

SWIR SYSTEMS

Component Product Series

SC320

High-speed SWIR Camera



SC320 is a short-wave infrared camera with compact structure and stable performance, with a frame rate of up to 300 Hz, which is easy to integrate in industrial systems. Thanks to the excellent low noise and TEC cooling design, the camera has a very low dark current and a high dynamic range in the detection range of 0.9 μ m~1.7 μ m, so that the SC320 camera can obtain better imaging results, and the application field is very widely.

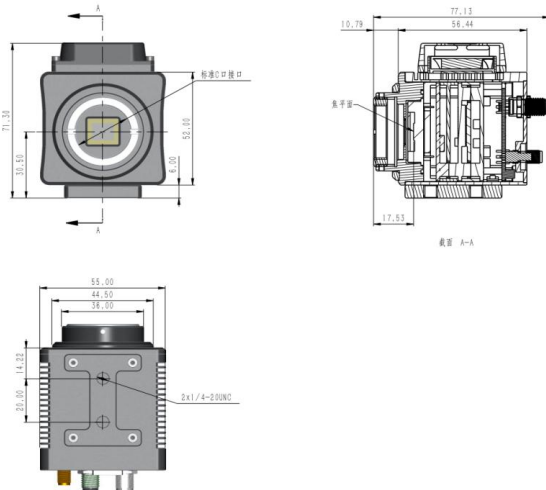
Performance Index

Detector		Interface	
Detector type	InGaAs Focal plane	Camera control	RS422
Spectral response	0.9~1.7 μ m	Digital output	USB/CameraLink/GigE
pixel	320×256	Analog output	PAL
Image spacing	30 μ m	External trigger	TTL
Effective area	9.6mm×7.68mm	Power Supply	
Quantum efficiency	≥65% (1.0~1.6 μ m)	Power input	DC 12V ± 1V
Sensitivity	≥5E+12Jones (1.55 μ m, Tint=16ms)	Power dissipation	5W (TEC OFF)
Refrigeration mode	TEC (Adjustable / off)	Environmental Adaptability	
Image		Operating temperature	-20°C~+50°C
Frame rate	25Hz/100Hz/300Hz	Storage temperature	-30°C~+60°C
Exposure time	10 μ s~1/ Frame rate	Physical Properties	
ADC	14bit	Weight	310g
On-board image processing	Blind element replacement、Auto exposure、Auto gain control、Auto contrast enhancement (adjustable)、Image noise reduction image enhancement	Size	77mm×55mm×73mm

Product Features

- TEC InGaAs Detector;
- Resolution: 320×256; Image spacing:30um;
- Camera output frame rate: fixed frame rate, continuously adjustable frame rate;
- Improved temperature control of detector;
- Improved automatic gain control;
- On-board non-uniformity correction;
- Auto contrast enhancement (adjustable) ;
- Digital video output;
- Analog video output;
- Abundant interfaces: power interface, video interface, external trigger;
- Small size, light weight, low power consumption, stable performance。

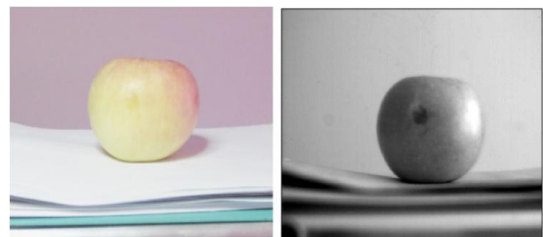
Dimensions



Imaging Effect



Visible (Fluid Level detection) SWIR



Visible (Bruise detection) SWIR