

DR BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY, LONERE
Supplementary Examination-Supplementary Winter-2023
Date: 03.01.2024

Course : B.Pharmacy
Subject Name: Human anatomy and physiology II
Max Marks : 75

Sem: II
Subject Code: BP201T
Duration :3Hr.

Instructions:

1. All questions are compulsory
2. Draw diagrams/figures wherever necessary
3. Figures to right indicate full marks

1. Solve the following. (Answer all the questions)

(10 x 2) = 20

- i. Draw neat labeled diagram structures representing digestive system.
- ii. Define the term tidal volume and vital capacity?
- iii. Define the term Hyperchlorhydria and Peristalsis?
- iv. Draw well labeled diagram of Neuron.
- v. Define Diabetes mellitus and give its types.
- vi. Mention different types of meninges present in brain.
- vii. Enlist different phase's menstrual cycle.
- viii. Enlist the parts of Urinary system.
- ix. Mention different hormones released by Pituitary gland.
- x. Write the composition of gastric juice.

2. Long Answers (Answer 2 out of 3)

(2 x 10) = 20

- i. Explain physiology of Urine formation with neat labeled diagram.
- ii. Discuss in detail male reproductive system and explain the process of spermatogenesis.
- iii. Explain the hormones released from pituitary gland with their role.

3. Short Answers (Answer 7 out of 9)

(7 x 5) = 35

- i. Explain the process chemical transmission of nerve impulses.
- ii. Explain the process of oogenesis.
- iii. Give the role of kidney in acid base balance.
- iv. Explain the process of absorption of food from small intestine.
- v. Explain the role of RAs in Kidney.
- vi. Explain what is BMR?
- vii. Explain Reflex action with neat labeled diagram.
- viii. Write the hormones released from pancreas and explain how they control blood glucose level.
- ix. What is Cardio Pulmonary Resuscitation? Why CPR is called as kiss of life?

-----END OF THE PAPER-----

DR. BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY, LONERE
Branch-Pharmacy

Supplementary End Semester Examination – Winter 2023

Date: 05/01/2024

Course: B. Pharmacy

Sem: II

Subject Name: Pharmaccutical Organic Chemistry- I

Subject Code: BP202T

Duration: 3 Hrs

Max Marks: 75

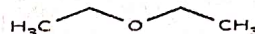
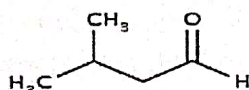
Instructions:

1. All questions are compulsory
2. Draw diagrams / figures wherever necessary
3. Figures to right indicate full marks

Q. 1. Objective Type Questions (Answer all the questions)

(10 x 2) = 20

- i) Draw the following structures
1) 1-Methyl cyclopentane 2) 5-Ethyl-3-methyloctane
- ii) Define the following terms
1) Hybridisation 2) sp^2 hybridisation
- iii) Identify the following structure



- iv) Write on Ozonolysis reaction.
- v) Write difference between E_1 and E_2 reactions.
- vi) Enlist any two qualitative tests for carboxylic acids.
- vii) Draw the structure and write uses of Ethanolamine.
- viii) What is mean by Electromeric effect?
- ix) Draw the structure and write uses of Ethyl alcohol.
- x) What is Saytzeff's rule? Give its reaction.

Q. 2. Long Answers (Answer 2 out of 3)

(2 x 10) = 20

- i) Describe the SN_1 & SN_2 reactions in detail.
- ii) Explain in detail Aldol condensation and Cannizarao reaction.
- iii) Illustrate the mechanism of Markownikoff's and anti- Markownikoff's rule. And write on orientation of alkene with suitable examples.

Q. 3. Short Answers (Answer 7 out of 9)

(7 x 5) = 35

- i) Describe the Perkin condensation reaction.
- ii) Elaborate sp^3 hybridisation in alkane.
- iii) Write different chemical reactions shown by alkyl halide.

- iv) What are Diene? Classify with example.
- v) Write a note on Inductive effect.
- vi) Explain acidity of carboxylic acids with effect of substituents on acidity.
- vii) What is structural isomerism in organic compound?
- viii) Discuss on Benzoin condensation reaction.
- ix) What is mean by aliphatic amines and explain basicity and effect of substituent on basicity?

-----END OF THE PAPER-----

DR. BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY, LONERE

Supplementary Winter 2023

Date:08/01/2024

Course : B. Pharmacy

Subject Name: Biochemistry

Max Marks : 75

Sem: II

Subject Code: BP203T

Duration : 3 hrs.

Instructions:

1. All questions are compulsory
2. Draw diagrams / figures wherever necessary
3. Figures to right indicate full marks

Q.1. Objective Type Questions (Answer all the questions) (10 x 2) = 20

- i) Classify lipids with suitable examples.
- ii) Draw the structures of Sucrose and Starch.
- iii) What are Purine and Pyrimidine bases.
- iv) Draw the double helix structure of DNA.
- v) Define Essential and Non-essential amino acids.
- vi) Define Redox potential and Energy rich compounds.
- vii) What is Gluconeogenesis and HMP shunt.
- viii) Give the difference between DNA and RNA.
- ix) Define Endergonic and Exergonic reactions.
- x) Draw the structures of α -helix and β -Pleated sheet.

