

FINAL ANSWER KEY

Question Paper Code:	25/2015/OL
Category Code:	322/2014
Exam:	Sergeant
Medium of Question:	English
Date of Test	30-10-2015
Alphacode	A

Question1:-Two lines are intersect in a point. How many angles are formed?

- A:-2
- B:-4
- C:-8
- D:-10

Correct Answer:- Option-B

Question2:-How many edges are in a square pyramid?

- A:-4
- B:-12
- C:-8
- D:-5

Correct Answer:- Option-C

Question3:-A solid body with length, breadth and height are equal, what is its name?

- A:-Rectangle
- B:-Circle
- C:-Cube
- D:-Parallelogram

Correct Answer:- Option-C

Question4:-6, 10, 12, 15, 16, 18, 21. What is its Arithmetic Mean?

- A:-12
- B:-14
- C:-15
- D:-18

Correct Answer:- Option-B

Question5:-What is the total surface area of a sphere with its radius 2.5 cm?

- A:-`6.25 Pi text{cm}^(2)`
- B:-`2.5 Pi text{cm}^2`
- C:-`25 Pi text{cm}^2`
- D:-`3.14 text{cm}^(2)`

Correct Answer:- Option-C

Question6:-What is $\sin 45^\circ$?

- A:-`sqrt(2)`
- B:-1
- C:-`sqrt(3)`
- D:-`1/sqrt(2)`

Correct Answer:- Option-D

Question7:-In a parallelogram one side is 15 cm and distance from this side to its opposite side is 9 cm, what is its area?

- A:-`135 text{cm}^(2)`
- B:-`67.5 text{cm}^(2)`
- C:-`80 text{cm}^(2)`
- D:-`24 text{cm}^(2)`

Correct Answer:- Option-A

Question8:-Find the value of `quad 0.05 + 1 1/2+2.45`

- A:-4
- B:-5
- C:-4.05
- D:-3.45

Correct Answer:- Option-A

Question9:-Find the value of `quad 2 8/11 + 3 4/12`

- A:-`quad 5 12/23`

B:-`200/33`

C:-`100/33`

D:-`90/43`

Correct Answer:- Option-B

Question10:-The trigonometric term 'Tangent' is originate from

A:-French

B:-Greek

C:-Latin

D:-Arabic

Correct Answer:- Option-C

Question11:-If $5^2 \times 5^4 \times 5^6 \times \dots \times 5^{2n} = (0.04)^{-28}$, text {what is the value of } 'n'?

A:-8

B:-7

C:-14

D:-12

Correct Answer:- Option-B

Question12:-30°, 60°, 90° are the angles of a triangle; opposite side of 30° is two metre, what is the length of side opposite to 60°?

A:-`sqrt(3)`

B:-`2/sqrt(3)`

C:-`2 sqrt(3)`

D:-`1/sqrt(2)`

Correct Answer:- Option-C

Question13:-A sector with radius 18 cm and centre angle 60°. While folding to make a cone, what will be the radius of that cone?

A:-3 cm

B:-9 cm

C:-30 cm

D:-36 cm

Correct Answer:- Option-A

Question14:-If $x_n = (n+1)^2 - (n-1)^2$, what is its x_{10} ?

A:-10

B:-12

C:-20

D:-8

Correct Answer:- Option-D

Question15:-Find the half of 2^{14} .

A:-`2^(7)`

B:-`1^(7)`

C:-`7^(2)`

D:-`2^(13)`

Correct Answer:- Option-D

Question16:-The sides of a triangle are 10 cm, 13 cm, 13 cm. What is its area?

A:-`60 text{cm}^(2)`

B:-`36 text{cm}^(2)`

C:-`130 text{cm}^(2)`

D:-`13 text{cm}^(2)`

Correct Answer:- Option-A

Question17:-Sum of first 'n' terms of an arithmetic sequence is $2n^2 + 3n$, what is its second term?

