

QID: 1 - The crushing strength (MPa) of good stone used for construction of a building must not be less than ____.

Options:

- 1) 10
- 2) 50
- 3) 100
- 4) 120

Correct Answer: 100

QID: 2 - In ordinary cement, about 99% of its final strength is achieved in ____.

Options:

- 1) 3 days
- 2) 7 days
- 3) 28 days
- 4) 1 year

Correct Answer: 28 days

QID: 3 - In the process of the hydration of OPC, what is the water requirement (expressed as the percentage by weight of cement) to complete the chemical reactions?

Options:

- 1) 15 to 25%
- 2) 20 to 25%
- 3) 25 to 35%
- 4) 35 to 45%

Correct Answer: 20 to 25%

QID: 4 - What is the main reason to use lime in the cement slurry during the plastering in the top coat?

Options:

- 1) To make the surface bright.
- 2) To harden the cement.
- 3) To make the plaster non-shrinkable.
- 4) To improve the workability of plaster.

Correct Answer: To make the plaster non-shrinkable.

QID: 5 - Bulking of sand occurs in the moisture content of ____.

Options:

- 1) 3%
- 2) 5%
- 3) 10%
- 4) 12%

Correct Answer: 5%

QID: 6 - Which of the following is the main advantage of the plywood?

Options:

- 1) Strength is more in the longitudinal direction.
- 2) Strength is more in the transverse direction.
- 3) Tensile strength is same in all directions.
- 4) Shrinkage stress is minimum.

Correct Answer: Tensile strength is same in all directions.

QID: 7 - The hardwood is produced by which of the following trees?

Options:

- 1) Chir
- 2) Kail
- 3) Pine
- 4) Shishum

Correct Answer: Shishum

QID: 8 - Which one of the following metamorphic rocks has more weathering resistance characteristics?

Options:

- 1) Lime stone
- 2) Phyllite
- 3) Quartzite
- 4) Slate

Correct Answer: Quartzite

QID: 9 - Which of the following type of stone is used in the rubble masonry?

Options:

- 1) Hard
- 2) Heavy weighted
- 3) Light weighted
- 4) Smooth

Correct Answer: Hard

QID: 10 - The hydraulicity of the hydraulic lime is mainly due to ____.

Options:

- 1) Calcium oxide
- 2) Clay
- 3) Sulphur
- 4) Water

Correct Answer: clay

QID: 11 - What percentage of the cost of the estimate is provided for the work charged establishment?

Options:

- 1) 2%
- 2) 8%
- 3) 10%
- 4) 15%

Correct Answer: 2%

QID: 12 - What is the thickness (inches) of the one brick wall made up of traditional brick?

Options:

- 1) 9
- 2) 10
- 3) 18
- 4) 20

Correct Answer: 9

QID: 13 - Which one is the **CORRECT** option for the damp proof course?

Options:

- 1) It is measured in the cubic meter.
- 2) It is measured in running meter.
- 3) It is not provided at sills of doors.

4) It is provided for half the width of the plinth wall.

Correct Answer: It is not provided at sills of doors.

QID: 14 - Calculate the year's purchase for a property of useful life of 30 years and rate of interest of 5% per annum.

Options:

- 1) 0.05
- 2) 0.2
- 3) 2
- 4) 2 0

Correct Answer: 20

QID: 15 - What is the density of the mild steel in quintal per cubic meter?

Options:

- 1) 7.85
- 2) 78.5
- 3) 490
- 4) 785 0

Correct Answer: 78.5

QID: 16 - Cleaning and fixing of glass panel is measured in _____.

Options:

- 1) cubic meter
- 2) meter
- 3) number
- 4) square meter

Correct Answer: number

QID: 17 - Calculate the volume (cubic meter) of earthwork for an embankment of length 30 m and width 4 m. The mean depth of the embankment is 4 m and side slope is 2: 1. Using mid-sectional area method.

Options:

- 1) 480
- 2) 960
- 3) 144 0
- 4) 1920

Correct Answer: 1440

QID: 18 - Calculate the quantity (cubic meter) of the cement required for 1 cubic meter of brick work with cement mortar (1: 4).

