

that runs in the Mac OS X BSD UNIX subsystem. Scroll down the list to **Command Line Utility** and the subitem **Standard Tool** (see Figure 1.3), select that item, and click **Next**.

The next panel—New Standard Tool Assistant (see Figure 1.4)—lets you name the project and place it on your disk hierarchy. For this exercise, type **HelloWorld** in the upper text field to name the project. The second field will echo what you type, designating `~/HelloWorld/` as the project directory. This means that the directory `HelloWorld`—which will be created if it isn't already there—will hold your *project file*, named `HelloWorld.xcodeproj`, and the other files needed to build your project's targets.

NOTE

The list of available project and target types is quite extensive. For a thorough review, see Appendix B, “Project and Target Templates.”

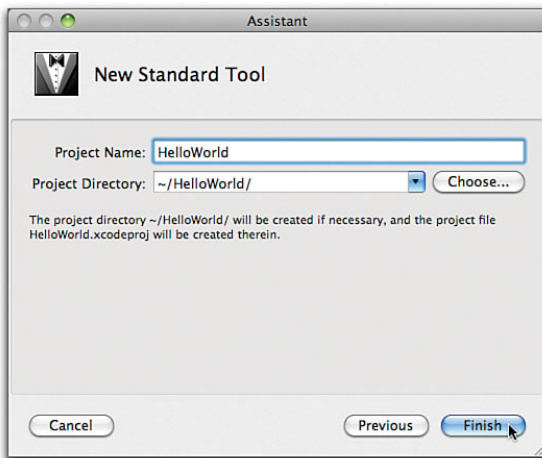


FIGURE 1.4 The New Standard Tool Assistant. To name a new project, type the name of the project. The assistant automatically names a new folder to enclose the project and its files.

Click the **Finish** button. Xcode creates the `HelloWorld` directory, copies some files into it, and opens the project window (see Figure 1.5). For a BSD command-line tool, the project starts with a `main.c` file for the tool's `main()` function, a `HelloWorld.1` template file for the man page, and the `HelloWorld` product, shown in red in the list because Xcode can't find the file associated with it, which is natural enough, because we haven't built it yet.

These files are shown in the large *Detail list* on the right side of the project window. The contents of the detail list are controlled by the selection in the *Groups & Files* column. Selecting the first item under this heading selects the project, filling the detail list with every file included in the project. Below the project icon are folder icons representing subgroups of files; clicking a folder icon displays in the detail list only the files in that group.

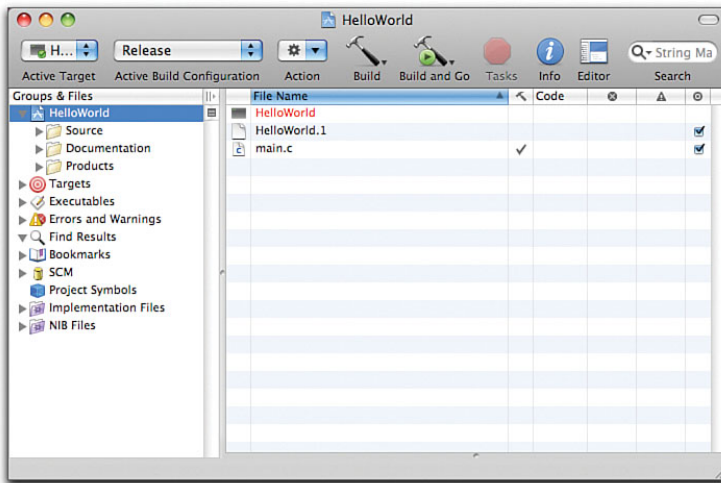


FIGURE 1.5 The HelloWorld project window. Names of files, arranged in groups, appear in the Groups & Files column at left. The Detail list at right provides searchable details of whatever is selected in the Groups & Files column.

To the left of the project and folder icons are the familiar disclosure triangles. Clicking a disclosure triangle opens a container in a list. Expanding a file group folder shows the names of the individual files in the group.

If you've been exploring, click the project icon at the top of the Groups & Files column to restore the list of all files in the Detail list under File Name. Now double-click `main.c`. A window like the one in Figure 1.6 appears.

The placeholder for `main()` in the default `main.c` for a command-line tool is `Hello,World`. This simplifies our first run of Xcode considerably. First, let's be sure that when our program runs we will be able to see what it prints. Produce a console window by selecting **Console** from the **Run** menu (⌘⇧R). Xcode presents a window for standard text input and output.

At the top of the console window (and all the other windows) is a toolbar, one item of which is labeled **Build and Go**. Click that button. Several seconds may pass—the first build of a target is always longer—but you are soon rewarded with `Hello, World!` in the console window (see Figure 1.7). Success.

Quit Xcode (by pressing ⌘Q, or selecting **Quit Xcode** in the **Xcode** application menu). There's nothing to save, so the project and editor windows disappear immediately.