

1. "AGMARK Act 1937" comes under-
 - (a) **Department of Consumer Affairs, Govt of India**
 - (b) Department of Agriculture and Corporation
 - (c) Directorate of Marketing and Inspection
 - (d) Department of Legal Metrology

2. what is the example of biological hazard?
 - (a) **Salmonella**
 - (b) Dirt
 - (c) Cleaners
 - (d) Antibiotics

3. What is HACCP system for ?
 - (a) Physical , Chemical and Biological Hazard
 - (b) **A systematic analysis of all steps and regular monitoring of the control points**
 - (c) Identifying the CCP's including their location procedure and process
 - (d) Accurately monitoring food Hygiene hazards

4. SPS under WTO stands for-
 - (a) Standards Prevention and Specifications
 - (b) **Sanitary and Phytosanitary measures**

- (c) Specifications for Products and Supplements
- (d) Safety and Prevention of Sickness

5. Food Safety and Standards Act, 2006 -passed by Indian Parliament and notified on-

- (a) 24th July, 2006
- (b) 24th June, 2006
- (c) **24th August, 2006**
- (d) 24th November, 2006

6. ISO 19011:2011 Quality management system deals with-

- (a) Specifications with Guidance for use
- (b) Guidelines for performance improvements
- (c) Customer satisfaction
- (d) **Guidelines for quality and/or environmental management systems auditing**

7. Coffee is adulterated with

- (a) Saw dust
- (b) **Chicory**
- (c) Ghee
- (d) All of these

8. Sugar and salt act as preservatives by:

- (a) Killing micro-organism directly
- (b) Increasing the acid content of food
- (c) Increasing the water content of food
- (d) **Binding water so it is not available for micro-organism**

9. Out of these, which bacteria is found in processed/cured meat

- (a) Moraxella
- (b) Alcaligenes
- (c) Pseudomonas
- (d) **Lactobacillus**

10. How many act are repealed by Food Safety and Standards Act, 2006

- (a) 4
- (b) 7
- (c) 5
- (d) **8**

11. Currently standards are present for which of the following?

- 1. Packaged drinking water
- 2. Piped drinking water
- 3. Well and canal water

- (a) 1,2
- (b) **,1**
- (c) 1,3
- (d) All of the above

12. Which of the following is/are true about Potassium Bromate?

- 1. Potassium Bromate is a category 2B carcinogen
- 2. Potassium Bromate increases dough strength, leads to higher rising and uniform finish to baked products
- 3. Food Safety Standard Authority of India (FSSAI) permits them up to 50 parts per million.

- (a) **1,3**

(b) **1,2**

(c) 2,3

(d) All of the above

13. The mandate assigned to the Food Authority is

(a) lying down science based standards for articles of food

(b) To facilitate food safety

(c) To regulate manufacture, storage, distribution, sale and import of food

(d) **All of the above**

14. How many Scientific Panels have been constituted in the Food Authority?

(a) **16**

(b) 7

(c) 9

(d) 5

15. Benefits of implementing HACCP/ISO 22000:

(a) A Preventive approach to food safety

(b) Reduces the need for need for and the cost of end product testing (c) Can help the identity process improvements and reduced customer complaints

(d) **All of the above**

16. Which of these is not an International Standards and statutes

(a) Codex Alimentarius Commission (CAC)

(b) European Union Standards (EU)

(c) Food and Agricultural Organization (FAO)

(d) **Bureau of Indian Standards**

17. FSSAI is located in region with head office located at-

- (a) Hyderabad
- (b) Mumbai
- (c) Bangalore
- (d) **New Delhi**

18. ISO 9001:2008 Quality management systems deals with

- (a) Fundamental and vocabulary
- (b) Guidelines for performance improvements
- (c) Customer satisfaction
- (d) **Requirements for quality management**

19. As per definition for food under the Food Act in India, food does not include-

- (a) alcoholic Beverages
- (b) Caffeinated Beverages
- (c) chewing gum
- (d) **chewing tobacco**

20. As per Food Safety and Standards Act, FSMS stands for-

- (a) Food Security Management System
- (b) **Food Safety Management System**
- (c) Food Standards Management System
- (d) Food Safety Mechanization System

21. As per Section 3 of Food Safety and Standards Act 2006, if a food article sold in the market contains any inferior or cheaper substances

whether wholly or partly which is injurious to health then such products can be called as-

- (a) Sub-Standard
- (b) **Unsafe**
- (c) Misbranded
- (d) Partly Sub-Standard

22. As per Section 22 of Food Safety and Standards Act 2006, Foods for special dietary uses or Functional foods or nutraceutical or health supplements does not include

