# Debug overview

The debugger lets you see what's going on "inside" a program while it executes.

In order to debug your application, you must use executables compiled for debugging. These executables contain additional debug information that lets the debugger make direct associations between the source code and the binaries generated from that original source.

The CDT debugger uses GDB as the underlying debug engine. It translates each user interface action into a sequence of GDB commands and processes the output from GDB to display the current state of the program being debugged.

**Tip:** Editing the source after compiling causes the line numbering to be out of step because the debug information is tied directly to the source. Similarly, debugging optimized binaries can also cause unexpected jumps in the execution trace.



[Overview of the CDT](http://docs.google.com/cdt_c_over_cdt.htm)

[Debug information](http://docs.google.com/cdt_c_dbg_info.htm)



[Debugging](http://docs.google.com/tasks/cdt_o_debug.htm)



[Run and Debug dialog box](http://docs.google.com/reference/cdt_o_run_dbg_pages.htm)

