A Specially Designed Initiative to Encourage Young Talent by



TALLENTEX 2017 : (09, October 2016)

PAPER CODE





CLASS - 9th (IX)

Duration: 2 Hrs. | Maximum Marks: 320

Tallentex Roll No. **Answer Sheet No.**

Please read the instructions carefully. You are allotted 5 minutes specifically for this purpose.

Things NOT ALLOWED in EXAM HALL: Blank Paper, clipboard, log table, slide rule, calculator, camera, mobile and any electronic or electrical gadget. If you are carrying any of these, then keep them at a place specified by invigilator at your own responsibility.

INSTRUCTIONS

- This Booklet is your Question Paper. DO NOT break seal of Booklet until the invigilator instructs to do so.
- Fill your TALLENTEX Roll No. & Answer Sheet No. in the space provided on the cover page. 2.
- 3. Carefully fill your **PAPER CODE** and present **CLASS** in space provided **(Serial No. 6 & 12)** of optical response sheet.
- 4. Please make sure that paper you received is of your class only.
- 5. The Answer Sheet is provided to you separately which is a machine readable Optical Response Sheet (ORS). You have to mark your answers in the ORS by darkening bubble, as peryour answer choice, by using black or blue ball point pen.
- 6. After breaking the Question Paper seal, check there are **16 pages** in the booklet. This Question Paper contains 80 MCQs with 4 choices (Subjects: Physics: 15, Chemistry: 15, Biology: 15, Maths: 15 & Mental ability: 20).
- 7. Think wisely before darkening bubble as there is negative marking for wrong answer. Answer once marked by pen cannot be cancelled.
- 8. Marking Scheme:
 - a. If darkened bubble is RIGHT answer: 4 Marks.
 - b. If darkened bubble is WRONG answer: -1 Mark (Minus One Mark).
 - c. If no bubble is darkened in any question: No Mark.
- 9. If you are found involved in cheating or disturbing others, then your ORS will be cancelled.
- 10. Do not put any stain on ORS and hand it over back properly to the invigilator.
- 11. You can take along the question paper after the test is over.

