



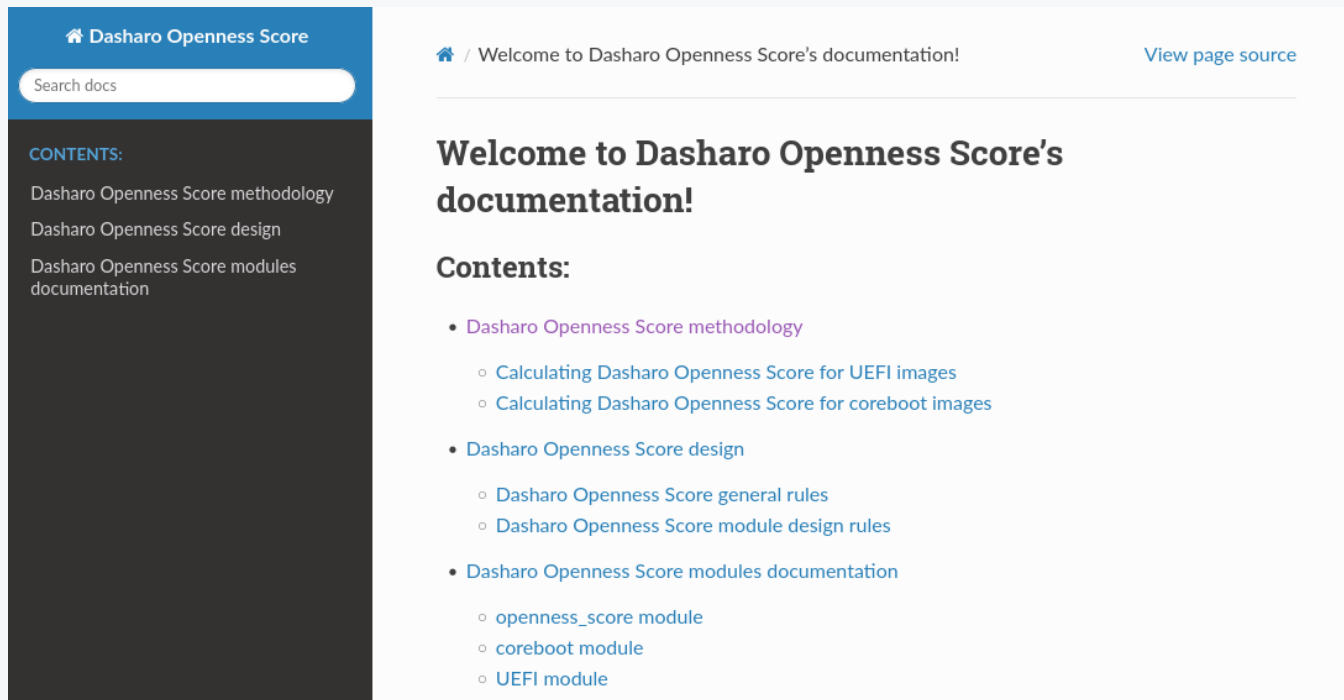
Dasharo Openess Score Status



- Short Introduction to Dasharo Openness Score (DTS)
- Exploring Dasharo Openness Score v0.1
- Upcoming Features: Dasharo Openness Score v0.2 and Beyond
- Q&A

- Dasharo Openness Score is a tool designed to quantify the openness of firmware images, providing insights into the ratio of open-source to closed-source components.
- Python, MIT licensed, <https://github.com/Dasharo/Openness-Score>
- DRY: <https://bit.ly/openness-score>
- Since last DUG we made some slight progress and we would like to treat this presentation as opportunity to provide more details about project status as well some knowledge about methodology.
- Unfortunately no new releases, but ...

