Roll	No	 	 	

ME-8003(1) (CBGS)

B.E. VIII SemesterExamination, June 2020

Choice Based Grading System (CBGS) Tribology

Time: Three Hours

Maximum Marks: 70

- *Note:* i) Attempt any five questions.
 - All questions carry equal marks.
- 1. Explain Tribo surface preparation concepts. Give brief overview of Tribology.
- 2. Explain Hertz contact stresses, residual stresses, surface fatigue, and creep concepts.
- 3. Discuss Molecular mechanical theory of Fiction.
- 4. How Fiction devices are designed? Give an example and explain.
- 5. Explain different wear mechanisms. How wear in prevented?
- 6. Write technical regulations of Labricants. Discuss boundary/ mixed and fluid thin film lubrication.
- 7. What is Nano Tribology How it can be applied to automotive applications?
- 8. Write short note on followings
 - a) Wear and Chemistry of lubricants
 - b) Specifications of lubricants
 - c) Viscoelastic and plastic behavior of materials
