

Installing DevSuite – Windows OS

Download the base installer from here;

https://www.onsemi.com/pub/Collateral/DEVSUITE_SW.ZIP

Decompress the .zip and read the "Read-Me-First.doc" for information on the installation package.

To install the Software, double-click the file and follow the instructions on your screen. If you have an earlier version of DevSuite on your computer, you will be prompted to uninstall it before proceeding.

Note: due to installation limitations, it is recommended to install all Software in the same drive and location.

It is NOT recommended to install any Software on a Network drive.

If a previous installation does not follow these guidelines, you may need to modify your "PATH" variable to remove the previous location(s).

Additional Product Software Installers

Some products require a separate software installer to be downloaded, and some require an NDA.

In either case, after starting DevWare you will be prompted with instructions if an additional installer is required.

- For products that do not require an NDA, a URL to the additional installer will be displayed.
- For products that do require an NDA, you will be directed to a Web site where you can either login with your assigned credentials or request credentials. Other products require that you contact onsemi support.

Additional Support Software Installers

DevWareX requires Python to be installed for certain products. In these cases, a dialog will appear that contains the URL of the Python installer. Using the provided URL link, download the installer and exit DevWareX. Run the Python installer and select "Install All". When the installer completes, rerun DevWareX. Here's that URL:

<https://www.python.org/ftp/python/3.8.2/python-3.8.2-amd64.exe>

Our color tuning application SensorTune requires a Matlab Runtime library to be installed.

In these cases, you will be prompted with a URL to use to download the additional installer.

Here is that URL; download, **decompress**, and double-click "Install" and follow the instructions.

https://ssd.mathworks.com/supportfiles/downloads/R2019a/Release/6/deployment_files/installer/complete/win64/MATLAB_Runtime_R2019a_Update_6_win64.zip

Other OS Platforms

DevWareX can also be run on MacOS and Linux Ubuntu. Use the following link for information and instructions;

<https://aptina.atlassian.net/wiki/display/DEVS/Software+Downloads?src=contextnavpagetreemode>

Python Version Control

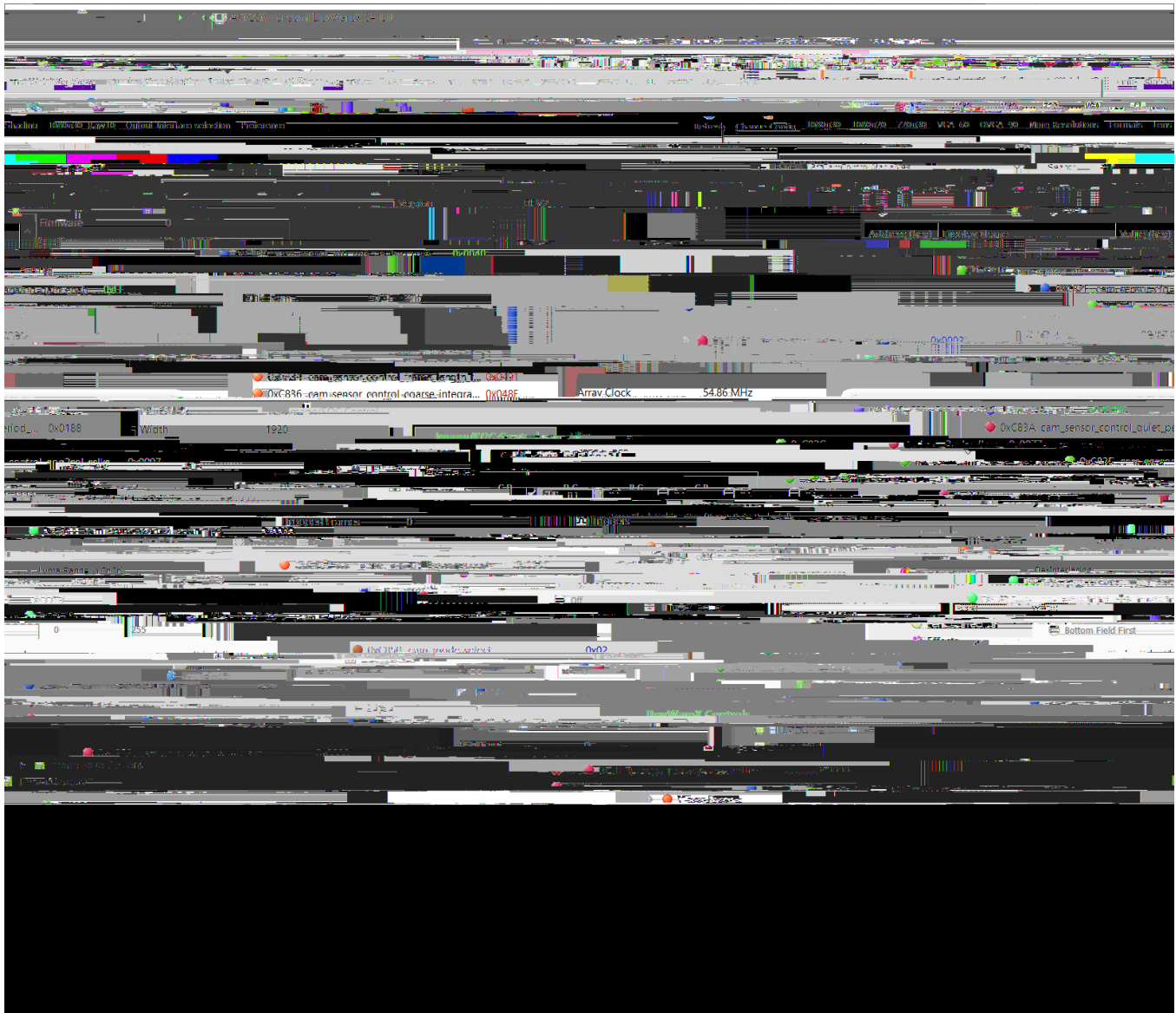
If you have multiple versions of Python installed, use menu item "Python -> Browse Python Environment" to navigate to version 3.8.2 or any other version from python.org (we support versions 3.4 to 3.24).