ALLEN RESULT: JEE ADVANCED-2016

4 in Top 10 | 12 in Top 50 | 25 in Top 100 AIR



AIR: 2

Bhavesh Dhingra Classroom

AIR: 3



Kunal Goyal Classroom



Gaurav Didwania Classroom



Rohan Garg Classroom



Animesh Bohra Distance



Ritesh Goenka Classroom

AIR: 27



Vikrant Garg Classroom

AIR: 29

Sharvik Mittal Classroom

AIR: 33

Ishan Tarunesh Distance



Naman Jain Classroom



Sushil Khvalia Classroom

Total Selections

Classroom: 2857 | Distance: 1026

ALLEN RESULT: NEET (UG)-2016

7 in Top 10 | 35 in Top 50 | 58 in Top 100 AIR





Ekansh Goyal



Classroom





Prakhar Bansal Classroom



Classroom **AIR: 13**



Lajjaben Patel

Classroom



AIR: 15



Ashank Khaitan Distance

Gurasis Singh

Distance



Dyuti Shah Distance **AIR: 18**

Swetank Anand

Classroom



Japnoor Kaur Distance



Utkarsh Anand Classroom



Mahak Kr. Surana Classroom



Prachi Singh Classroom

Total Qualified

Classroom : 26198 | Distance : 6908

Authenticity of Result: Power of ALLEN

ALLEN RESULT: AIIMS-2016

8 in Top 10 | 25 in Top 36



AIR: 3 AIR: 4



Lajjaben Patel Classroom



Het Sanjay Shah Classroom



Mridul Sharma Classroom



Distance



Aishvary Gupta Classroom



Kushagra Pandey Distance



Classroom





Ira Pachori



Ritik M Goyal



Amol Sood





Ashank Khaitan Dhruvil D. Shah







Sanil Garg



Distance



Vishal Saini Distance



Gurasis Singh Distance



Manavi Gupta Classroom



Anubhav Das



Prachi Singh Classroom



Japnoor Kaur Distance



Ayush Jain Classroom



Sukriti Chaudhri Distance

Total Qualified

Classroom : **405** | Distance : **197**

ALLEN RESULT: JEE Main-2016

8 in Top 100 | 25 in Top 200 | 65 in Top 500 | 136 in Top 1000



AIR-105



Megh V. Thakkar Shashwat Agrawal



Rohan Garg

Classroom



Amey Ravindra Patil Akash Bhardwaj Rahul Agrawal Distance Classroom



Classroom

AIR-137









Sharvik Mital Shashwat Shivam Ankit Dhankhar



Sukriti Gupta Georgi Joseph Boby

AIR-169



Rushikesh Vitthal Distance



AIR-177

Koustav Yacha Classroom



Rahul M. Chanduka Classroom

Students secured JEE Main All India Ranks from all Courses of ALLEN



Gavali H. Abhiman Distance



Distance

Atri Dutta



Vansh J. Chiripal Classroom

TALLENTEX Success Power Session & Rewards Ceremony (29 November 2015)

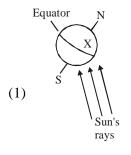


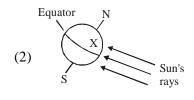


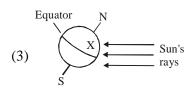
SECTION - A: PHYSICS

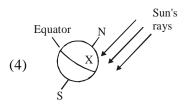
This section contains **15 Multiple Choice Questions**. Each question has four choices (1), (2), (3) and (4) out of which ONLY ONE is correct.

1. Which of the following diagrams best represents the angle at which the Sun's rays strike location X at noon on June 21?

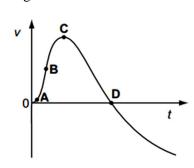








2. The graph shows how the velocity 'v' of a firework rocket changes with time t. At which point on the graph does the rocket have the greatest acceleration?



(1) A

(2) B

(3) C

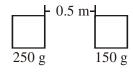
- (4) Γ
- 3. Which diagram correctly represents reflection of light along an optical fibre?
 - (1)
- (2)
- (3)
- (4)
- **4.** A bomb at rest explodes into two pieces of equal mass. Then the pieces will fly off
 - (1) in the same direction with equal speeds
- (2) in the same direction with unequal speeds
- (3) in opposite direction with equal speeds
- (4) in opposite directions with unequal speeds
- **5.** If the velocity of car is increased by 20% then the minimum distance in which it can be stopped increases by
 - (1) 44%
- (2) 55%
- (3) 66%
- (4) 88%



- **6.** A sound tone is produced in water, when it enters air
 - (1) λ decreases, and f does not change
- (2) both λ and f increase

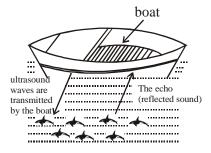
(3) both λ and f decrease

- (4) λ increases and f does not change
- 7. What event will produce the greatest increase in the gravitational force between the two masses?



- (1) doubling the large mass
- (2) doubling the distance between the masses
- (3) reducing the small mass by half
- (4) reducing the distance between the masses by half.
- **8.** The diameter of Saturn is almost ten times that of the Earth, yet its density is much less. This can best be explained by the fact that Saturn
 - (1) is farther from the Sun

- (2) is a gaseous planet
- (3) has a shorter period of rotation
- (4) has a ring around its center
- 9. A fish finder sends ultrasonic waves down the water to determine the location of the fish.



The same principle of reflection of sound is used in

(1) Sonic boom

(2) Sonar

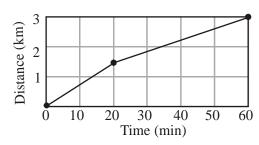
(3) Echocardiography

- (4) Ultrasonography
- **10.** If the density of earth increases by 20% and radius decreases by 20% then the new value of "g" on the surface of earth will be :
 - (1) 0.8 g
- (2) 0.90 g
- (3) 0.96 g
- (4) g
- 11. A plane mirror forms a virtual image. The distance between Mahima and her image in a plane mirror is 10 m. How much distance should she move in order to get the distance of 5 m between herself and her image?
 - (1) 2.5 m away form the mirror
- (2) 2.5 m towards the mirror

(3) 5 m away form the mirror

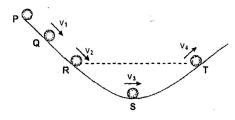
(4) 5 m towards form the mirror

12. The graph below shows distance over time.



Which of these situations could be represented by this graph?

