

S. B. Roll. No.....

MICROWAVE AND RADAR ENGINEERING
6th Exam/ECE/3612/Jun'2021
(For 2018 Batch onwards)

Duration: 1.15Hrs.

M.Marks:25

SECTION-A

Q1. Attempt any three questions.

3x5=15

- i. What are Microwaves? List various applications of Microwaves.
- ii. What are intermediate cavities and what is their function in Multicavity Klystron?
- iii. With the help of a diagram explain the working principle of GUNN diode.
- iv. What are wave guides and how they are different from transmission lines?
- v. Explain the limitations of vacuum tubes at high frequencies.
- vi. Explain the working of reflex Klystron oscillator with the help of a suitable schematic diagram.
- vii. What are attenuators? Explain the working of fixed and variable attenuators.

SECTION-B

Q2. Attempt any one question.

1x10=10

- a. With the help of a neat diagram explain the principle of operation, working and applications of Magnetron.
- b. Write short notes on any two of the following :-
 - i) Reflex Klystron
 - ii) PPI Display
 - iii) IMPATT Diode
- c. With the help of a block diagram explain the working principle of Microwave Communication Link in detail.
- d. Give the block diagram of Pulse Radar and explain the function of each block.