

PREVIEW QUESTION BANK

Module Name : DAIRY SCIENCE-ENG
Exam Date : 09-Jul-2023 Batch : 10:00-12:00

Sr. No.	Client Question ID	Question Body and Alternatives	Marks	Negative Marks
Objective Question				
1	3301	Which among the following is responsible for foodborne toxi- infection? 1. <i>Vibrio parahaemolyticus</i> 2. <i>Yersinia enterocolitica</i> 3. <i>Clostridium botulinum</i> 4. <i>Clostridium perfringens</i> A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
2	3302	Hotis test is used for differentiating, which of the following two mastitis causing pathogens? 1. <i>Staphylococcus aureus</i> from <i>Streptococcus agalactiae</i> 2. <i>Streptococcus agalactiae</i> from <i>Streptococcus dysgalactiae</i> 3. <i>Staphylococcus aureus</i> from <i>Streptococcus uberis</i> 4. <i>Streptococcus agalactiae</i> from <i>Streptococcus uberis</i> A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
3	3303		4.0	1.00

Given below are two statements:

Statement (I) : Lysozyme is present in cow milk in considerable amounts but is absent in human milk.

Statement (II) : Gram negative bacteria are generally more resistant to lysozyme than Gram positive bacteria.

In light of the above statements, choose the *most appropriate* answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are correct.
2. Both **Statement (I)** and **Statement (II)** are incorrect.
3. **Statement (I)** is correct but **Statement (II)** is incorrect.
4. **Statement (I)** is incorrect but **Statement (II)** is correct.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

4 3304

Which of the following is a non-leucoform dye used in the rapid test utilizing starter cultures for the detection of antibiotic residues in milk ?

1. Methylene blue
2. Resazurin
3. Tetrazolium
4. Nigrosine

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

5 3305

Lactic acid bacteria are _____.

1. Gram –ve, catalase +ve
2. Gram –ve, catalase –ve
3. Gram +ve, catalase –ve
4. Gram +ve, catalase +ve

A1 : 1

4.0 1.00

A2 : 2

A3 : 3

A4 : 4

Objective Question

6	3306	Repasteurization and prolonged holding of milk at pasteurization temperature leads to predominance of _____. 1. Mesophils 2. Thermophils 3. Thermodurics 4. Psychrotrophs	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

7	3307	Peptonising bacteria leads to ropiness in milk through production of _____ from nitrogenous substances. 1. Lignin 2. Pectins 3. Peptones 4. Mucins	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

8	3308	Barritts reagent is used in _____. 1. Indole test 2. Methyl red test 3. Eijkman's test 4. Voges-Proskauer	4.0	1.00
---	------	---	-----	------

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

9	3309	Given below are two statements: Statement (I) : Chances of survival of thermodurics are relatively more in HTST when compared to holder method of pasteurization. Statement (II) : Control of thermoduric species is an operational problem involving both dairy farms and milk plant. In light of the above statements, choose the <i>most appropriate</i> answer from the options given below. - Both Statement (I) and Statement (II) are true. - Both Statement (I) and Statement (II) are false. Statement (I) is true but Statement (II) is false. Statement (I) is false but Statement (II) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
---	------	--	-----	------

Objective Question

10	3310	'Emetic Syndrome' is associated with _____. <i>Salmonella typhi</i> <i>Bacillus cereus</i> <i>Clostridium perfringens</i> <i>Escherichia coli</i> O157 : H7 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	---	-----	------

Objective Question

11	3311		4.0	1.00
----	------	--	-----	------

Match **List-I** with **List-II**

List-I	List-II
(A) Widal test	(I) Tuberculosis
(B) Dick test	(II) Scarlet fever
(C) Mantoux test	(III) Typhoid
(D) Schick test	(IV) Diphtheria

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (IV), (B) - (II), (D) - (III), (C) - (I)
3. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
4. (A) - (III), (B) - (II), (C) - (I), (D) - (IV)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

12 3312

Aerobic spore former that produce bitty cream defect in pasteurized milk is _____.

1. *Bacillus cereus*
2. *Bacillus coagulans*
3. *Bacillus subtilis*
4. *Bacillus mycoides*

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

13 3313

4.0 1.00

Which of the following compounds is not generally elaborated by staphylococcal species?

1. Verotoxin
2. Enterotoxin
3. Hemolysin
4. Coagulase

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

14	3314
----	------

Enzymes involved in the formation of ethyl esters leading to the development of fruity flavour in milk are _____.

1. Proteases and lipases
2. Lipases and esterases
3. Proteases and esterases
4. Esterases and hydrolases

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0	1.00
-----	------

Objective Question

15	3315
----	------

4.0	1.00
-----	------

Given below are two statements:

Statement (I) : Moseley count gives a better index of shelf life than aerobic mesophilic count as it determines the growth rate of bacteria when stored at low temperature

Statement (II) : Flavor rating at 7°C is a useful shelf test as most of the enzymes responsible for off flavors are optimally produced and more active at this temperature.

In light of the above statements, choose the *most appropriate* answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

16 3316

Which of the following pairs of milk constituents form the specific factors of antimicrobial systems in milk ?

1. Lactanins and immunoglobulins
2. Lactanins and lysozyme
3. Bifidus factor and lactoferrin
4. Bifidus factor and complement

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

17 3317

4.0 1.00

In Eijkmans test, inoculum from positive PCT tubes is transferred to MacConkey's broth tubes and incubated at _____.

