Demystifying Common Microcontroller Debug Protocols

What actually happens on the wire when debugging hardware

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```
❯ arm-none-eabi-gdb target/example-image
GNU gdb (Arm GNU Toolchain 13.3.Rel1 (Build arm-13.24)) 14.2.90.20240526-git
Copyright (C) 2023 Free Software Foundation, Inc.
License GPLv3+: GNU GPL version 3 or later <http://gnu.org/licenses/gpl.html>
This is free software: you are free to change and redistribute it.
There is NO WARRANTY, to the extent permitted by law.
Type "show copying" and "show warranty" for details.
This GDB was configured as "--host=aarch64-apple-darwin20.6.0 --target=arm-none-eabi".
Type "show configuration" for configuration details.
For bug reporting instructions, please see:
<https://bugs.linaro.org/>.
Find the GDB manual and other documentation resources online at:
    <http://www.gnu.org/software/gdb/documentation/>.

For help, type "help".
Type "apropos word" to search for commands related to "word"...
target/example-image: No such file or directory.
(gdb)
```