Q.2 Long Answers (Answer 2 out of 3) (2x10) = 20

- i) Define and classify Proteins with example. Explain the various reactions involved in Urea cycle and its disorders.
- ii) What are lipids. Write in detail about ketogenesis. Give the disorders of lipid metabolism.
- iii) Define Glycolysis. Explain the pathway of glycolysis with energy production. Write a note on Glycogen Storage disease.

Q.3 Short Answers (Answer 7 out of 9) (7x5) = 35

- i) Give the reaction sequence in Gluconeogenesis.
- ii) Describe the Electron transport chain.
- iii) Explain Transamination in brief.
- iv) Define Enzymes and Co-enzymes. Give the IUB classification with example.
- v) Explain stages involved in RNA Transcription.

- vi) Write a short note on Diabetes Mellites.
- vii) What is ketoacidosis. Give the formation of Ketone bodies.
- viii) Write a note on Enzyme Inhibition.
- ix) Explain DNA Replication.

DR. BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY, LONERE

Supplementary Examination - Winter 2023

Course: B. Pharmacy
Subject Name: Pathophysiology
Date: 10/01/2024

Sem : II
Subject Code: BP204T
Time: 10:00am to 1:00pm, **MaxMarks-75**

Instructions:

1. All questions are compulsory
2. Draw diagrams / figures wherever necessary
3. Figures to right indicate full marks

Q. 1. Objective Type Questions (Answer all the questions)	(10 x 2) = 20
i) Differentiate between Metaplasia and Dysplasia.	02
ii) What are cardinal signs of Inflammation?	02
iii) Enlist the signs and symptoms of Hepatitis.	02
iv) Explain complications of Alcoholic liver disease	02
v) Define Iron deficiency and Megaloblastic anemia	02
vi) Enlist the causes of Acute renal failure.	02
vii) Causative agent, mode of transmission of Tuberculosis.	02
viii) Define Acidosis and Alkalosis.	02
ix) Name the causative organism for Meningitis and Typhoid.	02
x) Enumerate the signs and symptoms of Hyperthyroidism.	02
Q. 2. Long Answers (Answer 2 out of 3)	(2 x 10) = 20
i) Explain the etiology, pathogenesis and morphology of Reversible Cell injury.	10
ii) Explain Pathogenesis of- a) Essential hypertension b) Congestive cardiac failure.	10
iii) What is metabolic disorder? Explain the Pathogenesis of Diabetes mellitus.	10
Q. 3. Short Answers (Answer 7 out of 9)	(7 x 5) = 35
i) Explain pathogenesis of Rheumatoid arthritis.	05
ii) Define Tuberculosis. Explain the etiology, pathogenesis, signs and symptoms of Tuberculosis.	05
iii) Explain the vascular and cellular events of Inflammation.	05
iv) Differentiate between Intrinsic and Extrinsic Asthma.	05
v) Explain the pathogenesis, signs and symptoms of Parkinsonism.	05
vi) Explain the pathophysiology of Hepatitis B.	05
vii) Discuss the pathogenesis of Gout.	05
viii) Define Schizophrenia. Mention the positive and negative symptoms of Schizophrenia.	05
ix) Explain the pathophysiology of Cancer	05

-----END OF THE PAPER-----

DR.BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY,LONERE

End Semester Examination-Winter 2023

Date:30/12/2023

Course : B.Pharmacy

Sem : II

Subject Name : Computer Applications in Pharmacy

Subject Code : BP205T

Max.Marks : 50

Duration : 02Hr.

Instructions:

1. All questions are Compulsory
 2. Draw diagrams/figures wherever necessary
 3. Figures to right indicates full marks
-

Q.1. Long Answers (Answer 2 out of 3)

(2x10) = 20

- i) How a Pharmacy drug database can be designed?
- ii) Define the number system and explain its types with examples.
- iii) what is project planning ?What are the steps of development process?

Q.2. Shorts Answers(Answer 6 out of 8)

(6x5) = 30

- i) What is binary number system?
- ii) What are the various phases of the process life-cycle?
- iii) What are the features of programming languages?
- iv) What are the characteristics of database?
- v) How computers are used in hospital and clinical pharmacy?
- vi) Write a note on applications of CAD.
- vii) Discuss the objectives of bioinformatics.
- viii) List the different types of LIMS.

-----END OF THE PAPER-----

DR.BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY,LONERE

End Semester Examination-Winter 2023

Date: 01/01/2024

Course : B.Pharmacy

Sem : II

Subject Name : Environmental Sciences

Subject Code : BP206T

Max.Marks : 50

Duration : 02Hr.

Instructions:

1. All questions are Compulsory
 2. Draw diagrams/figures wherever necessary
 3. Figures to right indicates full marks
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Q.1. Long Answers (Answer 2 out of 3)

(2x10) = 20

- i) Explain the environmental studies challenges?
- ii) Write a brief note on energy flow in the eco system.
- iii) Explain in details the control measures for nuclear pollution?

Q.2. Shorts Answers (Answer 6 out of 8)

(6x5) = 30

- i) Discuss the effects of mining on water?
- ii) Write a note on water crisis?
- iii) State any two causes & effects of deforestation?
- iv) Discuss the type of ecological succession?
- v) What is food chain? State its importance.
- vi) Enumerate the different types of grass land ecosystem.
- vii) What are the measure causes of environmental pollution.
- viii) Illustrate the different types of air pollutant.

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