ARCHITECT & ENGINEER SPECIFICATIONS
SECTION 16780
VIDEO SURVEILLANCE SYSTEMS

SSC-DC593 CCD Color/B&W CCTV Camera with DynaView™ Technology

PART 2 PRODUCTS

2.01 CCTV CAMERA SPECIFICATIONS

A. VIDEO - GENERAL REQUIREMENTS:

1. The SSC-DC593 color camera shall utilize a 1/3" type interline transfer CCD with DynaView™ Technology. The image sensing area shall be 4.8 x 3.6mm. The camera shall produce 480 lines horizontal resolution and a signal to noise ratio of better than 50dB (AGC OFF, Weight ON).

2. The SSC-DC593 color camera shall require a minimum scene illumination of:
   Color: 0.4 lx at F1.4 (30 IRE, AGC ON, Turbo Mode)
   0.8 lx at F1.4 (50 IRE, AGC ON, Turbo Mode)
   2.9 lx at F1.4 (100 IRE, AGC ON, Turbo Mode)
   B&W: 0.07 lx at F1.4 (50 IRE, AGC ON, Turbo Mode)

3. The SSC-DC593 shall have Color and B/W mode capability, alternatively called day and night modes. The switching between modes shall be accomplished automatically by sensing the luminance level, or by external TTL level signals via the control terminals on the rear of the camera.
   On B/W mode, a dc motor shall move the IR cut filter away from the CCD imager, replacing it with a clear filter, allowing the camera to fully utilize the sensitivity of the CCD in the near IR range, beyond 700 nm.

4. Setup parameters of the camera shall be via onscreen menu setting except RS-485 addressing, which shall be accomplished via dip switches located on the side panel.

5. There shall be 2 independent user settings, designated A or B, as required by the user.

6. The SSC-DC593 shall have Normal & Turbo AGC modes, or turned off. Normal AGC shall provide up to 18dB of gain. Turbo AGC shall provide an additional 6dB gain when enabled, allowing a total AGC range of up to 24dB.

7. The SSC-DC593 shall have an Activity Detection circuit to detect changes in luminance levels in the designated area(s). The camera shall have up to 3 user configurable, rectangular sensing areas, variable in size, aspect ratio and position, within the viewing area. When the threshold detection is reached, user shall have the option of superimposing the word "Alarm" on the screen for 10 seconds, which can be located on any of the 4 corners of the screen. The camera shall also initiate an alarm output signal through the alarm terminals on the rear of the camera. The alarm duration shall be selectable in between 0.5 and 10 seconds and shall have 5 levels of sensitivity.

8. The SSC-DC593 shall also be equipped with a 4-pin auto iris lens connector to work with both DC and Video servo lens. Level control shall be accomplished via onscreen menu.

9. The SSC-DC593 camera shall include a DSP (Digital Signal Processor) LSI technology which delivers not only versatile functionality but also high stability and reliability. This Digital Signal Processing circuit shall provide Video Noise Reduction especially in low light level conditions.

10. Video connection shall be via a "BNC" Connector located on the rear of the camera.

11. The camera shall employ the DynaView™ wide dynamic range technology. Dynamic range shall be 52dB.

12. The SSC-DC593 shall have Privacy Zone Masking function, which allows the camera to mask areas that should not be displayed on the monitor

13. The SSC-DC593 shall have up to 2 privacy zone mask areas, independent in size, aspect ratio, and position within the viewing screen. User shall have the option of either viewing the video within the designated zones, or alternatively mask the frame(s) to view the remaining areas.

14. The SSC-DC593 shall have Variable Gamma function, to allow fine tuning the video response to various lighting conditions. It shall have 4 Scene selections in addition to a default gamma setting. Scene 4 setting shall have a gamma value of 1.

15. The SSC-DC593 shall have Camera Titling for up to 24 Characters. The position of the camera title on the screen shall be movable to the 4 corners of the monitor screen.

