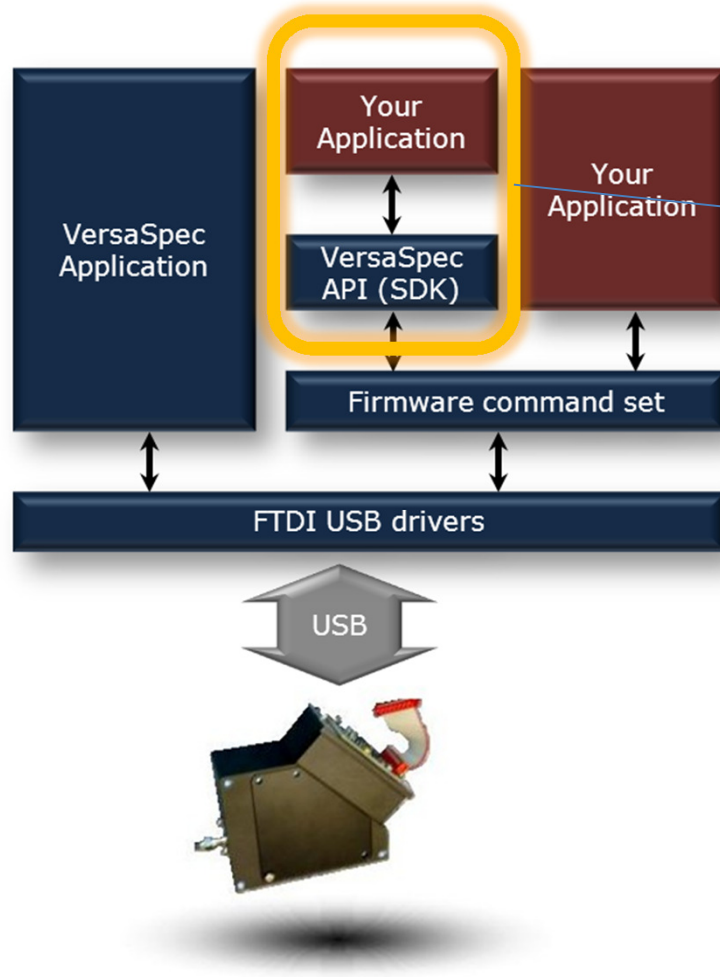


VersaSpec DLL Quick Guide

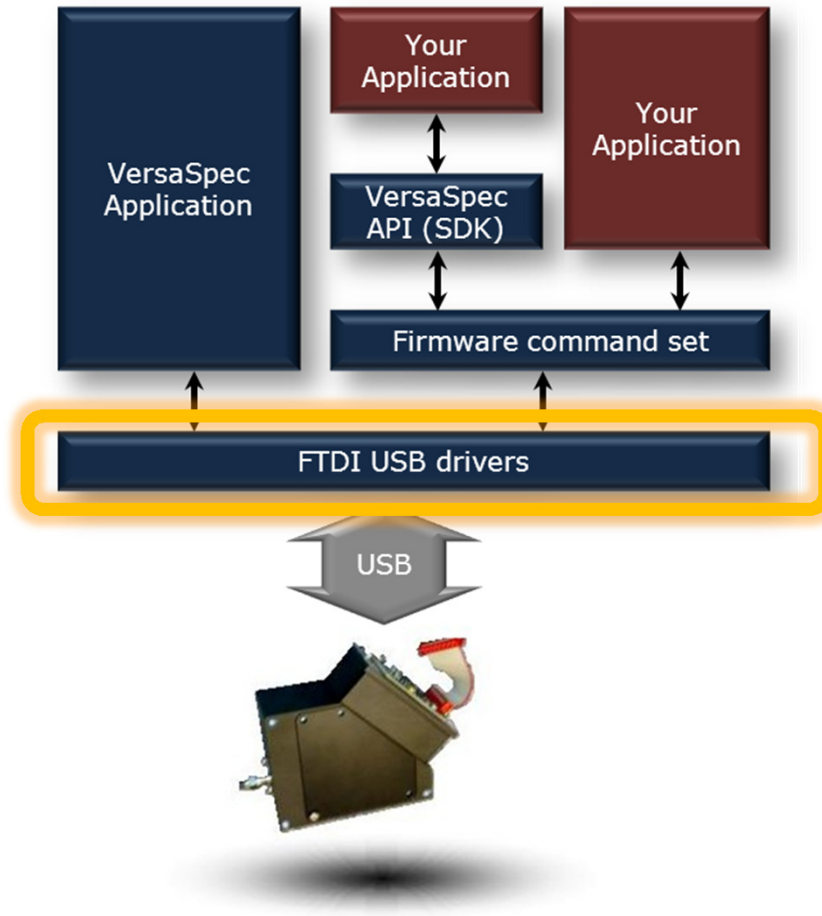
October 10th, 2012

Spectrometer software overview



This Quick guide explains how to use the VersaSpec API (DLL package) to write your own application software

Drivers must be installed before your start!



- You must install the right FTDI drivers for the Windows version you are running before you can communicate with your spectrometer
- Drivers is supplied on the VersaSpec V3.1.6 CD or can be downloaded from: <http://www.ftdichip.com/FTDrivers.htm>
- To check that drivers are correctly installed, try starting VersaSpec V3.1.6 Application Software

Which DLL's to use?

Use the following DLL's if you are programming for 32 bit OS:

