

Register No.: Name:

SAINTGITS COLLEGE OF ENGINEERING (AUTONOMOUS)

(AFFILIATED TO APJ ABDUL KALAM TECHNOLOGICAL UNIVERSITY, THIRUVANANTHAPURAM)

FIFTH SEMESTER B.TECH DEGREE EXAMINATION (S), FEBRUARY 2023**FOOD TECHNOLOGY****(2020 SCHEME)****Course Code : 20FTT307****Course Name: Cereal and Legume Technology****Max. Marks : 100****Duration: 3 Hours****PART A*****(Answer all questions. Each question carries 3 marks)***

1. Give an account on the application of parboiling.
2. Enlist the effect of polishing on the nutritional quality of grains.
3. How is a sifter applied in wheat milling?
4. What is tempering in wheat milling?
5. Compare dry and wet milling of corn.
6. List the different varieties of corn and their uses.
7. Explain the principle of twin-screw extrusion.
8. Explain the changes occurring during baking of bread.
9. Interpret the role of CAP in cereal and legume storage.
10. List and define the various types of storage structures.

PART B***(Answer one full question from each module, each question carries 14 marks)*****MODULE I**

11. a) Explain the structure of rice with a neat sketch. (8)
b) Outline the status and importance of grain processing industry in India. (6)

OR

12. Illustrate the process of rice milling and its importance. (14)

MODULE II

13. a) Summarize the nutritional value of wheat and draw a diagram of wheat structure. (8)
b) Define malting and its application in product manufacturing. (6)

OR

14. Illustrate the various steps involved in wheat milling with equipment diagrams. (14)

MODULE III

15. a) Discuss in detail about wet milling of corn. (10)
b) Define the importance of corn starch in food industry. (4)

OR

16. a) Summarize the nutritional benefits of millets in human diet. (8)
b) Outline the methods adopted in finger millet processing. (6)

MODULE IV

17. a) Illustrate the engineering aspects of the twin-screw extruder with a diagram. (10)
b) How the HFCS is produced in food industry? (4)

OR

18. a) Elaborate on breakfast cereal products. (7)
b) Give an account on special dietary foods. (7)

MODULE V

19. a) Discuss about the various anti-nutritional factors in pulses. (10)
b) Describe the silos flow pattern in detail. (4)

OR

20. a) Explain texturization in soybean processing. (7)
b) Distinguish between dry milling and wet milling of pulses. (7)
