

RasaAndishan

USB2 Linear Image Detector

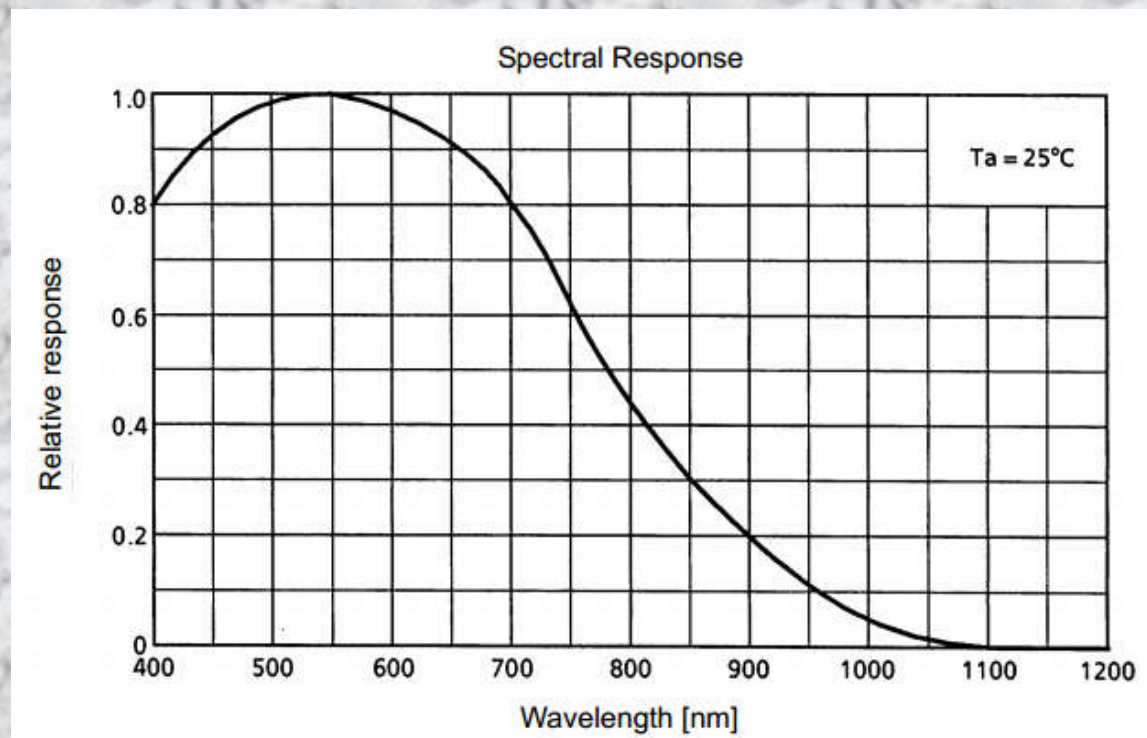
# RA-LSC-1254K



## Overview

- Input and Output Triggers
- Versatile Software Package (USB Camera) and SDK Package (C/C++, VB, DotNet, Matlab) Included
- USB 2.0 - High Speed Interface
- Powered via USB - External Supply Not Required!

RasaAndishan' RA-LSC-1254K USB2 Line Scan Camera is designed for applications in optics, imaging, biology, and industrial process control. It incorporates an CCD Linear Image Sensor with 2500 pixels and is capable of detecting light in the 350 - 1100 nm range With scan rates up to 790 Lines per second.



## Specification

Sensor Specs	
Sensor Type	CCD Linear Image Sensor
Spectral Response	350-1100 nm
CCD Pixel Size	5.25 $\mu$ m x 64 $\mu$ m
Pixel Height	64 $\mu$ m
Pixel Width	5.25 $\mu$ m
Effective Pixels	2500
Effective Length	2500x5.25 $\mu$ m=13.125mm
Max Pixel Frequency	2MHz
Max Line Rate	790Hz
Min Integration Time	10 $\mu$ s
Max Integration Time	35.5 Min
Integration Time Resolution	1 $\mu$ s
Pixel Color Depth	16 bit – 65536 Counts
Brightness Coefficient	-/+ 300 mV - 512 Steps
Contrast Coefficient	64V/V - 64 Steps
External Triggering	
Trigger Signal	TTL 5 V and 3.3 V
Trigger Mode	Free Running, Software Trigger, Hardware Trigger
Hardware Trigger Polarity	Rising Edge, Falling Edge, Both Edges, High Level, Low Level
Trigger Factor	0 To 65535
Exposure Mode in Ext Trig	Up to 4 Different Modes
Trigger Frequency, Scan Rate	Max 395 Hz
Trigger Pulse Length	33 ns
Trigger Delay	0 to 16 Min – in 1 $\mu$ s Steps
General Specs	
Interface	High-Speed USB 2.0 (480Mbit/s)
Weight	100 g
Temperature Range	-25 ~ 60 °C

## Graphical User Interface

### Features

- Operates up to 10 Devices Simultaneously
- Auto-Detection of Compatible Devices
- Different Thread for Data Acquisition for Better Responsiveness to User Input
- Extremely power full DLL, easy to use on any platform
- Saving Frames in RAW and Jpeg Formats

### Adjustable Parameters / Supported Command

- Integration Time
- Trigger Modes: Free Running, External, Software
- Exposure Mode
- Trigger Delay
- Brightness
- Contrast
- Capture Start/Stop
- Trigger Factor
- Trigger Polarity
- Software Trigger
- Mirroring Image/Flipping Image