Please note that Cypress is an Infineon Technologies Company.

The document following this cover page is marked as “Cypress” document as this is the company that originally developed the product. Please note that Infineon will continue to offer the product to new and existing customers as part of the Infineon product portfolio.

Continuity of document content

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Continuity of ordering part numbers

Infineon continues to support existing part numbers. Please continue to use the ordering part numbers listed in the datasheet for ordering.

PSoC® Creator™ Quick Start Guide

Install

Download PSoC Creator from www.cypress.com/psoccreator, or install from a kit CD.

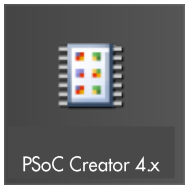
For assistance, go to http://www.cypress.com/go/support

For features, system requirements, and installation notes, refer to the Release Notes available at: http://www.cypress.com/products/psoc-creator-integrated-design-environment-ide.

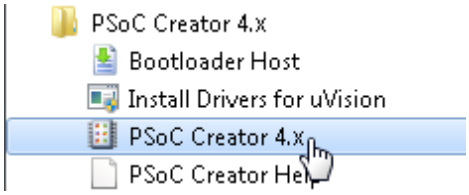
Launch

Find the **PSoC Creator** icon to launch the tool.

Windows® 8 or above



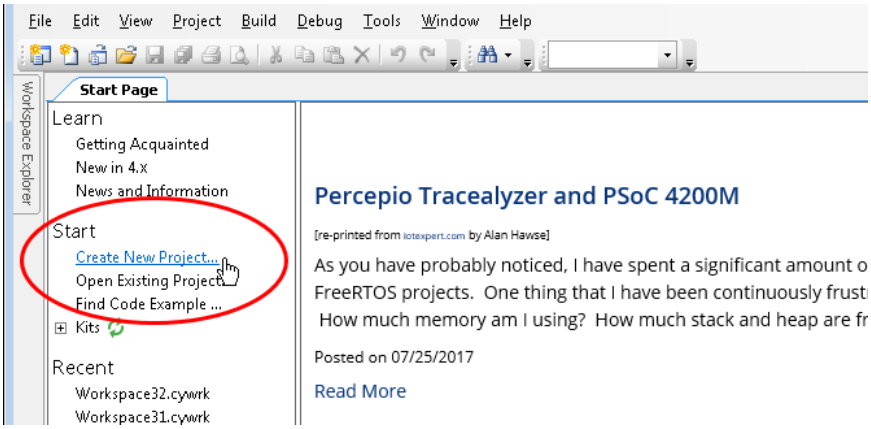
Windows 7 or before



You can launch the tool from the Installer application. You can also use the Windows Start key and type “PSoC Creator” to locate it.

