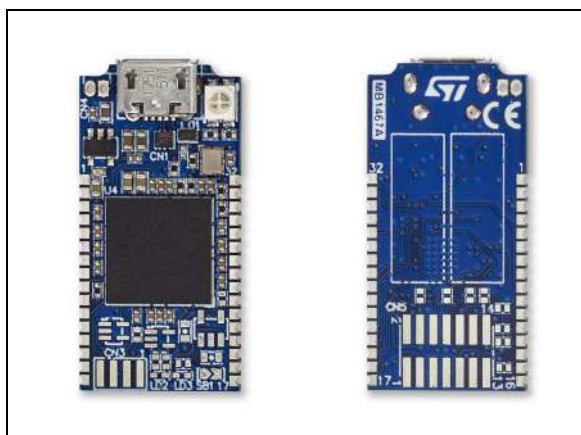


## STLINK-V3MODS mini debugger and programmer for STM32 microcontrollers

Data brief

### Features

- Modular probe with small size: approximately 15 x 30 mm
- Direct-to-PCB implementation by 2 x 16-pin 1.27 mm edge castellated vias, with all signals available in required minimum PCB surface
- Self-powered through a USB connector (Micro-B)
- USB 2.0 high-speed compatible interface
- Direct firmware update support (DFU)
- JTAG / serial wire debugging (SWD) specific features:
  - 3 V to 3.6 V application voltage support and 5 V tolerant inputs
  - JTAG communication support
  - SWD and serial wire viewer (SWV) communication support
- Virtual COM port (VCP) specific features:
  - 3 V to 3.6 V application voltage support on the UART interface and 5 V tolerant inputs
  - VCP frequency up to 15 MHz
- Multi-path bridge USB to SPI/UART/I<sup>2</sup>C/CAN/GPIOs specific features:
  - 3 V to 3.6 V application voltage support and 5 V tolerant inputs
- Drag-and-drop Flash programming
- Two color LEDs: communication, power



Pictures are not contractual.

### Description

The STLINK-V3MODS is a small size debugging and programming probe for STM32 microcontrollers.

The JTAG/SWD interfaces are used to communicate with any STM32 microcontroller located on an application board.

The STLINK-V3MODS also provides a Virtual COM port interface enabling the host PC to communicate with the target microcontroller through one UART, and bridge interfaces (SPI, I<sup>2</sup>C, CAN, GPIOs) simplifying for instance the field programming through bootloader.

The STLINK-V3MODS is ready to be embedded in a master application and can be directly soldered on the PCB motherboard.

## General information

The STLINK-V3MODS embeds an STM32 32-bit microcontroller based on the Arm<sup>®(a)</sup> Cortex<sup>®</sup>-M processor.



## System requirements

- Windows<sup>®</sup> OS (7, 8 and 10), Linux<sup>®</sup> 64-bit, or macOS<sup>®(b)</sup>
- USB Type-A to Micro-B cable

## Development toolchains

- Keil<sup>®</sup> MDK-ARM<sup>(c)</sup>
- IAR<sup>™</sup> EWARM<sup>(c)</sup>
- GCC-based IDEs

## Ordering information

To order the STLINK-V3MODS, refer to [Table 1](#).

**Table 1. Ordering information**

Order code	Description
STLINK-V3MODS	STLINK-V3 modular in-circuit debugger and programmer for STM32 microcontrollers

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

b. macOS<sup>®</sup> is a trademark of Apple Inc. registered in the U.S. and other countries.

c. On Windows<sup>®</sup> only.

## Revision history

**Table 2. Document revision history**

Date	Revision	Changes
20-Dec-2018	1	Initial version

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