

# ValueAnalyzer for ARM

ValueAnalyzer is a static program analyzer for value analysis of register and memory contents. It is particularly useful for verifying the absence of illegal accesses to an embedded software system from within third-party modules provided as object code.

## Key benefits

- The analysis is fully automatic and valid for all inputs. No input patterns need to be provided.
- The analysis performed by ValueAnalyzer is conservative, i.e. the results are safe. All illegal accesses that are present will also be reported.
- Supplied third-party software can be analyzed right away. It does not have to be integrated on the ECU.
- No debug information is required. The results are not affected by possible bugs in the debug output.
- Seamless integration with other analysis tools from AbsInt in an intuitive user interface.

## Supported compilers

- CompCert C Compiler
- ARM Developer Suite C compiler
- Texas Instruments TMS 470 compiler
- IAR compiler suite
- Tasking C compiler
- Green Hills MULTI for ARM
- Keil MDK-ARM compiler suite
- GNU C Compiler (GCC)

## Supported architecture variants and extensions

- ARMv4 / ARMv4T
- ARMv5T / ARMv5TE
- ARMv6 / ARMv6T2
- ARMv7
- Advanced SIMD / “NEON”
- Thumb/Thumb-2
- VFP

## Supported ARM families

- ARM7TDMI / ARM9TDMI

- StrongARM
- ARM9E / ARM10E
- XScale
- Cortex-A / Cortex-M / Cortex-R

## System requirements

- Windows: 64-bit Windows 7 SP1 or newer
- Linux: 64-bit CentOS/RHEL 6 or compatible
- macOS: macOS High Sierra 10.13 or newer
- 4 GB of RAM (16 GB recommended)
- 4 GB of disk space

## Also available

The following AbsInt products are also available for this target:

- aiT
- StackAnalyzer
- TimingProfiler
- Qualification Software Life Cycle Data Report

## More information

- Visit our website: [www.absint.com](http://www.absint.com)
- Speak with a product specialist:  
call +49 681 383 600

## About AbsInt

AbsInt provides advanced development tools for embedded systems, and tools for analysis, optimization and verification of safety-critical software. Our customers are located in more than 40 countries worldwide. We have distribution agreements with major software distributors in Asia, North America, Middle East, and throughout Europe.

## Our headquarters

Science Park 1  
66123 Saarbrücken, Germany  
Phone: +49 681 383 600  
Fax: +49 681 383 60 20  
Email: [info@absint.com](mailto:info@absint.com)  
Web: [www.absint.com](http://www.absint.com)