Create New Project

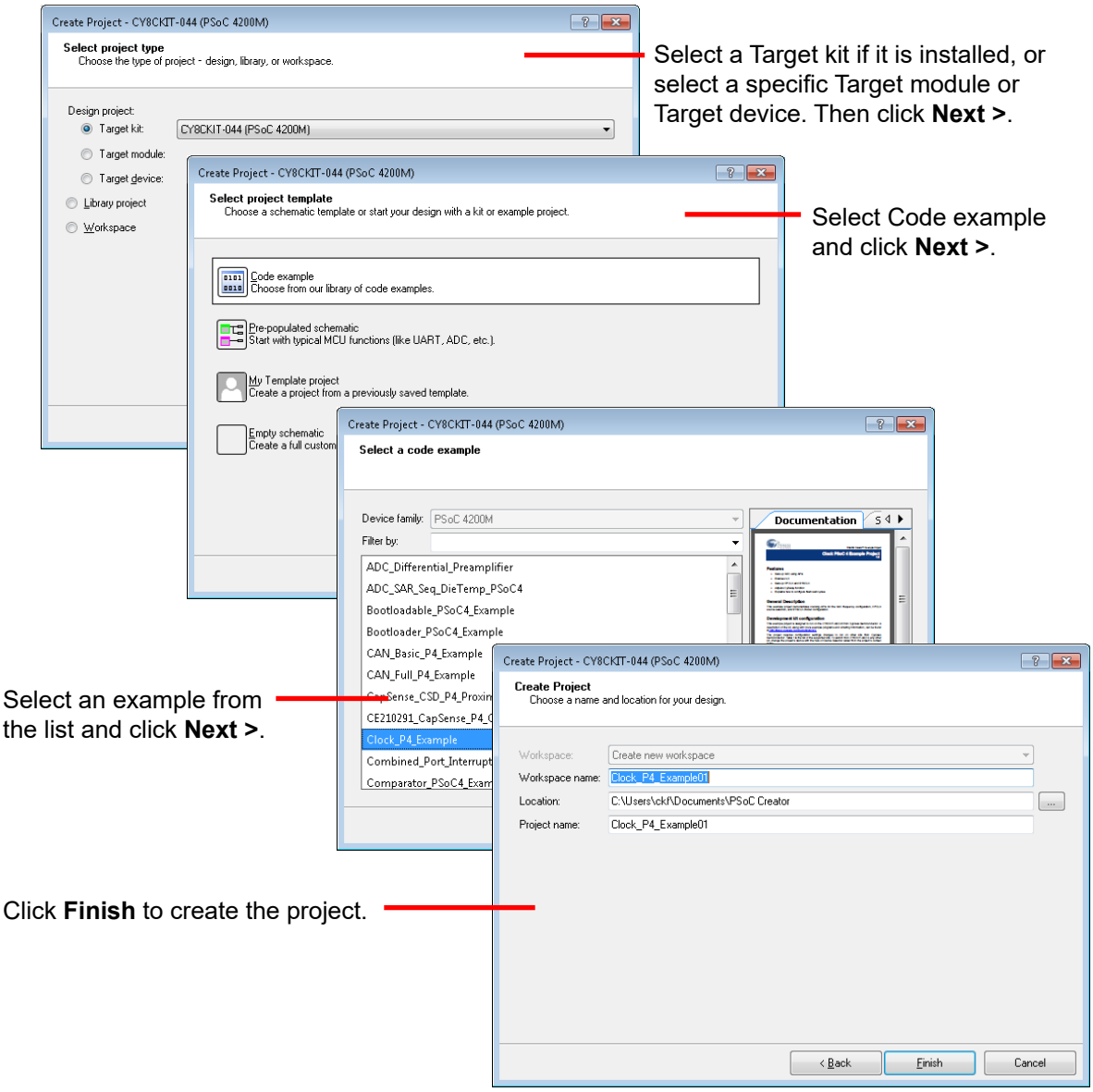
Click the **Create New Project** link on the Start Page to open the New Project wizard.



Note There are also code examples available from a link on the Start Page and from the **File** menu.

Complete New Project Wizard

Follow the instructions on the New Project wizard to select/complete information needed for your project. This wizard provides several options to create projects from code examples and pre-populated schematics.



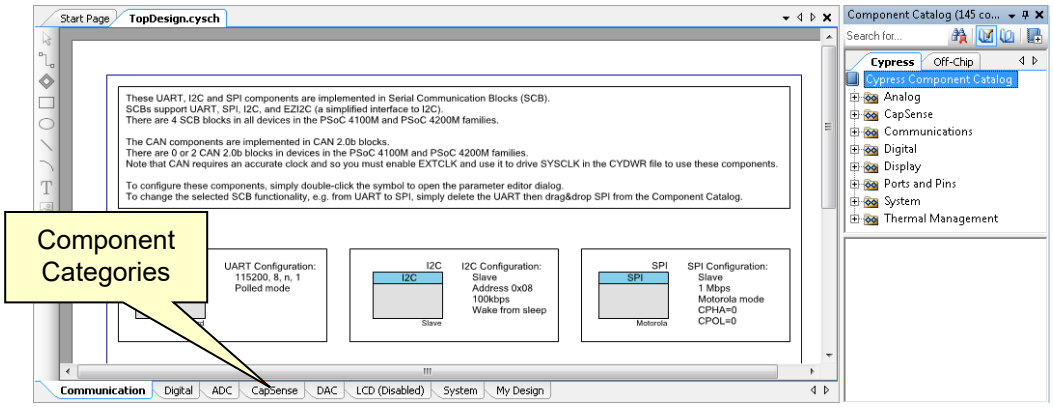
Note For PSoC 6 devices, the Target IDEs page displays to select one or more IDEs for which to generate files. See also Optional: 3rd Party IDE Integration in this document.

