

# SENTECH

## **STC-N632 / N632CS / N632L STC-P632 / P632CS / P632L Product Specification**

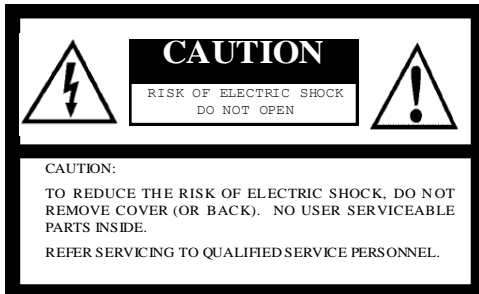
**NTSC / PAL (Color / High Resolution)  
Board Type CCD Camera**

For design help, accessories or pricing, please contact:  
sales@avsupply or call: 1-858-565-1101

**AUDIOVIDEO SUPPLY**  
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## Safety Precautions



The lightning flash with arrowhead symbol, within an equilateral triangle, is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.



The exclamation point within an equilateral triangle is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

For U.S.A.

Warning:

This equipment generates and uses radio frequency energy and if not installed and used properly, i.e., in strict accordance with the instruction manual, may cause harmful interference to radio communications. It has been tested and found to comply with the limits for a Class A computing device pursuant to Subpart J of Part 15 of FCC Rules, which are designed to provide reasonable protection against such interference when operated in a commercial environment.

For Canada

Warning:

This digital apparatus does not exceed the Class A limits for radio noise emissions from digital apparatus set out in the Radio Interference Regulations of the Canadian Department of Communications.

WARNING:

TO PREVENT FIRE OR SHOCK HAZARD, DO NOT EXPOSE THIS APPLIANCE TO RAIN OR MOISTURE.

## Product Precautions

- Handle the camera with care. Do not abuse the camera; avoid striking or shaking it. Improper handling or storage could damage the camera.
- Do not pull or damage the camera cable.
- During camera use, do not wrap the unit in any material. This will cause the internal temperature of the unit to increase.
- Do not expose the camera to moisture, or do not try to operate it in wet areas.
- Do not operate the camera beyond its temperature, humidity and power source ratings.
- While the camera is not being used, keep the lens or lens cap on the camera to prevent dust or contamination from getting in the CCD or filter area and scratching or damaging this area.
- Do **not** keep the camera under the following conditions:
  - In wet, moist, and high humidity areas
  - Under hot, direct sunlight
  - In high temperature areas
  - Near an object that releases a strong magnetic or electric field
  - Areas with strong vibrations
- Use a soft cloth to clean the camera. Use pressured air spray to clean the surface of the glass. DO not scratch the surface of the glass.

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## I. Specifications

### A. Electronic Specifications / Mechanical Specifications / Environmental Conditions

Product		STC-N632	STC-P632
Electronic Specifications	Imager	1/3" Interline NTSC CCD: ICX638AK (Sony)	1/3" Interline PAL CCD: ICX639AK (Sony)
	Active Picture Elements	768 (H) x 494 (V)	752 (H) x 582 (V)
	Chip Size	5.59 (H) x 4.68 (V) mm	5.59 (H) x 4.68 (V) mm
	Cell Size	6.35 (H) x 7.4 (V) $\mu$ m	6.50 (H) x 6.25 (V) $\mu$ m
	Scanning System	2:1 Interlace	
	Vertical Frequency (Frame Rate)	59.94 Hz	50.00 Hz
	Horizontal Frequency	15.734 kHz	15.625 kHz
	Resolution	480 TV lines	
	S/N Ratio	More than 48 dB (GAIN 0dB)	
	Minimum Scene Illumination	0.53 lx at F1.2	0.47 lx at F1.2
	Sync. System	Internal	
	Video Output	1.0Vp-p with 75 $\Omega$	
	Shutter Speed	Electronic Iris / Fixed Shutter (Software Selectable)	
	Gain	AGC / Fixed Gain (Software Selectable)	
	Gamma	1 / 0.45 (Software Selectable)	
	White Balance	Normal / Mirror (Software or Wire Harness Selectable)	
	Mirror Image	I2C through Jig box	
	Communication	DC +7V to +13V	
	Power	Input Voltage	Less than 1.0W
Consumption		26 (W) x 26 (H) x ** (D) mm	
Mechanical Specifications	Dimensions	IR cut filter	
	Optical Filter	IR cut filter	
	Weight	CS mount / Fixed lens / Without lens mount	
	Weight	Approximately 12g (without lens)	
Environmental Conditions	Temperature & Humidity	Operational	Temperature: -10 to 45°C; Relative Humidity: 0 to 85% (No Condensation)
		Storage	Temperature: -30 to 65°C; Relative Humidity: 0 to 90% (No Condensation)
	RoHS	RoHS Compliant	