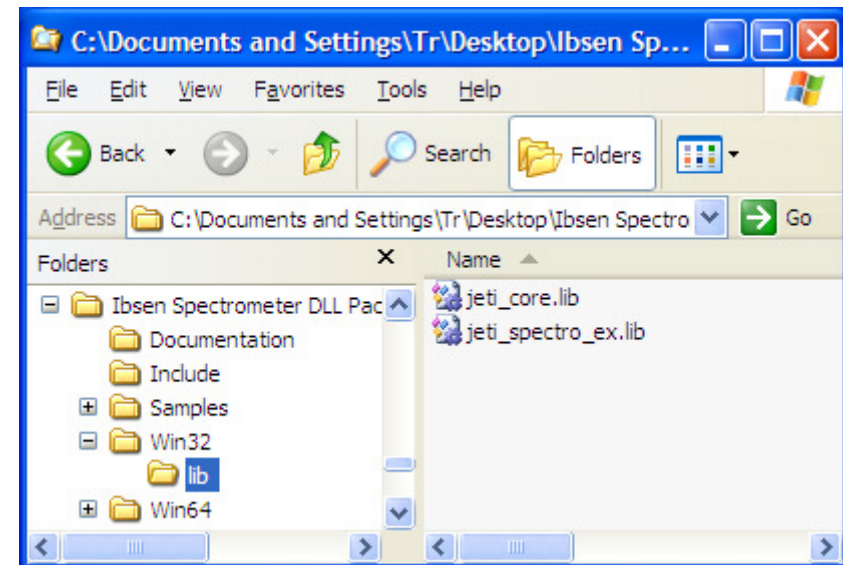
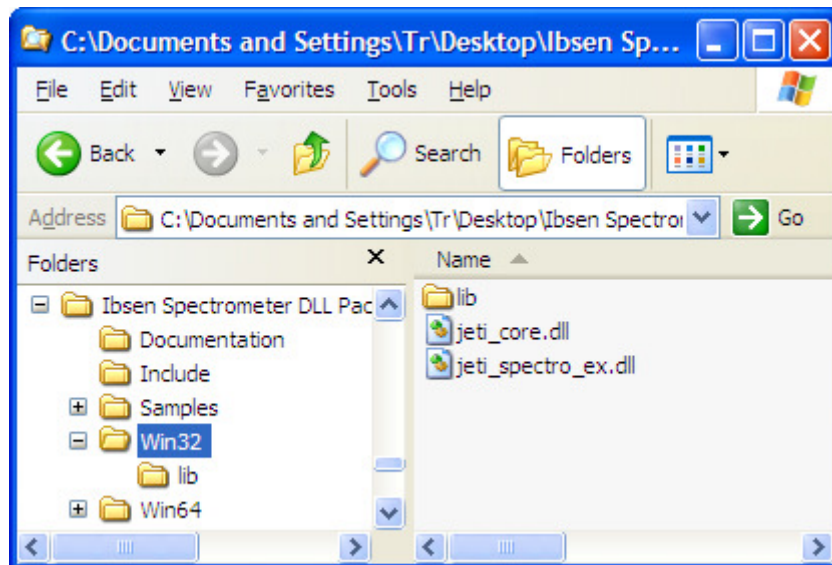
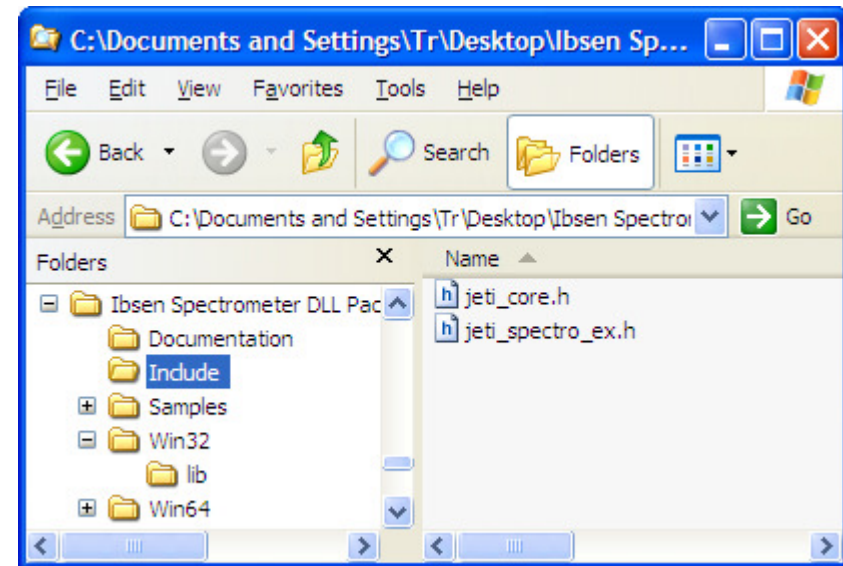