For more information, refer to the PSoC Creator Help topic “Creating a New Project.” Also, each code example project contains a description document.

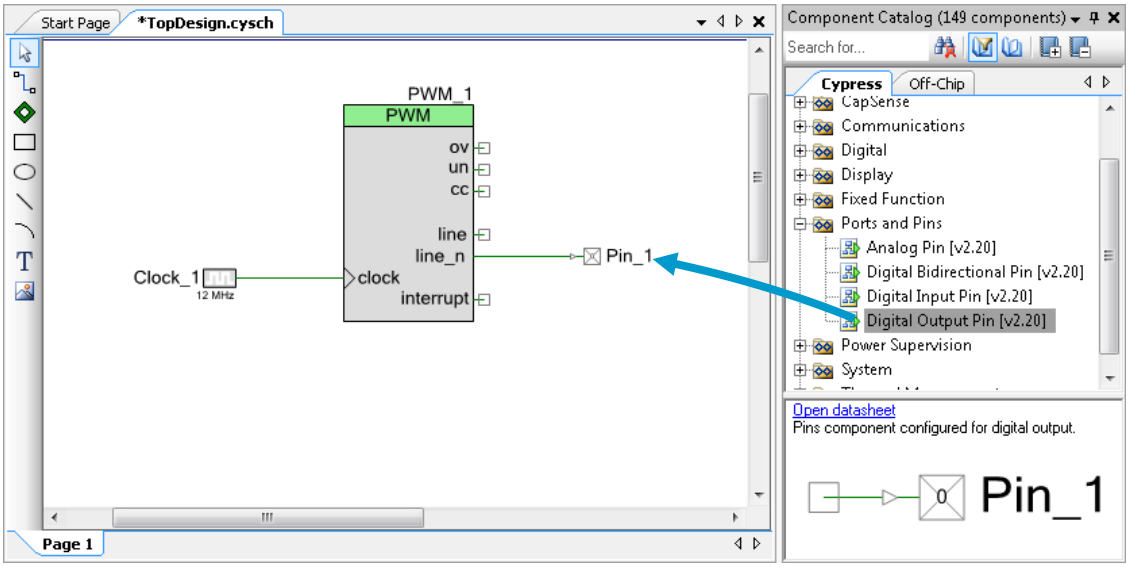
Modify the Design

As needed, you can add components and functionality to modify the design to fit your needs.

For PSoC 4xxx devices, pre-populated schematics contain preconfigured Components to use in your design. Components are divided into separate categories by schematic tabs. There is a "My Design" tab to customize your design. You can disable individual Components or disable complete schematic tabs.



As needed, add a Pin, Clock, and other Components to complete the design by dragging items from the Component Catalog.



