Common toolchain errors

Tobias Tefke[1], **Prof. Ralf C. Staudemeyer**[1]

[1] *Schmalkalden University of Applied Sciences, Schmalkalden, Germany*

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Error: module managed externally

Problem: No Python virtual environment (venv) is set up or the venv is not activated.
Solution: Set up a venv to create a separate Python instance for the Software Development Kit (SDK) (or activate it). Please refer to the toolchain installation guide to learn how to create a venv and how to activate it.

Error: please set chip name/please set BL60X_SDK_PATH

Problem: Environment variables are not set up.
Solution: Make sure the following environment variables are set on your system:

Environment variable	Value
`BL60X_SDK_PATH`	Path to the directory where your SDK is stored. You have to specify the root directory of the SDK.
`CONFIG_CHIP_NAME`	`BL602`

Error: gcc: file not found/compiler not found

Problem: Either the compiler is not installed, the path to the compiler is not part of the system's `PATH` variable or your platform or operating system is not supported.
Solution: Ensure you downloaded and installed the compiler into the toolchain directory. Extend the `PATH` variable such that it contains the path to the directory where the compiler for the BL602 platform is stored:

Environment variable	Value
`PATH`	Content of the `PATH` variable + `/path/to/bl_iot_sdk/toolchain/compiler/bin`

Please note the compiler only works under GNU/Linux and ARM architectures are currently unsupported.

Error: blflash not found

Problem: The blflash tool is either not downloaded yet or it does not reside in a directory that is a part of the `PATH` variable.

Solution: Download the blflash tool and make it accessible in a directory that is a part of the system's `PATH` variable.

Error: genromap is not executable:

Problem: The `genromap` script is not allowed to be run as program.

Solution: Allow `genromap` to be run as program:

```
chmod u+x genromap
```

Error: blflash is not executable

See steps above for `genromap`, replace `genromap` with `blflash`.

Error: missing file/undefined reference

Problem: You try to include libraries which are not specified in your project's makefile or you included the correct header files but the actual implementation of the function is missing.

Solution: Make sure that all libraries you want to use are included as dependency in your project's makefile and that all necessary headers are specified in your source code files. Also ensure all necessary code files are included and the missing functions are present in the compiled output (e. g. not excluded by preprocessor directives).