Options:

- 1) 0.05
- 2) 0.06
- 3) 0.2
- 4) 0.24

Correct Answer: 0.06

QID: 19 - Which one is the **CORRECT** statement for conversion of the lift into lead?

Options:

- 1) Lift up to 3.6 m is converted into the horizontal lead by multiplying with 10.

2) Lift up to 3.6 m is converted into horizontal lead by multiplying with 1 5

3) Lift up to 3.6 m is converted into horizontal lead by multiplying with 2 0

4) Lift above 6 m is converted into horizontal lead by multiplying with 10

Correct Answer: Lift up to 3.6 m is converted into the horizontal lead by multiplying with 10.

QID: 20 - A building has been purchased by a person at a cost of Rs. 25,000. The useful life of the building is 40 years and the scrap value of the building is Rs.3,000. Calculate the annual sinking fund (Rs.) at the rate of 5% interest.

Options:

- 1) 136
- 2) 155
- 3) 182
- 4) 207

Correct Answer: 182

QID: 21 - Plumb bob lines at two different places in geodetic surveying will _____.

Options:

- 1) Intersect at the surface of the Earth
- 2) Intersect at the center of the Earth
- 3) Parallel to each other
- 4) Perpendicular to each other

Correct Answer: intersect at the center of the Earth

QID: 22 - Calculate the true reduced level (m) of a point A after correcting the refraction and curvature. The staff reading at the point taken from an instrument set at a distance of 2 km from the point A is 2.56 m. The staff reading from the same station on a bench mark of reduced level is 100 m is 1.34 m.

Options:

- 1) 98.51
- 2) 99.78
- 3) 99.05
- 4) 101.3

Correct Answer: 99.05

QID: 23 - Which one is the **CORRECT** expression for the horizontal distance between the instrument and the staff for the anallactic telescope, if S is the staff intercept, K and C are multiplying and additive constant?

Options:

- 1) C
- 2) 100C
- 3) S
- 4) 100S

Correct Answer: 100S

QID: 24 - With an increase in the denominator of the representative fraction, the scale of the map will _____.

Options:

- 1) Decrease
- 2) Either decrease or increase
- 3) Increase
- 4) Remain same

Correct Answer: decrease

QID: 25 - Calculate the length of one division of the vernier scale, if least count of the combination of main and vernier scale is 0.02 mm. The least count of the main scale is 1 mm.

Options:

- 1) 1
- 2) 0.98
- 3) 1.02
- 4) 1.03

Correct Answer: 0.98

QID: 26 - Which one is the **CORRECT** statement?

Options:

- 1) Length of engineering chain is 33 ft.
- 2) Length of engineering chain is 66 ft.
- 3) Length of Gunter's chain is 66 ft.
- 4) Length of revenue chain is 33 ft.

Correct Answer: Length of Gunter's chain is 66 ft.

QID: 27 - Which of the following statement is **CORRECT** for whole circle bearing?

Options:

- 1) It is always measured in anticlockwise direction.
- 2) It is always measured in anticlockwise direction from south end of the reference.
- 3) It is always measured in clockwise direction from south end of the reference.
- 4) It is always measured from north end of the reference.

Correct Answer: It is always measured from north end of the reference.

QID: 28 - Calculate the length (m) tangent of a 5 degree curve, if the deflection angle is 60 degree.

Options:

- 1) 172.5
- 2) 198.6
- 3) 360
- 4) 596

Correct Answer: 198.6

QID: 29 - Calculate the limiting length (m) of the offset, if the maximum allowable error in laying offset is 2 degree. The scale of the map is 1 cm = 100 m.

Options:

- 1) 2.5
- 2) 71.63

3) 250

4) 286.5

Correct Answer: 71.63

QID: 30 - Calculate the error in the staff reading on a staff at a distance of 100 m due to out of the center of the bubble by 4 divisions. The sensitivity of the bubble tube is 30 seconds per 2 mm divisions

Options:

- 1) 0.29
- 2) 0.34
- 3) 0.58
- 4) 0.67

Correct Answer: 0.58

QID: 31 - For which of the following soil, plasticity index is maximum?