<https://dasharo.github.io/Openness-Score/>



🏠 Dasharo Openness Score

Search docs

CONTENTS:

- Dasharo Openness Score methodology
- Dasharo Openness Score design
- Dasharo Openness Score modules documentation

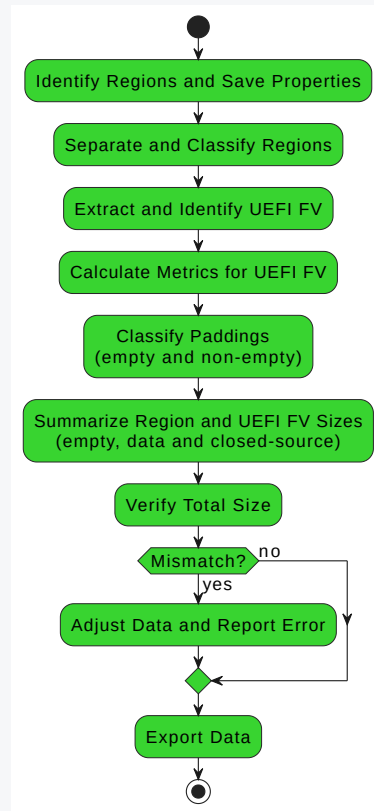
🏠 / Welcome to Dasharo Openness Score's documentation! [View page source](#)

Welcome to Dasharo Openness Score's documentation!

Contents:

- [Dasharo Openness Score methodology](#)
 - [Calculating Dasharo Openness Score for UEFI images](#)
 - [Calculating Dasharo Openness Score for coreboot images](#)
- [Dasharo Openness Score design](#)
 - [Dasharo Openness Score general rules](#)
 - [Dasharo Openness Score module design rules](#)
- [Dasharo Openness Score modules documentation](#)
 - [openness_score module](#)
 - [coreboot module](#)
 - [UEFI module](#)

- Documentation is in Sphinx at this point, but we will migrate mkdocs.



- CBFS classification is even more complex.

- Back in the days we provided Dasharo Openess Score (pre-v0.1) for NV4x 11th Gen v0.5.0 (2021/11/19).

Whole flash image

region	size	open-source percent (bytes)
descriptor	1000h	0%
ME	4FF000h	0%
BIOS	B00000h	62.9%
Summary	1000000h	43.2%

Summary

image	open-source percent (bytes)
Insyde	0%
Dasharo	43.2%

Open and closed source images are in the table below.

type	summarised size	Percent
open-source	1D42D1h	62.9%
closed-source	114276h	37.1%
empty (not included)	10F4ECh	

- Starting from upcoming:
 - NV4x, NS5x/7x ADL v1.7.0
 - NV4x, NS5x/7x TGL v1.5.0
- All Novacustom releases will contain Dasharo Openess Score v0.1