- (1) A student walks 1.5 km to a friend's house in 40 minutes. The two students then walk another 1.5 km to school in 20 minutes.
- (2) A student walks 1.5 km to a friend's house in 20 minutes. The two students then walk another 1.5 km to school in 40 minutes.
- (3) A student walks 1.5 km to a friend's house in 30 minutes. The two students then walk another 1.5 km to school in 30 minutes.
- (4) A student walks 1.5 km to a friend's house in 20 minutes. The two students then walk another 1.5 km to school in 60 minutes.
- **13.** P,Q,R,S and T are five points on a smooth curved rail. Point R is directed along point T as shown in the diagram.



A marble released from rest at point P slides along the rail. The speeds of the marble at points Q, R, S and T are v_1 , v_2 , v_3 and v_4 respectively. Then which of the following relation is correct?

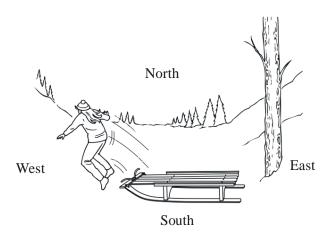
$$(1) v_4 > v_3 > v_2 > v_1$$

$$(2) v_1 > v_2 > v_3 > v_4$$

(3)
$$v_4 = v_2 > v_3 > v_1$$

(4)
$$v_3 > v_4 = v_2 > v_1$$

14. A student jumps off a sled toward the west after it stops at the bottom of an icy hill.



In what direction will the sled most likely move as the student jumps off?

- (1) North
- (2) South
- (3) East
- (4) West



15.	The minute hand of a clock is 4 cm long. The average velocity of the tip of the minute hand between 11:00 am to 11:30 am is						
	(1) $1.5 \times 10^{-5} \text{ m/s}$	(2) $4.5 \times 10^{-5} \text{ m/s}$	(3) $1.8 \times 10^{-6} \text{ m/s}$	(4) $3.5 \times 10^{-6} \text{ m/s}$			
		SECTION-B	: CHEMISTRY				
This	section contains 15 Mu	Itiple Choice Questions	Each question has four of	choices (1), (2), (3) and (4) out			
of w	hich ONLY ONE is co	rrect.					
16.	Arrange the different	types of coal in the inc	reasing order of their qu	iality.			
	(a) Lignite	(b) Peat	(c) Anthracite	(d) Bituminous			
	(1) acdb	(2) dbca	(3) badc	(4) bcda			
17.	German silver is an a	lloy of					
	(1) Cu, Ni and Sn	(2) P, Cu and Ag	(3) Cu, Zn and Sn	(4) P, Cu and As			
18.	Element used for make	king solar cells, transisto	ors and computer chips i	is			
	(1) Phosphorus	(2) Silicon	(3) Iron	(4) Sulphur			
19.	Total amount of heat	produced by a fuel havi	ng calorific value of 30	kJ/kg was found to be 60,000			
	Joules. How much fu	el was burnt ?					
	(1) 2000 kg	(2) 200 kg	(3) 20 kg	(4) 2 kg			
20.	Forest fire is an example of						
	(1) slow combustion		(2) rapid combustion				
	(3) spontaneous comb	oustion	(4) explosion				
21.	The liquid and its vapours at boiling point are at equilibrium. The molecules of the two phases have						
	equal						
	(1) potential energy	(2) forces	(3) total energy	(4) kinetic energy			
22.	The boiling points of diethyl ether, acetone and n-butyl alcohol are 35°C, 56°C and 118°C respectively						
	Which one of the foll	owing correctly represe	nts their boiling points i	in kelvin scale?			
	(1) 306 K, 329 K, 39	1 K	(2) 308 K, 329 K, 39	92 K			
	(3) 308 K, 329 K, 39	1 K	(4) 329 K, 392 K, 30	08 K			
23.	The solubility of potassium chloride in water at 20°C is 34.7 g in 100 g of water. The density of solution						
	is 1.3 g/ml. Calculate	the % of mass/volume	concentration of potassi	um chloride.			
	(1) 25.76%	(2) 33.49%	(3) 24.7%	(4) 1.3%			
24.	Which one of the following processes results in the formation of a new chemical compound?						
	(1) Dissolving commo	on salt in water	(2) Heating water				
	(3) Heating platinum	rod	(4) Heating calcium of	carbonate			
25.	Water is used to extin	nguish fire because water	er				
	(1) raise the ignition	(1) raise the ignition temperature of the burning substance.					
	(2) lowers the ignition	n temperature of the bu	rning substance.				
	(3) cools the burning substance to a temperature below its ignition temperature.						
	(4) conducts the heat.						