## B. Connector Specifications

### 1. Power / Video Connector (CN1)

Pin No.	Signal Type	Color of the Wire
1	Power in	Red
2	GND	Black
3	Video Out	Yellow
4	GND	Black
5	Select image type (Normal/Mirror)	Green
6	N.C.	

Notes: The mirror image is set by pin 5.

a. The mirror image outputs when pin no.5 connects to the GND. The normal image outputs when pin no.5 is open.

b. The camera setting when mirror is selected:

Back light compensation: OFF  
 ALC: ON  
 White Balance: AUTO  
 Image: Mirror Image  
 (The settings above cannot be changed by the communication)

c. The camera setting when normal is selected:

Back light compensation: ON  
 ALC: ON  
 White Balance: AUTO  
 Image: Normal Image  
 (The settings above cannot be changed by the communication)

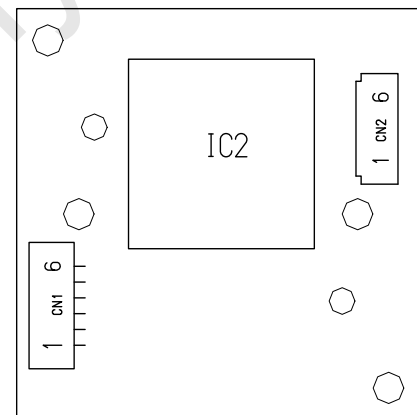


Fig. 1 PCB1 Back

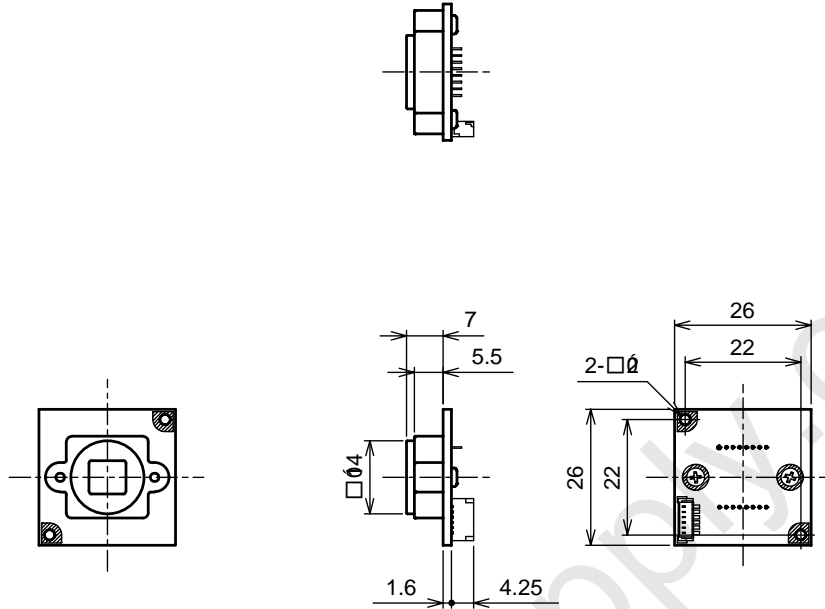
### 2. Communication Connector (CN2)

Note: Communication Jig box is required for communicating to the camera.