A:-9

B:-8

C:-10

D:-4

Correct Answer:- Option-A

Question18:-` $x^2 - x - 6 = 0$ ` , what are the two factors of this equation?

A:-` $(x+2)(x+3)$ `

B:-` $(x-3)(x+2)$ `

C:-` $(x-2)(x-3)$ `

D:-` $(x+3)(x-2)$ `

Correct Answer:- Option-B

Question19:-An equilateral triangle with one side 8 cm. What is the radius of its incircle?

A:-4

B:-6

C:- $\frac{4}{\sqrt{3}}$

D:-2

Correct Answer:- Option-C

Question20:-In a right angled triangle, small sides are 3.5 cm; 2.5 cm; what is its hypotenuse?

A:-6

B:-4.3

C:-3.5

D:-5.5

Correct Answer:- Option-B

Question21:-Which major port in India is known as "Offspring of Partition"?

A:-Haldia

B:-Kandla

C:-Nawashewa

D:-Mumbai

Correct Answer:- Option-B

Question22:-On which river in India does the Dhanu Dhar waterfall situate?

A:-Yamuna

B:-Mahanadi

C:-Kosi

D:-Narmada

Correct Answer:- Option-D

Question23:-Which soil in India is known as 'Self-Ploughing Soil'?

A:-Red soil

B:-Laterite soil

C:-Black soil

D:-Alluvial soil

Correct Answer:- Option-C

Question24:-Which among the following personality called Bharathappuzha "Sokanasini"?

A:-Kunchan Nambiar

B:-Ezhuthachan

C:-Vallathol

D:-M.T. Vasudevan Nair

Correct Answer:- Option-B

Question25:-The only Malayalee who was one among the eight personalities who prepared the "Bombay Plan"?

A:-E. Sreedharan

B:-V.K. Krishna Menon

C:-John Mathai

D:-M.S. Swaminathan

Correct Answer:- Option-C

Question26:-At which of the following central jail, Bhagat Singh was hanged to death?

A:-Alipur

B:-Lahore

C:-Amritsar

D:-Thihar

Correct Answer:- Option-B

Question27:-Who among the following organized the Ganapathi and Shivaji festivals to awaken mass consciousness?

A:-Bankim Chandra Chatterjee

B:-Swami Vivekananda

C:-Bal Gangadhar Tilak

D:-Surendranath Banerjee

Correct Answer:- Option-C

Question28:-Who is known as "India's Unofficial Ambassador to England"?

A:-Dadabhai Naoroji

B:-Surendranath Banerjee

C:-W.C. Banerjee

D:-Gopalakrishna Gokhale

Correct Answer:- Option-A

Question29:-The Women Unit of Indian National Army (INA) was

A:-Rani of Lakshmi

B:-Rash Bihari Bose

C:-Aruna Asaf Ali

D:-Rani of Jhansi

Correct Answer:- Option-D

Question30:-The partition of Bengal was in the year

A:-1905

B:-1911

C:-1885

D:-1909

Correct Answer:- Option-A

Question31:-Who was the author of "Jaathikkummi"?

A:-Dr. Pulpu

B:-Pandit Karuppan

C:-Kumara Guru

D:-Thycaud Ayya

Correct Answer:- Option-B

Question32:-Who was the founder of "God's Church of Visible Salvation"?

A:-Kuriakose Elias Chavara

B:-Pope John Paul II

C:-St. Alphonsa

D:-Poikayil Yohannan

Correct Answer:- Option-D

Question33:-The first president of Nair Service Society was

A:-K. Kelappan

B:-Mannath Padmanabhan

C:-Chattampi Swamikal

D:-Pattom Thanu Pillai

Correct Answer:- Option-A

Question34:-Aruvippuram consecration was in the year

A:-1928

B:-1903

C:-1856

D:-1888

Correct Answer:- Option-D

Question35:-What was the original name of Thycaud Ayya Guru?