26. The table shows the melting and boiling points of four pure substances. Which substance is a liquid at room temperature and rapidly evaporates if left exposed to air?

Substance	Melting point/°C	Boiling point/°C
A	-100	-35
В	-7	58
C	-6	225
D	44	280

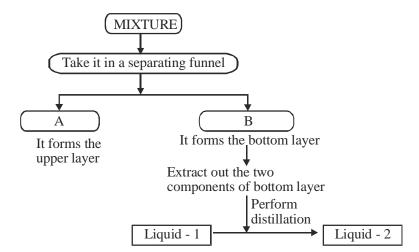
(1) A

(2) B

(3) C

- (4) D
- 27. Goldsmith uses ____ zone of the flame for melting gold.
 - (1) Outermost zone
- (2) Middle zone
- (3) Innermost zone
- (4) Both (2) & (3)
- 28. Arrange the given combustible substances in decreasing order of calorific value.
 - (a) Hydrogen
- (b) Charcoal
- (c) Petrol

- (d) L.P.G
- (e) Wood
- (1) b c a d e
- (2) a d c b e
- (3) b a d e c
- (4) b a c e d
- 29. Which of the following statements is true about the evaporation of water from an open container?
 - (1) Evaporation is slower when there is a breeze.
 - (2) Evaporation takes place faster on a humid day.
 - (3) The process of evaporation gives off energy.
 - (4) Some water particles leave the surface and become part of the air.
- **30.** Identify A and B in the given flow-chart.



- (1) (A)-Kerosene and Water, (B)-Common salt
- (2) (A)-Oil and Water, (B)-Common salt
- (3) (A)-Oil, (B)-Alcohol and Water
- (4) (A)-Water, (B)-Common salt and Oil



SECTION-C: BIOLOGY

This section contains **15 Multiple Choice Questions.** Each question has four choices (1), (2), (3) and (4) out of which ONLY ONE is correct.

31. Who is/are "Father of Green Revolution"?

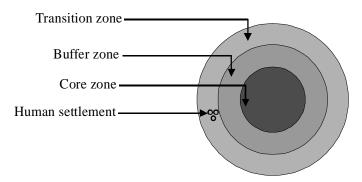


Norman borlaug



Dr. V. Kurein

- (3) Norman borlaug and Dr. V. Kurein both are the Father of Green Revolution.
- (4) None of these
- 32. Select the zone from the below image where no human activity is allowed.



- (1) Transition zone
- (2) Core zone
- (3) Buffer area
- (4) None of the above
- **33.** Shown here are some drawings of structures that are found in our bodies. They are all at different magnifications.



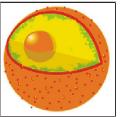
Blood vessel



Thyroid gland



Organs



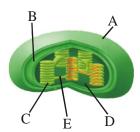
Nucleus of a cell

Which one of them is drawn at the highest magnification?

- (1) Blood vessel
- (2) Thyroid gland
- (3) Organs
- (4) Nucleus of a cell



34. Identify A to E in the sectional view of a chloroplast given below.



- (1) A-Inner membrane, B-Granum, C-Outer membrane, D-Stromal lamellae E-Stroma
- (2) A-Outer membrane, B-Inner membrane, C-Thylakoid D-Stroma, E-Stromal lamellae
- (3) A-Thylakoid, B-Outer membrane, C-Stroma, D-Stromal lamellae, E-Granum
- (4) A-Outer membrane, B-Stroma, C-Inner membrane, D-Granum, E-Thylakoid
- 35. Which of the following option is correct regarding the diagram given below?