Options:

- 1) Clay
- 2) Cobble
- 3) Gravel
- 4) Silt

Correct Answer: Clay

QID: 32 -

A friction pile of diameter 50 cm is embedded 15 m into the homogeneous consolidated clay deposit. If the adhesion factor is 0.7 and adhesion develops between the clay and pile shaft is 4 t/m^2 . What is the safe load (t) for factor of safety 3.0?

Options:

- 1) 15
- 2) 22
- 3) 26
- 4) 30

Correct Answer: 22

QID: 33 -

If the void ratio and discharge velocity for soil is 0.5 and $6 \times 10^{-7} \text{ m/s}$ respectively, what is the value of seepage velocity (m/s)?

Options:

- 1) 3×10^{-7}
- 2) 6×10^{-7}
- 3) 12×10^{-7}
- 4) 18×10^{-7}

Correct Answer:

18×10^{-7}

QID: 34 - For bulk heads, which of the following earth pressure theory is applied directly?

Options:

- 1) Coulomb's theory
- 2) Rankine's theory
- 3) Coulomb's theory and Rankine's theory both
- 4) None of these

Correct Answer: None of these

QID: 35 - On increasing the temperature of a liquid, the viscosity of the liquid _____.

Options:

- 1) Decrease
- 2) Increase
- 3) First decrease and then increase
- 4) Remains same

Correct Answer: decrease

QID: 36 - Which of the following represents the unit of kinematic viscosity?

Options:

- 1) cm^2/s
- 2) dyne-sec/ cm^2
- 3) gm/cm-sec
- 4) gm/ cm^2 -sec

Correct Answer:

cm^2/s

QID: 37 –

What is the discharge (m^3/s) from circular pipe having diameter 0.5 m and velocity of flow of 10 m/s?

Options:

- 1) 1.5
- 2) 1.96
- 3) 2.76
- 4) 3

Correct Answer: 1.96

QID: 38 –

A rectangular channel of cross-sectional dimensions 15×9 m is running at one third. What is the hydraulic radius (m) of the channel?

Options:

- 1) 5
- 2) 6.43
- 3) 8.95
- 4) 10

Correct Answer: 6.43

QID: 39 - A turbine generates the power of 150,000 kW while working at the speed of 300 rpm at the head of 100 m. What is the specific speed of the turbine?

Options:

- 1) 300
- 2) 340
- 3) 367
- 4) 452

Correct Answer: 367

QID: 40 - Which of the following represent the Darcy's friction factor in terms of Reynolds number (Re) for the laminar flow in circular pipes?

Options:

- 1) $16/\text{Re}$
- 2) $32/\text{Re}$
- 3) $64/\text{Re}$
- 4) None of these

Correct Answer: $64/\text{Re}$

QID: 41 - Which of the following represents the maximum thickness of the boundary layer in the pipe having radius R?

Options:

- 1) 0
- 2) $R/2$
- 3) R
- 4) $2R$

Correct Answer: R

QID: 42 - Which of the following represents the speed of the elementary wave in the still water at a depth of y?

Options:

- 1) $\sqrt{gy/3}$
- 2) $\sqrt{gy/2}$
- 3) \sqrt{gy}
- 4) $\sqrt{2gy}$

Correct Answer:

\sqrt{gy}

QID: 43 - What is the specific energy (m-kg/kg) for 1 m depth of flow having velocity of 3 m/s?

Options:

- 1) 0.54
- 2) 1.46
- 3) 5
- 4) 7.62

Correct Answer: 1.46

QID: 44 - In the Sutro weir, the discharge of the weir is proportional to _____.

Options:

- 1) $H^{1/2}$
- 2) $H^{3/2}$
- 3) $H^{5/2}$
- 4) H

Correct Answer: H

QID: 45 - Watering done prior to the sowing of the crops is called _____.

Options:

- 1) Kor watering
- 2) Duty
- 3) Delta
- 4) Paleo irrigation

Correct Answer: Paleo irrigation

QID: 46 - Calculate the runoff (cm) from a rainfall of 3 hours. The intensity of the rainfall is 2 cm/hr. The evaporation and infiltration losses are 8 mm and 16 mm respectively.