1. $44.5 \pm 0.2^{\circ}\text{C}$ for $24 \pm 2\text{h}$
2. $42.0 \pm 0.5^{\circ}\text{C}$ for $24 \pm 2\text{h}$
3. $44.5 \pm 0.2^{\circ}\text{C}$ for $48 \pm 2\text{h}$
4. $42.0 \pm 0.2^{\circ}\text{C}$ for $48 \pm 2\text{h}$

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

18 3318

According to the process hygiene criteria prescribed by FSSAI for pasteurised milk, which of the following is applicable for coliforms ?

1. $n = 3 ; c = 5$
2. $n = 5 ; c = 3$
3. $n = 5 ; c = 0$
4. $n = 3 ; c = 0$

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

19 3319

Which of the following reagent is used in the presumptive determination of somatic cells in mastitic milk?

1. Potassium dichromate
2. Hydrogen peroxide
3. Silver nitrate
4. Sodium lauryl sulphate

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

20	3320	Tumbling motility is typical for _____. 1. <i>Listeria monocytogenes</i> 2. <i>Mycobacterium tuberculosis</i> 3. <i>Escherichia coli</i> 4. <i>Campylobacter jejuni</i> A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	---	-----	------

Objective Question

21	3321	The main purpose of thermization is to _____. 1. to extend storage of raw milk prior to processing 2. to substitute for pasteurization 3. to substitute for boiling 4. to destroy all pathogenic organisms A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	--	-----	------

Objective Question

22	3322		4.0	1.00
----	------	--	-----	------

Match **List-I** with **List-II**

List-I	List-II
Defect	Causative metabolite
(A) Putrid odour in butter	(I) acid and gas
(B) Frothiness in sour cream	(II) isovaleric acid
(C) Phenolic flavour in sterilized milk	(III) 3-methyl butanol
(D) Malty flavour	(IV) cresols

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
3. (A) - (III), (B) - (II), (C) - (I), (D) - (IV)
4. (A) - (IV), (B) - (III), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

23 3323

The sequence of metabolic events in raw milk held at room temperature for long period is

- (A) Streptococci converts lactose to lactic acid
- (B) Mold grow on the surface and reduce acidity by oxidizing lactic acid to CO₂ and H₂O
- (C) Lactobacilli further converts remaining lactose to lactic acid
- (D) Proteolytic sporeformers degrade casein fraction and lipolytic bacteria utilize fat fraction

Choose the **correct** answer from the options given below:

1. (A), (B), (C), (D).
2. (A), (D), (C), B).
3. (A), (C), (B), (D).
4. (C), (B), (D), (A).

A1 : 1

A2 : 2

A3 : 3

4.0 1.00

A4 : 4

Objective Question

24 3324

The Bottler's standard for yeast and molds [cfu/10g] in granulated sugar for use in ice-cream shall not exceed _____.

1. 200
2. 10
3. 20
4. 100

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

25 3325

Coagulation of evaporated milk accompanied by gas and cheesy odour is carried by

1. *Bacillus cereus*
2. *Bacillus subtilis*
3. *Bacillus panis*
4. *Bacillus megaterium*

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

26 3326

4.0

1.00

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion (A) : In UHT sterilization treatments spore destructions is higher while chemical changes are minimal.

Reason (R) : The Q10 value for bacterial endogens ranges between 8 to 30 while the Q10 value for chemical changes is 1.5 – 2.0.

In light of the above statements, choose the *most appropriate* answer from the options given below.

1. Both (A) and (R) are correct and (R) is the correct explanation of (A).
2. Both (A) and (R) are correct but (R) is NOT the correct explanation of (A).
3. (A) is correct but (R) is not correct.
4. (A) is not correct but (R) is correct.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

27 3327

Slimy or ropy cream is due to excessive growth of

1. *Pseudomonas fragi*
2. *Escherichia coli*
3. *Alcaligenes viscolactis*
4. *Enterobacter faecalis*

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

28 3328

4.0 1.00

Match **List-I** with **List-II**

List-I	List-II
Discolouration/Off-flavour	Causative Organism
(A) Fruity flavour	(I) <i>Pseudomonas syncyanea</i>
(B) Blue colour	(II) <i>Pseudomonas synxantha</i>
(C) Yellow colour	(III) <i>Pseudomonas fragi</i>
(D) Greenish Colour	(IV) <i>Pseudomonas fluorescens</i>

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (IV), (B) - (III), (C) - (II), (D) - (I)
3. (A) - (III), (B) - (I), (C) - (II), (D) - (IV)
4. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

29 3329

In a plating experiment of milk, 1 ml of each 10^{-2} and 10^{-3} dilutions were relate out in duplicate. The volume of the actual milk sample used in the experiments is

1. 4 ml
2. 0.2 ml
3. 0.22 ml
4. 0.022 ml

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

30 3330

4.0 1.00

Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R).

Assertion (A) : *Clostridium tyrobutyricum* is responsible for late blowing in cheese.

Reason (R) : *Clostridium tyrobutyricum* ferments lactose and produces CO₂ leading to late blowing in cheese.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

31 3331

Typical glue like odour in sweetened condensed milk is caused by _____.

1. *Proteus vulgaris*
2. *Aspergillus repens*
3. *Torulopsis globosa*
4. *Thermobacterium mathiacolle*

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

32 3332

Packaging of khoa at _____ °C extends its shelf life to 14-21 days at 37°C.

