

Open System Firmware Requirements Checklist (v1.2)

This form will help self-access compliance for Open System Firmware. Note these requirements only apply to the main application processor on server platforms. Please contact the OSF Leadership Team to see if your Product qualifies.

Reference Document:

[Open System Firmware Checklist](#)

Instructions:

- Upload artifacts listed in section 1.2 to OCP's GitHub: <https://github.com/opencomputeproject/OpenSystemFirmware/>
Instructions on using GitHub can be found here: <https://docs.github.com/en/github/managing-files-in-a-repository/adding-a-file-to-a-repository>

Note, these artifacts are made public as soon as they are uploaded.

- Complete the form below.

1 Review Package	Required?	Answer FREEFORM	Notes
1.1. Required Supporting documentation		Answer FREEFORM	
a. Name of the platform under review	Yes		
b. Short description of the host firmware and its technical features	Yes		See Appendix B of the OSF checklist for what constitutes a "technical feature".
c. Emails to contact during the review process	Yes		
d. PROVIDE URL for submission on OCP's GitHub	Yes		Artifacts must be submitted to https://github.com/opencomputeproject/OpenSystemFirmware/
e. List of other URLs for any source code dependencies	optional		For example, a link to https://github.com/tianocore/edk2
1.2. Required Artifacts		Answer YES if the artifact is included on OCP GitHub	
a. <i>Firmware image</i>	Yes		<i>Firmware image</i> : A binary file which, when written directly to the firmware medium (typically a NOR FLASH, but other mediums are valid), will boot the machine.
b. Description of the firmware ownership model	Yes		As described in section-3
c. Top-level build script	Yes		As described in section-4
d. Documentation	Yes		As described in section-5
e. Test results	Yes		As described in section-6
f. Tool for user modification	Yes		As described in section-9
2. Licensing and Redistribution	Required?	Answer YES or NO	Notes
2.1. The entirety of the review package and artifacts are:		Answer YES or NO	
a. <i>redistributable</i> ,	Yes		<i>Redistributable</i> : A software component (in source or binary form) with a license permitting redistribution from anyone to anyone by any means without an NDA, payment or royalties.
b. publicly available for download, and	Yes		
c. submitted during the review process under a license that allows OCP to host on the marketplace.	Yes		
2.2. All source code published as part of the review process must meet the definition of <i>open-source</i>.	Yes		<i>Open-source</i> : Source code which is <i>redistributable</i> under an OSI-compatible license as defined by https://opensource.org/licenses and is publicly available for download.
2.3. OSF is <i>open-source</i> by default. Closed-source items are allowed given an approved and reasonable exception reason such as "containing silicon IP". Each closed-source item must be redistributable, included in the submission and reasonably granular. It is strongly encouraged, but not required, that every severable firmware component (e.g. a UEFI driver) be so documented.	optional	Answer FREEFORM	Feel free to use Sheet2 for more room. <i>Open-source</i> : Source code which is <i>redistributable</i> under an OSI-compatible license as defined by https://opensource.org/licenses and is publicly available for download.
3. Ownership and Reusability	Required?	Answer YES or NO	Notes
3.1. Owners must have the ability to:		Answer YES or NO	<i>Owner</i> : The owner of the physical machine.

