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

S.Y. B.Sc. SEM: IV | INTERNAL TEST | DATE: 12th March 2014
SUB: ELECTRONICS | TIME: 1:00 pm to 2:30 pm
SUB CODE: US04CELE01 | TOTAL MARKS: 30

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

(1) The out put power of an amplifier is measured as 1 volt at 5 kH_z and 0.707 volt at 20 KH_z, calculate the decibel change in output.
(2) List different FET parameters.
(3) Draw the symbol of photo diode, solar cell and light emitting diode.
(4) List different type of opto electronics couplers.
(5) Draw the self bias circuit of n-channel FET and explain its working.
(6) Why potential divider FET biasing circuit is best than self FET bias circuit?

Q.2 Draw the frequency response curve for transistor amplifier and explain why the gain falls off at lower and upper frequency. [08]

OR

Q.2 Give an account of fixed voltage bias circuit for FET. [08]

Q.3 Give an account of photo multiplier tube [08]

OR

Q.3 Give an account of LCD in detail. [08]

Q.4 Give an account of n-channel enhancement MOSFET [08]

OR

Q. 4 Draw the potential divider biasing circuit using n-channel FET. Explain it's working and analysis [08]

-: ALL THE BEST:-