

## Cooled Thermal Imaging Module

Combining HgCdTe high performance cooled FPA detector with a real-time digital image processing circuit, Guide Infrared has developed the 3rd generation of cooled FPA thermal imaging modules, taking the lead in the global IR industry. The compact size and low noise greatly enhance its working performance, and adaptive dimming with strong stability enable it to easily achieve reconnaissance, search and identification.

Thermcore CM series are very appropriate system for discovering targets from a vehicle, building, construction projects, ocean navigation and border surveillance, providing a clear and stable infrared image at night and in adverse weather conditions.

### Features and Benefits

- High sensitivity and high resolution
- Automatic adjustment of brightness and contrast to improve image quality for better target recognition
- Rugged design, easy for direct use or integration
- Compact and light weight



### Applications

- Transportation: vehicle, voyage and maritime
- System integration
- Security
- Search and rescue



# Specifications

CM3

CM6

Detector		
Detector material	Cooled FPA microbolometer HgCdTe	
Cooling method	Stirling cycle cooling	
Cooling time	8 minutes	
Spectral range	3 $\mu$ m ~ 5 $\mu$ m	
Pixels	320 x 256	640 x 512
Pitch	30 $\mu$ m x 30 $\mu$ m	15 $\mu$ m x 15 $\mu$ m
NETD	$\leq 25\text{mk}@25^{\circ}\text{C}$	
Image		
Video Output	PAL(25Hz)/NTSC(30Hz)	
Digital Zoom	2 x	
Image Enhancement	Image filtering and sharpening function	
Contrast & brightness adjustment	Auto/Manual	
Polarity	B&W, B&W inverse	
Power System		
Power Supply	24 VDC (110/220VAC adapter)	
Power Dissipation	cooling 25W; stable 20W	
Environmental Parameters		
Operating temperature	-40 $^{\circ}\text{C}$ ~ +60 $^{\circ}\text{C}$	
Storage temperature	-45 $^{\circ}\text{C}$ ~ +65 $^{\circ}\text{C}$	
Interface		
Interface	Power, RS422, RCA/BNC	
Physical Characteristics		
Weight	2.3kg (excluding lens)	
Size	260mm x 106mm x 116mm (excluding lens)	