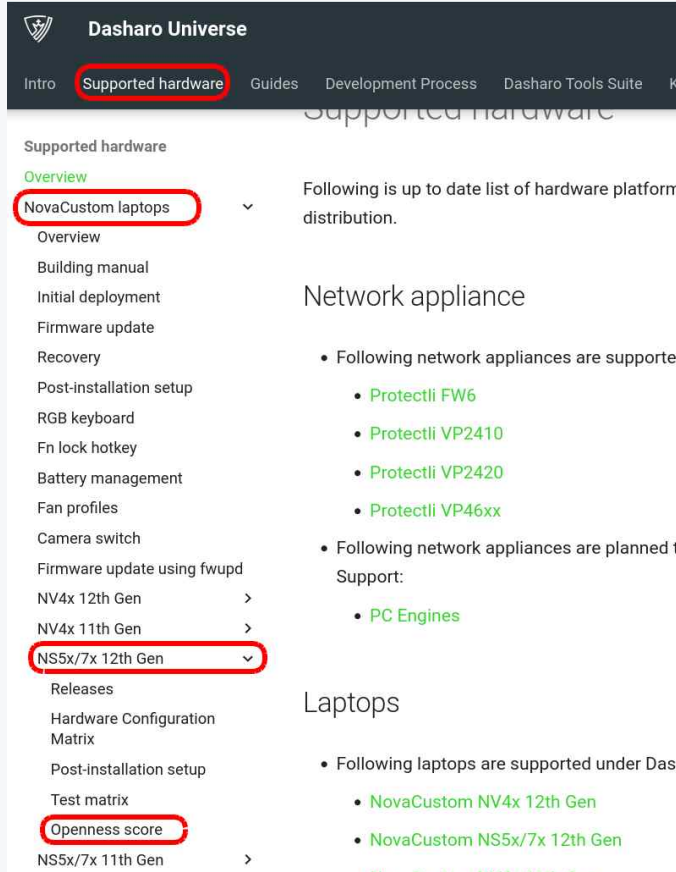
Dasharo Openness Score

Ever questioned the openness of your open-source firmware? Eager to discern the balance between open and closed-source code?

Enter the **Dasharo Openness Score**, a tool designed for the curious.

Our utility meticulously dissects firmware, quantifying the open-source to closed-source code ratio. It then presents this data in a visually digestible pie charts. For those intrigued by the mechanics, click [here](#) to access the comprehensive documentation explaining what the Dasharo Openness Score is, the rules it follows, and how reports are generated. For a quick snapshot of your firmware's openness, click [here](#) to access the full report directly.

- Above notes will be added to newsletters announcing releases, which include Dasharo Opness Score.



Dasharo Universe

Intro **Supported hardware** Guides Development Process Dasharo Tools Suite K

Supported hardware

[Overview](#)

NovaCustom laptops ▾

- Overview
- Building manual
- Initial deployment
- Firmware update
- Recovery
- Post-installation setup
- RGB keyboard
- Fn lock hotkey
- Battery management
- Fan profiles
- Camera switch
- Firmware update using fwupd
- NV4x 12th Gen >
- NV4x 11th Gen >
- NS5x/7x 12th Gen** ▾
- Releases
- Hardware Configuration Matrix
- Post-installation setup
- Test matrix
- Openness score**
- NS5x/7x 11th Gen >

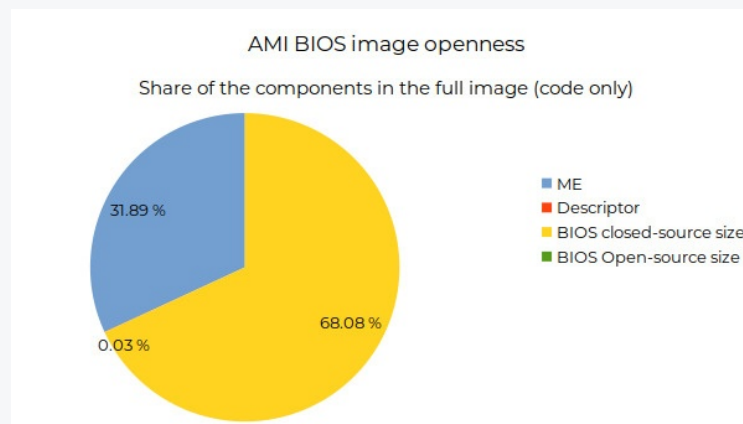
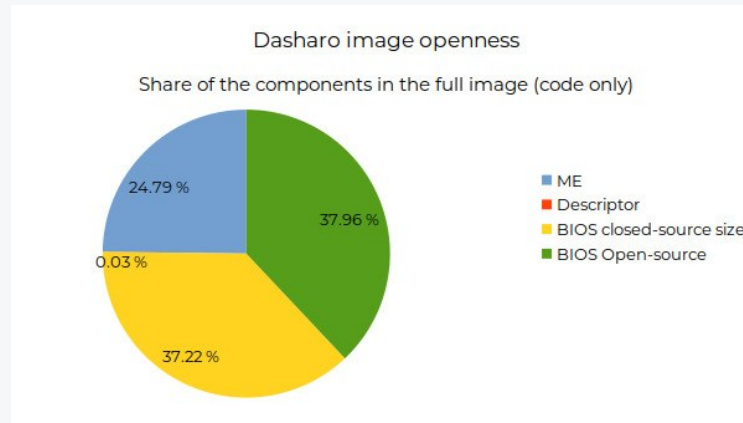
Following is up to date list of hardware platform distribution.