1. 40-50
2. 80-90
3. 60-70
4. 50-60

A1 : 1

A2 : 2

A3 : 3

4.0 1.00

A4 : 4

Objective Question

33	3333	‘Musty potato’ aroma in milk is caused by _____. 1. <i>Achromobacter</i> spp. 2. <i>Flavobacterium lactis</i> 3. <i>Pseudomonas graveolems</i> 4. <i>Pseudomonas mephetica</i> A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	--	-----	------

Objective Question

34	3334	When cream is heat treated in excess of 121°C for 3 minutes it is termed as _____. 1. tyndallization 2. thermization 3. botulinum cook 4. flash cook A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	---	-----	------

Objective Question

Match **List-I** with **List-II**

List-I (Causative organisms)	List-II (Indicator)
(A) Coliforms	(I) late blowing in canned products
(B) Pseudomonas	(II) bitterness
(C) Anaerobic sporeformers	(III) faecal contamination
(D) Bacillus spp	(IV) water contamination

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)
3. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
4. (A) - (III), (B) - (II), (C) - (I), (D) - (IV)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

36 3336

Non acid coagulation defect in Evaporated milk is caused by

1. *Bacillus cereus*
2. *Bacillus coagulans*
3. *Geo-bacillus stearothermophilus*
4. *Bacillus subtilis*

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

37 3337

4.0

1.00

Absence of Salmonella in ____/g of Infant Food is considered as a food safety criteria according to FSSAI regulation

1. 50
2. 125
3. 25
4. 100

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

38 3338

The permissible limit (M) of yeast and mold count (cfu) as process hygiene criteria in chhana based sweets is

1. 1.5×10^5 /g
2. 1.5×10^4 /g
3. 1.5×10^1 /g
4. 1.5×10^2 /g

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

39 3339

Arrange the following HACCP principles in order their occurrence from first to last.

- (A) Identify CCPS
- (B) Establish monitoring system
- (C) Establish critical limits
- (D) Conduct Hazard analysis

Choose the **correct** answer from the options given below:

1. (A), (B), (C), (D).
2. (B), (D), (C), (A).
3. (C), (A), (B), (D).
4. (D), (A), (C), (B).

A1 : 1

4.0 1.00

A2 : 2

A3 : 3

A4 : 4

Objective Question

40	3340	UASB stands for 1. Upflow aerobic sludge blanket 2. Uptake aerobic slime blanket 3. Uptake anaerobic slime blanket 4. Upflow anaerobic sludge blanket A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	--	-----	------

Objective Question

41	3341	Koumiss has been traditionally prepared from which milk? 1. Ewe's milk 2. Mare's milk 3. Cow's milk 4. Camel's milk A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	--	-----	------

Objective Question

42	3342	In the citrate metabolic pathway, reduction of diacetyl results in the formation of which compound? 1. Oxaloacetate 2. Pyruvate 3. Acetoin 4. α-acetolactate A1 : 1	4.0	1.00
----	------	--	-----	------

A2 : 2

A3 : 3

A4 : 4

Objective Question

43	3343	In a thermal treatment, 5-log reduction of orecreuorganism means _____. (A) 99.949 % destruction (B) 0.001 % survival (C) 99.0 % reduction (D) 1.0 % survival Choose the correct answer from the options given below: (A) and (B) (C) and (D) (A) and (D) (B) and (C)	4.0	1.00
		A1 : 1 A2 : 2 A3 : 3 A4 : 4		

Objective Question

44	3344	Which test can be used to check the purity of lactic starter cultures? - Oxidase test - Catalase test - Indole test - Creatine test	4.0	1.00
		A1 : 1 A2 : 2 A3 : 3 A4 : 4		

Objective Question

45	3345		4.0	1.00
----	------	--	-----	------

Given below are two statements:

Statement (I) : *Lactobacillus delbrueckii* ssp. *bulgaricus* produces D(-) lactic acid

Statement (II) : *Streptococcus thermophilus* produces L(+) lactic acid.

In light of the above statements, choose the **most appropriate** answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

46 3346

Given below are two statements:

Statement (I) : Traditional acidophilus milk is prepared by inoculating *Lactobacillus acidophilus* culture at the rate of 2–5% in autoclaved or severely boiled milk.

Statement (II) : Traditional acidophilus milk has tartness and a strong cooked flavour.

In light of the above statements, choose the **most appropriate** answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

47 3347

4.0 1.00

Match the following:

List I	List II
(A) Gassiness	(I) Kefiran
(B) <i>Leuconostoc</i> sp.	(II) Implant in intestinal tract
(C) <i>Lactobacillus acidophilus</i>	(III) Cultured butter milk
(D) Polysaccharide	(IV) Kluveromyces

Choose the **correct** answer from the options given below:

1. (A) - (IV), (B) - (III), (C) - (II), (D) - (I)
2. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
3. (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
4. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

48 3348

In the sampling plan for microbiological analysis of fermented milk products by FSSAI, _____ represents an acceptable level and values above it are marginally acceptable in terms of the sampling plan.

1. N
2. c
3. M
4. m

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

49 3349

4.0 1.00

Lactocidin is a bacteriocin-like compound produced by which organism?

1. *Lactococcus lactis*
2. *Lactobacillus casei*
3. *Lactobacillus brevis*
4. *Lactobacillus acidophilus*

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

50 3350

‘Nutrifer’ is a probiotic fermented milk of which country?