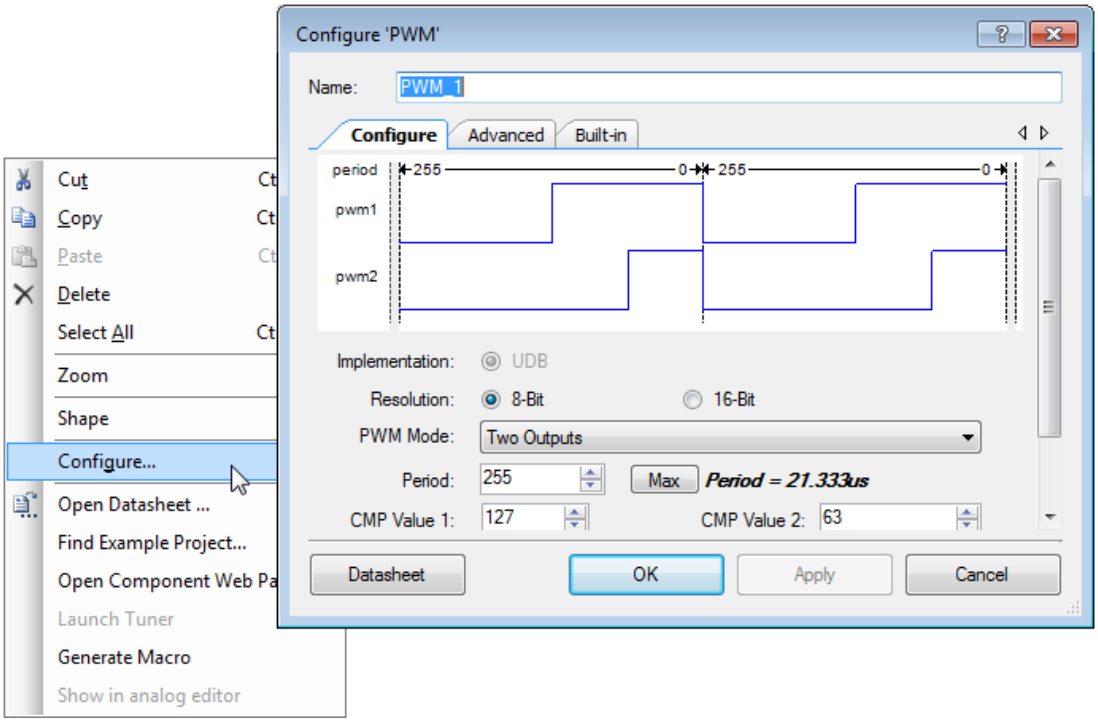
If needed, connect various components using the Wire tool.

If you have complex or frequent wiring, double-click the wire tool to enable “Sticky” mode to use it repeatedly. Then press [**Esc**] to return to “Normal” mode.

For more information, refer to the PSoC Creator Help topic “Schematic Editor.”

Configure Components

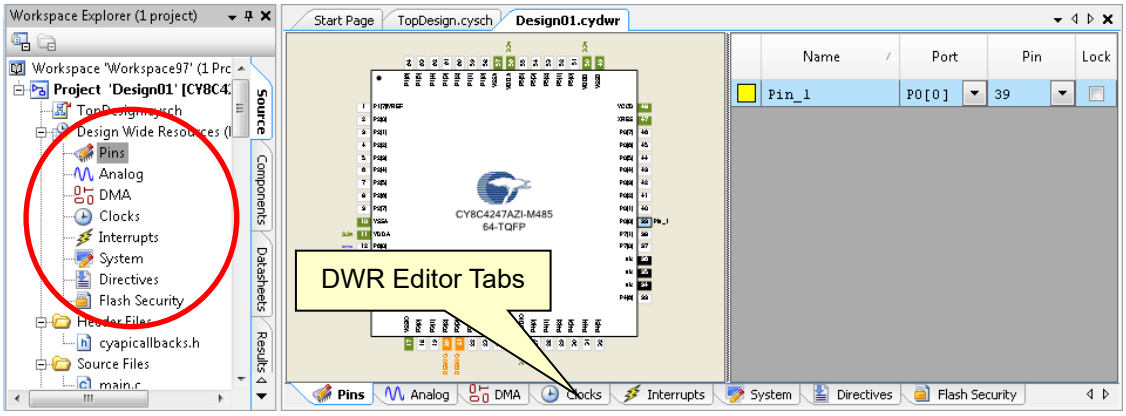
As needed, configure various component parameters to modify the behavior.



For more information, refer to each component's datasheet, available from the Configure dialog, the Component Catalog, or from the **Datasheets** tab in the Workspace Explorer.

