

VITHALBHAI PATEL & RAJRATNA P.T. PATEL SCIENCE COLLEGE  
VALLABH VIDHYA NAGAR

T.Y. B.Sc. SEM: VI  
SUB: INSTRUMENTATION(V)  
SUB CODE: US06CINV06

INTERNAL TEST

DATE: 15<sup>th</sup> March 2014  
TIME: 3:30 pm to 5:00 pm  
TOTAL MARKS: 30

Q.1 Answer the following in short.(Attempt Three, each two marks) [06]

- (1) Explain Aspect ratio.
- (2) Explain interlaced scanning.
- (3) Explain amplitude modulation Drawing necessary waveform.
- (4) Draw schematic diagram of frequency mixer and explain its working.
- (5) List and explain different types of mixing of colours.
- (6) Explain electronic tuning in brief.



Q.2 Explain construction and working of image orthicon camera tube. [08]

OR

Q.2 Explain construction and working of vidicon-camera tube. [08]

Q.3 Draw the block diagram of super heterodyne radio receiver. And explain working of each block. [08]

OR

Q.3 Draw the block diagram of amplitude modulated radio transmitter using higher carrier power modulation and explain working of each block. [08]

Q.4 Draw the block diagram of black and white TV receiver and explain working of each block in brief. [08]

OR

Q. 4 Explain in detail principle of colour TV camera. [08]

-: ALL THE BEST:-