CHEM30 · MANITOBA

CHEM30
Practice Test

Unit E: Organic Chemistry

25 Questions

Original practice test based on the Manitoba curriculum. Work through each question, then check your answers at the end.

This practice test was made by AI and there may be mistakes. If a question or answer looks wrong, use the Flag a mistake button to let Brett know so he can fix it.

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Question 1

A sample of nitrogen has amount 6 moles and molar mass 28 grams per mole. Its mass, in grams, is

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Question 2

A sample of ammonia has mass 102 grams. Its molar mass is 17 grams per mole. The amount, in moles, is

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Question 3

An amount of 3 moles of water has molar mass 18 grams per mole. Its mass, in grams, is

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Question 4

A solution has 2 moles of solute in 2 litres. Its concentration, in moles per litre, is

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Question 5

A solution *has* hydrogen *ion* concentration $10^{-}3$ moles *per* litre . *Its pH is*

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Question 6

The number of atoms in one molecule of O_2 is

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Question 7

A sample of hydrogen has amount 5 moles and molar mass 2 grams per mole. Its mass, in grams, is

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Question 8

A sample of water has mass 54 grams. Its molar mass is 18 grams per mole. The amount, in moles, is

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Question 9

An amount of 3 moles of carbon dioxide has molar mass 44 grams per mole. Its mass, in grams, is

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Question 10

A solution has 5 moles of solute in 1 litres. Its concentration, in moles per litre, is

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Question 11

A solution *has* hydrogen *ion* concentration 10^{-9} moles *per* litre . *Its pH is*

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Question 12

A sample of methane has amount 3 moles and molar mass 16 grams per mole. Its mass, in grams, is

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Question 13

A sample of ammonia has amount 5 moles and molar mass 17 grams per mole. Its mass, in grams, is

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Question 14

A sample of carbon dioxide has mass 176 grams. Its molar mass is 44 grams per mole. The amount, in moles, is

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Question 15

An amount of 2 moles of oxygen has molar mass 32 grams per mole. Its mass, in grams, is

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Question 16

The organ where oxygen enters the blood is the

A) lung

B) heart

C) liver

D) stomach

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Question 17

The chemical symbol for water is

A) CO_2

B) H_2O

C) O_2

D) NaCl

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Question 18

The chemical symbol for carbon dioxide is

A) H_2O

B) O_2

C) CO_2

D) CO

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Question 19

The gas plants absorb from the air for photosynthesis is

A) oxygen

B) nitrogen

C) hydrogen

D) carbon dioxide

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Question 20

The gas released by plants during photosynthesis is

A) oxygen

B) carbon dioxide

C) nitrogen

D) hydrogen

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Question 21

An acid has a pH that is

A) equal to 7

B) less than 7

C) greater than 7

D) equal to 14

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Question 22

A neutral solution has a pH of

A) 0

B) 14

C) 7

D) 1

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Question 23

The force that pulls objects toward Earth is

A) friction

B) magnetism

C) inertia

D) gravity

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Question 24

The unit of force is the

A) newton

B) joule

C) watt

D) pascal

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Question 25

The unit of energy is the

A) newton

B) joule

C) watt

D) volt

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ANSWER KEY

1. 168
2. 6
3. 54
4. 1
5. 3
6. 2
7. 10
8. 3
9. 132
10. 5
11. 9
12. 48
13. 85
14. 4
15. 64
16. A
17. B
18. C
19. D
20. A
21. B
22. C
23. D
24. A
25. B

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