A:-V.K. Gurukkal

B:-Muthukutty

C:-Subbarayan

D:-Shanmukhadasa

Correct Answer:- Option-C

Question36:-The 35th National Games was held at

A:-Assam

B:-Kerala

C:-Karnataka

D:-Manipur

Correct Answer:- Option-B

Question37:-Swachh Bharat Project was launched on

A:-1st March 2014

B:-1st January 2015

C:-1st February 2015

D:-2nd October 2014

Correct Answer:- Option-D

Question38:-Who is the Chief Minister of Bihar?

A:-Tarun Gogoi

B:-Nitish Kumar

C:-Dr. Raman Singh

D:-Manohar Lal

Correct Answer:- Option-B

Question39:-The Scheme "Project Arrow" is related to

A:-Rural Department

B:-Telephone Department

C:-Postal Department

D:-Forest Department

Correct Answer:- Option-C

Question40:-Kailash Satyarthi, the Nobel laureate belongs to which State?

A:-Andhra Pradesh

B:-Bihar

C:-Madhya Pradesh

D:-Assam

Correct Answer:- Option-C

Question41:-When a resistance wire is stretched twice its length, its area of cross-section reduced by half. Then its resistance

A:-increases twice

B:-increases 4 times

C:-reduces to half

D:-no change

Correct Answer:- Option-B

Question42:-In a p-type semiconductor, the majority carriers are

A:-electrons

B:-holes

C:-neutrons

D:-protons

Correct Answer:- Option-B

Question43:-When a white light undergoes dispersion through a triangular glass prism, the colour that deviates the most

A:-violet

B:-red

C:-indigo

D:-yellow

Correct Answer:- Option-A

Question44:-When an explosion occurs 6800m away from a man, then how long after its sound reaches the man (speed of sound in air is 340 m/s)

A:- 2 s

B:-6.8 s

C:-3.4 s

D:-20 s

Correct Answer:- Option-D

Question45:-Time taken by sunlight to reach the earth is approximately

A:-8½ minutes

B:-8½ seconds

C:-8½ hours

D:-8½ light years

Correct Answer:- Option-A

Question46:-A transformer works on

A:-Self induction

B:-Joule's heating effect

C:-Maxwell's law

D:-Mutual induction

Correct Answer:- Option-D

Question47:-Unit of electric power

A:-Volt

B:-Watt

C:-Ampere

D:-Newton

Correct Answer:- Option-B

Question48:-Einstein's mass-energy relation is

A:- $E=Mc^2$

B:- $E=Mc^2$

C:- $E=M^2c$

D:- $E=Mc/2$

Correct Answer:- Option-B

Question49:-When a body is lifted from the surface of the earth, acceleration due to gravity(g) on it

A:-increases

B:-remains the same

C:-first increases and then decreases

D:-decreases

Correct Answer:- Option-D

Question50:-During free fall of a body, its weight

A:-decreases

B:-increases

C:-no weight

D:-none of the above

Correct Answer:- Option-C

Question51:-A gas can be liquified by,

A:-High temperature and high pressure

B:-Low temperature and low pressure

C:-Low temperature and high pressure

D:-High temperature and low pressure

Correct Answer:- Option-C

Question52:-At constant pressure, the volume of a fixed mass of gas is directly proportional to its temperature in Kelvin scale. This is known as,

A:-Boyle's law

B:-Charles' law

C:-Avogadro's law

D:-Hentry's law

Correct Answer:- Option-B

Question53:-36g of water contains

A:- $2 \times 6.023 \times 10^{23}$ molecules

B:- 6.023×10^{23} molecules

C:- 6.023×10^{22} molecules

D:- $2 \times 6.023 \times 10^{22}$ molecules

Correct Answer:- Option-A

Question54:-Maximum number that can be accommodated in p subshell is,

A:-2

B:-6

C:-14

D:-10

Correct Answer:- Option-B

Question55:-The metal with maximum electropositivity is,

A:-K

B:-Na

C:-Fe

D:-Cs

Correct Answer:- Option-D

Question56:-An important ore of aluminium is,

A:-Dolomite

B:-Haematite

C:-Bauxite

D:-Carnalite

Correct Answer:- Option-C

Question57:-Maximum close packing can be seen in,

A:-Graphite

B:-Diamond

C:-Glass

D:-Liquids

Correct Answer:- Option-B

Question58:-Value of absolute zero is,

A:-273°C

B:-273°C

C:-0°C

D:-273K

Correct Answer:- Option-A

Question59:-The minimum energy required to remove the most loosely bound electron from an isolated gaseous atom is called its,