- (a) Botanical extracts
- (b) Vitamin Supplements
- (c) **Parenterals**
- (d) Probiotics

23. Food authority may notify laboratories and research institutions accredited by NABL or any such accreditation agencies, wherein NABL stands for -

- (a) National Accreditation Board for Laboratories
- (b) National Accreditation Board for Testing Laboratories
- (c) National Accreditation Board for Calibration Laboratories
- (d) **National Accreditation Board for Testing and Calibration Laboratories**

24. Act/order which is not deemed after implementation of Food Safety and Standards Act, 2006

- (a) Fruit Products Order, 1955
- (b) Prevention of Food Adulteration Act, 1954
- (c) Milk and Milk Products order, 1992

(d) **Standards Weights and Measures Act, 1976**

25. Analysis report format shall be followed by the food Analyst under the FSSR 2011 is -

- (a) **Form VIIA**
- (b) Form VIII
- (c) Form VB
- (d) Form VI

26. Analysis report section of Food Analyst report does not contain one of the following

- (a) Test Methods used
- (b) Opinion on the sample
- (c) **Measurements of uncertainty**
- (d) Prescribed Standards

27. As per the provisions of Food Safety and Standards (Licensing and Registration of Food Business) Regulation 2011 which of the following is mandatory before slaughtering animals -

- (a) **Stunning**
- (b) Use of electric pods
- (c) Staining
- (d) Stripping

28. Packaging material Polyethylene (PE) bottles used for packaging of Drinking water shall conform to the following BIS Standards

- (a) IS:12252
- (b) IS:10910
- (c) IS:52122

(d) **IS: 10146**

29. The claim on "Trans fat free" is being permitted under Food Safety and Standards (Packaging and Labelling Regulation) under the condition if the Trans fat content less than

- (a) 0.05 gm per serving
- (b) **0.2 gm per serving**
- (c) 0.1 gm per serving
- (d) 0.01 gm per serving

30. as per the requirements of Packaging and Labelling Regulation, Net Quantity for a food packed in liquid medium shall carry a declaration on

- (a) Liquid Weight
- (b) **Drained Weight**
- (c) Gross Weight
- (d) None of the above

31. Mandatory statement displayed on the pack of Infant milk Substitute is

- (a) "Baby requires Mother's Milk"
- (b) "Milk is the best source for the child"
- (c) **"Mother's Milk is best for your baby"**
- (d) "Mother's Milk is needed for your baby"

32. "Not for Phenylketoneurics" shall carry on the label if the product contains following table top sweetener

- (a) **Aspartame**
- (b) Acesulfame-K

- (c) Sucralose
- (d) Neotame

33. Percentage of Milk fat and milk solids not fat contents for raw and pasteurized mixed milk in India are-

- (a) **4.5 & 3.5 respectively**
- (b) 3.5 & 8.5 respectively
- (c) 3.5 & 8.5 respectively
- (d) 3.0 & 9.0 respectively

34. Baudouin test for Vanaspati (Hydrogenated fat) indicates the presence of

- (a) **sesame oil**
- (b) Mineral oil
- (c) Vitamin A
- (d) Trans fatty acid

35. Butyro refractometer reading at 40°C for milk fat always lies between-

- (a) 44-46
- (b) 30-34
- (c) **40-44**
- (d) 34-36

36. Percent acidity as acetic acid for chilly sauces shall not be less than

- (a) 1.2
- (b) 1.5
- (c) 0.6
- (d) **1.0**

37. Added colouring matter permitted for bread under section 2.4.15 of Food Safety & Standards (Food Product Standards and Food Additives) Regulations 2011 are-
- (a) All water soluble colours
 - (b) Only natural colours
 - (c) **Only carry over food colours from ingredients**
 - (d) All oil soluble Colours
38. Test for Lead Chromate is conducted for the sample of
- (a) Chilli Powder
 - (b) **Turmeric Powder**
 - (c) Coriander Powder
 - (d) Curry Powder
39. pH of packaged Drinking water shall be between
- (a) 6.0 to 8
 - (b) 6.5 to 7.5
 - (c) **6.5 to 8.5**
 - (d) 6.5 to 8.0
40. The International body that is involved in harmonize food standards around the world is
- (a) World Health Organization
 - (b) **Codex Alimentarius Commission**
 - (c) International Standards Organization
 - (d) International Union of Food Standards
41. Expanded uncertainty is derived by multiplying the combined standards uncertainty with