1. USA
2. Denmark
3. France
4. India

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

51 3351

Which cheese variety in the following involve *Brevibacterium linens* for ripening?

1. Limburger
2. Camembert
3. Cheshire
4. Gorgonzola

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

52 3352

4.0 1.00

Which pathway is used by *Streptococcus thermophilus* for galactose metabolism ?

1. Leloirs pathway
2. Tagatose 6-p-pathway
3. Phosphoketolase pathway
4. Glycolytic pathway

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

53 3353

4.0 1.00

Given below are two statements:

Statement (I) : Leuconostocs are lactic acid bacteria containing phosphoketolase.

Statement (II) : Leuconostocs metabolize lactose through 6-P-gluconate pathway and produce equimolar amount of CO₂, lactate and acetate/ethanol.

In light of the above statements, choose the **most appropriate** answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

54 3354

4.0 1.00

Which statement is **not true** in relation to Bifidobacteria?

1. Bifidobacteria are fastidious in their nutritional requirements and need bifidogenic factors for their growth
2. Bifidobacteria have a G+C content of 55 to 67%
3. Bifidobacteria are Gram-positive, catalase-positive, nonmotile, gas- producing bacteria
4. Bifidobacteria are normal inhabitants of intestinal tract of new borns and infants

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

55 3355

4.0 1.00

Given below are two statements:

Statement (I) : Lactic acid bacteria hydrolyze casein outside the cell by cell wall bound or excreted peptidases

Statement (II) : Lactic acid bacteria hydrolyze oligopeptides into small peptides and amino acids by membrane-bound peptidases

In light of the above statements, choose the *most appropriate* answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

56 3356

4.0 1.00

Which of the following statements are **true** with respect to cultures buttermilk?

- (A) It is prepared using mesophilic cultures
- (B) 'O' – cultures are used in its manufacture
- (C) It is prepared using no-fat to low-fat milk
- (D) The curd is diluted with water after fermentation

Choose the *correct* answer from the options given below:

1. (A), (B)
2. (A), (C)
3. (A), (D)
4. (C), (D)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

57 3357

4.0

1.00

Match List-I with List-II

List-I	List-II
(A) Starter distillate	(I) Bacteriophage
(B) Nisin	(II) Propionibacteria
(C) Calcium deficient medium	(III) Diacetyl
(D) Cobalamin	(IV) <i>Lactococcus lactis ssp. lactis</i>

Choose the **correct** answer from the options given below:

- (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (A) - (I), (B) - (III), (C) - (II), (D) - (IV)
- (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

58 3358

4.0

1.00

According to FSSAI rules and regulations, fermented milks, are of satisfactory quantity, if coliform count is less than _____ cfu/g

- 50
- 10
- 100
- 20

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

59 3359

4.0

1.00

Which statement is **not true** in relation to probiotic strains?

1. Health benefits of probiotics are strain specific
2. Probiotic culture must remain viable and stable in the product during storage
3. Probiotic products must be harmless to the consumers
4. Yoghurt starter culture possess probiotic properties

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

60 3360

Bacteriophage attack of a starter culture involve a cycle of events. Among the options which is the correct sequence of events in the lytic cycle?

- (A) Injection
- (B) Packaging/Assembly
- (C) Adsorption
- (D) RNA and Protein synthesis

Choose the **correct** answer from the options given below:

1. (A), (B), (C), (D).
2. (A), (C), (B), (D).
3. (C), (A), (D), (B).
4. (C), (A), (B), (D).

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

61 3361

The specific gravity of amyl alcohol (Grade I) at 27° C to be used for fat estimation of milk by Gerber method as per BIS Method is:

1. 0.807 - 0.809
2. 0.907 - 0.909
3. 0.789 - 0.790
4. 0.907 - 1.02

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

62 3362

4.0 1.00

Match **List-I** with **List-II**

List-I	List-II
Additive	Function
(A) Glucono delta lactone	(I) Antioxidant
(B) Propyl Gallate	(II) Acidulant
(C) Erythrosine	(III) Emulsifier
(D) Polyglycerol esters of fatty acids	(IV) Colour

Choose the **correct** answer from the options given below:

- (A) - (III), (B) - (IV), (C) - (II), (D) - (I)
- (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
- (A) - (IV), (B) - (III), (C) - (I), (D) - (II)
- (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

63 3363

4.0 1.00

Match **List-I** with **List-II**

List-I	List-II
Additive	Class
(A) A food additive, which prolongs the shelf-life of foods through free radical inhibition.	(I) Stabilizer
(B) A food additive, which prevents food from drying out by counteracting the effect of a dry atmosphere.	(II) Preservative
(C) A food additive, which prolongs the shelf-life of a food by protecting against deterioration caused by microorganisms.	(III) Humectant
(D) A food additive, which makes it possible to maintain a uniform dispersion of two or more components.	(IV) Antioxidant

Choose the **correct** answer from the options given below:

1. A-III; B-IV; C-I; D-II
2. A-II; B-I; C-IV; D-III
3. A-IV; B-III; C-II; D-I
4. A-III; B-I; C-II; D-IV

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

64 3364

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion A : Specific gravity of whole milk increases when held at lower/cold temperature. This phenomenon is known as Recknagel phenomenon.

Reason R : Reckangel phenomenon occurs mainly due to loss of entrapped gas when milk is held at lower temperature.

