

Roll No

ME-6004 (CBGS)

B.E. VI Semester

Examination, May 2019

Choice Based Grading System (CBGS)

Metal Cutting and Machine Tools

Time : Three Hours

Maximum Marks : 70

Note: i) Attempt any five questions.

ii) All questions carry equal marks.

1. a) What is the importance of machining in modern industry?
b) What is a tenet lathe. Why is it more useful?
2. a) Name various methods of cutting external thread. Explain the working principle of any one method.
b) Draw a neat sketch of a single point cutting tool and describe its features.
3. Explain the following:
i) Up milling process
ii) Specification of universal milling machine.
4. a) How are drilling machines classified?
b) What is Broaching? What are its advantages and applications?

5. a) Describe the crank and slotted lever quick return motion mechanism.
b) How is surface quality measured?
6. a) Explain forming of gear.
b) Name various gear finishing operations and explain gear grinding process.
7. a) Define the following type of wear
i) Flank wear
ii) Chipping
b) Explain the relationship of tool temperature and tool life.
8. Write short notes on any three
i) Tool signature and nomenclature
ii) Cylindrical grinding
iii) Wheel turning and dressing
iv) Centreless grinding
