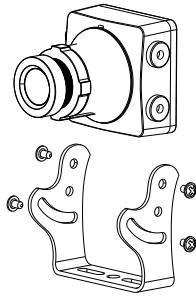




## 600TVL/700TVL CCD Mini FPV Camera Instruction Manual



**WARNING:** Read the ENTIRE instruction manual to become familiar with the features of the product before operating. Failure to operate the product correctly can result in damage to the product, personal property and cause serious injury.

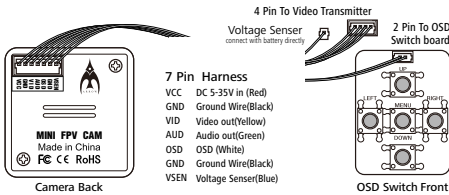


**Age Recommendation:**  
Not for children under 14 years. This is not a toy.

**NOTICE:** This product is only intended for use with unmanned, hobby-grade, remote-controlled vehicles and aircraft. FOXEEER disclaims all liability outside of the intended purpose and will not provide warranty service related thereto.

**SUPPORT:** Visit [www.foxeeer.com/support](http://www.foxeeer.com/support) to get more information.

### CAMERA-OSD SWITCH CONNECTION



**CAUTION:** If you are using ESC's with active braking, we recommend powering the camera system through a BEC or voltage regulator.

### CAMERA-VIDEO TRANSMITTER CONNECTION

To connect the camera directly to the video transmitter, plug the 4 pin wiring harness from the video transmitter into the camera leaving the OSD pin open.

### OSD MENU

**MENU:** Push MENU (center button) to go to the main menu.  
**UP/DOWN:** Move up and down through the menu.  
**Left/Right:** Modify the menu parameters.

### FPV OSD Setup

- Long press left button, user name info will flicker, you can move user name position now, after setup, press center button to save, user name stop flicker
- Long press right button, time flicker, you can move time position, after setup, press center button to save, time stop flicker

FOXEEER	
0 1 2 3 4 5 6 7 8 9	ABCDEF GHIJKL MOP
QRSTUVWXYZ01-↵	
FONT :	S2
NAME :	ON
TIME :	ON
POWER :	ON
DEFAULT :	
EXIT :	

- Long press top button, you can setup user name, OSD info enable or disable separately, besides, you can also setup font, S1/S2/S3, default is S2, and you can reset to default setup, press EXIT to save.
- Long press bottom button, voltage flicker, you can move voltage position, after setup, press center button, you can adjust voltage if the OSD voltage is not same as real power, after setup, press center button, voltage stop flicker

### 1. Lens

This function is used to adjust the brightness of the screen.

- MANUAL:** For use with a manual iris lens.
- DC:** For use with a DC drive auto iris lens.
- VIDEO:** For use with a video drive auto iris lens.

SETUP		
LENS		MANUAL
EXPOSURE		↵
BACKLIGHT		OFF
WHITE BAL		ATW1
DAY/NIGHT		AUTO
SPECIAL		↵
IMAGE ADJ		↵
DPC		↵
LANGUAGE		ENGLISH
RESET		↵
EXIT		

### 2. EXPOSURE

1. SHUTTER- Condition and speed control

- Auto:** Shutter speed is controlled automatically according to the brightness of the scene.
- FIXED:** Select shutter speeds from 1/50 to 1/100000.
- FLK:** Select when flickering occurs due to imbalance between illumination and frequency. PAL Mode: 1/100, NTSC Mode: 1/120.

2. BRIGHTNESS- Adjust brightness from 0-255

3. AGC- Depending on lightness of surroundings select HIGH, MID, LOW or OFF.

4. DWDR- Depending on lightness of surroundings turn OFF or ON (Adjust brightness from 0-63).

SETUP		
LENS		MANUAL
EXPOSURE		↵
BACKLIGHT		OFF
WHITE BAL		ATW1
DAY/NIGHT		AUTO
SPECIAL		↵
IMAGE ADJ		↵
DPC		↵
LANGUAGE		ENGLISH
RESET		↵
EXIT		

EXPOSURE		
SHUTTER		AUTO
BRIGHTNESS	---	050
AGC		----
DWDR		OFF
RETURN		RETJ

### 3. BACKLIGHT

1. BLC ( Backlight Compensation)

Use when there is a strong backlight behind the object, clear images of the background as well as the object can still be obtained.

2. HLC

Adjust level from 0-255. There are two options: night only, all day.

SETUP		
LENS		MANUAL
EXPOSURE		↵
BACKLIGHT		OFF
WHITE BAL		ATW1
DAY/NIGHT		AUTO
SPECIAL		↵
IMAGE ADJ		↵
DPC		↵
LANGUAGE		ENGLISH
RESET		↵
EXIT		

### 4 WHITE BAL (WHITE BALANCE)

1. ATW (Auto Tracking White Balance)- Ideal for color temps from 1800°K-10500°K ( fluorescent light, outdoor, sodium vapor lamp, etc.)