In light of the above statements, choose the **correct** answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

4.0 1.00

A3 : 3

A4 : 4

Objective Question

65 3365

Mixed indicator used in the titration of the distillate in MicroKjeldahl method is made up of _____

1. Methyl orange and methylene blue
2. Methyl orange and methyl red
3. Methylene blue and bromocresol red
4. Methyl red and methylene blue

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

66 3366

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion (A) : In titratable acidity determination of milk by titration method, the pink colour (phenolphthalein end point) disappears soon, whereas in normal acid-base titration, it persists for long time.

Reason (R) : Due to alkalinity of the medium after the titration, there is a shift in the equilibrium of milk salts releasing more of hydrogen ions.

In light of the above statements, choose the **correct** answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

67 3367

4.0

1.00

Given below are two statements:

Statement (I) : Ash represents the true salt composition of milk.

Statement (II) : Salt balance of milk is a ratio between cations (Calcium and Magnesium) and anions (Citrate and Phosphate)

In light of the above statements, choose the *most appropriate* answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

68 3368

In Mohr's method of salt estimation of table butter, the type of titration employed is _____

1. Argentometric
2. Iodometric
3. Acid-base
4. Potentiometric

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

69 3369

4.0 1.00

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion (A) : Saponification value of ghee is relatively higher than most of the vegetable oils.

Reason (R) : The average molecular weight of the fatty acids in ghee is high and hence, ghee has a higher saponification value.

In light of the above statements, choose the **correct** answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

70 3370

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion (A) : Care should be taken to test only fresh samples of milk for freezing point depression, as aged samples can actually depress the freezing point such that the presence of extraneous water could be masked.

Reason (R) : The production four molecules of lactic acid from one molecule of lactose during storage of milk increases freezing point depression.

In light of the above statements, choose the **correct** answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

71 3371

4.0 1.00

Nitrate in milk is generally used as a marker to detect the presence of added _____.

1. Pond or surface water
2. Salicylic acid
3. Skim milk powder
4. Benzoic acid

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

72 3372

4.0 1.00

Match **List-I** with **List-II**

List-I	List-II
Preservative	Reagent used in the Test
(A) Boric Acid	(I) Stannous chloride
(B) Formaldehyde	(II) Paraphenylenediamine
(C) Hydrogen Peroxide	(III) Ferric chloride
(D) Hypochlorite	(IV) Turmeric Paper

Choose the **correct** answer from the options given below:

1. (A) - (III), (B) - (IV), (C) - (II), (D) - (I)
2. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
3. (A) - (IV), (B) - (III), (C) - (II), (D) - (I)
4. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

73 3373

4.0 1.00

Which of the following tests ascertain detection of adulteration of ghee with vegetable oil by RP-HPLC method?

1. Beta sitosterol test
2. Baudouin test
3. Hehner Test
4. Holde Test

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

74 3374

Given below are two statements:

Statement (I) : Lactose in freshly prepared spray dried skim milk powder is crystalline.

Statement (II) : Lactose in spray dried skim milk powder, upon exposure to air, undergoes crystallization, which causes caking of powder.

In light of the above statements, choose the *most appropriate* answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are true.
2. Both **Statement (I)** and **Statement (II)** are false.
3. **Statement (I)** is true but **Statement (II)** is false.
4. **Statement (I)** is false but **Statement (II)** is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

75 3375

4.0 1.00

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion (A) : Large amount of sucrose present in sweetened condensed milk causes a defect called 'sandiness'.

Reason (R) : α -Lactose hydrate crystals in sweetened condensed are hard and not very soluble, and they feel gritty when placed in mouth, similar to sand particles. Hence, this defect is called 'sandiness'.

In light of the above statements, choose the **correct** answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

76 3376

What is the Whey Protein Nitrogen Index (mg/mL) of low-heat skim milk powder?

1. > 6.0
2. 1.5 – 6.0
3. < 1.5
4. 6.6

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

77 3377

4.0 1.00

Match **List-I** with **List-II** choosing the **most appropriate** options.

List-I	List-II
Maillard Reaction Products	Impact
(A) Melanoidins	(I) Flavour
(B) Hydroxy Methyl Furfural	(II) Colour
(C) Cross-linked proteins	(III) Nutrition
(D) Lysine-glucose complex	(IV) Solubility

Choose the **correct** answer from the options given below:

- (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
- (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

78 3378

As per the latest Food Safety and Standards (Food Product Standards and Food Additives) Regulations, 2011, effective from the First July, 2022, which of the following new standards have been added to ghee?

- ISO Triglyceride Analysis, Fatty acid composition, Presence of β -sitosterol and Iodine value
- Presence of β -sitosterol, Iodine value, Polenske value and Saponification value
- ISO Triglyceride Analysis, Fatty acid composition, Polenske value, Saponification value
- Presence of β -sitosterol, Iodine value, ISO Triglyceride Analysis, Fatty acid composition

Choose the **correct** answer from the options given below:

- (A) and (C) only.
- (B) only.
- (C) only
- (C) and (D) only.