- (a) Coverage factor, a
- (b) Coverage factor, m
- (c) **Coverage factor, k**
- (d) Coverage factor, s

42. If internal audit is not conducted as per the clauses of ISO 17025- 2005, the auditor can issue

- (a) Minor Non conformance
- (b) **Major Non conformance**
- (c) Improvement Notice
- (d) Opportunity for Improvement

43. Which of the following are covered under proximate analysis of Foods?

- (a) Proteins, Carbohydrates, Vitamins
- (b) **Proteins, Carbohydrates, fats**
- (c) Proteins, Sugar, Minerals
- (d) Fats, Vitamins, Minerals

44. Food poisoning occurs due to inadequate processing or poor handling of processed food articles. The most dangerous food poisoning organism is

- (a) salmonella typhosa
- (b) Clostridium perfringens
- (c) Staphylococcus aureus
- (d) **Clostridium botulinum**

45. Auditors can gather objective evidence by

- (a) Observing activities

- (b) Interviewing Staff
- (c) Reading documents
- (d) **All of the above**

46. A primary Standard is a

- (a) substance dissolved in a known volume of water
- (b) mass of a substance dissolved in a known volume of water
- (c) substance that is reacted with substance whose concentration is known accurately
- (d) **pure substance that can be use to determine the concentration of other substance**

47. NABL 212 is a

- (a) The guidance document on Quality manual
- (b) **The guidance document on Validation of Test Method**
- (c) The guidance document on Quality audit
- (d) None of above

48. The minimum intensity of light required at working surface other than those required for specified test is

- (a) 50-lux
- (b) **300-lux**
- (c) 500-lux
- (d) 1000-lux

49. A signal to noise ratio (S/N) of Is generally accepted for estimating LOD and signal to noise ratio of Is used for estimating LOQ

- (a) **3 and 10**

- (b) 9 and 10
- (c) 10 and 3
- (d) 10 and 9

50. Bacterial contamination may cause food poisoning the condition required for bacterial growth are

- (a) moisture, cold Temperature, time, food supply, low acid environment, oxygen
- (b) moisture, high temperature, time, food supply, low acid environment, oxygen
- (c) **moisture, warm Temperature, time, food supply, low acid environment, oxygen**
- (d) moisture, cold Temperature, time, food supply, high acid environment, oxygen

51. In food safety and standard (food products standard and additive) regulations 2011, the antibacterial polypeptide which is permitted as a Preservative in cheese and cheese products is

- (a) nukacin
- (b) **nisin**
- (c) bisin
- (d) lysozyme

52. A method of drying in which the moisture in the food is frozen, and then sublimed to vapour under vacuum is called as-

- (a) Sun drying
- (b) **Lyophilization**
- (c) Spray drying
- (d) Drum drying

53. Enzymes which are mainly used in clarification of fruit juices are

- (a) **Pectinases and pectinesterases**
- (b) Hemicellulases
- (c) cellulases
- (d) Amylases

54. Packaging of a food is a method of

- (a) Food adulteration
- (b) **Food preservation**
- (c) Food irradiation
- (d) None of the above

55. Molecular weight of a polymer can be calculated if you know

- (a) Degree of polymerization (DP)
- (b) Molecular weight of repeating units
- (c) Either (a) or (b)
- (d) **Both (a) or (b)**

56. The sum of all mobile packaging components (molecules) released per unit area packaging material under defined conditions is called

- (a) Specific migration
- (b) **Overall migration (global migration)**
- (c) Diffusion
- (d) Non-migration

57. For easy identification, most plastic containers are marked with a recycling symbol containing a specific number. What is the specific number given for Low Density Poly Ethylene (LDPE)?

- (a) 2

- (b) 3
- (c) 4
- (d) 7

58. The essential nutrients that the body required for normal growth and metabolism, apart from water, protein, carbohydrate and fats are

- (a) Minerals
- (b) Vitamins
- (c) Neither (a) nor (b)
- (d) Both (a) and (b)

59. The two essential fatty acids that are required are

- (a) Linoleic and oleic acid
- (b) Linoleic and palmitic acid
- (c) Linoleic and α -linolenic acid
- (d) palmitic and oleic acid

60. The preferred 'best' method for determining the protein quality is

- (a) True protein digestibility
- (b) protein efficiency ratio (PER)
- (c) PDCAAS
- (d) Amino acid Score

61. In animal feeding experiments, the weight gained (in grams) per gram of protein consumed is called as

- (a) Net protein ratio (NPR)
- (b) protein efficiency ratio (PER)
- (c) Net protein utilization (NPU)
- (d) Biological value (BV)

62. In the mitochondrial Electron Transport Chain (ETC), electron pairs carried by NADH produce.....number of ATP molecules.

