

INT2224EE Catalog



INT2224E Description:

The INT2224E is a Dual Channel, 24-Bit, 625kS/s (programmable up to 2.5MS/s), Simultaneous Data acquisition module that transfers data in real-time to PC using the USB2.0 HS port. Its analog inputs ranges are: 0V to 5V, -2.2V to +2.2V including Wide-band analog front-end amplifier.

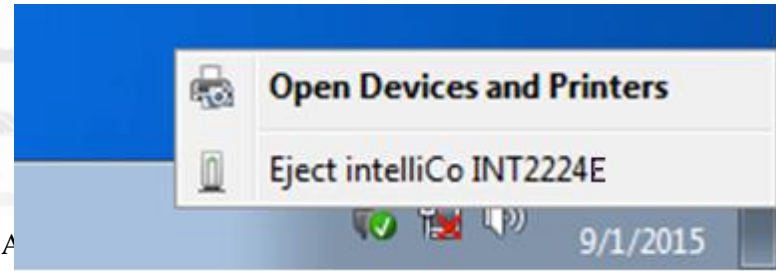
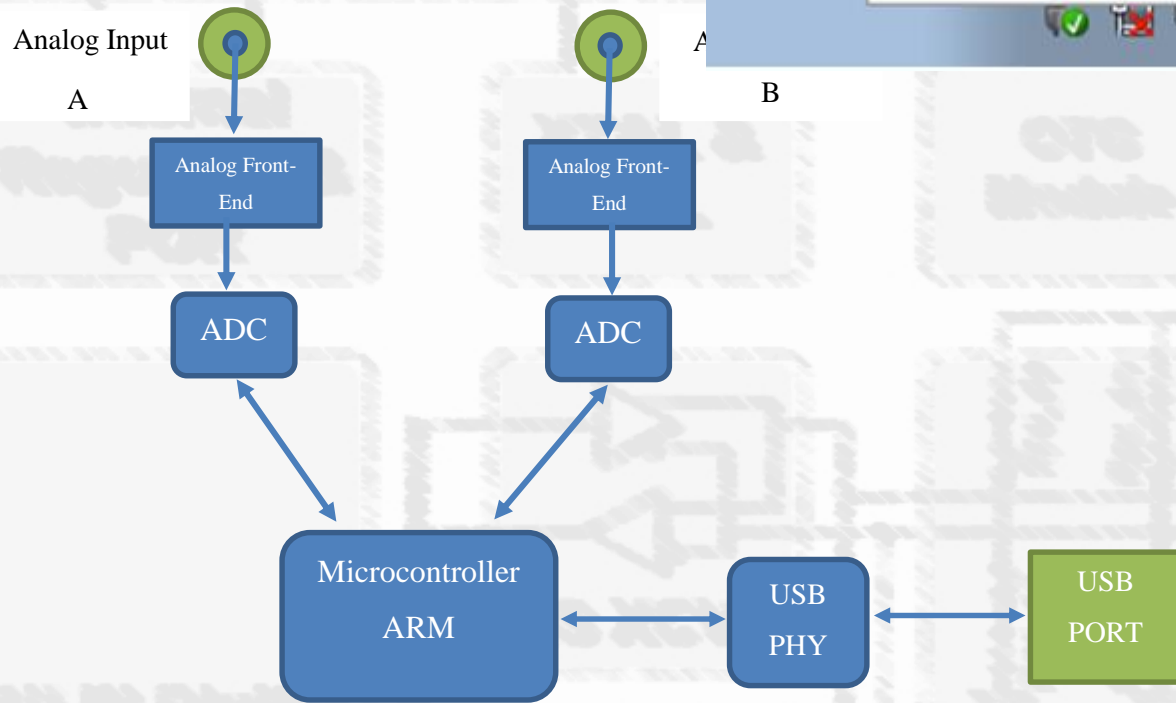
This module is a Plug and Play USB device (intelliCo INT2224E) that uses a couple of AD7760 24-Bit ADCs for synchronous data sampling, a STM32F407 ARM Cortex-M4 Microcontroller to establish USB high speed communication

The module is delivered with fully functional Windows and LabVIEW software Drivers. A couple of user-friendly VIs in LabVIEW is designed to make the user able to save the acquired samples to a binary file (*.bin) or graphically show the signals of both channels. The saved .bin files could be read and decoded in MATLAB environment using a script (INT2224E.m) and to make plots for each channel.

INT2224E Specification:

- Dual Channel, 24-Bit, 625kS/s, Simultaneous Data acquisition module
- Real-time data transfer to PC using the USB2.0 HS port
- 0V to 5V, -2.2V to +2.2V analog input including Wide-band analog front-end amplifier
- Plug and Play USB device (intelliCo INT2224E)
- Easy to install and use Windows and LabVIEW Drivers
- Using a couple of AD7760 24-Bit ADCs for synchronous data sampling
- Using STM32F407 ARM Cortex-M4 Microcontroller for establish USB high speed communication
- LED indicator for Power
- LabVIEW VIs and MATLAB script for data storage and plot
- One year warranty
- 10 years of technical support

INT2224E Block Diagram:



INT2224E VI Screenshot:

The screenshot displays the IntelliCo software interface. On the left, there are two signal plots: 'CHANNEL B' (top) and 'CHANNEL A' (bottom). Both plots show 'Amplitude' on the y-axis (ranging from 0 to 1,680,000) and 'Time' on the x-axis (ranging from 0 to 400). The plots are currently empty, showing a flat line at zero. To the right of the plots is a control panel. At the top of the control panel is the IntelliCo logo. Below the logo is a USB device selection dropdown menu showing 'USB0::0x0483::0x5740::3050386B3133:' and a file format dropdown set to ':RAW'. A 'RESET' button is located to the right of these dropdowns. Below the USB selection is a 'Bulk Read Response' text box containing the hexadecimal string 'CF12 0112 0124'. At the bottom of the control panel is a table with columns for 'Numeric', 'H2B', 'H1B', 'LB', 'H2A', 'H1A', and 'LA'. The table contains the following data:

| Numeric | H2B | H1B | LB | H2A | H1A | LA |
|---------|-----|-----|----|-----|-----|----|
| 6 | 14 | 14 | 36 | 1 | 207 | 1 |

MATLAB Plot Screenshot