A1 : 1

A2 : 2

4.0 1.00

A3 : 3

A4 : 4

Objective Question

79	3379	Given below are two statements: Statement (I) : The fortificants permitted in liquid milk as per Food Safety and Standards (Fortification of Foods) Regulations, 2018 are Vitamin A and Vitamin D. Statement (II) : Milk powder also can be fortified with Vitamin A and Vitamin D; but it shall only be used in the Government Funded Programs for the purpose of preparation of 'Reconstituted Fortified Milk'. In light of the above statements, choose the most appropriate answer from the options given below. - Both Statement (I) and Statement (II) are true. - Both Statement (I) and Statement (II) are false. Statement (I) is true but Statement (II) is false. Statement (I) is false but Statement (II) is true.	4.0	1.00
	A1 : 1			
	A2 : 2			
	A3 : 3			
	A4 : 4			

Objective Question

80	3380	Given below are two statements: Statement (I) : As per the Food Safety and Standards (Food Product Standards and Food Additives) Regulations, 2011, the fat content in partly skimmed milk powder shall be more than 1.5 and less than 26.0. Statement (II) : As per the Food Safety and Standards (Food Product Standards and Food Additives) Regulations, 2011, the "partly skimmed milk powder" may be designated "semi-skimmed milk powder" if the content of milk fat does not exceed 16% (m/m) and is not less than 14% (m/m). In light of the above statements, choose the most appropriate answer from the options given below. - Both Statement (I) and Statement (II) are true. - Both Statement (I) and Statement (II) are false. Statement (I) is true but Statement (II) is false. Statement (I) is false but Statement (II) is true.	4.0	1.00
----	------	--	-----	------

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

81	3381	The rennet coagulation of casein during cheese making is prolonged or prevented when the temperature of milk is maintained above _____. 1. 60°C 2. 70°C 3. 50°C 4. 40°C	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

82	3382	Rate of autoxidation in ghee is measured by which of the following methods ? (A) TBA Value (B) Peroxide Value (C) Iodine Value (D) Acid Value Choose the correct answer from the options given below: 1. (A) and (D) only. 2. (D) and (C) only. 3. (A) and (B) only. 4. (B) and (C) only.	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

83	3383		4.0	1.00
----	------	--	-----	------

Which of the following compounds is **NOT** used to monitor Maillard reactions in milk products?

1. Furosine
2. Lactulosyl lysine
3. Hydroxymethylfurfural
4. Octa – 2, 4–dial

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

84 3384

Colostrum has low heat stability due to presence of high amounts of _____.

1. Sodium
2. Fat
3. Protein
4. Chloride

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

85 3385

Which of the following is **NOT** responsible for cooked flavour in case of heated milk?

1. Butyric acid
2. Sulphur compounds
3. Lactones
4. Methyl ketanes

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0

1.00

Objective Question

86	3386	Which of the following property is not desirable in Infant milk formulations? 1. Low moisture content 2. High solubility 3. High foaming on reconstitution 4. High flowability A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	--	-----	------

Objective Question

87	3387	Oxidized off-flavours in ghee are caused mainly due to _____. (A) Aldehydes (B) Ketones (C) Hydro peroxides (D) Free fatty acids Choose the correct answer from the options given below: 1. (C) and (D) only. 2. (B) and (C) only. 3. (A) and (B) only. 4. (A) and (D) only. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
----	------	--	-----	------

Objective Question

88	3388		4.0	1.00
----	------	--	-----	------

Arrange the following milk products in descending order of “heat induced changes” during their preparation.

- (A) Paneer
- (B) Khoa
- (C) Chakka
- (D) Acid casein

Choose the **correct** answer from the options given below:

1. (A), (B), (C), (D).
2. (C), (A), (B), (D).
3. (B), (C), (A), (D).
4. (B), (A), (C), (D).

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

89 3389

Given below are two statements:

Statement (I) : Primary phase of rennet coagulation involves hydrolysis of k-casein.

Statement (II) : The calcium ions are essential for coagulation of casein in the secondary phase.

In light of the above statements, choose the **most appropriate** answer from the options given below.

1. Both **Statement (I)** and **Statement (II)** are correct.
2. Both **Statement (I)** and **Statement (II)** are incorrect.
3. **Statement (I)** is correct but **Statement (II)** is incorrect.
4. **Statement (I)** is incorrect but **Statement (II)** is correct.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

90 3390

4.0 1.00

4.0 1.00

Arrange the following whey proteins based on the order of heat stability (ascending order) measured by loss of solubility

- (A) α -lactalbumin
- (B) Immunoglobulin
- (C) Bovine Serum Albumin
- (D) β -Lactoglobulin

Choose the **correct** answer from the options given below:

1. (A), (B), (C), (D).
2. (B), (A), (C), (D).
3. (C), (D), (A), (B).
4. (B), (C), (D), (A).

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

91 3391

Arrange the following biochemical reactions in ascending order of time taken during ripening of cheese

- (A) Proteolysis
- (B) Lactose fermentation
- (C) Free fatty acid production
- (D) Alcohol production

Choose the **correct** answer from the options given below:

1. (A), (B), (C), (D).
2. (B), (C), (A), (D).
3. (B), (A), (C), (D).
4. (C), (B), (D), (A).

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

92 3392

4.0 1.00

Match **List-I** with **List-II**

List-I	List-II
Property/flavour/storage defect of ghee	Contributing Components
(A) Pro-oxidant	(I) Free fatty acids
(B) Antioxidant	(II) Riboflavin and light
(C) Flavour of the ghee	(III) Tocopherol
(D) Hydrolytic rancidity in ghee	(IV) Lactones and carbonyls

Choose the **correct** answer from the options given below:

1. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
2. (A) - (II), (B) - (III), (C) - (IV), (D) - (I)
3. (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
4. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

93 3393

Match **List-I** with **List-II** related to cheese manufacture.

