

Posttest Chapter 1

1. What do the legal regulations refer to?

- a) how to direct a civil work by means of guidelines
- b) lack of compliance with said provisions by its personnel.
- c) the laws and decrees that engineers must follow
- d) laws to safeguard the lives of workers

2. ¿Are the ordinances, agreements included in the laws and decrees issued by the Republic of Colombia for construction?

- a) True
- b) False

3. Fundamental characteristics of quality assurance in civil work are:

- a) laws, administration, quality model
- b) management, control, assurance
- c) organization, implementation, control
- d) management, responsibility, service

4. The responsibility of the quality, supervision, revision, verification of engineering work is exclusive of:

- a) civil works institute
- b) structural maintenance personnel
- c) Invias plan
- d) builder

5. Should the engineer have a field laboratory that allows him to perform all the design and quality control?

- a) false

b) true

6. what requirements must the constructor have before the execution of engineering work?

a) all legal permits and licenses

b) take into account the rules of construction

c) defects of the work

d) the design and quality control

7. Should devices, materials, procedures be included in the prices of contractual items?

a) true

b) false

8. What is an architectural restoration?

a) It is the maintenance of historical assets

b) It is the process of renovating or reconstructing any element of a building

c) It involves the demolition of old and dilapidated buildings

d) It is the conservation of cultural works

9. The construction environment, according to Youker, is:

a) the activities include examination, documentation, treatment.

b) the permit for handling explosives in forest areas

c) the option a and b are correct

d) the set of surrounding conditions that externally influence the construction process

10. What is the structure of the pavement?

a) Surface course, base course, and subbase course.

b) Face course, base course, and subbase course.

c) Surface course, basement course, and subbase course.

d) Surroundface course, base course, and subbase course.

11. What is architectural heritage?

a) conservation of the ancestral culture

b) maintenance of old buildings

c) It' is a term that refers to buildings or structures of historical or cultural importance, which are a vital part of the country's

d) legal documentation for the renewal of the national patrimony

12. When carrying out a work must be taken into account:

a) development of the engineering work, working hours, maintenance of the materials

b) planning, development of the engineering work and its environmental impacts.

c) damage to architectural heritage and wastewater

d) The option a and b are correct

13. One of the biggest engineering works more pollutants are:

a) houses environmentally sustainable buildings

b) small buildings and factories

c) Factories and power plants

d) nuclear plants and Parks

14. When constructing a building nowadays, should the environmental factor be taken into account?

a) false

b) true

15. Which of these images represents "the solid waste of a building"?

a)

b)



c)

d)



16). Which of these images represents “the land use”?

a)

b)



c)

d)



17. which are the most used natural resources in construction.

a) cement, clay and sand

b) water, brick and materials

c) construction process, fuel and land

d) energy, land, materials, and water

18. How many parts is the unit price analysis divided?

- a) five
- b) six
- c) four
- d) three

19. what are the 4 parts of a unit price analysis

- a) The option d and b are correct
- b) materials, machinery, environmental factors
- c) salaries, machinery and others
- d) materials, workforce, machinery, and other resources.

20. What are the 4 phases of subgrade soil stabilization?

- a) Mechanical Stabilization, compaction, blending and geosynthetics
- b) compaction, support, erosion
- c) ground waters, blending, plasticity
- d) geosynthetics, mechanical stabilization and fuel

21. What are the 3 courses of the pavement structure?

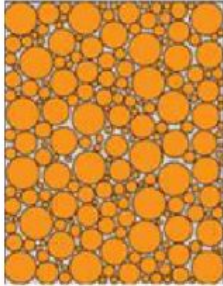
- a) Surface course, base course, subbase course
- b) Treated Base, asphalt Binder, reinforce subgrade
- c) Surface course, additives, subbase course
- d) Aggregate base, gravel base, soil course

22. What are the 4 types of asphalts?

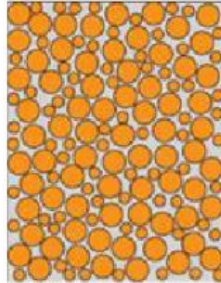
- a) asphalt pavement, seal coat pavement, common asphalt
- b) emulsified asphalt, , cutback asphalt
- c) asphalt pavement, asphalt binder, emulsified asphalt, cutback asphalt
- d) asphalt binder, asphaltic drainage, etc

23. According to "Desirable Properties of Aggregates" which of these images refers to a well graded one?

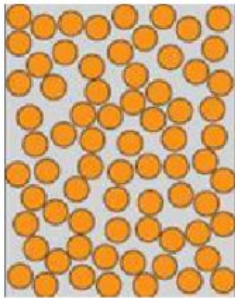
a)



b)



c)



24. The following definition: "The shapes of aggregate particles influence the asphalt mixture's overall strength and workability" refers to:

- a) Cleanliness
- b) Desirable Properties
- c) Capillary rise
- d) Particle shape

25. What is Capillary rise?

- a) It is a property of the raw or fresh concrete mixture
- b) the attraction of the water molecules to a solid surface
- c) It refers to the principal load-supporting components of an asphalt pavement

d) The option c and b are correct