Options:

- 1) 1.2
- 2) 2.8
- 3) 3.6
- 4) 6.8

Correct Answer: 3.6

QID: 47 - Calculate the design rate of super elevation (%) on a highway in a plain terrain, if design speed of the highway is 80 kmph and radius of the curve is 400m.

Options:

- 1) 7
- 2) 7.11
- 3) 8.2
- 4) 12.6

Correct Answer: 7

QID: 48 - The width (m) of the narrow gauge is _____.

Options:

- 1) 0.762
- 2) 1
- 3) 1.435
- 4) 1.676

Correct Answer: 0.762

QID: 49 - On which scale the turbidity is measured?

Options:

- 1) Platinum scale
- 2) Silica cobalt scale
- 3) Silica platinum scale
- 4) Standard silica scale

Correct Answer: Standard silica scale

QID: 50 –

Which of the following represents the approximate overflow rate (liters/hours/m²) for the plain sedimentation tank?

Options:

- 1) 500 to 750
- 2) 800 to 1200
- 3) 1200 to 1550
- 4) 1650 to 2500

Correct Answer: 500 to 750

QID: 51 - Which of the following structural loads are not applied commonly to a building?

Options:

- 1) Dead load
- 2) Rain load
- 3) Live load
- 4) Environmental load

Correct Answer: Rain load

QID: 52 - In the method used to establish the magnitude of live load, what is the reference time period?

Options:

- 1) 30 years
- 2) 40 years
- 3) 50 years
- 4) 60 years

Correct Answer: 50 years

QID: 53 - Find the value of reduction factor R_2 if F (rise to span ratio in inches) is given to be 5.

Options:

- 1) 0.95
- 2) 0.96
- 3) 0.97
- 4) 0.98

Correct Answer: 0.95

QID: 54 - How many constraints are there in a free-rotation support used in a planar system?

Options:

- 1) 1
- 2) 2
- 3) 3
- 4) 4

Correct Answer: 2

QID: 55 - A surface structure has:-

Options:

- 1) Small thickness
- 2) Large thickness
- 3) Moderate thickness
- 4) Arbit thickness

Correct Answer: Small thickness

QID: 56 - If in a planar system, only 2 reaction forces are acting, then the system is:-

Options:

- 1) Essentially unstable
- 2) Essentially stable
- 3) Can't say
- 4) None of these

Correct Answer: Essentially unstable

QID : 57 - If a structure has total 10 joints, then what should be the minimum no. of joints in which equilibrium equations should be concurrently satisfied for stability?

Options:

- 1) 7
- 2) 8
- 3) 9
- 4) 10

Correct Answer: 10

QID: 58 –

A single angle in tension is connected by one leg only. If the areas of connecting and outstanding legs are respectively a and b , then what is the net effective area of the angle?

- A] $a - \frac{b}{1+0.35 \frac{b}{a}}$
- B] $a + \frac{b}{1+0.35 \frac{b}{a}}$
- C] $a - \frac{b}{1+0.2 \frac{b}{a}}$
- D] $a + \frac{b}{1+0.2 \frac{b}{a}}$

Options:

- 1) Only A
- 2) Only B
- 3) Only C
- 4) Only D

Correct Answer: Only B

QID: 59 - Generally, in a truss system compressive parts are thicker than tensile parts. Is it true or false?

Options:

- 1) TRUE
- 2) FALSE
- 3) Can't say
- 4) Depends upon situation

Correct Answer: TRUE

QID: 60 - If a truss has two more members surpassing each other, then it is:-

Options:

- 1) Simple
- 2) Compound
- 3) Complex
- 4) None of these

Correct Answer: Complex

QID: 61 - How many components are mainly used to prepare concrete?

Options:

- 1) 5
- 2) 3
- 3) 2
- 4) 4

Correct Answer: 4

QID: 62 - Retarders are used for:

Options:

- 1) Const ruction of high rise building
- 2) Repair works
- 3) Cold weather conditions
- 4) Grouting deep oil wells

Correct Answer: Grouting deep oil wells

QID: 63 - What is the ratio of components in grade M20 concrete?