List-I	List-II
Process	Results in
(A) Syneresis	(I) curdling of milk
(B) Cheddaring	(II) development of uniform molten glass and fibrous mass
(C) Plasticization	(III) development of fibrous or chicken-breast take feature
(D) Gelation	(IV) draining of whey

Choose the **correct** answer from the options given below:

1. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
2. (A) - (IV), (B) - (III), (C) - (II), (D) - (I)
3. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)
4. (A) - (I), (B) - (IV), (C) - (III), (D) - (II)

A1 : 1

4.0 1.00

A2 : 2

A3 : 3

A4 : 4

Objective Question

94	3394	Which of the following are true about chymosin? (A) is commonly known as rennin (B) is used in cheese industry (C) is a protease enzyme (D) is an essential amino acid Choose the correct answer from the options given below: (A), (B) and (D) only. (A), (B) and (C) only. (A), (B), (C) and (D). (B), (C) and (D) only.	4.0	1.00
		A1 : 1 A2 : 2 A3 : 3 A4 : 4		

Objective Question

95	3395	Given below are two statements related to paneer manufacture: Statement (I) : The coagulum formation in paneer involves progressive removal of tricalcium phosphate from the surface of the casein after acidification. Statement (II) : Dispersion of casein is not stable which gets precipitated to form coagulum embedding fat into it. In light of the above statements, choose the most appropriate answer from the options given below. - Both Statement (I) and Statement (II) are correct. - Both Statement (I) and Statement (II) are incorrect. Statement (I) is correct but Statement (II) is incorrect. Statement (I) is incorrect but Statement (II) is correct.	4.0	1.00
		A1 : 1 A2 : 2 A3 : 3		

A4 : 4

Objective Question

96 3396

4.0 1.00

Given below are two statements with respect to heat stability of milk

Statement (I) : The heat stability of concentrated milk increases considerably upon preheating of milk.

Statement (II) : Interaction of denatured whey proteins with κ -casein and reduction of calcium ion activity during preheating are responsible for increased heat stability of concentrated milk.

In light of the above statements, choose the *most appropriate* answer from the options given below.

- Both **Statement (I)** and **Statement (II)** are correct.
- Both **Statement (I)** and **Statement (II)** are incorrect.
- Statement (I)** is correct but **Statement (II)** is incorrect.
- Statement (I)** is incorrect but **Statement (II)** is correct.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

97 3397

4.0 1.00

Match **List-I** with **List-II**

List-I	List-II
Dried Milk Products	Fat % (m/m)
(A) Whole milk powder	(I) Min. 42
(B) Partially skimmed milk powder	(II) Max. 1.5
(C) Skimmed milk powder	(III) More than 1.5 and less than 26.0
(D) Cream powder	(IV) Min. 26.0 and less than 42.0

Choose the *correct* answer from the options given below:

- (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (A) - (IV), (B) - (III), (C) - (II), (D) - (I)
- (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

98	3398	Which of the following are oxidized flavour defects of ghee (A) Tallowy (B) Fishy (C) Soapy (D) Metallic Choose the correct answer from the options given below: (A), (B) and (C) only. (A), (B) and (D) only. (A), (B), (C) and (D). (B), (C) and (D) only.	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

99	3399	Cooked flavour and brown colour in the heat desiccated dairy products are caused mainly due to _____. - Enzymatic browning - Non-enzymatic browning - Lipid peroxidation - Whey protein denaturation	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

100	3400		4.0	1.00
-----	------	--	-----	------

Antioxidants in foods function by -

- (A) Inactivation of free radicals by donating hydrogen atoms
- (B) Chelation of prooxidant metals
- (C) Breakdown of hydroperoxides into non-flavourful substances
- (D) Inactivation of lipolytic enzymes

Choose the **correct** answer from the options given below:

- 1. (B), (C) and (D) only.
- 2. (B) and (C) only.
- 3. (A), (B) and (C) only.
- 4. (A), (C) and (D) only.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

101 3401

Greenish yellow colour of whey is due to the presence of

- 1. Carotene
- 2. Anthocyanin
- 3. Chlorophyll
- 4. Riboflavin

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

102 3402

Milk from which species has maximum content of lactose?

- 1. Human
- 2. Cow
- 3. Sheep
- 4. Buffalo

A1 : 1

A2 : 2

4.0 1.00

A3 : 3

A4 : 4

Objective Question

103	3403	Given below are two statements: Statement (I) : Creaming is a phenomenon in which milk fat globules rise during cold storage of milk as per stoke's law. Statement (II) : Immunoglobulins increase the rate of creaming by forming fat globule clusters, a phenomenon called 'cold agglutination'. In light of the above statements, choose the <i>most appropriate</i> answer from the options given below. - Both Statement (I) and Statement (II) are true. - Both Statement (I) and Statement (II) are false. Statement (I) is true but Statement (II) is false. Statement (I) is false but Statement (II) is true.	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

104	3404	Corrected lactometer reading is to be determined from observed lactometer reading considering the following parameters. Select the correct combination - Temperature of milk & Density of milk - Fat % of milk & Viscosity of milk - Protein% of milk & Temperature of milk - Temperature of milk & Fat% of milk	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		

Objective Question

105	3405		4.0	1.00
-----	------	--	-----	------

Match the enzymes in milk from **List-I** with their association in **List-II** and select correct series from the options.