Configure Design-Wide Resources

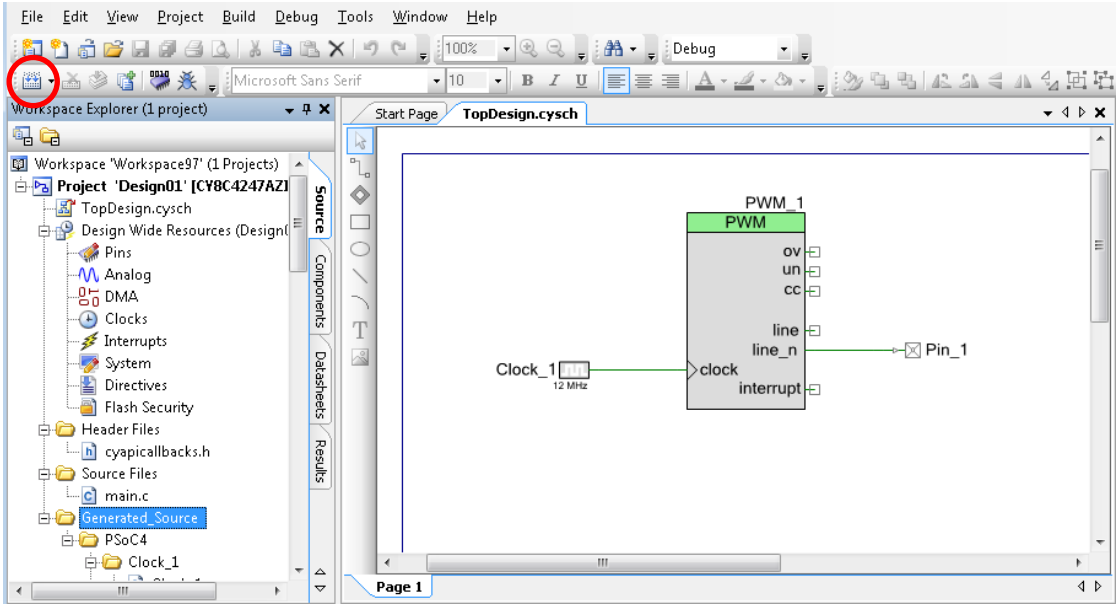
Double-click on a node in the Workspace Explorer to open Design-Wide Resources, such as pins, clocks, interrupts, DMA, and more. Once open, use the tabs to switch between them.



For more information, refer to the PSoC Creator Help topic “Design-Wide Resources.”

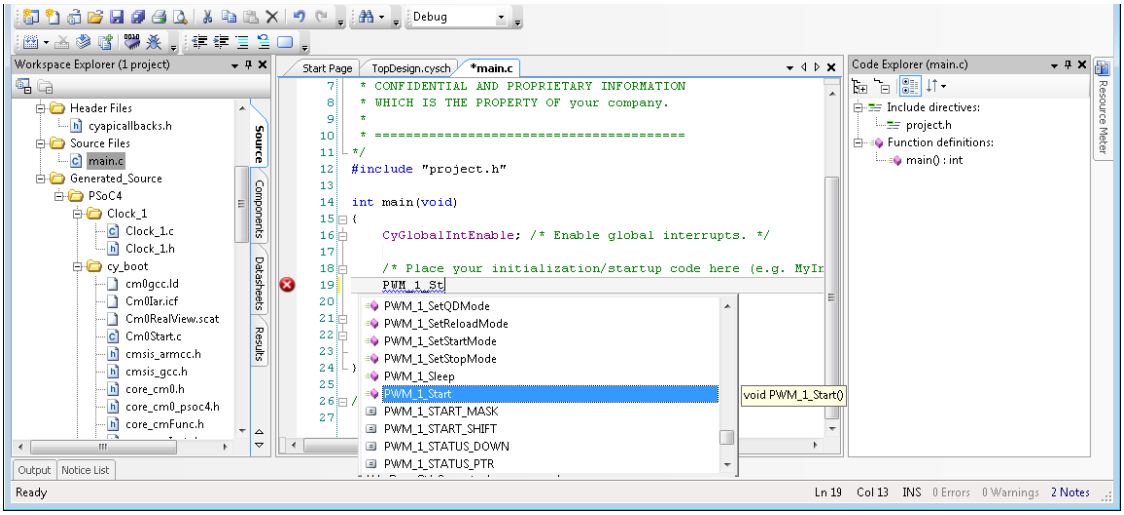
Build the Design

After completing the design, use the **Build** command to generate source code.



For more information about these files, refer to the *System Reference Guide*, located on the **Help** menu, under **Documentation**.

