



Vidicon Colour Camera Channel Type V 3310

THE V 3310 colour camera channel may be used wherever a high level of scene illumination is available.

Although primarily intended for closed-circuit systems it may also be used for a limited number of broadcast applications and for this purpose may be fitted with an 8½ in. (21.6 cm) viewfinder.

The camera provides high-quality pictures at a light level of 300 ft lamberts, and thus it is suitable for use out-of-doors in all but the dullest weather.

The storage characteristic of the vidicon pick-up tubes also renders the camera suitable for use in telecine channels without the need for fast pull-down projectors.

Features

High accuracy of alignment of 3 colour components.

Will operate on 405, 525 or 625 lines.

Lens indexing and focusing may be controlled either locally or remotely.

All operational controls are contained on the camera control panel and the controls for re-alignment after tube replacement are readily accessible.

Operation is simpler and running costs lower than for an image-orthicon camera.

Lens turret will accommodate a range of lenses from 35 mm to 100 cm plus a zoom lens.

Standard pan and tilt mountings can be used.

Small size and simple operation.

Will operate with up to 300 ft (90 m) of camera cable.

Both tipped and tipless vidicon tubes may be used.

EQUIPMENT

When used for simultaneous RGB transmission the complete camera channel comprises the camera, camera control unit, remote control unit, power supplies and 8½ in. (21.6 cm) viewfinder (if fitted).

If a coded signal is to be produced, a colourplexer unit and sub-carrier phase shifter unit are also required.

The size of the camera is comparable with that of a black-white camera, and standard pan and tilt mountings can be used.



The camera, fitted with viewfinder.

8805

A dust-tight camera case with external connections for filtered-air cooling can be supplied, if required.

All the equipment other than camera and power supplies is housed in two consoles, the power supplies being rack mounted.

Data Summary

Inputs

Mains: 100–125 V or 200–250 V 50/60 c/s.

Pulses: Bridging inputs for standard line drive, field drive blanking and sync pulses at 2 V ± 2 dB.

Outputs: Non-composite Red, Green and Blue vision outputs of 0.7 V into 75 ohm or a coded composite vision output of 1 V into 75 ohms.

Overall vision response: Controlled by aperture correction. With no aperture correction within ±0.25 dB to 6 Mc/s and –3 dB at 7 Mc/s.

Tracking linearity: Differential non-linearity less than 2%. The relative linearities of the 3 channels are within 1% at all levels.

Resolution: At 400 lines per picture height without aperture correction; loss of resolution at the centre of the picture less than 10 dB.

Signal-to-noise ratio: The peak-to-peak signal/r.m.s noise ratio is better than 36 dB with 6 dB of aperture correction.

Registration: The three component images are coincident to within one fifth of a picture element over a central region defined by an ellipse of major and minor axes equal to the width and height of the picture. Outside this region the registration is within half of a picture element.

Dimensions: (overall)

Height	Width	Length	Weight
Camera			
12.5 in. (32 cm)	13 in. (33 cm)	32 in. (80 cm)	125 lb (56.5 kg)
Remote control unit			
5.75 in. (14 cm)	15.25 in. (39 cm)	25.5 in. (65 cm)	
Camera control unit*			
23.75 in. (60 cm)	15.5 in. (39 cm)	31 in. (78.5 cm)	170 lb (75.5 kg)
Camera control panel			
11.75 in. (30 cm)	15.5 in. (39 cm)	25 in. (64 cm)	60 lb (25.5 kg)

*Weight includes camera control panel.

Marconi

The Marconi Company Limited
Closed-circuit Television Division, Basildon, Essex
Telephone: Basildon 22822 · Telex: 1964
Telegrams: Expanse Basildon Telex