

RISC-V embedded variant RV32E now fully supported by SEGGER's Floating-Point library

Monheim, Germany – September 17th, 2020

SEGGER announces a new version of the RISC-V Floating-Point Library with full support for RV32E – the embedded variant of the RISC-V core. The new library leads to a massive reduction in code size for RISC-V applications using floating point.

With all arithmetic functions hand-coded in assembly language, the memory footprint of RISC-V applications using floating-point code is minimized. The Floating-Point library complies with the RISC-V ABI standard and can therefore be easily used as a plug-and-play replacement for any other floating point library.

Replacing the GNU floating-point library used by most toolchains with the SEGGER assembly optimized equivalent results in an over 72% code size reduction of the benchmark application. The library supports RV32I, as well as the newly introduced RV32E embedded variant of the RISC-V core with the assembly-level code.

"This new release is much smaller than anything available to us for comparison and, at the same time, is incredibly fast," says Rolf Segger, Founder of SEGGER. "In the world of Embedded Systems, every byte counts. The SEGGER Floating-Point library delivers high performance and uses the architectural advantages of RISC-V to close the code-density gap to comparable Arm Cortex devices. We are convinced that our software is market-leading and – unlike some of our competitors – we facilitate and encourage comparing and benchmarking it."

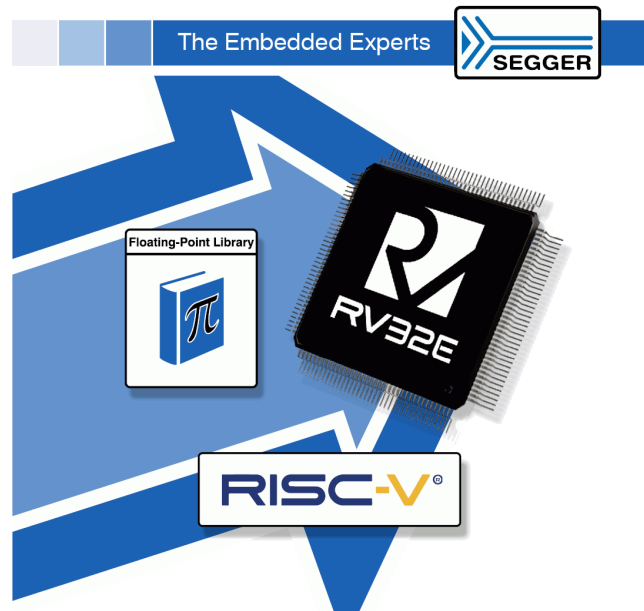
The library can be licensed by end customers and toolchain suppliers. Just like the [SEGGER Runtime Library](#), it is integrated into [SEGGER Embedded Studio](#) for RISC-V. Using Embedded Studio, benchmarking for both floating-point and runtime libraries can be done quickly and easily. It is readily available at no cost for non-commercial usage under [SEGGER's Friendly License](#).

For a detailed look at SEGGER's [Floating-Point Library](#) for RISC-V please visit:

<https://blog.segger.com/profiling-and-code-coverage-on-risc-v-using-simulation/>

For more information on SEGGER's support for RISC-V please visit:

<https://www.segger.com/risc-v/>



About SEGGER

SEGGER Microcontroller has over twenty-five years of experience in Embedded Computer Systems, producing state-of-the-art software libraries, and offering a full set of hardware tools (for development and production) and software tools.

SEGGER provides an RTOS plus a complete spectrum of software libraries including communication, security, data compression and storage, user interface software and more. Using SEGGER software libraries gives developers a head start, benefiting from decades of experience in the industry.

SEGGER's professional software libraries and tools for Embedded System development are designed for simple usage and are optimized for the requirements imposed by resource-constrained embedded systems. The company also supports the entire development process with affordable, high-quality, flexible, easy-to-use tools.

The company was founded by Rolf Segger in 1992, is privately held, and is growing steadily. SEGGER also has a U.S. office in the Boston area and branch operations in Silicon Valley and the UK, plus distributors on most continents, making SEGGER's full product range available worldwide.

Why SEGGER?

In short, SEGGER has a full set of tools for embedded systems, offers support through the entire development process, and has decades of experience as the Embedded Experts.

In addition, SEGGER software is not covered by an open-source or required-attribution license and can be integrated in any commercial or proprietary product, without the obligation to disclose the combined source.

Finally, SEGGER offers stability in an often volatile industry making SEGGER a very reliable partner for long-term relationships.

For additional information please visit: www.segger.com

Contact information:

Dirk Akemann

Marketing Manager

Tel: +49-2173-99312-0

E-mail: info@segger.com

Issued on behalf of:

SEGGER Microcontroller GmbH

Ecolab-Allee 5

40789 Monheim am Rhein

Germany

www.segger.com

SEGGER Microcontroller Systems LLC

101 Suffolk Lane

Gardner, MA 01440

United States of America

www.segger.com