**Specification**

- **Pick Up Element**: 1/3" SONY CMOS Sensor
- **Effective Picture Elements (H×V)**: 1280(H) X720(V)
- **Horizontal Resolution**: 1000TV Lines
- **S/N Ratio**: More than 48dB
- **Clock Frequency (MHZ)**: NTSC:19.9999, PAL:19.9375
- **Scanning System**: 2:1 Interface
- **Minimum Illumination**: 0 Lux (with IR LED ON)
- **Synchronous System**: Internal, Negative sync.
- **Auto Electronic Shutter**: NTSC:1/60s~1/1000, 00s; PAL:1/50s~1/100,000s
- **Gamma Characteristic**: 0.45
- **IR Distance**: 60~80 Meters
- **IR Status**: Under 10 LUX by CDS
- **IR Power On**: CDS Auto Control
- **Video Output**: Vpp, 75 Ω
- **Auto Gain Control**: Auto
- **Power/Current**: 12VDC(+/-10%)/2000mA
- **Lens**: 8 mm
- **Water Resistance**: IP67
- **Dimension (mm)**: 250(W)X115(H)X35(D)mm
- **Weight (g)**: 1350
- **Storage Temperature**: -30~+60℃ RH95% Max
- **Operating Temperature**: -10~+50℃ RH95% Max

**Packing List**

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<th>Name</th>
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<td>Weatherproof Day&amp;Night IR Camera</td>
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<tr>
<td>2.</td>
<td>UserGuide</td>
<td>1</td>
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**Notes**: Before providing power for the camera, please read this UserGuide in detail!

Do not attempt to disassemble the camera. If the camera cannot work, please contact local franchiser or our company.


**BRIEF OF PRODUCT**

- **Sensor**
  Adopt 1/3" SONY CMOS sensor

- **Auto Gain Control (AGC)**
  Built-in auto gain control (AGC) circuit. The color camera can get high definition picture in low Lux condition.

- **Auto Electronic Shutter (AES)**
  Built-in auto electronic shutter function. The color camera's AES speed can reach 1/100,000s.

- **Gamma Characteristic**
  Camera Gamma characteristic is 0.45.

- **Scanning Mode**
  NTSC or PAL mode.

- **Night-time Vision**
  0 Lux with IR LED ON. Adopt Taiwan high quality IR LED, having very good night-vision effect.

**CONNECTING**

- **Trouble and Solution**

  1. **No Picture after providing power**
     - May be the power supply voltage abnormality, please check the power supply voltage and pole whether exactitude.
     - Please check all the connecting cable and monitors whether be connected correctly or not.

  2. **The picture level direction have flowing interference ripples**
     - May be caused by the power supply AC ripples, it need filter the wave of the power supply.
     - Check the monitor and peripheral equipments used.

  3. **The picture background color changes continuously**
     - The fluorescent lamp's electromagnetic field cause color roll. This is proper phenomenon of the cameras.
     - Reduce the fluorescent lamp numbers or increase the distance between the camera and the fluorescent lamps can improve it.
     - Use power supply external sync. camera can solve it.

  4. **The picture smear too mass**
     - The power supply's voltage unstable.
     - Connecting cables not connect correctly or have high impedance.

**INTRODUCTION**

Congratulations on your purchase of this product. This UserGuide suits IR camera series product. We adopt the latest CMOS technical of sensor and driver. The most attractive characteristics are water-resistant, and widely applicable to day & night, indoor & outdoor. In addition, it owns the characters of high definition and stability, strong anti-jamming, rich and real color. Fixing and using this model are convenient too. It is very good for you to apply to yours CCTV system.

Please read this instruction manual carefully to ensure proper use of the product.

- **Notes:**
  - The power supply must through safe attestation, its output voltage, current, voltage polarity and operating temperature must match the camera's requirement.
  - When using the camera in the thunderbolt condition, please note to mount Anti-thunder device or put off the power supply plug and cable.
  - In order to capture high quality pictures, the power supply's cable and video output cable should not be too long.