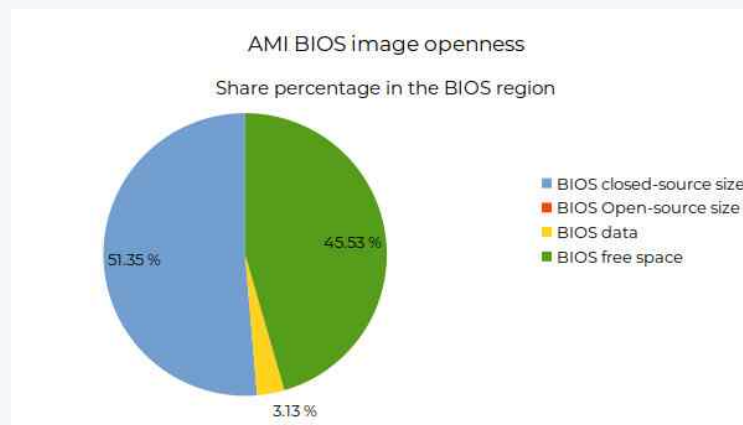
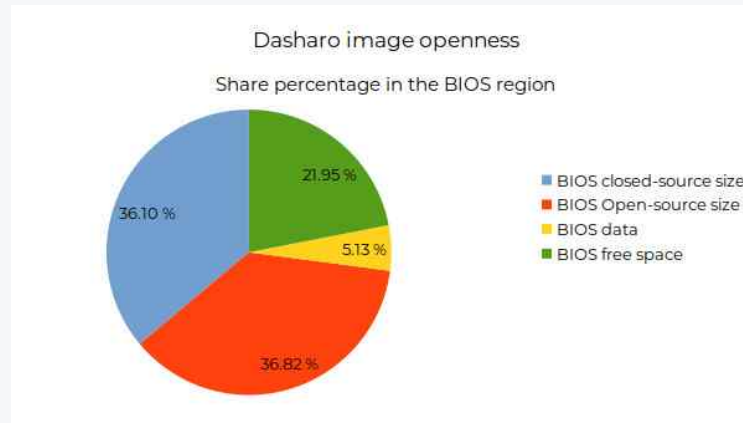
Network appliance

- Following network appliances are supported
 - [Protectli FW6](#)
 - [Protectli VP2410](#)
 - [Protectli VP2420](#)
 - [Protectli VP46xx](#)
- Following network appliances are planned to Support:
 - [PC Engines](#)

Laptops

- Following laptops are supported under Dasharo
 - [NovaCustom NV4x 12th Gen](#)
 - [NovaCustom NS5x/7x 12th Gen](#)
 - [NovaCustom NV4x 11th Gen](#)







- ETA: Q3 2023 (v0.1 integration)
 - No code changes.
 - Integration in Dasharo Release infrastructure.
 - ~~Increased Visibility:~~ Openness Score updates in newsletters and Dasharo User's Guide.
 - ~~Documentation Upgrade:~~ Improving methodology explanation in documentation.

- ETA: Q4 2023
- Planned features
 - **CI/CD Integration:** Including Openness Score script in CI/CD processes.
 - **Improved Visualization:** Enhancing visual representation for user-friendliness.
 - **Binary Comparison:** Comparing Dasharo binary with reference binaries.
 - **Versioning & Wide Application:** Implementing versioning and supporting multiple platforms.
 - **Advanced Parsing:** Utilizing ifdtool for improved image parsing.
- Planned bug fixes:
 - [GitHub issue #461](#) - Check for ME presence in coreboot images with ifdtool if flashmap does not indicate it
 - [GitHub issue #451](#) - Migrate Openness Score documentation from Sphinx to mkdocs



Q&A