A:-Electronegativity

B:-Electropositivity

C:-Ionisation energy

D:-Electron gain enthalpy

Correct Answer:- Option-C

Question60:-Maximum number of electrons that can be accommodated in a shell is,

A:- $2n^2$

B:- n^2

C:- $2n$

D:- n

Correct Answer:- Option-A

Question61:-Which of the following is a unicellular green algae that is motile and with a light sensitive "eyespot"

A:-Chlamydomonas

B:-Hydra

C:-Spirogyra

D:-Chlorella

Correct Answer:- Option-A

Question62:-Plant hormone used in the ripening of fruits is

A:-Auxin

B:-Gibbrellin

C:-Ethylene

D:-Abscisic Acid

Correct Answer:- Option-C

Question63:-A viral disease of plant that spreads through aphides in the following is

A:-Coconut budrot

B:-Bunchytop of banana

C:-Wilt of brinjal

D:-Quick wilt in pepper

Correct Answer:- Option-B

Question64:-Light sensitive proteinacious pigment in plant involved in photomorphogenesis is

A:-Cytochrome

B:-Chlorophyll

C:-Phytohormone

D:-Phytochrome

Correct Answer:- Option-D

Question65:-Flowering plants are included under the group

A:-Phanerogams

B:-Cryptogams

C:-Bryophytes

D:-Lichens

Correct Answer:- Option-A

Question66:-Water and minerals are principally transported in angiosperms through

A:-Xylem parenchyma

B:-Xylem tracheids

C:-Xylem vessels

D:-Xylem fibres

Correct Answer:- Option-C

Question67:-Growth movement of plants in response to gravity is called

A:-Phototropism

B:-Hydrotropism

C:-Chemotropism

D:-Geotropism

Correct Answer:- Option-D

Question68:-Male reproductive organs of a flower are called

A:-Androecium

B:-Gynoecium

C:-Calyx

D:-Corolla

Correct Answer:- Option-A

Question69:-The structure meant for the nourishment of developing embryo in a seed is

A:-Phloem

B:-Pollentube

C:-Leaves

D:-Endosperm

Correct Answer:- Option-D

Question70:-The plant selected by G J Mendel for his genetic experiment is

A:-4' O Clock plant

B:-Garden pea

C:-Sweet pea

D:-Snap dragon

Correct Answer:- Option-B

Question71:-Deficiency of Tocopherol in human body leads to,

A:-Beriberi

B:-Pellagra

C:-Infertility

D:-Scurvy

Correct Answer:- Option-B

Question72:-Example for a uricotelic animal

A:-kangaroos

B:-bony fish

C:-cockroach

D:-frog

Correct Answer:- Option-C

Question73:-The part of brain which controls respiration

A:-cerebrum

B:-cerebellum

C:-medulla oblongata

D:-pons

Correct Answer:- Option-C

Question74:-Acromegaly is due to

A:-hypersecretion of growth hormone

B:-hyopsecretion of growth hormone

C:-hypersecretion of ACTH

D:-hyopsecretion of ACTH

Correct Answer:- Option-A

Question75:-A child's blood group is O.The parents blood group can not be

A:-A and B

B:-A and A

C:-AB and O

D:-B and O

Correct Answer:- Option-C

Question76:-The nitrogen base which pair with adenine in DNA

A:-uracil

B:-thymine

C:-cytosine

D:-guanine

Correct Answer:- Option-B

Question77:-Which one of the following is the most primitive ancestor of man ?