If you do have multiple versions, ensure that any environment variables such as PYHOME and PATH point to version running in DevWareX as Python uses those to load other modules. Otherwise, DevWareX may not run.

Note that packages such as Anaconda use a Python version that does not work with DevWareX, don't select **AS3417y**.

Warning Dialogs

Figure 3: DevWare Xilinx Mail Screen



Additional Applications and Resources

There are several additional DevSuite applications and resources that are useful for demonstrating and configuring sensors.

This application produces register settings given the sensor's parameters; width/height, mode, output type, etc.

This application produces the Color Correct Matrix (CCM) for a sensor or ISP.


This application configures and produces the binary image for Flash storage of ISP and SOCs that support it.

This application allows two onsemi Imaging Demo cameras to be simultaneously displayed side-by-side. It is useful for comparing differences in equal sized sensors, although dissimilar sensors may also be used. Synchronous control of both images is provided for panning, zooming and play-state. Side-by-Side can be launched via the desk-top shortcut.

ApBase provides an API of the main functions of DevWare and is available for users to write their own applications to interface to onsemi sensors. Information can be found via the shortcut:

- Image won't display / DevWare exits before displaying an image.
 - Outdated Graphics display drivers on the PC. If this is first time you've installed DevWare and/or the first time you've attached a Demo3, it is possible you need to update the Graphics driver on your PC. Do a Web search of "<Your PC manufacturer> <Your PC Model> Graphics driver update". Also, if samples\SimpleQT shows an image, then check for other graphics-based libraries installed on your PC.
- Windows 7: the USB driver can't be found, or device not recognized.
 - Run the "Hardware Update Tool" to ensure the correct version of FW is installed; see "USB Driver User Guide" for details. Accessed via:
- The Frame Rate is very low.
 - The amount of data being processed is quite significant for large display sizes, especially on larger sensors. Lower the size of the displayed image.
 - Ensure that the HW and SW requirements as defined in Appendix A are met.
- Win10/Win11 and ApBaseCOM.
 - If your Matlab application can't connect to ApBaseCOM, do the following to ensure it is registered.
 - Search for "Command Prompt" from Start menu, right click on it and select "Run as administrator".
 - Navigate to the installation folder, usually "C:\Aptina Imaging\bin".
 - Enter; %SystemRoot%\system32\regsvr32 apbasecom.dll
 - A "RegSvr32

Reporting Bugs

If you are having issues with any of the applications, please use the "Bug" icon  on the menu bar to open "Bug Report" dialog. Your system and sensor configuration information will be filled-in automatically. Please enter information in to "Bug Description" and "How to reproduce the bug" fields, select the "Copy to Clipboard" button, and then paste that information in to an Email using the address provided in the dialog.

If you experience a "Crash", please follow the instruction provided via the [link](#).

