

KERALA AGRICULTURAL UNIVERSITY

B. Tech (Food Engg) 2012 Admission

VIth Semester Final Examination - June/July-2015

Cat. No: Fdsc.3205

Title: Food Industry Waste Management (2+0)

Marks: 80

Time: 3 hours

Part A

Answer the following

(10 × 1.0 = 10.0)

State the following statement True (or) False

1. Biomass energy is a renewable source.
2. Activated carbon has very low degree of micro porosity.
3. Briquetting can be done even without binders.
4. Briquetting process with binder material requires high pressure
5. Activated carbon is used in wastewater treatment.
6. Paddy contains about 35 per cent of husk
7. Particle boards can be used in false ceiling.
8. Mango kernel is used for making briquettes.
9. Silver loaded activated carbons are used in domestic water purification.
10. Briquetting increases ash content after combustion.

Part B

Answer any TEN of the following

(10 × 3.0 = 30.0)

Write short note on

1. Biomass resource
2. carbonization
3. Alkali treatment of lignin
4. Pyrolysis
5. Activated carbon
6. stabilization
7. particle board
8. briquetting
9. COD
10. molasses number
11. pelleting.
12. calendaring.

Part C

(6 x 5.0 = 30.0)

Answer any SIX questions

1. Explain pyrolysis and gasification of rice husk
2. Discuss problems encountered in rice bran utilization.
3. Write a note on effluent treatment plant in fruit industry.
4. Explain various uses of byproduct from wheat milling industry.
5. Discuss waste utilization from coconut industry.
6. Discuss by-product utilization of pulse milling industry
7. Write a note on waste water recycling plant
8. Discuss alcohol production from sugar mill.

Part D

(1 x 10.0 = 10.0)

Answer any ONE question

1. Discuss about by-product utilization from meat and poultry industries
2. Discuss nature and availability of food industry waste.

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