a. Update the firmware on the machine.	Yes		
b. If firmware needs to be signed*, b.i. Choose their own firmware signing key and change it as needed over time OR obtain the necessary signing key(s) through a transfer of ownership process. b.i.1. Note that, in particular, a requirement to choose immutable keys in advance and provide to, e.g., a chipset vendor or ODM makes a system noncompliant.	Yes		
c. Change owners at least 8 times.	Yes		The number '8' is considered by end-users to be too low; it was chosen based on chipset vendor guidance concerning the limits of current chipsets. OCP reserves the right, in later versions of this spec, to increase the number. The most desirable value would be infinity, as in, e.g., Chromebooks
d. Transfer ownership to a non-predetermined owner.	Yes		
4. Build System	Required?	Answer YES or NO	Notes
4.1. Build and update utilities must be:		Answer YES or NO	
a. <i>open-source</i> , or	Yes		<i>Open-source</i> : Source code which is <i>redistributable</i> under an OSI-compatible license as defined by https://opensource.org/licenses and is publicly available for download.
b. a <i>redistributable</i> binary which must run natively under at least Linux or Windows.	Yes		<i>Redistributable</i> : A software component (in source or binary form) with a license permitting redistribution from anyone to anyone by any means without an NDA, payment or royalties.
4.3. The top level build script shall be the only script needed to be run to fetch all source code, binary blobs needed, and to build an entire host firmware image.	Yes		
a. The top level build script may invoke other scripts and utilities to carry out its main function.	Yes		
b. It must be possible to build without a network connection once a suitable set of packages and binaries have been gathered.	Yes		
4.5. If the platform requires signed firmware, it shall be possible for the owner to sign the image with a user-provided key. It must be possible to re-sign the firmware with a new key. Signing must continue to work after End Of Support.	Yes		<i>Owner</i> : The owner of the physical machine.
5. Documentation	Required?	Answer YES or NO	Notes
5.1. Documentation describes features of firmware, and build and install procedures.	Yes		
a. The documentation shall describe the validation scope (i.e. the test regime).	Yes		
		Select LEVEL	
5.3. The documentation shall describe the readiness of the OSF with one of the following levels:	Yes		
a. Pre-silicon. The OSF is good enough for pre-silicon entrance on the corresponding OCP platform as-is.			
b. Power-On. The OSF is good enough for power-on entrance on the corresponding OCP platform as-is. This is the level described in this checklist.			
c. Pre-production. The OSF is good enough for pre-production entrance on the corresponding OCP platform as-is.			
d. Production. The OSF is good enough for production entrance on the corresponding OCP platform as-is.			
6. Test Regime	Required?	Answer YES or NO	Notes
6.1. The platform with OSF must be capable of booting an operating system whose code is openly available under an OSI-approved license (such as Linux).	Yes		
6.2. Bare minimum: The platform with OSF needs to be able to be cold re-booted into OS 100 times sequentially without issue.	Yes		
6.3. If the system advertises support for a warm reboot, the platform flashed with OSF needs to be able to be warm re-booted into OS 100 times sequentially without issue.	optional		
6.4. Any support contract or warranty must confirm the system is conformant with such reboot tolerance.	Yes		

7. Standard Compliance		Required?	Answer YES or NO
	7.1. For a given architecture family, the minimum standard interfaces required to boot and run a reasonable set of kernels must be provided. E.g., if required, ACPI should be available. On Power or RISC-V, flattened device tree should be available.	Yes	
8. Firmware Configuration		Required?	Answer YES or NO
	8.1. The OSF needs to provide a tool so that firmware configuration can be viewed and changed from, at minimum Linux, and optionally Windows.	Yes	
	8.2. This tool must be released in source form under an OSI-approved license. Existing examples in Linux include efibootmgr, sysfs variables, etc..	Yes	
9. Firmware Upgrade		Required?	Answer YES or NO
	9.1. <i>Open-source</i> software must exist to update the firmware OR sufficient public documentation exists to write such software.	Yes	<i>Open-source</i> : Source code which is <i>redistributable</i> under an OSI-compatible license as defined by https://opensource.org/licenses and is publicly available for download.
	9.2. <i>Owners</i> must have the ability to update the firmware on the machine regardless of its state in its current life cycle.	Yes	<i>Owner</i> : The owner of the physical machine.

HARDWARE MANAGEMENT			
Please answer the following questions:	Required?	Answer	Action
Did you execute and pass the Redfish Service Validator v1.3.9?	Yes		If yes, upload report in Contribution Portal. If no, provide reason.
Did you execute and pass the Redfish Protocol Validator v1.0.2?	Yes		If yes, upload report in Contribution Portal. If no, provide reason.
Does the platform's manageability interface conform to the Redfish Interop Validator v1.1.7 with the appropriate Redfish profile?	Yes		If yes, upload report in Contribution Portal. If no, provide reason.
If applicable, which platform does the manageability interface conform to?	Select One:	Server	If yes, upload report in Contribution Portal. If no, provide reason.
Did you execute and run the Redfish Usecase Checker v1.0.6 (recommended)?	Yes		If yes, upload report in Contribution Portal. If no, provide reason.
All exceptions will need to be approved by the Project Leads. If approved, then it will proceed to the IC for review for consideration.			

BMC (if exists)					
Submission Type	Description	Required	Answer	License	Action
For Source Code + Binary Blobs	Package: source code and instructions enabling one to build a binary	Yes			<p>If yes, upload code in Github Repo and add link in Contribution Portal. If no, provide reason.</p> <p>In OCP Github: https://github.com/opencomputeproject/OCPAcceptedBMC/XXX If in another Github, please provide pointer in OCP Github.</p> <p>A vendor can create /<vendor_name>/<product_name>/ directory and upload the BMC source code and/or binary blobs</p>