Sprinkler system of irrigation

- (1) It is useful for sandy soil and even land.
- (2) It is useful for loamy soil and even land.
- (3) It is useful for loamy soil and uneven land.
- (4) It is useful for sandy soil and uneven land
- **36.** Find out the correct sentences about manure.
 - (i) Manure reduces soil erosion.
 - (ii) Manure improves the texture of soil by adding organic matter.
 - (iii) Manure decreases water holding capacity.
 - (iv) Manure decreases the number of friendly microbes.
 - (1) (i) and (iii)

(2) (i) and (ii)

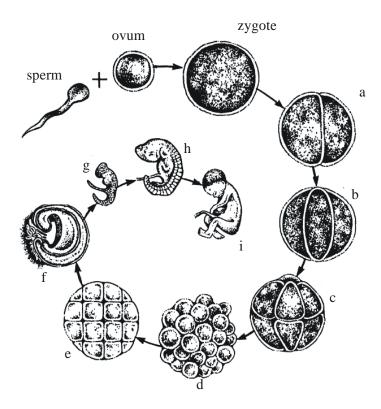
(3) (ii) and (iii)

(4) (iii) and (iv)

- **37.** The Black Rhino is killed for its
 - (1) Ivory
- (2) Fur
- (3) Horn
- (4) Meat



38. The new baby's genetic / inherited material is carried in the



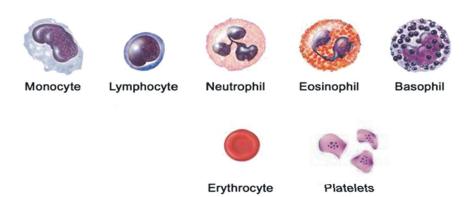
(1) sperm cell

(2) ovum

(3) sperm cell and ovum

- (4) sperm and body cell
- **39.** Which of the following blood cells are phagocytic in nature?

Blood Cells



- (1) Eosinophil and Basophil
- (3) Lymphocyte and Platelet

- (2) Erythrocyte and Monocyte
- (4) Neutrophil and Monocyte



- **40.** Which of the following practices involve in organic farming?
 - (1) Use of biofertilizers

(2) Crop rotation

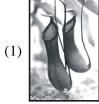
(3) Both (1) and (2)

- (4) Use of chemical pesticides
- 41. Use of contraceptive pills by female inhibits which step of reproductive cycle
 - (1) Ovulation

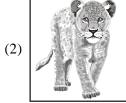
(2) Ejaculation

(3) Insemination

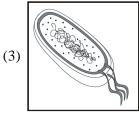
- (4) Fertilization
- **42.** There are some microorganisms which decompose the waste products and remain of dead plant and animals. This helps in keeping the environment clean. Which of the following can do this?



Pitcher plant



Tiger

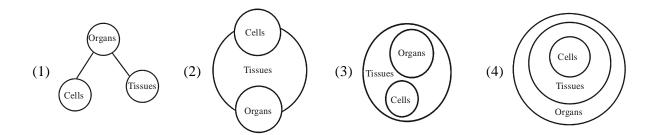


Bacteria

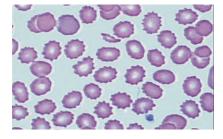


Tree

43. Which diagram best illustrates the relationship among the number of cells, tissues, and organs in a complex multicellular organism?



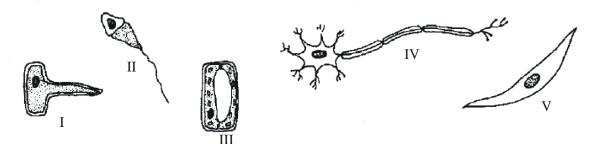
44. Study the diagram given below. In this diagram RBC's show crenation then this solution will be



- (1) Hypotonic(3) Hypertonic
- (2) Isotonic
- (4) None of these



Living organisms are madeup of building blocks called cells. They may differ in size, in the way they **45.** look and in what they are used for. Look at the pictures of different cells.



Which diagrams represent plant cells?