2. MANUAL- Select ATW and change to Manual mode.

- Red 0-255
- Blue 0-255

Select RETURN when finished.

SETUP		
LENS		MANUAL
EXPOSURE		↵
BACKLIGHT		OFF
WHITE BAL		ATW1
DAY/NIGHT		AUTO
SPECIAL		↵
IMAGE ADJ		↵
DPC		↵
LANGUAGE		ENGLISH
RESET		↵
EXIT		

### 5. Day & Night

Day & Night switch is specially designed for different occasions. There are four kinds of modes.

- Auto mode
- Color mode
- B/W mode
- External switch

## 1. Color to B/W

When in External Control this can't be adjusted. This is color to B/W accumulated light intensity, when it reach "alternating light" state, camera could be damaged by frequent switch. It might cause to not correct judgment of image and reduction of span life of the device.

## 2. B/W TO COLOR

When in External Control this can't be adjusted. This is B/W to color accumulated light intensity, when it reach "alternating light" state, camera could be damaged by frequent switch. It might cause to not correct judgment of image and reduction of span life of the device.

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
▶ DAY&NIGHT	AUTO
SPECIAL	↓
IMAGE ADJ	↓
DPC	↓
LANGUAGE	ENGLISH
RESET	↓
EXIT	↓

## 3. DELAY TIME

Delay before color state begins to alternate.

## 6. SPECIAL

### 1. CAM Title - Set the title background

### 2. MOITON - Motion detection

Choose the area and press ENTER to confirm. The color of the chosen area will change. Repeat to choose other areas. After 1 second of inactivity it will move to the next menu item.

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
DAY&NIGHT	AUTO
▶ SPECIAL	↓
IMAGE ADJ	↓
DPC	↓
LANGUAGE	ENGLISH
RESET	↓
EXIT	↓

### 3. PRIVACY - Conceal the areas(OFF/ON)

Conceal the areas where you don't wish to appear on the screen.

- (1) AREA SEL: Set 4 privacy areas.
- (2) AREA STATE: Select AREA STATE ON to conceal AREA selected. OFF to disable Privacy.
- (3) LEFT/RIGHT/TOP/BOTTOM: Set the dimension of each privacy area by slider.
- (4) COLOR: Select the color of each privacy area by slider.
- (5) RETRUN: Return to previous menu.

### 4. PARK LINE - OFF/ON

### 5. COMM ADJ

- (1) CAM ID: Set camera ID from 0~255
- (2) BAUD RATE: Set camera communication speed from 2400 to 38400
- (3) PROTOCOL
- (4) DISPLAY ID: OFF/ON
- (5) ID POS

COMM ADJ	
▶ CAM ID	001
BAUD RATE	4800
PROTOCOL	PELCO-D
DISPLAY ID	OFF
ID POS	↓
RETURN	RET ↓

### 6. VERSION

## 7. IMAGE ADJ

- (1) Lens sharp: OFF/ON, adjust from 0~255
- (2) 2DNR: OFF/ON
- (3) Mirror: OFF/ON
- (4) FONT COLOR: Adjusted from 0 to 51
- (5) CONTRASR: Adjusted from 0 to 255
- (6) SHARPNES: Adjusted from 0 to 255
- (7) DISPLAY CRT/LCD
- (8) NEG IMAGE: OFF/ON

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
DAY&NIGHT	AUTO
SPECIAL	↓
▶ IMAGE ADJ	↓
DPC	↓
LANGUAGE	ENGLISH
RESET	↓
EXIT	↓

## 8. DPC

Set the black point and white point as auto-completion-point numbers.

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
DAY&NIGHT	AUTO
SPECIAL	↓
IMAGE ADJ	↓
▶ DPC	↓
LANGUAGE	ENGLISH
RESET	↓
EXIT	↓

## 9. LANGUAGE

ENGLISH/CHINESE

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
DAY&NIGHT	AUTO
SPECIAL	↓
IMAGE ADJ	↓
DPC	↓
▶ LANGUAGE	ENGLISH
RESET	↓
EXIT	↓

## 10. RESET

### 1. FACTORY

Return to camera's initial setting.

### 2. RETURN

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
DAY&NIGHT	AUTO
SPECIAL	↓
IMAGE ADJ	↓
DPC	↓
LANGUAGE	ENGLISH
▶ RESET	↓
EXIT	↓

## 11. EXIT

Save all settings and exit to Main Menu.

SETUP	
LENS	MANUAL
EXPOSURE	↓
BACKLIGHT	OFF
WHITE BAL	ATW1
DAY&NIGHT	AUTO
SPECIAL	↓
IMAGE ADJ	↓
DPC	↓
LANGUAGE	ENGLISH
RESET	↓
▶ EXIT	↓

## VOLTAGE DISPLAY

CAM IN  
GND  
VIDEO  
AUDIO  
GND  
VSEN connect with battery directly

