

Total No. of printed pages = 3

19/3rd Sem/DFET303



2021

FOOD PRODUCT TECHNOLOGY-I

Full Marks – 100

Time – Three hours

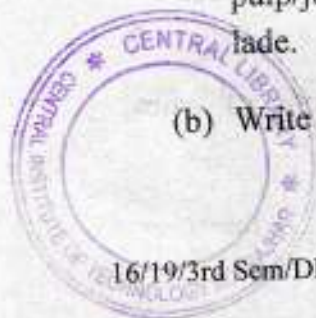
The figures in the margin indicate full marks for the questions.

Answer any *five* questions.

1. (a) What are oilseeds? Describe the steps in extraction of oil from oilseeds. 2+8=10
- (b) Explain the processing of vegetable oils with proper flow diagram. 10
2. (a) What is hydrogenation? Describe the process of hydrogenation. 1+5=6
- (b) What is meant by plasticity of fat? 2
- (c) Explain the wheat flour milling process. 5
- (d) Describe the cleaning operations of wheat grains. 7

[Turn over

3. (a) Explain evaporative cooling. How can evaporative cooling benefit the farmers in the field? 3+3=6
- (b) What is the principle behind controlled atmosphere (CA) and modified atmosphere (MA) storage? Enlist some benefits and limitations of CA and MA storage. 3+7+4=14
4. (a) Write a detail note on Post harvest preliminary processing operations of fruits and vegetables. 10
- (b) Explain the mechanism of drying of fruits and vegetables. Give suitable diagram. 5
- (c) What is osmotic dehydration? Describe the mechanism of osmotic dehydration with proper diagram. 1+4=5
5. (a) Give FPO specification of TSS and fruit pulp/juice content for jam, jelly, and marmalade. 6
- (b) Write a note on Fruit Product Order. 6



(c) Write short notes on : 2×4=8

- (i) Sheet test
- (ii) Drop test
- (iii) Temperature test
- (iv) Refractometer test.

6. Write short notes on any *two* of the following :
10×2=20

- (a) Tomato ketchup/Sauce
- (b) Tomato puree/Paste
- (c) Preparation of Chutney.

7. (a) Describe the canning process of fruits and vegetables. 10

(b) Write about the applications of by-products of fruits and vegetables processing industry. 10