- (1) III and IV
- (2) II and V
- (3) I and III
- (4) I and IV

SECTION-D: MATHEMATICS

This section contains 15 Multiple Choice Questions. Each question has four choices (1), (2), (3) and (4) out of which ONLY ONE is correct.

- 46. The unit's digit in the product of first 50 odd natural numbers is
 - (1) 0

(2) 5

(3) 7

- (4) None of these
- Find the quotient if we divide $x^7y xy^7$ by $(x+y)(x^2 xy + y^2)$ 47.
- (1) $xy(x^3 + y^3)$ (2) $(x^3 + y^3)$ (3) $xy(x^3 y^3)$ (4) $(x^3 y^3)$

- **48.** If 3^{x+3} . $9^{2x-5} = 3^{3x+7}$, then the value of x is
 - (1) 3

(2) 4

(3) 6

- (4) 7
- Factorize : $p^2 + q^2 a^2 b^2 + 2pq + 2ab + p + q a + b$ 49.

 - (1) (p + q a + b)(p + q + a b + 1) (2) (p q a + b)(p q + a b + 1)
 - (3) (p + q + a + b)(p + q + a b + 1) (4) (p + q a b)(p + q + a b + 1)
- If $r^3 = 1728$ and $s = (6859)^{1/3}$, then $s^2 r^2$ is **50.**
 - (1) 217
- (2) 341
- (3) 534
- (4) 231

- The number $107^{90} 76^{90}$ is divisible by **51.**
 - (1) 61
- (2) 62
- (3) 64
- (4) None of these
- What is the value of $x^3 3b^{\frac{2}{3}}x + 9a$, if $x = \left(2a + \sqrt{4a^2 b^2}\right)^{1/3} + \left(2a \sqrt{4a^2 b^2}\right)^{1/3}$? 52.
 - (1) 12a
- (2) 13a
- (3) 14a
- (4) None of these

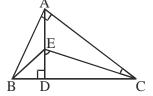


- **53.** Find $x : [3+\{2+(1+x^2)^2\}^2]^2 = 144$
 - (1) 1

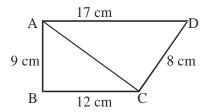
(2) 0

(3) 5

- (4) 6
- 54. If a wire is bent into the shape of a square, then the area of the square is 81 sq. cm. When the wire is bent into a semi-circular shape, the area of the semi-circle will be: $(take \ \pi = \frac{22}{7})$
 - (1) 22 cm²
- (2) 44 cm²
- (3) 77 cm²
- (4) 154 cm²
- **55.** In $\triangle ABC$, if $\angle ABD = 64^{\circ}$, what is the measure of $\angle DEC \angle ACE$?
 - $(1) 66^{\circ}$
 - (2) 64°
 - $(3) 60^{\circ}$
 - (4) 54°



- **56.** ABCD is a parallelogram in which $\angle DAO = 40^{\circ}$, $\angle BAO = 35^{\circ}$ and $\angle COD = 65^{\circ}$ where point O is intersection point of diagonals then $\angle ODC = \dots$
 - $(1) 80^{\circ}$
- (2) 105°
- $(3) 25^{\circ}$
- (4) None of these
- 57. If two lines intersect X axis at (-1, 0) and (10, 0) and Y axis at (0, 1) and (0, 10) and intersect each other at (4, 5) then find the difference between area of triangle formed by the lines along with X axis and area of triangle formed by lines along with Y axis.
 - (1) $\frac{19}{2}$ sq units
- (2) 7 sq units
- (3) 14 sq units
- (4) None of these
- **58.** Three pumps working 8 hours a day can empty a tank in 2 days. How many hours a day must 4 pumps work to empty the tank in 1 day?
 - (1) 13 hours
- (2) 12 hours
- (3) 10 hours
- (4) 9 hours
- **59.** If the area of the quadrilateral ABCD ($\angle B=90^{\circ}$) is $(a+20\sqrt{b})$ cm² (where a is area of $\triangle ABC$), then the value of a+b is



- (1) 54
- (2) 63
- (3)85
- (4) none of these

- **60.** Factorize $(x + y + z)^2 (x + y z)^2$
 - (1) 2(x + y + z)(x + y z)

(2) (x + y + z) (x + y - z)

(3) 4z(x + y)

(4) (x + y + z) (x - y - z)

SECTION-E: MENTAL ABILITY

This section contains **20 Multiple Choice Questions.** Each question has four choices (1), (2), (3) and (4) out of which ONLY ONE is correct.

