

Adding More Components With CMake (and Adding wxRTC)

A Primer to Using CMake's find_package(...)

(1) Syntax

Seen within **Controls-and-Containers** in the repository as an example, we see that our **CMakeLists.txt** contains:

```
find_package(wxWidgets REQUIRED core base)
```

- REQUIRED: Prefix to define what required components are needed to run your program
- After REQUIRED (core and base): These will be the dependencies you'll include

[Here](#), you may see the dependency tree for wxWidgets that will allow you to choose which widgets you'd like that isn't provided by default (with core and base). We may think of core and base as an #include <iostream> of sorts; providing us with the minimum for what we need to create a program in wxWidgets.

(2) Adding wxRichText

1. First, we will refer [here](#) again. We will need to topologically sort these dependencies or else this **will not work badly**
2. We first choose from the top, we add wxRichText (richtext in CMake terms) first.
 1. Result: find_package(wxWidgets REQUIRED richtext)
3. wxRichText's dependencies are wxAdvanced, wxHTML, and wxXML (adv, html and XML in CMake)
 1. Both wxAdvanced and wxHTML have wxCore as a dependency, thus we add adv, html, then core keeping topological order
 2. Result: find_package(wxWidgets REQUIRED richtext adv html core)
4. Missing only wxXML and it's dependency wxBase (which is required), we add xml and base
 1. **Final Result:** find_package(wxWidgets REQUIRED richtext adv html core xml base)

You will now be able to use wxRichTextCtrl!