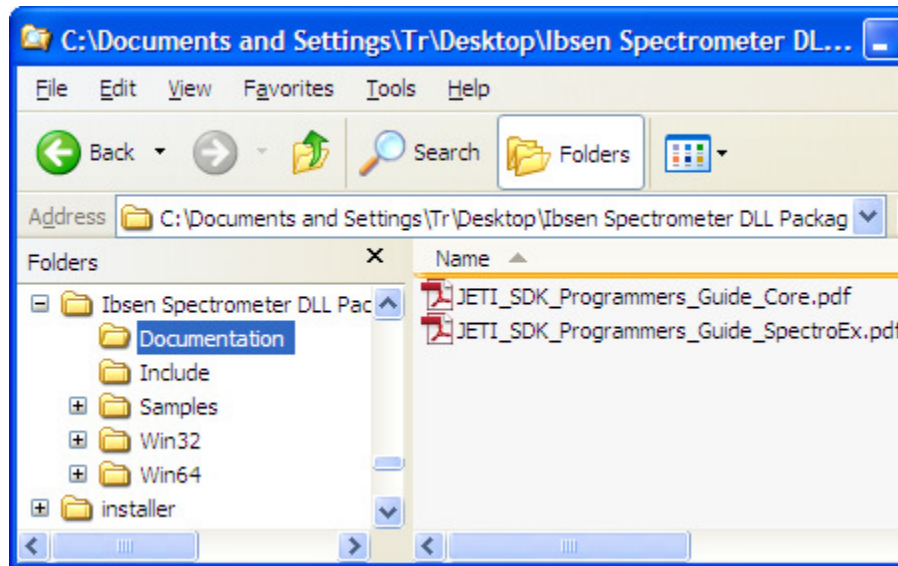
- **jeti_spectro_ex.dll**
- **jeti_core.dll**

Use the following DLL's if you are programming for 64 bit OS:

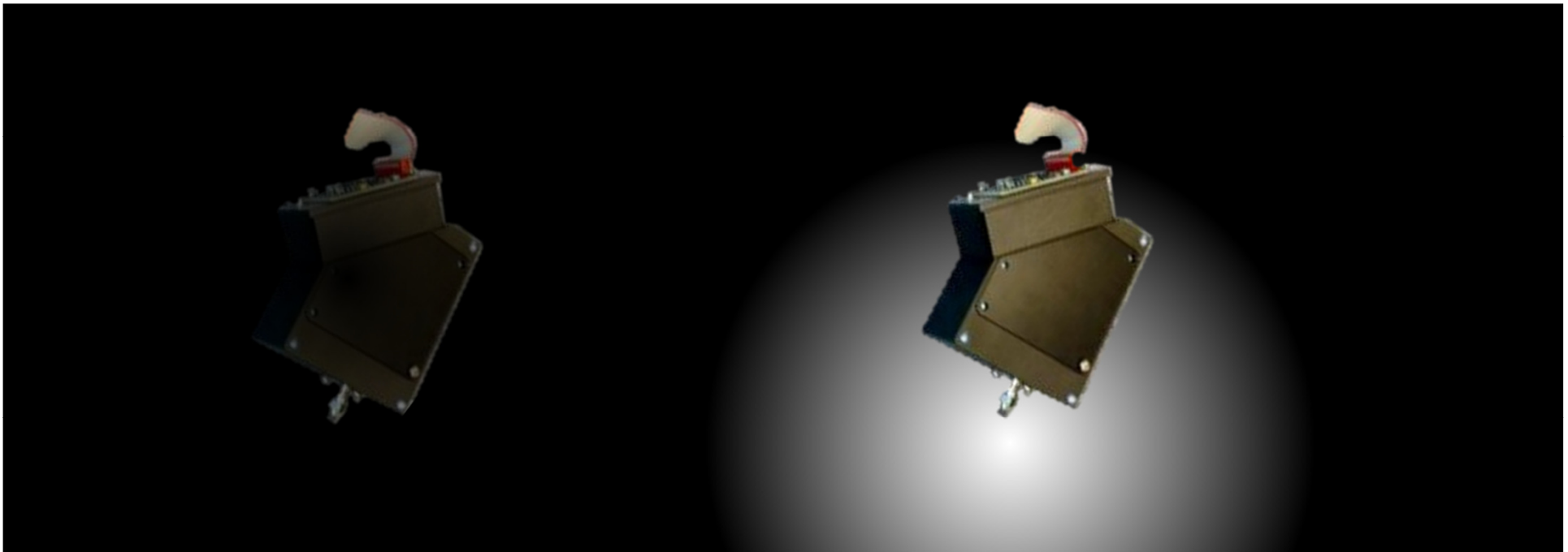
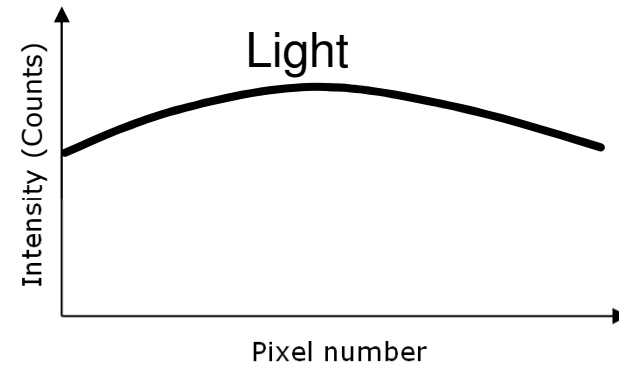
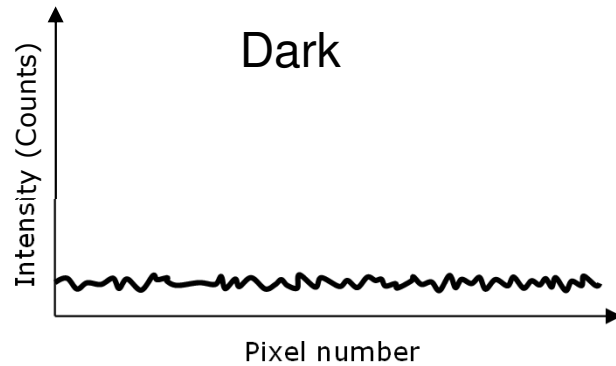
- **jeti_spectro_ex64.dll**
- **jeti_core64.dll**

Where to find the files?

