

Reg.No. \_\_\_\_\_



# Karunya UNIVERSITY

(Karunya Institute of Technology & Sciences)  
(Declared as Deemed-to-be University under Sec.3 of the UGC Act, 1956)

## End Semester Examination – Nov/Dec – 2016

Code : 14FP2025  
Sub. Name : Cereal and Pulses Technology

Semester : 2016-17 ODD  
Duration : 3hrs  
Max. marks : 100

### ANSWER ALL QUESTIONS (5 x 20 = 100 Marks)

| Q. No.                    | Sub Div. | Questions  | Course Outcome | Marks |
|---------------------------|----------|--|----------------|-------|
| 1.                        | a.       | Explain the importance and methods of grain drying.  | CO1            | 5     |
|                           | b.       | Briefly explain the construction and working of LSU dryer with neat diagram.                               | CO1            | 15    |
| (OR)                      |          |  |                |       |
| 2.                        | a.       | Discuss in detail various traditional and modern methods of parboiling.                                    | CO1            | 5     |
|                           | b.       | Write a note on physic-chemical changes associated with paddy parboiling.                                  | CO1            | 15    |
| 3.                        | a.       | Explain in detail the construction and working of Engelburg huller with neat sketch.                       | CO2            | 15    |
|                           | b.       | Brief about various pre-cleaners used in paddy milling.  | CO1            | 5     |
| (OR)                      |          |  |                |       |
| 4.                        | a.       | Explain in detail various milling operations with machinery involved in hulling with neat labeled diagram. | CO2            | 15    |
|                           | b.       | Explain the importance of whitening process in milling of rice.  | CO2            | 5     |
| 5.                        | a.       | Write the process involved in manufacture of glucose syrup and its application in food industry.           | CO2            | 15    |
|                           | b.       | Short note on TVP.   | CO2            | 5     |
| (OR)                      |          |  |                |       |
| 6.                        | a.       | Illustrate the process of oil extraction of corn using soxhlet apparatus with neat labeled diagram.        | CO2            | 20    |
| 7.                        | a.       | Explain the anatomy of corn kernel with labeled diagram.   | CO2            | 5     |
|                           | b.       | Elaborate on dry milling and wet milling of corn with flowchart.   | CO2            | 15    |
| (OR)                      |          |  |                |       |
| 8.                        | a.       | Describe about various traditional storage structure for cereal grains with neat labeled diagram.          | CO3            | 20    |
| <b><u>Compulsory:</u></b> |          |  |                |       |
| 9.                        | a.       | Mention the various factors considered in design of a silo.  | CO3            | 5     |
|                           | b.       | Explain in detail various pressure distribution theories considered while designing a storage silo.        | CO3            | 15    |

ALL THE BEST