- A. 1:3:6
- B. 1:1.5: 3
- C. 1:1:2
- D. 1:2:4

Options:

- 1) Only A
- 2) Only B
- 3) Only C
- 4) Only D

Correct Answer: Only B

QID: 64 - How many types of machine mixers of concrete are available?

Options:

- 1) 2
- 2) 5
- 3) 6
- 4) 3

Correct Answer: 3

QID: 65 - Excess vibration during compacting of concrete can lead to:

Options:

- 1) Bleeding
- 2) Segregation
- 3) High strength
- 4) Air bubbles

Correct Answer: Segregation

QID: 66 - Which of the below property of aggregates is not desirable?

Options:

- 1) Smooth texture
- 2) Well graded
- 3) Angular shape
- 4) Smaller size

Correct Answer: Angular shape

QID: 67 - Which of the following statements is true?

- A. Workability reduces with time.
- B. Workability does not reduce with time.
- C. Workability remains constant with time .

Options:

- 1) Only A
- 2) Only B
- 3) Only C
- 4) None of these

Correct Answer: Only A

QID: 68 –

Modulus of elasticity of concrete,
E is calculated using:

- A] $E=5000\sqrt{f_{ck}}$
- B] $E=500\sqrt{f_{ck}}$
- C] $E=50\sqrt{f_{ck}}$
- D] $E=5\sqrt{f_{ck}}$

Options:

- 1) Only A
- 2) Only B
- 3) Only C
- 4) Only D

Correct Answer: Only B

QID: 69 - The result of Vee-Bee test is expressed in terms of:

:

Options:

- 1) s
- 2) m
- 3) N/mm²
- 4) kg

Correct Answer: s

QID: 70 - Plastering is also called:

Options:

- 1) Pre-casting
- 2) Pargeting
- 3) Porting
- 4) Polishing

Correct Answer: Pargeting

QID: 71 - In plastering, the 1st coat is called _____ and its thickness should be _____ mm.

Options:

- 1) Under coat, 6-9
- 2) Floating coat, 6-9
- 3) Floating coat, 10-15
- 4) Undercoat, 10- 15

Correct Answer: Undercoat, 10-15

QID: 72 - Which of the following statements is **true**?

- A. Mud plastering does not require curing
- B. Mud plastering requires curing.
- C. It depends on the situation

Options:

- 1) Only A
- 2) Only B
- 3) Only C
- 4) Non e of these

Correct Answer: Only A

QID: 73 - Which of the following statements is **true**?

Options:

- 1) The quality of water governs the strength of concrete
- 2) The quantity of water required for concreting, depends upon the grading of aggregate and method of compaction
- 3) 10% excess of water reduces the strength of concrete by 15%
- 4) All option are correct

Correct Answer: All option are correct

QID: 74 - In the method of voids for determination of the quantity of cement paste, it is assumed that

Options:

- 1) Voids in coarse aggregates are filled by fine aggregates
- 2) Voids in fine aggregates are filled by the cement paste
- 3) Volume of fine aggregates is equal to total voids in coarse aggregates plus 10% extra
- 4) All option are correct

Correct Answer: All option are correct

QID: 75 - The 28 days' cube strength of mass concrete using aggregates of maximum size 5 cm for gravity dams should be:

:

Options:

- 1) Between 150 to 300 kg/sq.cm
- 2) Between 350 to 600 kg/sq .cm
- 3) Between 150 to 500 kg/sq .cm
- 4) Below 200 kg/sq.cm

Correct Answer: below 200 kg/sq.cm

QID: 76 - What do you mean by 'Ware house pack' of cement?

Options:

- 1) Full capacity of the warehouse
- 2) Pressure exertion of the bags of upper layers
- 3) Pressure compaction of the bags on lower layers
- 4) Packing the ware house

Correct Answer: pressure compaction of the bags on lower layers

QID: 77 - Which of the following refers to the process of proper and accurate

measurement of concrete ingredients for uniformity of proportion?

Options:

- 1) Grading
- 2) Curing
- 3) Mixing
- 4) Batching

Correct Answer: batching

QID: 78 - What are the dimensions of a 35-liter forma for measuring aggregates by volume?

