

# SIR 2



## OPTICAL

Number of Channels	1
Lenses	Nikon F-mount
System Aperture	f 2
Shutter	Electro-mechanical
Distortion	Nominally zero
Coupling	MCP to CCD via relay optic
Vignetting	<3%
Intensity variation	Better than 5% across the image

## INTENSIFIER/CCD

Image Sensor	KAI11002M
Active CCD Pixel	4008 (H) x 2688 (V)
Pixel Size	9µm (H) x 9µm (V)
Dynamic Range	12 bits
Intensifier	40mm High Resolution MCP Input window Fused Silica Output window Glass Photocathode S25, others on request Phosphor Screen FS
Dynamic resolution	>36 lp/mm

## TIMING PARAMETERS

System Clock	100MHz quartz crystal controlled.
Inherent Delay	<130ns
Imaging Mode	Single or Double image
Exposure Modes (each image)	Single exposure or multiple exposures (Max. 16 - subject to imaging conditions).
Exposure Times	10ns – 10ms in 10ns steps independently variable
Delay to 1st exposure	130ns – 10ms in 10ns steps independently variable
Flash output	20ns to 1ms in 10ns steps independently variable
Separation	30ns to 20ms in 10ns steps independently variable

## INPUT/OUTPUT SIGNALS

Trigger 1	Electrical signal (BNC connector) Threshold variable from ± 25V Rising or falling edge Positive or Negative polarity Make/Break 50Ω or 1KΩ termination
Trigger 2	Electrical signal (BNC connector) Threshold variable from ± 25V Rising or falling edge Positive or Negative polarity Make/Break 50Ω or 1KΩ termination
Timing Monitor Pulses	Pulse width and position user programmable minimum width 10ns TTL into 50Ω
Flash Trigger Outputs	Pulse width and position user programmable minimum width 10ns TTL into 50Ω
Focus Monitor	6.5" TFT LCD display monitor
Local Controls	Intuitive membrane keypad
Local Status Display	16 x 2 character LCD Backlit
Camera Interface	Data and Command transfer via 100Mbps Ethernet Cable length 100m (standard) 100FX fibre optic Ethernet link (upto 2Km) - optional
Software	Custom software compatible with Microsoft Windows Operating Systems for camera control, image data archiving in various file formats.

## ENVIRONMENTAL

Storage temperature	-10°C to +50°C
Operating temperature	-5° to +40°C
Humidity	10 – 90% RH non condensing
Vibration shock	10 – 40Hz Max. 10g in any direction
EMC	Meets all EC harmonized standards



BS EN ISO9001:2000 FM 87429