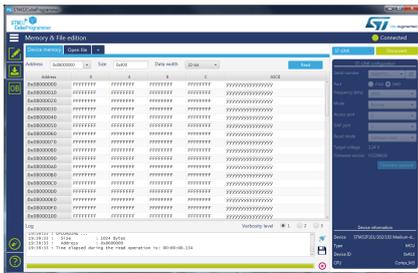


STM32CubeProgrammer all-in-one software tool



Features

- Erases, programs, views and verifies the content of the device Flash memory
- Supports Motorola S19, Intel HEX, ELF, and binary formats
- Supports debug and bootloader interfaces:
 - ST-LINK debug probe (JTAG/SWD)
 - UART, USB DFU, I²C, SPI, and CAN bootloader interfaces
- Programs, erases and verifies external memories, with examples of external Flash loaders to help users to develop loaders for specific external memories
- Automates STM32 programming (erase, verify, programming, configuring option bytes)
- Allows OTP memory programming
- Supports the programming and configuring of option bytes
- Offers a command-line interface for automation through scripting
- ST-LINK firmware update
- Enables secure firmware creation using the STM32 Trusted Package Creator tool
- STM32MP1 Series peripheral boot and flashing
- Supports OTA programming for the STM32WB Series
- Multi-OS support: Windows[®], Linux[®], macOS[®]

Product status link

[STM32CubeProg](#)




Description

STM32CubeProgrammer (STM32CubeProg) is an all-in-one multi-OS software tool for programming STM32 products.

It provides an easy-to-use and efficient environment for reading, writing and verifying device memory through both the debug interface (JTAG and SWD) and the bootloader interface (UART, USB DFU, I²C, SPI, and CAN).

STM32CubeProgrammer offers a wide range of features to program STM32 internal memories (such as Flash, RAM, and OTP) as well as external memories.

STM32CubeProgrammer also allows option programming and upload, programming content verification, and programming automation through scripting.

STM32CubeProgrammer is delivered in GUI (graphical user interface) and CLI (command-line interface) versions.

1 General information

STM32CubeProg supports STM32 products based on the Arm® Cortex® processor.

Note: Arm is a registered trademark of Arm Limited (or its subsidiaries) in the US and/or elsewhere.



1.1 Ordering information

STM32CubeProg is available for free download from the www.st.com website.

1.2 What is STM32Cube™?

STM32Cube™ is an STMicroelectronics original initiative to significantly improve designer's productivity by reducing development effort, time and cost. STM32Cube™ covers the whole STM32 portfolio.

STM32Cube™ includes:

- A set of user-friendly software development tools to cover project development from the conception to the realization, among which:
 - STM32CubeMX, a graphical software configuration tool that allows the automatic generation of C initialization code using graphical wizards.
 - STM32CubeProgrammer (STM32CubeProg), a programming tool available in graphical and command-line versions.
 - STM32CubeMonitor-Power (STM32CubeMonPwr), a monitoring tool to measure and help in the optimization of the power consumption of the MCU.
- STM32Cube™ MCU Packages, comprehensive embedded-software platforms specific to each microcontroller series (such as STM32CubeF4 for the STM32F4 Series), which include:
 - STM32Cube™ hardware abstraction layer (HAL), ensuring maximized portability across the STM32 portfolio.
 - STM32Cube™ low-layer APIs, ensuring the best performance and footprints with a high degree of user control over the HW
 - A consistent set of middleware components such as RTOS, USB, TCP/IP, and graphics.
 - All embedded software utilities with full sets of peripheral and applicative examples.

1.3 License

STM32CubeProg is delivered under the *Mix Ultimate Liberty+OSS+3rd-party V1* software license agreement (SLA0048).

For more details about the license agreement of each component, refer to the release note (RN0109).

Revision history

Table 1. Document revision history

Date	Version	Changes
14-Dec-2017	1	Initial release.
12-Apr-2018	2	Part number changed to STM32CubeProg.
19-Jul-2018	3	Updated section <i>License</i> .
25-Feb-2019	4	Tool support extended to the STM32MP1 Series and STM32WB Series: updated Features and Description . Added General information .

IMPORTANT NOTICE – PLEASE READ CAREFULLY

STMicroelectronics NV and its subsidiaries (“ST”) reserve the right to make changes, corrections, enhancements, modifications, and improvements to ST products and/or to this document at any time without notice. Purchasers should obtain the latest relevant information on ST products before placing orders. ST products are sold pursuant to ST’s terms and conditions of sale in place at the time of order acknowledgement.

Purchasers are solely responsible for the choice, selection, and use of ST products and ST assumes no liability for application assistance or the design of Purchasers’ products.

No license, express or implied, to any intellectual property right is granted by ST herein.

Resale of ST products with provisions different from the information set forth herein shall void any warranty granted by ST for such product.

ST and the ST logo are trademarks of ST. All other product or service names are the property of their respective owners.

Information in this document supersedes and replaces information previously supplied in any prior versions of this document.

© 2019 STMicroelectronics – All rights reserved