Options:

- 1) Length 30 cm, breadth 25 cm, height 30 cm
- 2) Length 39 cm, breadth 25 cm, height 32 cm
- 3) Length 27 cm, breadth 27 cm, height 48 cm
- 4) Length 220 cm, breadth 25 cm, height 40 cm

Correct Answer: length 27 cm, breadth 27 cm, height 48 cm

QID: 79 - In how many types can R.C.C. be classified into?

Options:

- 1) 2
- 2) 3
- 3) 4
- 4) 5

Correct Answer: 2

QID: 80 - R.C.C. was developed and first used by:

Options:

- 1) Joseph Monier
- 2) John Smeaton
- 3) Francois Coignet
- 4) Joseph Asphadin

Correct Answer: Francois Coignet

QID: 81 - Which of the below is not a property of ferro-cement?

Options:

- 1) Impervious nature
- 2) Capacity to resist shock
- 3) No need of form work
- 4) Strength per unit mass is low

Correct Answer: Strength per unit mass is low

QID: 82 –

If W is the load on a circular slab of radius R , the maximum radial moment at the center of the slab is

- A) $\frac{WR^2}{16}$
- B) $\frac{2WR^2}{16}$
- C) $\frac{3WR^2}{16}$
- D) $\frac{5WR^2}{16}$

Options:

- 1) A Only
- 2) B Only
- 3) C Only
- 4) D Only

Correct Answer: C Only

QID: 83 - If the ratio of the span to the overall depth does not exceed 10, the stiffness of the beam will ordinarily be satisfactory in case of a

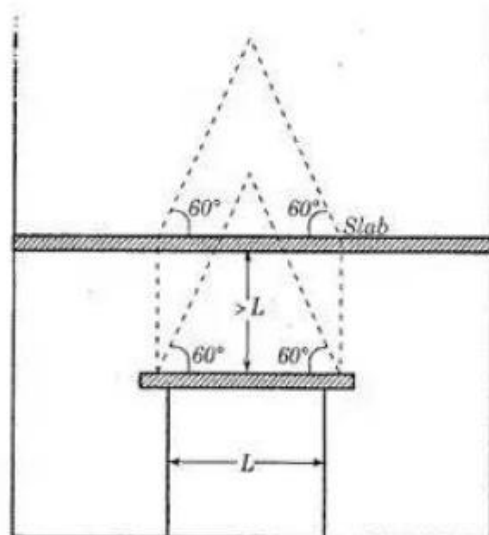
Options:

- 1) Simply supported beam
- 2) Continuous beam
- 3) Cantilever beam
- 4) None of these

Correct Answer: cantilever beam

QID: 84 –

The total load on the lintel shown in the figure below will be taken as the weight of brickwork contained in _____



Options:

- 1) A rectangle whose height is equal to the effective span
- 2) A rectangle whose height is equal to the height of the slab above lintel
- 3) A rectangle whose height is equal to the height of the wall above the lintel
- 4) Equilateral triangle of side L and the load between lintel and slab

Correct Answer: equilateral triangle of side L and the load between lintel and slab

QID: 85 - The maximum permissible size of aggregates to be used in casting the ribs of a slab is

Options:

- 1) 5 mm
- 2) 7.5 mm
- 3) 10 mm
- 4) 15 mm

Correct Answer: 10 mm

QID: 86 - For a number of columns constructed in a row, the type of foundation provided is

Options:

- 1) Footing
- 2) Raft
- 3) Strap
- 4) Strip

Correct Answer: strip

QID: 87 –

If the bearing capacity of soil is 10 tones/cm^2 and the projection of plain concrete footing from walls, is a cm, the depth D of footing is

- A) $D = 0.0775a$
- B) $D = 0.775a$
- C) $D = 0.775\sqrt{a}$
- D) $D = 0.775a^2$

Options:

- 1) A Only
- 2) B Only
- 3) C Only
- 4) D Only

Correct Answer: B Only

QID: 88 –

If p is the net upward pressure on a square footing of side b for a square column of side a , the maximum bending moment is given by

- A) $B.M. = \frac{pb(c-a)}{4}$
- B) $B.M. = \frac{pb(b-a)^2}{4}$
- C) $B.M. = \frac{pb(b-a)^2}{8}$
- D) $B.M. = \frac{pb(b+a)}{8}$