16. The SSC-DC593 shall have Dynamic Noise Reduction, to reduce video noise in low light conditions.

17. The SSC-DC593 color camera shall have a CCD Iris™ function to automatically adjust the shutter speed depending on the amount of incident light. This shall enable the camera to continuously control the exposure by electronically adjusting the CCD shutter speed in the range from 1/60 to 1/100,000 of a second.

18. The camera shall have an RS-485 interface, located on the rear panel of the camera.. Camera address shall be accomplished through dip switches located on the side of the camera.

B. VIDEO-ELECTRICAL REQUIREMENTS

1. The SSC-DC593 shall use an input voltage of either 12VDC ± 10% or 24 VAC ± 10% as a power source with auto sensing between the 2 modes.

2. The power connection shall be by means of a screw type terminal strip to connect to an external power supply of 12 VDC or 24 VAC, a ground connection shall also be provided on the back of the camera.

3. The scanning system shall be 625 lines, 50 fieldes/25 frames, 2:1 interlace.

4. The SSC-DC593 shall meet the EIA/NTSC standard.

5. Camera synchronization shall be switch selectable for Internal or AC (60Hz) line lock, with vertical phase adjustment ±90°.

6. The camera shall automatically switch to internal sync mode when 12VDC is applied, regardless of the sync selection switch position.

7. The composite video output shall be 1.0 V peak to peak @ 75 ohms, sync negative via a BNC connector.

8. The signal to noise ratio shall be 50dB (AGC Off, Weight On).

9. The SSC-DC593 camera parameters or functions shall be via On Screen Set Up Menu with cursor keys on the side of the camera.

10. 10-1. The SSC-DC593 color camera shall have a wide range ATW (Automatic Tracing White Balance) mode from 2000°K to 10,000°K. It shall adjust the white balance automatically in response to the light conditions in order that pictures with an appropriate color balance can be obtained.

10-2. The white balance menu shall have the following 6 modes (ATW-Pro/ATW/Dual WB/5600K/3200K/Manual). The ATW-Pro balance shall be accomplished by using absolute values referenced from the black body radiation curve and the color temperature of the scene. The automatic adjustment range shall be 2,500°K to 6,000°K.

10-3. The SSC-DC594 shall employ dual white balance capability on DynaView™ mode, to achieve proper color balance between high light and low lit areas.

10-3. The SSC-DC593 shall also have conventional backlight compensation. Users shall be able to select Center Spot or average weighting to obtain adequate back light compensation.

11. Power requirements for the SSC-DC593 shall be 12VDC ±10% or 24VAC ±10% at 60Hz.

12. Power consumption shall be approx: 5.8W at 24VAC.

C: MECHANICAL REQUIREMENTS:

1. The SSC-DC593 shall incorporate a CS Lens mount (C-Mount lens can be used by mounting a 5mm adapter).

2. The camera shall incorporate a thumbwheel back-focus adjustment mechanism to allow for fine focus adjustments.

3. The camera shall employ a motor driven mechanism that removes the IR cut filter position from the front of the CCD when it switches to B/W mode, placing a clear filter in place of the IR cut filter, to maintain back focal distance in the visible spectrum.

4. The SSC-DC593 camera shall incorporate a mechanical slide switch to lock the menu settings.

5. The camera mounting hole shall be ¼" –20, on a removable mounting plate that can be positioned at either the top or the bottom of the camera.

6. The camera dimensions shall be 2 7/8(W) x 2 ¼(H) x 5 1/8(D) inches, 70mm(W) x 57mm(H) x 129mm(D).

7. The camera shall weigh approximately 1 lb 2 oz (500g).

D. ENVIRONMENTAL REQUIREMENTS

1. The operating temperature shall be 14°F to 122°F (-10°C to +50°C)

2. The operating humidity shall be 20% to 80% non-condensing.

3. Storage temperature must not be less than -40°F or greater than 140°F

4. Storage humidity shall be 20% to 95% non-condensing.

E. SUPPLIED ACCESSORIES

1. Operating Instructions (1)

2. Menu Operations (1)

3. Lens Mount Cap (1)

F. REFERENCES

1. SSC-DC593 :UL Listed 2044
: FCC/IC Verified Class "B"