SEGGER

ISO 9001 certified

embedded**software**
solutions

J-Link™

ARM7/9®, Cortex-M3™ cores supported

Download speed up to 720 KBytes/s

Support for multi core debugging

Fully plug and play compatible

USB

j-link

SEGGER
www.segger.com

JTAG

JTAG/SWD Emulator

+ + + Fast - Efficient - Reliable + + +

embedded**software**
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J-Link™ is a JTAG/SWD emulator designed for ARM® cores. It connects via USB to a PC running Microsoft® Windows® 2000, XP or Vista™. J-Link™ is compatible with the standard 20-pin connector defined by ARM®.

J-Link™ features:

- Any ARM7/9/11® and Cortex-M3®
- Serial Wire Debug (SWD) supported
- Serial Wire Viewer (SWV) with up to 6 MHz supported
- Maximum JTAG speed 12 MHz
- Download speed up to 720 KB/sec
- DCC speed up to 800 KB/sec
- USB 2.0 interface
- No power supply required, powered through USB
- Support for adaptive clocking
- Mulitcore debugging supported
- Support for multiple devices on scan chain
- Embedded Trace Buffer (ETB) support
- All JTAG/SWD signals can be monitored, target voltage can be measured
- Standard 20-pin JTAG connector
- Optional 14-pin JTAG adapter available
- Wide target voltage range: 1.2V - 3.3V, 5.0V tolerant
- USB and 20-pin ribbon cable included
- Memory viewer (J-Mem) included
- TCP/IP server included, which allows using J-Link via TCP/IP networks
- Supported by most popular debuggers
- RDI DLL available, which allows using J-Link with RDI compliant software
- SDK available

Additional software packages

Flash download

J-Link™ flash download allows a debugger to download program into flash even if the debugger does not have a flash loader.

Flash breakpoints

More and more applications are based on ARM® processor-based microcontrollers. Since RAM size is an expensive part of an ARM® processor-based micro, most of these microcontrollers do not have enough RAM to hold program and data in real world applications. Debugging in flash is normally limited to the two hardware breakpoints permitted by the on-chip debug unit of ARM Powered® chips (ICE-breaker module).

SEGGER offers a powerful and efficient debug solution. The J-Link™ software allows setting an unlimited number of software breakpoints in flash memory areas, rather than just the 2 hardware breakpoints. A RAM code, specially designed for this purpose, sets and clears flash breakpoints extremely fast; on micros with fast flash the difference between breakpoints in RAM and flash is hardly noticeable.

J-Link GDB Server

The J-Link™ GDB Server is a remote server for the GDB. The GDB and GDB Server communicate via a TCP/IP connection, using the standard GDB protocol. The GDB Server translates the GDB monitor commands into J-Link™ commands.

J-Link SDK

The J-Link™ ARM SDK is a standard Windows DLL typically used from C. It makes the entire functionality of the J-Link™ available thru the exported functions and allows to write your own program using J-Link™.

J-Flash

J-Flash is a stand-alone flash programming software for PCs running Microsoft® Windows®. It has an intuitive user interface and makes programming flash devices convenient. J-Flash requires a J-Link™ to interface to the hardware. It is able to program internal and external flash devices at very high speeds. Another notable feature is smart read back, which only transfers non-blank portions of the flash, increasing the speed of read back greatly.

Related products

J-Link ARM Pro

J-Link ARM Pro is a refined version of the regular J-Link featuring an Ethernet interface in addition to the USB interface. It comes with licenses for all J-Link related SEGGER software products: FlashDL, FlashBP, RDI, J-Flash, GDB Server, providing the optimum debugging solution for professional developers.

J-Trace for Cortex-M3

J-Trace for Cortex-M3 is an enhanced version of J-Link, specifically designed for Cortex-M3 based devices. In addition to the features of the regular J-Link, it comes with a trace interface and 16MBytes of trace memory. On device with ETM, the trace memory can be used to capture the flow of execution of app. 32 Million instructions.

Flasher ARM

Flasher ARM is a programming tool for microcontrollers with on-chip or external Flash memory and ARM core. Flasher ARM is designed for programming flash targets with the J-Flash software or stand-alone. In addition to that Flasher ARM has all of the J-Link functionality.

Trial licenses can be obtained from: sales@segger.com