



CHALLENGING LIGHT
FOR OUR PARTNERS

IRXCAM-1024

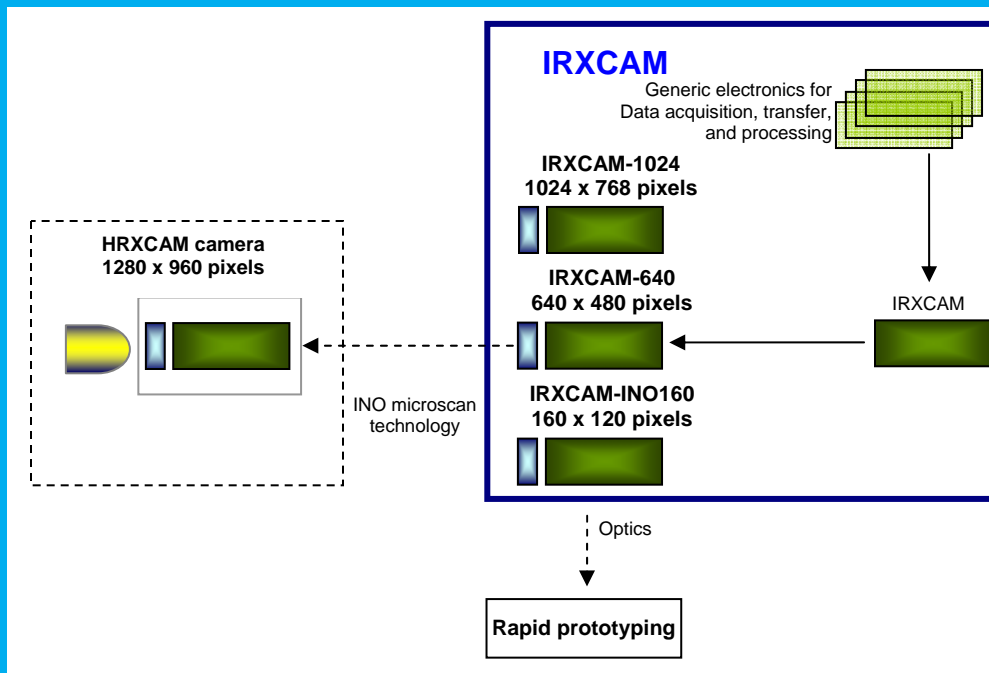
CAMERA MODULE

The IRXCAM-1024 camera core is a flexible module based on a state-of-the-art 1024 x 768 pixel uncooled FPA but which may be rapidly modified to accommodate other resolutions and sensor types. Providing 16-bit raw signal and 8-bit final image outputs at 50 Hz, the electronics gives total access to the detector configuration parameters.

The output is available in Camera Link, XGA and GigE. The camera core can be configured for outdoor operation from -30°C to 55°C at maximum sensitivity.

INO is a world-class center of expertise in industrial applications for optics and photonics, and a leading technology developer and provider of bolometers and IR module technologies.

GENERAL ARCHITECTURE



COMM-110012

The module is composed of a set of electronic boards that handle raw data acquisition and processing, final data formatting, synchronization with an external source, and data transfer according to various standards. The FPA is mounted on proximity electronics that are adaptable to various FPAs.

PRELIMINARY TECHNICAL SPECIFICATIONS

SENSOR	<ul style="list-style-type: none"> . 1024 x 768 pixels . ULIS UL 05 251 . LWIR uncooled microbolometer
VIDEO OUTPUT	<ol style="list-style-type: none"> 1. Camera Link <ul style="list-style-type: none"> . Raw data image or corrected image 2. XGA <ul style="list-style-type: none"> . Corrected image only 3. GigE Link <ul style="list-style-type: none"> . Corrected image only
CONTROL	<ul style="list-style-type: none"> GigE Link <ul style="list-style-type: none"> . System operation control . Loading of parameters & calibration tables
IN-SYSTEM PROCESSING	<ul style="list-style-type: none"> . Shutter offset correction table (baseline) . Gain & offset correction table . Contrast & brightness user adjustment . Pixel replacement . Overlay video . Black hot/white hot
OPTIONS	<ul style="list-style-type: none"> External trigger input (opto-isolated) TEC driver MicroShutter electronic driver Serial interface Thermistor interface (x2) Real time clock
POWER SUPPLY	9-12V DC
POWER CONSUMPTION	<ul style="list-style-type: none"> With GigE Link: ~ 7.8W Without GigE Link: ~ 6.8W
DIMENSIONS	65 mm (H) x 65 mm (W) x 145 mm (L)
WEIGHT	250 g
TEMPERATURE	<ul style="list-style-type: none"> . Operating: -30 to 55 °C . Storage: -40 to 70 °C
EXTENSION	<ul style="list-style-type: none"> . Interface for microscan electronic driver . Push buttons (x3) . Quadrature encoder (x1)

* Subject to change.

COMM-11001Z