A:-Homo habilis

B:-Australopithecus

C:-Neanderthal man

D:-Ramapithecus

Correct Answer:- Option-D

Question78:-Kala azar is a disease caused by

A:-fungus

B:-bacteria

C:-virus

D:-protozoa

Correct Answer:- Option-D

Question79:-Majority of Carbon dioxide in human body is transported to lungs

A:-as bicarbonates

B:-as carbonic acid

C:-attached to haemoglobin

D:-attached to leucocytes

Correct Answer:- Option-A

Question80:-Which of the following is a true fish ?

A:-cuttle fish

B:-silver fish

C:-jelly fish

D:-flying fish

Correct Answer:- Option-D

Question81:-One of the girls a badminton player.

A:-are

B:-is

C:-were

D:-have been

Correct Answer:- Option-B

Question82:-I am clever,.....?

A:-aren't I?

B:-amn't I?

C:-shall I?

D:-do I?

Correct Answer:- Option-A

Question83:-Raju told me that heto go home that day.

A:-wants

B:-will want

C:-has wanted

D:-wanted

Correct Answer:- Option-D

Question84:-Shakespeareas the greatest playwright.

A:-is regarded

B:-is regarding

C:-regards

D:-has regarded

Correct Answer:- Option-A

Question85:-Gita is writing an essaythe new economic policy.

A:-at

B:-on

C:-with

D:-to

Correct Answer:- Option-B

Question86:-If I got a lot of money, Ibuy an aeroplane.

A:-would

B:-will

C:-shall

D:-would have

Correct Answer:- Option-A

Question87:-Mr. Smith, the only foreigner in our group, isEuropean.

- A:-an
- B:-a
- C:-the
- D:-any

Correct Answer:- Option-B

Question88:-My parentsParis last month.

- A:-have visited
- B:-will have visited
- C:-visited
- D:-has visited

Correct Answer:- Option-C

Question89:-Nina isthan Anil.

- A:-clever
- B:-cleverest
- C:-most clever
- D:-cleverer

Correct Answer:- Option-D

Question90:-We tried our best, butnot win the match.

- A:-could
- B:-should
- C:-may
- D:-can

Correct Answer:- Option-A

Question91:-The teacher wanted the students tothe important points.

- A:-take after
- B:-take off
- C:-take down
- D:-take into

Correct Answer:- Option-C

Question92:-'Maiden speech' means

- A:-a maid's speech
- B:-ready-made speech
- C:-first speech
- D:-a girl's speech

Correct Answer:- Option-C

Question93:-.....is the one word substitute for 'the pen name adopted by a writer'.

- A:-synonym
- B:-pseudonym
- C:-antonym
- D:-homonym

Correct Answer:- Option-B

Question94:-Which prefix can be used to form the opposite of the word 'gratitude'?

- A:-un
- B:-mis
- C:-dis
- D:-in

Correct Answer:- Option-D

Question95:-Prima facie means

- A:-beautiful face
- B:-prim and proper
- C:-at first view
- D:-prime time

Correct Answer:- Option-C

Question96:-The story is about abetween two brothers.

- A:-duel
- B:-duet
- C:-dual
- D:-dude

Correct Answer:- Option-A

Question97:-Which of the following is the correct spelling?

- A:-asassination
- B:-asasination
- C:-assasination
- D:-assassination

Correct Answer:- Option-D

Question98:-A group of lions is known as.....

- A:-swarm
- B:-flock
- C:-team
- D:-pride

Correct Answer:- Option-D

Question99:-The plural form of the word 'criterion' is

- A:-criterions
- B:-criteria
- C:-criterias
- D:-criterion

Correct Answer:- Option-B

Question100:-Which of the following is the synonym of 'attentive'?

- A:-attractive
- B:-servant
- C:-watchful
- D:-tentative

Correct Answer:- Option-C