SEMESTER: 4th   **STREAM: H-GE**
PAPER CODE: PHY-H-GE-P-02 (Practical)   **Paper: WAVES & OPTICS**
Full Marks: 10

Answer any two of the following questions :   (5×2=10)

1. Describe an experiment to study the motion of coupled oscillators.

2. How can the frequency of an electrically maintained tuning fork be determined by Melde's method?

3. What are Lissajous figures? How can they be studied in the laboratory?

4. How is Schuster's focusing achieved in a spectrometer? How can the angle of a prism be determined with a spectrometer?

5. Describe an experiment to determine the coefficient of viscosity of water by capillary flow method?

6. Describe an experiment to determine the refractive index of the material of a prism using sodium light.

7. How can the Cauchy constants be determined experimentally?

8. How can the resolving power of a prism be determined experimentally?

9. Describe an experiment to determine the wavelength of sodium light using Fresnel Biprism.

10. How can the resolving power of a plane diffraction grating be determined experimentally?