

USBSID-Pico Cynthcart manual

Author: LouD - generated on 2026-01-29

Table of Contents

Disclaimer.....	2
Thank you.....	2
Firmwares with Cynthcart embedded.....	2
Usage.....	2
CC messages.....	2
Cynthcart control.....	2
Development.....	2
License.....	3
Software License ~ GNUv2.....	3
USBSID-Pico v1.3 PCB Hardware License ~ Creative Commons.....	3
USBSID-Pico v1.0 PCB Hardware License ~ Creative Commons.....	3

Disclaimer

I do this stuff in my free time for my enjoyment. Since I like to share my joy in creating this with everyone I try my best to provide a working PCB and Firmware. I am in no way an electronics engineer and can give ***no guarantees*** that this stuff does not break or damage your hardware, computer, phone, or whatever you try to hook it up to. Be sure to take great care when inserting any real MOS SID chips into the board. While everything has been tested with real chips, this is in no way a guarantee that nothing could go wrong. Use of this board and firmware at your own risk! I am in no way responsible for your damaged hardware. That being said, have fun!

Thank you

First off thanks go out to Paul Slocum for creating Cynthcart and Mario Ballano for creating emudore.

(The onboard emulator is called 'adorable' and is a fork of 'emudore')

Firmwares with Cynthcart embedded

Starting with firmware version v0.6.0-BETA firmwares ending with **_em** have an embedded emulator running Cynthcart.

For example **usbsidpico-v1.0_em.uf2** or **usbsidpico2-rgb-v1.3_em.uf2**

Usage

To start the emulator and Cynthcart you will need an USB-midi connection to USBID=Pico.

CC messages

85 (0x55) ~ Enable Cynthcart

86 (0x56) ~ Disable Cynthcart

87 (0x57) ~ Reset Cynthcart

Cynthcart control

For all other midi CC messages to control Cynthcart please refer to the Cynthcart manual.

Page two in github.com/PaulSlocum/cynthcart/blob/master/manual/cynthcart2.0.1.pdf [cynthcart2.0.1.pdf] or [cynthcart2.0.1_5x7.pdf](#)

On the right side of [cynthcartCommandChart1.pdf](#)

Or on the bottom of [cynthcartCommandChart2.pdf](#)

Development

More information about adorable (emudore-embedded) is available on the [github repo](#)

License

Software License ~ GNUv2

All code written by me in this repository is licensed under the terms of the GNU General Public License as published by the Free Software Foundation, version 2. Any code in this repository that is not written by me automatically falls under the licensing conditions by the authors of said code as mentioned in the source code header. For more information about this license please read the LICENSE document in the root of the USBSID-Pico repository.

USBSID-Pico v1.3 PCB Hardware License ~ Creative Commons

USBSID-Pico v1.3 PCB © 2025 by [LouD](#) is licensed under
Creative Commons Attribution-NonCommercial-NoDerivatives 4.0 International



USBSID-Pico v1.0 PCB Hardware License ~ Creative Commons

USBSID-Pico v1.0 PCB © 2024 by [LouD](#) is licensed under
Creative Commons Attribution-ShareAlike 4.0 International



Author: LouD - generated on 2026-01-29