Add Code in PSoC Creator



Inside PSoC Creator, open the *main.c* file and insert the necessary code for your application.

Note For many components, you must add at least a start function to enable the component. This start function is usually named [component_instance_name]_Start(). For more information, refer to the applicable Component datasheet API section.

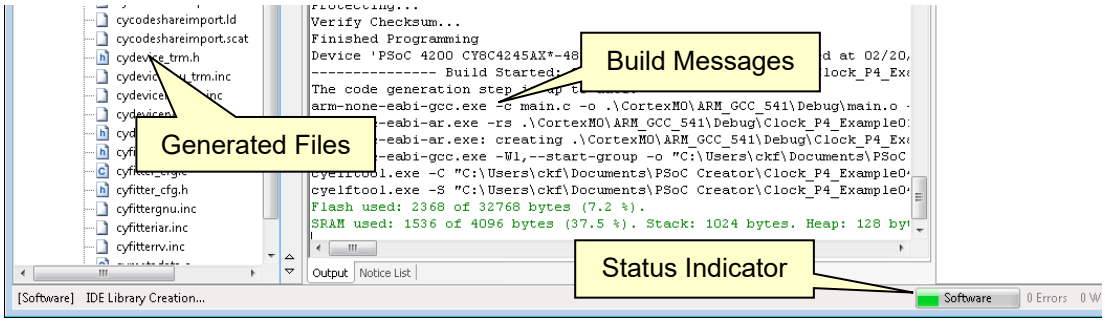
Cypress provides various PSoC Creator code example projects that can help you design faster. Open the Code Example dialog from the **File** menu or Start Page. For more information, refer to the PSoC Creator Help topic “Find Code Example.”

Program the Device

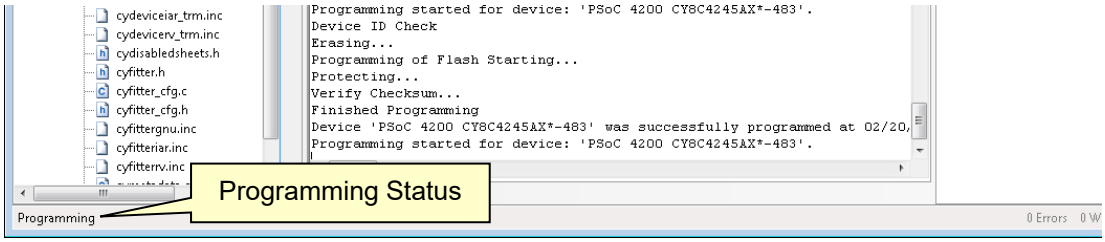
Connect your development kit to your computer, and click **Program**

You can obtain a kit from the Cypress web page at: http://www.cypress.com/go/store.

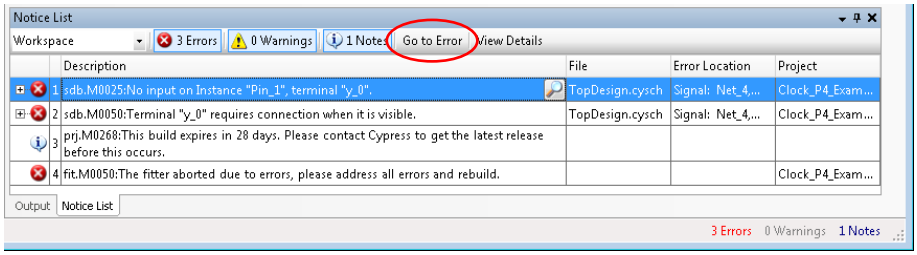
If your design has no errors, PSoC Creator will build the design …



… and program the device.



If there are errors, view the Notice List window and click **Go To Error** to find and resolve them.