Options:

- 1) A Only
- 2) B Only
- 3) C Only
- 4) D Only

Correct Answer: C Only

QID: 89 –

A rod of uniform cross-section A and length L is deformed by δ , when subjected to a normal force P . The Young's modulus E of the material is

- A) $E = \frac{P \cdot \delta}{A \cdot L}$
- B) $E = \frac{A \cdot \delta}{P \cdot L}$
- C) $E = \frac{P \cdot L}{A \cdot \delta}$
- D) $E = \frac{P \cdot A}{L \cdot \delta}$

Options:

- 1) A Only
- 2) B Only
- 3) C Only
- 4) D Only

Correct Answer: C Only

QID: 90 - Total strain energy theory for the failure of a material at elastic limit is known as

Options:

- 1) Guest's or Tresca's theory
- 2) St. Venant's theory
- 3) Rankine's theory
- 4) Haig's theory

Correct Answer: Haig's theory

QID: 91 –

By applying the static equations i.e. $\Sigma H = 0$, $\Sigma V = 0$ and $\Sigma M = 0$, to a determinate structure, we may determine

Options:

- 1) Supporting reactions only
- 2) Shear forces only
- 3) Bending moments only
- 4) All option are correct

Correct Answer: All option are correct

QID: 92 –

The ratio of the section modulus of a square section of side B and that of a circular section of diameter D is

- 1) $\frac{2\pi}{15}$
- 2) $\frac{3\pi}{16}$
- 3) $\frac{3\pi}{8}$
- 4) $\frac{\pi}{16}$

Options:

- 1) [1] Only
- 2) [2] Only
- 3) [3] Only
- 4) [4] Only

Correct Answer: [2] Only

QID: 93 - Which of the following statements is true?

Options:

- 1) The ability of the material to absorb energy till the breaking or rupture taken place is known as hardness
- 2) The ability of the material to absorb energy till the breaking or rupture taken place is known as Toughness
- 3) The ability of the material to absorb energy till the breaking or rupture taken place is known as brittleness
- 4) None of these

Correct Answer: The ability of the material to absorb energy till the breaking or rupture taken place is known as Toughness

QID: 94 - The one that has least carbon content is:

Options:

- 1) Wrought iron
- 2) Cast iron
- 3) Mild steel
- 4) Pig steel

Correct Answer: Wrought iron

QID: 95 - The modulus of elasticity of steel is more than that of concrete. It indicates that steel is

Options:

- 1) Less elastic
- 2) More plastic
- 3) Less plastic
- 4) None of these

Correct Answer: None of these

QID: 96 - Which of the following statements is true?

Options:

- 1) Limit of proportionality depends upon area of cross-section
- 2) Limit of proportionality depends upon type of loading

3) Limit of proportionality depends upon type of material

4) All option are correct

Correct Answer: Limit of proportionality depends upon type of material

QID: 97 - In a thin cylindrical shell, the ratio of longitudinal stress to hoop stress is

Options:

- 1) 1.5
- 2) 1
- 3) 2
- 4) None of these

Correct Answer: None of these

QID: 98 - Which of the following statements is true?

Options:

- 1) Shear stress on principal planes is zero.
- 2) Shear stress on principal planes is maximum
- 3) Shear stress on principal planes is minimum.
- 4) None of these

Correct Answer: Shear stress on principal planes is zero.

QID: 99 - The net area of round bars to resist the tension, is the area of cross section at

Options:

- 1) Mid-section
- 2) Root of the thread
- 3) Difference of mid-section and root of the thread
- 4) None of these

Correct Answer: root of the thread

QID: 100 - Pick up the correct statement from the following:

Options:

- 1) When the gauge distance is larger than the pitch, the failure of the section may occur in a zig-zag line
- 2) When the gauge distance is smaller than the pitch, the failure of the section may occur in a straight right angle section through the centre of rivet holes
- 3) When the gauge distance and pitch are both equal, the failure to the section becomes more likely as the diameter of the hole increases
- 4) All option are correct

Correct Answer: All option are correct