ENGLAND GCSE COMBINED SCIENCE AQA TRILOGY FOUNDATION · UNIT 8 · 25 QUESTIONS

Atomic Structure and the Periodic Table — Practice Test

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 so it can be fixed.

1 **A hot air balloon cools down. What happens?**

- A it stays still
- B it sinks
- C it bursts
- D it rises faster

Understand It with Pulse | Flag a mistake

2 **A thermometer measures temperature in degrees Celsius. What is the freezing point of water on this scale?**

- A 0
- B 10
- C 100
- D 32

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3 **Hardcover books are dropped. What happens to their speed as they fall?**

- A it increases
- B it becomes zero
- C it decreases
- D it stays the same

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4 **Silver coins are made of the element silver. What is the chemical symbol for silver?**

- A Sv
- B Si
- C Ag
- D S

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5 **Glass marbles in a tray are used as a model for particles in a solid. What do the marbles show?**

- A particles are far apart from each other
- B particles vibrate in fixed positions
- C particles move freely through space
- D particles flow past each other easily

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6 **An ice cream cone is put in a freezer. What happens to the liquid?**

A it freezes

B it evaporates

C it condenses

D it boils

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7 **An atom has 19 protons and 18 neutrons. What is its mass number?**

A 37

B 19

C 39

D 18

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8 **How does reactivity change down Group 7?**

A it decreases

B it increases

C it stays the same

D it stops

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9 **What is the centre of an atom called?**

A the neutron

B the nucleus

C the electron shell

D the proton

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10 **Which transition metal is used in construction?**

A sodium

B lithium

C calcium

D iron

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11 **What is the electronic structure of oxygen (atomic number 8)?**

A 2,7

B 2,4

C 2,8

D 2,6

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12 **What does the atomic number tell you?**

- A the number of electrons and neutrons
- B the number of protons
- C the mass of the atom
- D the number of neutrons

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13 **An atom has 12 protons and 10 neutrons. What is its mass number?**

- A 10
- B 22
- C 24
- D 12

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14 **How does reactivity change down Group 1?**

A it stops

B it increases

C it decreases

D it stays the same

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15 **Which particle has no charge?**

A the proton

B the nucleus

C the electron

D the neutron

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16 **Which of these is a typical property of a metal?**

A it does not conduct heat

B it is brittle

C it is dull

D it conducts electricity

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17 **An atom has 17 protons and 10 neutrons. What is its mass number?**

A 17

B 27

C 10

D 29

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18 **Which group contains the alkali metals?**

A Group 0

B Group 7

C Group 1

D Group 2

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19 **Which particle has a positive charge?**

A the neutron

B the nucleus

C the electron

D the proton

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20 **An atom has 12 protons and 6 neutrons. What is its mass number?**

- A 20
- B 12
- C 6
- D 18

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21 **Which of these is a non-metal?**

- A sulfur
- B sodium
- C iron
- D copper

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22 How many electrons are in the outer shell of a Group 1 element?

- A 7
- B 2
- C 8
- D 1

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23 An atom has atomic number 8 and mass number 16. How many electrons does it have?

- A 24
- B 8
- C 6
- D 16

Understand It with Pulse | Flag a mistake

24 An atom has 8 protons and 10 neutrons. What is its mass number?

- A 10
- B 18
- C 20
- D 8

Understand It with Pulse | Flag a mistake

25 What is the electronic structure of sodium (atomic number 11)?

- A 2,8,2
- B 2,8,1
- C 2,8,8
- D 2,7,2

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ANSWER KEY

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

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