- (a) **2.5**
- (b) 4.5
- (c) 1.5
- (d) 5.5

63. Any representation which states, suggest or implies that a food has particular nutritional properties which are not limited to energy value is termed as

- (a) Health Claims
- (b) risk reduction
- (c) **Nutrition claim**
- (d) None of the above

64. Packed foods containing monosodium glutamate (MSG) shall carry the label declaration

- 1) Contains added MSG
 - 2) Not recommended for infants below 12 months
 - 3) Not for Phenylketoneurics
 - 4) Not for lactose intolerant infants (a)
- 1,2,&3
 - (b) 1,2,&4
 - (c) 1,3,&4
 - (d) **1, &2**

65. What is the date that signifies the end of the period under any stated storage conditions, during which the foods shall remain fully marketable and shall retain any specific qualities for which tacit or

express claims have been made, and beyond that date the food may still be perfectly safe to consume, though its quality may have diminished?

- (a) Use-by date
- (b) **Best before use**
- (c) Recommended last consumption date
- (d) expiry date

66. The following type of food processing is referred to as 'cold sterilization'

- (a) Adding permitted preservatives
- (b) Just boiling treatments
- (c) **Irradiation**
- (d) Concentration under vacuum

67. The antifungal agent permitted for use in Fruit jam by FSSR is:

- (a) **Benzoates**
- (b) Glacial acetic acid
- (c) Vinegar
- (d) Nisin

68. The following is not a good source of Vitamin D in our diet

- (a) Spinach
- (b) Milk
- (c) Sunlight
- (d) **Pineapple**

69. According to FSSR, vitamin A in food product added externally with such vitamin should be analyzed only using following method:

- (a) **Carr- Price method**
- (b) Fluorospectrometry
- (c) Gas-Liquid chromatography
- (d) High Pressure Liquid Chromatography

70. As per FSSAI in packaging requirements for fruit and vegetables products, juices and pulps may be packed in the following type of container, when sulphited.

- (a) **Wooden barrels**
- (b) Tin plate containers
- (c) Wooden baskets
- (d) Aluminium tins

71. As per FSSAI, the nutritional Information per 100 g/100 ml or per serving of the product given on the label shall not contain the followings:

- (a) Energy value in kcal
- (b) Amount of protein, carbohydrate and fat in g or ml
- (c) **The amount of other nutrient for which allergic potential is declared**
- (d) The amount of other nutrient for which health claim has been made

72. The following method is an effective technique to preserve perishable chilled foods without resorting to heat processing or chemical preservatives

- (a) **Modified Atmospheric Packaging**
- (b) Bactofugation
- (c) Stassanization

(d) Thermization

73. The maximum dosage of irradiation permitted for mango by FSSR is:

- (a) 0.09 KGy
- (b) **0.75 KGy**
- (c) 0.09 Rad
- (d) 0.75 Rad

74. Yeasts and moulds that are capable of growth at or below a water activity (a_w) of 0.85 are known as:

- (a) **Xerophilic fungi**
- (b) Xerophilic Rickettsiae
- (c) Xerophilic bacteria
- (d) Zanolophilic fungi

75. The following food is not considered as a major food allergen (among top eight)

- (a) Milk
- (b) Egg
- (c) **poultry**
- (d) Peanut

76. Potentially hazardous foods must be maintained at 'safe temperatures'. 'Safe temperatures' mean:

- (a) Between 5 degrees Celsius and 60 degrees Celsius
- (b) **5 degrees Celsius or below and 60 degrees Celsius or above**
- (c) at a temperature that will not cause trauma to the plate (mouth) and will not compromise the nutritional value of the food

(d) above 5 degrees Celsius and below 60 degrees Celsius

77. What do you need to know applied cleaning agents?

(a) All cleaning agents in the food-processing industry are of different composition, therefore, this is not relevant

(b) All cleaning agents in the food-processing industry have the same composition, so they are easier to handle.

(c) **cleaning agents in the food-processing industry are of different composition therefore, knowledge of their properties is required, e.g. material safety data sheets.**

(d) cleaning agents used are only detergents.

78. Sanitation is vital to disease control and cleanliness. Which of the following statements regarding sanitation programs is TRUE?

(a) The most important aspect on sanitation is the commitment to producing safe, wholesome products in a clean plant environment.

