

V.P. & R.P.T.P SCIENCE COLLEGE, V.V.NAGAR

S.Y.B.Sc. Sem-IV EXAMINATION

SUB. CODE:-US04CELE01

SUB:Electronic-Devices

DATE:-15 /3/2018

TIME:-03:00 am to 04:30 pm

MARKS-25

- Q-1 Choose correct answer [3]
- _____ is a unit of relative power.
(A) Decibels (C) Volt
(B) Ampere (D) None of these
 - In case of depletion Enhancement MOSFET, the gate source voltage may be either _____ or _____ in both n & p channel device.
(A) positive; negative (C) positive; positive
(B) negative; negative (D) None of these
 - _____ type of biasing is used in Common source amplifier circuit.
(A) fixed bias (C) self bias
(B) potential divider bias (D) None of these
- Q-2 Short answer type question. (any two) [04]
- List different FET parameters
 - Draw the FET equivalent circuit.
 - Draw the input & output wave form of common source amplifier circuit.
- Q.3 Draw frequency response of transistor amplifier. Explain why response fall's off at lower and upper frequency ends also drawing necessary circuit diagram. [06]
- OR
- Q.3 Give an account of fixed voltage bias circuit for FET. [06]
- Q.4 Draw the potential divider biasing circuit using n-channel FET, Explain its working and analysis. [06]
- OR
- Q.4 Give an account of n-channel enhancement MOSFET. [06]
- Q.5 Draw the neat circuit diagram of common source amplifier, explain its working in detail & draw necessary waveform. [06]
- OR
- Q.5 Draw the neat circuit diagram of common gate amplifier, explain its working in detail & draw necessary waveform. [06]

