

Example Second Midterm, Geology 100, Section 2

1) Much of Yellowstone is developed in what type of a volcanic landform?

- A) crater
- B) cone
- C) rift
- D) subduction zone
- E) pyroclastic caldera

2) The first hard shelled fossils are found in the:

- A) Cambrian Period
- B) Proterozoic Era
- C) Mesozoic Era
- D) Paleozoic Era
- E) Cenozoic Era

3) The first dinosaurs are found in the:

- A) Cambrian Period
- B) Proterozoic Era
- C) Mesozoic Era
- D) Paleozoic Era
- E) Cenozoic Era

4) The first land plants are found in the:

- A) Cambrian Period
- B) Proterozoic Era
- C) Mesozoic Era
- D) Paleozoic Era
- E) Cenozoic Era

5) The first fish are found in the:

- A) Cambrian Period
- B) Proterozoic Era
- C) Mesozoic Era
- D) Paleozoic Era
- E) Cenozoic Era

6) The first land animals are found in the:

- A) Cambrian Period
- B) Proterozoic Era
- C) Mesozoic Era
- D) Paleozoic Era
- E) Cenozoic Era

7) The “Age of Mammals” is the:

- A) Cambrian Period
- B) Proterozoic Era
- C) Mesozoic Era
- D) Paleozoic Era
- E) Cenozoic Era

- 8) An atom with a positive charge is called a/an:
A) electron
B) neutron
C) proton
D) anion
- 9) Igneous rocks that are coarse grained because they formed under the Earth's surface are called:
A) intrusive rocks
B) minerals
C) extrusive rocks
D) lithified rocks
- 10) This type of bonding occurs in a molecule when electrons (e^-) are shared:
A) atomic bonding
B) covalent bonding
C) ionic bonding
D) metamorphic bonding
- 11) An ion with a negative charge is called a/an:
A) proton
B) electron
C) cation
D) anion
- 12) The two elements that make up 75% of the Earth's crust are:
A) silica and oxygen
B) silica and aluminum
C) aluminum and oxygen
D) iron and oxygen
- 13) According to Bowen's experiments, the first mineral to crystallize from a melt at 1200°C is:
A) quartz
B) olivine
C) amphibole
D) mica
- 14) According to Bowen's experiments, the last mineral to crystallize from a melt at 700°C is:
A) quartz
B) olivine
C) amphibole
D) mica
- 15) The extrusive igneous rock that has a mineral composition of olivine, pyroxene, and plagioclase feldspar (calcium rich) is:
A) granite
B) rhyolite
C) gabbro
D) basalt

16) The intrusive equivalent to Question #15 is:

- A) gabbro
- B) basalt
- C) andesite
- D) diorite

17) The extrusive igneous rock that has a mineral composition of mica, quartz, and alkali feldspar is:

- A) granite
- B) rhyolite
- C) gabbro
- D) basalt

18) The intrusive equivalent to Question # 17 is:

- A) granite
- B) rhyolite
- C) andesite
- D) diorite

19) Geologists believe the Earth formed (MYA :Million Years Ago):

- A) 3,800 MYA
- B) 4,350 MYA
- C) 4,550 MYA
- D) 2,500 MYA

20) Which of the following is NOT a type of unconformity:

- A) Disconformity
- B) Nonconformity
- C) Divergent Unconformity
- D) Angular Unconformity

Mix and Match the Geologic Timescale:

Use the table below to answer Questions 21 to 28 to fill in the blanks.

Eon	Era	Period	Epoch	Age at Start
Phanerozoic	<u>Question #21</u>	Quaternary	Holocene	10,000 yr B.P.
			Pleistocene	
		Tertiary	Pliocene	5 m.y.
			Miocene	24 m.y.
			Oligocene	37 m.y.
			Eocene	58 m.y.
	Paleocene		<u>Question #26</u>	
	<u>Question #22</u>	<u>Question #24</u>		144 m.y.
		Jurassic		208 m.y.
		Triassic		
	<u>Question #23</u>	Permian		286 m.y.
		Pennsylvanian		320 m.y.
		Mississippian		360 m.y.
		Devonian		408 m.y.
		Silurian		438 m.y.
		Ordovician		505 m.y.
	<u>Question #25</u>		<u>Question #27</u>	
Precambrian	Proterozoic			
	Archean			
	Hadean		<u>Question #28</u>	

- 21) Blank:
A) Cenozoic
B) Mesozoic
C) Paleozoic
D) Cretaceous
E) Cambrian

- 22) Blank:
A) Cenozoic
B) Mesozoic
C) Paleozoic
D) Cretaceous
E) Cambrian

- 23) Blank:
A) Cenozoic
B) Mesozoic
C) Paleozoic
D) Cretaceous
E) Cambrian

- 24) Blank:
A) Cenozoic
B) Mesozoic
C) Paleozoic
D) Cretaceous
E) Cambrian

- 25) Blank:
A) Cenozoic
B) Mesozoic
C) Paleozoic
D) Cretaceous
E) Cambrian

- 26) Blank (m.y. = million years ago):
A) 2 m.y.
B) 65 m.y.
C) 570 m.y.
D) 2,500 m.y.
E) 4,550 m.y.

- 27) Blank (m.y. = million years ago):
A) 2 m.y.
B) 65 m.y.
C) 545 m.y.
D) 2,500 m.y.
E) 4,550 m.y.

28) Blank (m.y. = million years ago):

- A) 2 m.y.
- B) 65 m.y.
- C) 570 m.y.
- D) 2,500 m.y.
- E) 4,550 m.y.

29) The eruption of which of the following lavas would occur at the lowest (coolest) temperature?

- A) andesite
- B) basalt
- C) rhyolite
- D) granite
- E) none of the above

30) Aa lavas:

- A) are formed of pyroclastic debris
- B) have a surface of sharp, broken blocks
- C) are smooth and ropy in appearance
- D) are emitted only by cinder cones
- E) none of the above

31) A lahar is

- A) A slurry of water and rock debris
- B) A hot cloud of glowing ash
- C) A blanket of ash that is deposited on the land
- D) All of the above
- E) None of the above