Pin No.	Signal Type	Color of the Wire
1	EEPSL	White
2	EEPSL	White
3	Write Protect	White
4	GND	White
5	Data	White
6	CLK	White

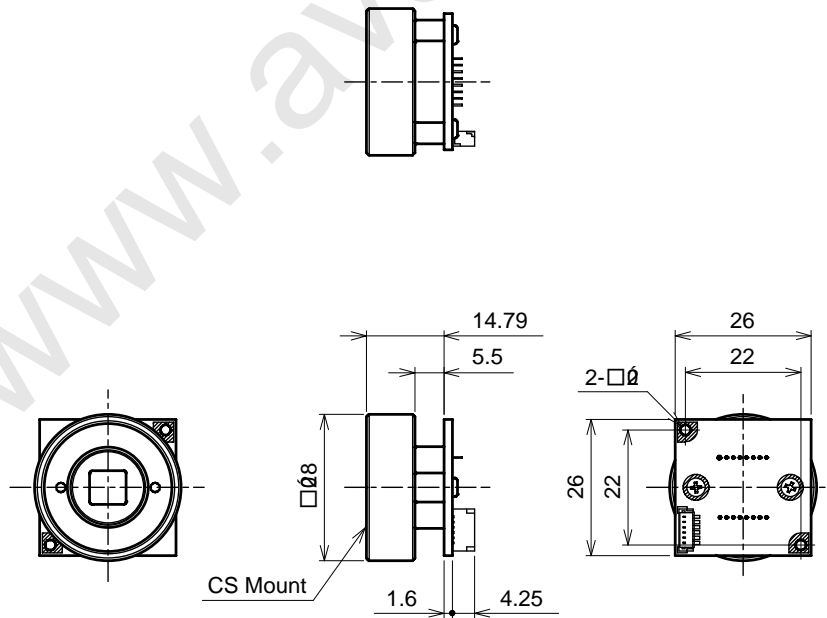
## II. Dimensions

### A. Dimensions STC-N632 / P632: Without lens mount type



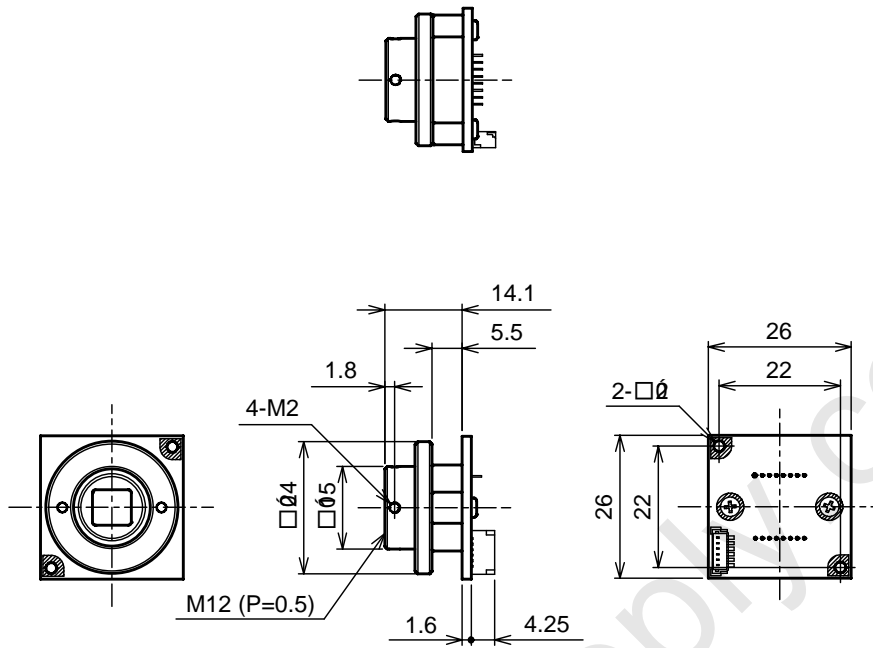
Unit: mm

### B. Dimensions STC-N632CS / P632CS: CS mount type



Unit: mm

## C. Dimensions STC-N632L / P632L: Fixed lens type



Unit: mm



Revisions

Rev	Date	Changes	Notes
1.0	2009/08/31	New Document	

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