2022

Food Science and Nutrition

[P.G.]

(CBCS)

(M.Sc. Third Semester End Examination-2022) PAPER-302

Full Marks:40

Time: 02 Hrs

The figures in the right hand margin indicate marks

Candidates are required to give their answers in their own words as

far as practicable

Illustrate the answers wherever necessary

Group-A

A. Answer any five questions of the following:

5x2 = 10

- 1) Differentiate nutrigenomics and nutrigenetics.
- 2) Define phytosteroid.
- 3) What do you mean by bioavilability of drug?
- 4) Define pseudovitamin.
- 5) Write the role of fluorine on human health
- 6) Write the relationship between prebiotics and probiotics.
- 7) What do you mean by gene silencing?
- 8) Why is lycopene known as nutraceutical?

Group-B

- B. Answer any four questions of the following: 4x5 = 20
 - "Curcumin is inflammatory modulatory nutraceutical"-Justify the statement from the view point of nutriepigenetics.
 - 10) 'Vitamin A is lipid metabolic regulator'- critically analysis the statement from the angle of nutrigenomics.
 - 11) State the possible way of drug-nutrient interaction for absorption of nutrients from g.i. tract
 - 12) Discuss the role of selenium and magnesium on human health.
 - 13) Write briefly the interaction of plant microbiome with human-microbiome.
 - 14) Discuss the phase-I and phase-II of biotransformation of drug.

Group-C

- C. Answer any one question of the following: 1x10 = 10
 - 15) What is amylase inhibitor? State the role of amylase inhibitor on health benefit. What is IC50 value? 2+6+2
 - 16) State about the role of choline and lipoic acid. Draw the structure of 2- flavonol and 3-flavonol. Write the biochemical function of inositol.