Connecting Devices

You can connect devices to the development PC to run, debug, and analyze applications built for them from Qt Creator. When you install Qt for a target platform, such as Android or QNX, the build and run settings for the development targets might be set up automatically in Qt Creator.

You can connect the device to the development PC using a USB connection. Additionally, you can connect Linux-based devices by using a WLAN connection.

The experimental WebAssembly plugin enables you to build your applications in WebAssembly format, to deploy them, and to run them in a web browser.

- Connecting Android Devices

  Qt applications for Android are compiled as `shared objects` that are loaded by a Java launcher that is part of Qt. This is totally transparent to users. As Qt is composed of libraries referencing each other, Qt 5 applications are only supported on Android version 4.1 (API level 16), or later, and Qt 6 applications on Android version 6.0 (API level 23), or later. You must install a Qt version targeting Android and the Android SDK and NDK to develop for Android devices.

- Connecting Bare Metal Devices

  You can connect bare metal devices to the development PC and use Qt Creator to debug applications on them with GDB or a hardware debugger.

- Connecting Boot2Qt Devices

  You can connect Boot2Qt devices to the development PC to run, debug, and analyze applications built for them from Qt Creator.

- Adding Docker Devices

  You can add Docker images as *devices* to run, debug, and analyze applications built for Docker containers from Qt Creator.

- Connecting Generic Remote Linux Devices

  If you have a tool chain for building applications for embedded Linux devices installed on the development PC, you can add it and the device to Qt Creator.

- Connecting iOS Devices

  You use the tools delivered with Xcode to connect devices to Qt Creator. Qt Creator detects the tools and configured devices automatically and uses the tools to build, deploy, and run applications.

- Connecting MCUs

  You can connect MCU boards to a development host to deploy, run, and debug applications on them from Qt

You can connect QNX devices to the development PC to deploy, run and debug applications on them from within Qt Creator. This is currently only supported for QNX Neutrino devices, and requires the QNX SDK to be installed on the development PC.

Related Topics

- Building Applications for the Web

  You can use the experimental Qt WebAssembly plugin to build applications in WebAssembly format, to deploy them, and to run them in a web browser.

- Qt Creator Plugin for Qt Application Manager

  You can use the experimental Qt Application Manager plugin (commercial only) to deploy, run, and debug applications on the local Linux PC, remote generic SSH Linux targets, or Boot2Qt devices.

‹ Deploying Applications to QNX Neutrino Devices

Connecting Android Devices ›