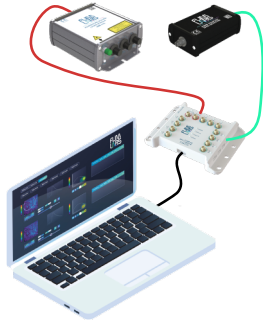


## Entry Level Starter Kit

The fluorescence lifetime analysis starter-kit represents a complete instrument solution specifically conceived for pursuing single-photon FLIM imaging and spectroscopy applications.

### INCLUDES

- Picosecond-pulsed Laser Module
- FLIM Data Acquisition Card
- Single-photon SPAD Sensor
- FLIM Studio Software



## FLIM Studio Software

This software solution aims at simplifying the data acquisition, reconstruction and analysis of fluorescence lifetime for FLIM and spectroscopy experiments. The environment provides a user-friendly interface and intuitive tools that can be used by any user.

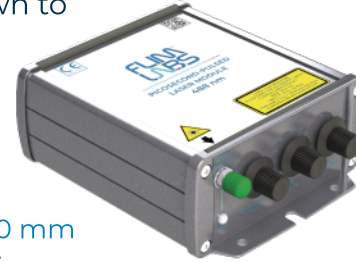


### TECH-SPECS

- Real time imaging and fluorescence decay histogram data reconstruction
- Real time FLIM phasor-plot analysis
- AI-driven phasor-plot analysis techniques
- Software API for data acquisition and reconstruction (Rust, C, C++, C#, Python, node.js, .NET)
- MATLAB, Python, HDF5, .SVG FLIM-phasors and imaging data exporting
- In-cloud data storage
- Result sharing via social media, instant message, chat and email
- Supported platforms: Windows and Linux

## Fiber-coupled Picosecond-pulsed Laser Module

These compact laser modules can provide short light pulses down to 50 ps with a peak power up to 150 mW in various wavelengths.

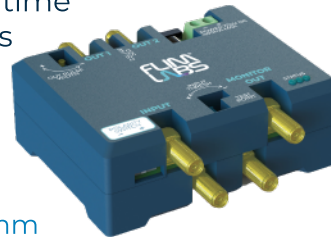


### TECH-SPECS

- Dimensions: 135×110×50 mm
- Available wavelengths: 405, 445, 488, 520, 635 and 850 nm
- Pulse duration down to 50 ps (FWHM)
- From 1 KHz up to 80 MHz repetition rate
- 150 mW pulse peak power
- 1.5 mW average CW power at 80 MHz
- Single-mode fiber coupled module (FC/PC type)
- External and internal trigger available (LVTTTL @ 50 Ohm and LVDS interface)
- Standalone module, no computer connection required
- B2C or B2B selling options

## Constant Fraction Discriminator Module

A CFD Module is an electronic device that generates digital exact time stamps for input signals having changing amplitudes but a constant rise time.



### TECH-SPECS

- Dimensions: 85×70×30 mm
- Single channel dual-output module
- Discrimination for positive and negative input signals
- Rise time: <500 ps
- Jitter: <15 ps
- Max repetition rate: 140 MHz
- Min input detectable signal: +/- 100 mV
- Max output signal: 4 V @ 50 Ohm load
- B2C or B2B selling options

## FLIM Data Acquisition Card

The FLIM card is a compact USB-powered, FPGA-based, single-photon time tagging and multichannel TDC device specifically designed for FLIM and spectroscopy TCSPC applications.



### TECH-SPECS

- Dimensions: 101,3x139x28 mm
- < 300 ps single-shot precision ( $\sigma/\sqrt{2}$ )
- 24 or 48 ps minimum time bin resolution
- 1.5 ns deadtime
- 80 MHz max laser sync rate
- < 0.5% rms differential non-linearity
- Transfer rate up to 100 Mcounts/s
- Peak count rate per input channel up to 640 Mcounts/s
- Up to 25 input channels
- B2C or B2B selling options

## Single-photon SPAD Detector

The fiber-coupled single-photon SPAD sensor is a USB-powered detector engineered for time-resolved fluorescence lifetime imaging and spectroscopy measurements.

### TECH-SPECS

- Dimensions: 100x60x30 mm
- Spectral response range from 370 nm to 900 nm
- Peak sensitivity at 450 nm
- 7 cps dark count
- < 200 ps jitter
- 50  $\mu$ m photosensitive area
- Digital LVTTTL @ 50 Ohm and LVDS output
- B2C or B2B selling options