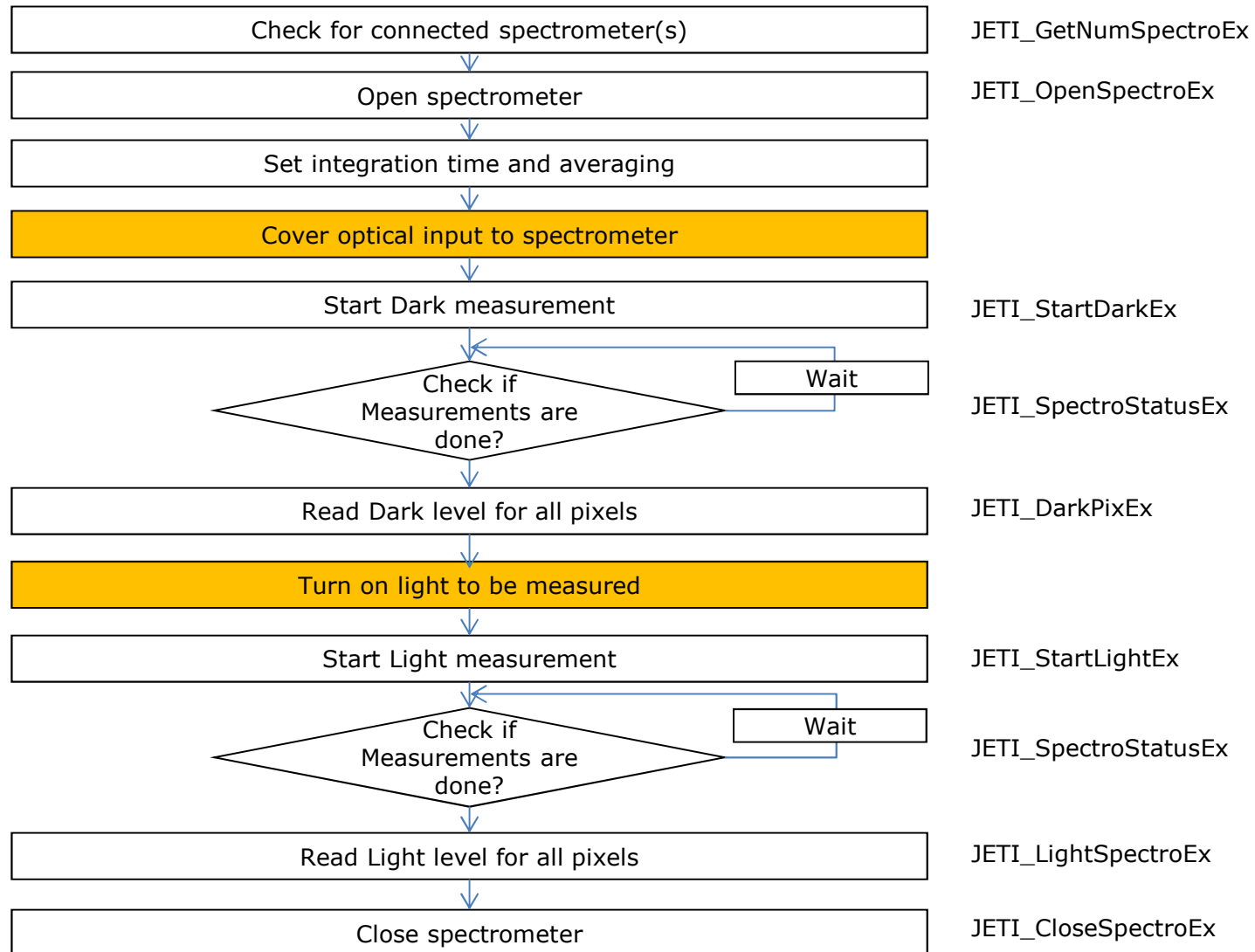
For c, c++



Simple light spectrum example



Simple light spectrum example



How to convert from pixel to wavelength scale?

Get the number of pixels of the spectrometer

JETI_PixelCountEx (from jeti_spectro_ex.dll)

Get Polynomial coefficients for the spectrometer

JETI_GetFit (from jeti_core.dll)

Calculate wavelength (λ) as a function of pixel (p)

$$\lambda(p) = \text{fit}[0] + \text{fit}[1]*p + \text{fit}[2]*p^2 + \text{fit}[3]*p^3 + \text{fit}[4]*p^4$$