Next Steps

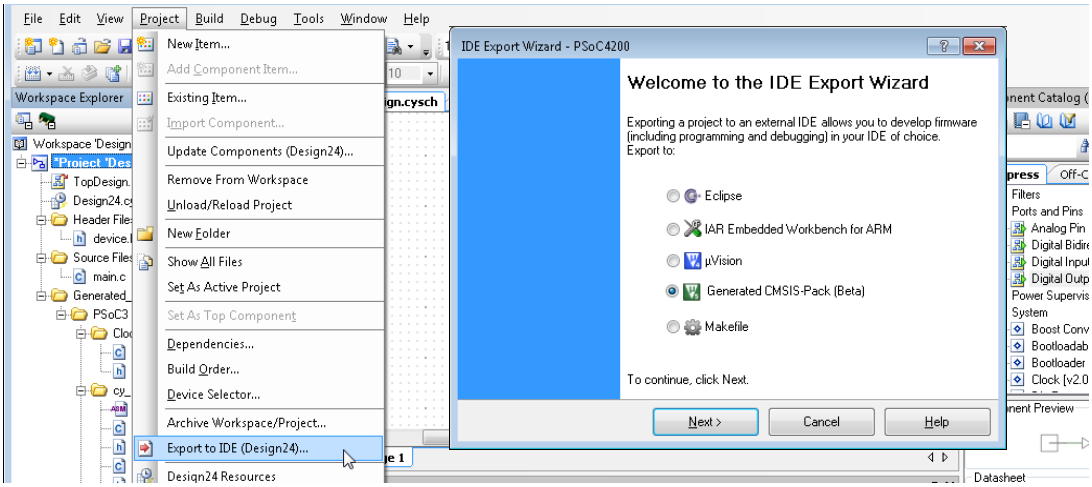
Now that you have created a design, open a few example projects and explore different ways to improve it. The PSoC Creator Help and various documents are available from the **Help** menu.

Refer also to the PSoC Creator web page for more information, such as design guides, application notes, and training videos.

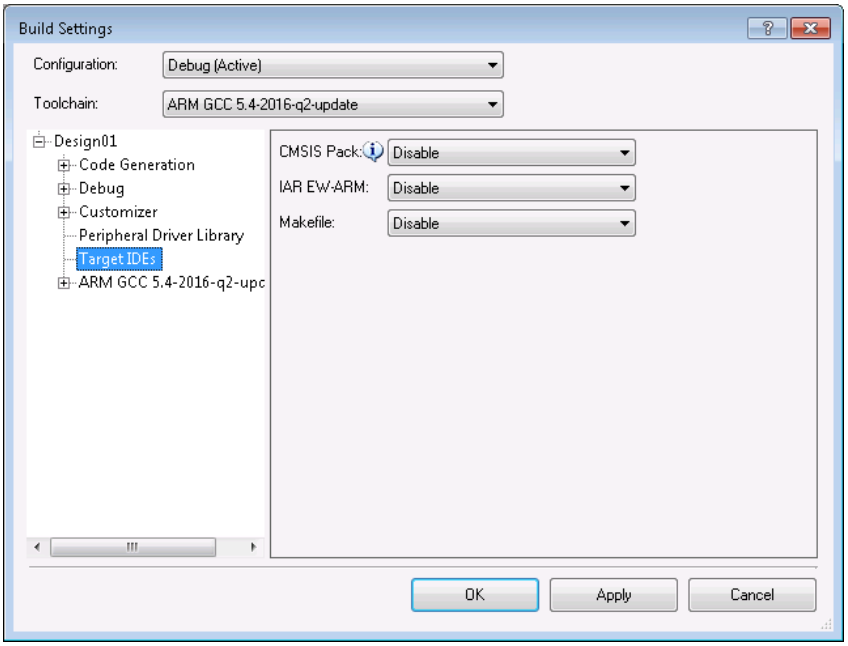
Optional: 3rd Party IDE Integration

If preferred, you can use your PSoC Creator design with a 3rd Party IDE to code, debug, and test firmware.

For PSoC 3, PSoC 4, PSoC 5LP, and FM0+ devices, select **Export to IDE** from the **Project** menu to open the IDE Export Wizard.



For PSoC 6 devices, this step is included as part of creating a new design. You can also select **Build Settings** from the **Project** menu, and then select **Target IDEs**.



Refer to the PSoC Creator Help topic “Integrating into 3rd Party IDEs” for full details.

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