List-I	List-II
A. Lipoprotein lipase	1. Mastitis indicator
B. Lactoperoxidase	2. Age gelation in UHT milk
C. Catalase	3. Homologous with alpha lactalbumin
D. Plasmin	4. Indicator of HTST pasteurisation
E. Lysozyme	5. Rancid flavour
F. Alkaline phosphatase	6. Bactericidal activity

Choose the **correct** answer from the options given below:

1. A-5; B-6; C-1; D-4; E-2; F-3
2. A-5; B-6; C-1; D-2; E-3; F-4
3. A-1; B-6; C-5; D-2; E-3; F-4
4. A-6; B-3; C-1; D-2; E-5; F-4

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

106 3406

Lactose intolerance is observed in individuals with deficiency of the enzyme _____.

1. Galactokinase
2. Lactose-1-phosphatase
3. Alpha lactose hydrolase
4. Beta galactosidase

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

107 3407

4.0 1.00

Which of the following milk constituents scatter/reflect light for milk to appear whitish?

(A) Fat (B) Lactose (C) Casein (D) Whey proteins

1. (A) and (B)

2. (A) and (C)

3. (B) and (D)

4. (C) and (D)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

108 3408

Which of the followings agent is used as a thickening agent in whipped cream and permitted by FSSR, zell ?

1. Carrageenan

2. Starch

3. Sodium citrate

4. Calcium chloride

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

109 3409

Which of the following is **NOT** a factor affecting keeping quality of dried milk?

1. Fat content

2. Initial moisture content

3. Temperature of storage

4. Bulk density

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

110	3410	Which of the following is NOT a source for indigenous enzymes in milk? 1. Blood plasma 2. Milk fat globule membrane 3. Somatic cells 4. Casein micelle A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
-----	------	---	-----	------

Objective Question

111	3411	First limiting essential amino acid in wheat and rice is 1. Threonine 2. Aspartic acid 3. Lysine 4. Cysteine A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
-----	------	--	-----	------

Objective Question

112	3412	Among the following vegetable oils which one contains lowest amount polyunsaturated fatty acids? 1. Sunflower oil 2. Palm oil 3. Peanut oil 4. Cotton seed oil A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
-----	------	--	-----	------

Objective Question

113	3413	Which of the following represent fermentation of lactose to lactic acid by homofermentative bacteria? 1. Lactose + 1 H₃PO₄ + 1 ADP → 2 Lactic Acid + 2 ATP + 2 H₂O 2. Lactose + 4 ADP + 4 H₃PO₄ → 4 Lactic Acid + 4 ATP + 3 H₂O 3. Lactose + 2 ADP + 2 H₃PO₄ → 2 Lactic Acid + 2 ATP + 3 H₂O 4. Lactose + 3 ADP + 3 H₃PO₄ → 3 Lactic Acid + 3 ATP + 3 H₂O A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
-----	------	---	-----	------

Objective Question

114	3414	Which of the following indigenous enzymes in milk has capability of reactivation from an inactivated state thereby giving a false positive test during a quality check? 1. Lactoperoxidase 2. Plasmin 3. Xanthine oxidase 4. Alkaline phosphatase A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
-----	------	---	-----	------

Objective Question

115	3415		4.0	1.00
-----	------	--	-----	------

Given below are two statements, one is labelled as **Assertion (A)** and other one labelled as **Reason (R)**.

Assertion (A) : The redox potential (Eh) of cheese and fermented milk products is more negative than that of milk.

Reason (R) : A rapid decrease in Eh occurs after the available oxygen has been consumed by the bacteria.

In light of the above statements, choose the **correct** answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is **NOT** the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

116 3416

A¹ and A² milk differ in the amino acid residue at 67th position in bovine β -CN. In the following options which is the correct statement regarding amino acid residues at 67th position?

1. A² - Histidine; A¹ - Proline
2. A² - Proline; A¹ - Histidine
3. A² - Methionine; A¹ - Proline
4. A² - Histidine; A¹ - Methionine

A1 : 1

A2 : 2

A3 : 3

A4 : 4

4.0 1.00

Objective Question

117 3417

Pectin is a polysaccharide which is a polymer of _____.

1. Fructose
2. Glucose
3. Maltose
4. Galacturonic acid

4.0 1.00

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

118 3418

Match between milk constituents under **List-I** and most relevant biological activity under **List-II**. Choose the correct answer from the options given below:

List-I	List-II
(Constituent in milk)	(Most relevant biological activity)
(A) Conjugated Linoleic acid	(I) Antimicrobial
(B) Lactoferrin	(II) Vitamin carrier
(C) β - Lactoglobulin	(III) Lactose biosynthesis
(D) α - Lactalbumin	(IV) Anticarcinogenic

Choose the **correct** answer from the options given below:

- (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (A) - (II), (B) - (III), (C) - (I), (D) - (IV)
- (A) - (IV), (B) - (I), (C) - (II), (D) - (III)
- (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

119 3419

Which of the following proteins has highest biological value.

- Casein
- Soy protein
- Whey proteins
- Gluten

A1 : 1

A2 : 2

4.0 1.00

4.0 1.00

A3 : 3

A4 : 4

Objective Question

120	3420	Which of the following are the principal precursors for milk fatty acid synthesis in the mammary gland? 1. Acetate and beta-hydroxy butyrate 2. Propionic acid and citric acid 3. Cholesterol and Molonyl CoA 4. Amino acids and citric acid	4.0	1.00
		A1 : 1		
		A2 : 2		
		A3 : 3		
		A4 : 4		