# Debug Commands

Breakpoint Commands

Breakpoint commands create, delete, enable, disable, or list the breakpoints. Use breakpoints to halt program execution, to stop commands, or interrupt user functions.

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| Command | Description |
| [BreakAccess](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_breakaccess.htm) | Adds an access breakpoint with a length parameter to the breakpoint list. |
| [BreakDisable](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_breakdisable.htm) | Disables one or more breakpoints. |
| [BreakEnable](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_breakenable.htm) | Enables one or more breakpoints. |
| [BreakKill](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_breakkill.htm) | Removes one or more breakpoints from the breakpoint list. |
| [BreakList](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_breaklist.htm) | Lists the current breakpoints. |
| [BreakSet](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_breakset.htm) | Adds a breakpoint expression to the list of breakpoints. |

General Commands

General commands perform a number of miscellaneous debugging operations.

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| Command | Description |
| [ASSIGN](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_assign.htm) | Assigns input and output sources for the Serial window. |
| [DEFINE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_define.htm) | Creates a Toolbox button. |
| [DIR](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_dir.htm) | Generates a directory of symbol names. |
| [EXIT](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_exit.htm) | Exits the debug mode. |
| [INCLUDE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_include.htm) | Reads and executes the commands in a command file. |
| [KILL](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_kill.htm) | Deletes user- or signal functions and Toolbox buttons. |
| [LOAD](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_load.htm) | Loads object modules, and HEX files. |
| [LOG](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_log.htm) | Creates log files, queries log status, and closes log files for the Debug window. |
| [MODE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_mode.htm) | Sets the baud rate, parity, and number of stop bits for PC COM ports. |
| [RESET](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_reset.htm) | Resets the CPU, memory map assignments, and predefined variables. |
| [SAVE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_save.htm) | Saves a memory range in an Intel HEX386 file. |
| [SCOPE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_scope.htm) | Displays address assignments of modules and functions of a target program. |
| [SET](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_set.htm) | Sets the string value for predefined variables. |
| [SIGNAL](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_signal.htm) | Displays signal function status and removes active signal functions. |
| [SLOG](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_slog.htm) | Creates log files, queries log status, and closes log files for the Serial window. |

Memory Commands

Memory commands display and change the content of memory.

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| Command | Description |
| [ASM](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_asm.htm) | Assembles in-line code. |
| [DEFINE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_define.htm) | Defines symbols or Toolbar buttons. |
| [DISPLAY](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_display.htm) | Displays the content of memory. |
| [ENTER](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_enter.htm) | Enters values into a specified memory area. |
| [EVALuate](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_evaluate.htm) | Evaluates an expression and outputs the results. |
| [MAP](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_map.htm) | Specifies access parameters for memory areas. |
| [Unassemble](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_unassemble.htm) | Disassembles program memory. |
| [WatchSet](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_watchset.htm) | Adds a watch variable to the Watch window. |
| [WatchKill](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_watchkill.htm) | Kills all watch variable in the Watch window. |

Program Commands

Program commands execute target programs and analyze their performance.

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| Command | Description |
| [COVERAGE](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_coverage.htm) | Displays code coverage information. |
| [Go](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_go.htm) | Starts program execution. |
| [LogicAnalyze](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_la.htm) | Adds, deletes, or displays Logic Analyser variables. |
| [PerformanceAnalyze](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_perfanalyze.htm) | Adds, deletes, displays, or resets the Performance Analyzer ranges. |
| [Pstep](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_pstep.htm) | Steps over instructions but does not step into procedures or functions. |
| [Ostep](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_ostep.htm) | Steps out of the current function. |
| [Tstep](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_cm_tstep.htm) | Steps over instructions and into functions. |

ms-its:C:\Keil\ARM\HLP\uv4.chm::/note.gifNote

* [Expressions](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_db_expressions.htm) describes the debug commands syntax and offers additional examples.
* [Fully Qualified Symbols](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_db_exp_symb_fq.htm) explains the use of symbols.
* [System Variables](ms-its:C:\Keil\ARM\HLP\uv4.chm::/uv4_db_exp_sysvariables.htm) help setting or querying specific system functions.