(b) The commitment to sanitation must be communicated to all employees

(c) The sanitation program's top priority should be to communicate to all employees the necessity and importance of proper cleaning and sanitation practices

(d) **All of the above**

79. An example of critical control point is

(a) Dicing Raw Ingredient for the preparation of soup mix.

(b) Reviewing the source of raw ingredient for a food product.

(c) Cooking a raw food product to the critical limit

(d) **Serving the finished, ready-to-eat product**

80. Confirming that the process and Critical Control Point (CCPs) are under control is also known as validation. An example of validating a pre-requisite program is

- (a) Reviewing Food Defense procedures for a food plant.
- (b) **Swab testing of equipment after cleaning and sanitation procedures have been finished**
- (c) Microbiological testing for pathogens in a finished food product
- (d) taste testing a finished food product for consumer preferences

81. Verification involves being able to confirm that HACCP elements are working properly. Which of the following is NOT a method used for verification:

- (a) Random sampling
- (b) Microbiological testing
- (c) **Performing a mock recall**
- (d) Chemical testing

82. The Codex Alimentarius Commission (CAC) was established

- (a) by the Food and Agricultural Organization of the United Nations (FAO)
- (b) by the World Health Organization (WHO)
- (c) **Both of the above**
- (d) Neither of the above

83. Which of the following Joint FAO/WHO expert scientific committees deals with food bourn parasites?

- (a) JECFA
- (b) JMPR
- (c) **JEMRA**

(d) None of the Above

84. Consider the following statements

1. Technical Barriers to Trade (TBT) are the category of non-tariff barriers to trade under the WTO agreements.

2. TBT have the greatest impact on agriculture due to sanitary and phytosanitary measures designed to protect humans, animals, and plants, from diseases, pests, and other contaminants.

Which of the statements given above is/are correct?

(a) Only 1

(b) Only 2

(c) **Both 1 & 2**

(d) Neither 1 nor 2

85. Which microbiological criteria are applicable in a robust Food safety Management System?

(a) Food safety criteria

(b) Process hygiene criteria

(c) Only B

(d) **Both A & B**

86. Which of the listed organizations in the supply chain can implement ISO 22000?

1) food manufacturing, 2) food ingredient manufacturing, 3) food additives manufacturing, 4) transportation of food, 5) packaging of food, 6) retail or wholesale dealer, 7) Restaurants, 8) food equipment production

(a) All of the above excluding 2 and 3

(b) All of the above excluding 4, 5 and 8

(c) **All of the above**

(d) Only 1, 6 and 7

87. The family Enterobacteriaceae are useful indicator organism to monitor food

(a) Hygiene

(b) Contamination

(c) **A & B**

(d) Neither A & B

88. Codex has prescribed General principles of Food Hygiene

(a) For different Food Groups

(b) Only general guidelines

(c) **A general and food groups specific guidelines separately**

(d) None of these

89. Allergen control in food will fall under

(a) CCP

(b) **PRP**

(c) GMP

(d) None of the above

90. Aflatoxins are highly toxic and carcinogenic chemical substances produced by *Aspergillus* spp. on variety of agricultural commodities and found at highest level in

(a) **groundnut**

(b) wheat

(c) barley

(d) pearl millet

91. Oleoresins are prepared from

- (a) Basil
- (b) cardamom
- (c) celery
- (d) **all**

92. Which of the following is a liquefying enzyme

- (a) **Alpha amylase**
- (b) pectinase
- (c) protease
- (d) cellulose

93. The major portion in cholesterol is that of

- (a) **LDL**
- (b) HDL
- (c) CDL
- (d) Ferritin

94. Which one is not a Class I preservatives

- (a) Salt
- (b) sugar
- (c) acetic acid
- (d) **benzoic acid**

95. Yellow color of cow milk is due to

- (a) **carotene**
- (b) riboflavin
- (c) annatto

(d) all

96. An efficient method of drying milk is

- (a) **spray drying**
- (b) drum drying
- (c) freeze drying
- (d) cabinet drying

97. The pungency of chilli is due to presence of

- (a) **capsaicin**
- (b) capsicin
- (c) capcisin
- (d) capcaisin

98. Staling of bread is due to

- (a) **retrogradation**
- (b) gelatinization
- (c) fermentation
- (d) none

99. The grain size can be enlarged by

- (a) **gibberellic acid**
- (b) auxin
- (c) fumaric acid
- (d) all

100. The fruits affected by ethylene gas

- (a) **climacteric**
- (b) non-climacteric

- (c) both
- (d) none