- 61. Kunal travels 10 m from his shop and turns to his left. After that he turns to right from the crossing. After moving certain yards, he turns to left and again turns to left after moving some distance. Finally, he turns to right. If at final position he is facing North direction, then which direction he was facing while coming out of his shop?
 - (1) South
- (2) West
- (3) East
- (4) North
- **62.** Two ladies and two men are playing a bridge game (cards) and are seated around a square table. No lady is facing towards East. Persons sitting opposite to each other are not of the same sex. One man is facing towards South. Which directions are the ladies facing?
 - (1) East and West

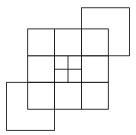
(2) South and East

(3) North and East

- (4) North and West
- **63.** In a certain code language, QUEUE is written as Q22, and CHURCH is written as 1UR1. Which of the following would be most appropriate code for BANANA in that language?
 - (1) B5A5
- (2) 5N5A
- (3) B55A
- (4) BA5A5A
- **64.** Kritik ranked 16th from the top and 29th from the bottom among those who has passed an examination. Six children do not participate in the examination and five failed in it. How many children are there in the class ?
 - (1) 40
- (2) 44
- (3) 50
- (4) 55
- 65. Two equi dimensional cubes are joined face to face and are coloured red on all of their available open faces. One cube is then cut into eight equal smaller cubes and the other cube is cut into 27 smaller cubes. How many smaller cubes have two of their faces coloured?
 - (1)10

- (2) 12
- (3) 16
- (4)18

66. Find the number of squares in the given figure.



- (1) 19
- (2) 20
- (3) 18
- (4) 16



67.	In a certain coo	de KETTLE is	coded as	252235,	ROUGH	is coded	as 9637	8. What is	s the	code	of
	TALENT?										

- (1) 213562
- (2) 251362
- (3) 213552
- (4) 251335
- **68.** Find the alternative figure which contains figure (X) as its part.









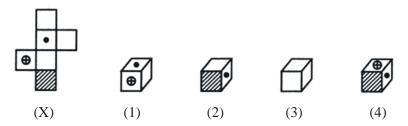


69. A series of small letters is given which follow a certain pattern. However some letters are missing from the series. You have to find out the right set of letters from alternative that can be inserted into the blanks of the series.

_a_b_abaa_bab_abba

- (1) aaabb
- (2) ababb
- (3) babab
- (4) babba

70. Choose the box that is similar to the box formed from the given sheet of paper (X):



- (1) 1 only
- (2) 1 and 3 only
- (3) 1, 3 and 4 only
- (4) 1, 2, 3 and 4

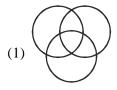
71. If a means +, b means - , c means \times and d means \div , then

16 c 12 b 6 d 2 a 17 = ?

- (1) 172
- (2) 192
- (3) 206
- (4) None of these

72. Out of the four figures that follow, you are to indicate which figure will best represent the relationship amongst the three classes.

"Boys, Students, Athletes"









73. Find the missing character in the given figure.

6	7	17
8	8	20
2	3	?

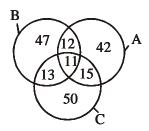
(1) 7

(2) 16

(3) 10

(4) 45

74. There are three circles A, B and C in the figure, which represents the number of students who got distinction in Physics, Chemistry and Mathematics respectively. The total number of candidates passed is 500. Observe the diagram given below and find out the total percentage of students who got distinction in all the three subjects?



(1) 7.2

(2) 5.2

(3) 3.2

(4) 2.2

75. Pointing to a woman, a girl said, 'She is the only daughter-in-law of the grandmother of my father's son'. How is the woman related to the girl?

(1) Sister

(2) Cousin

(3) Mother

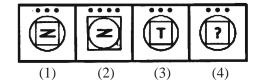
(4) Aunt

76. Pick up from the answer figures, one which will continue the series to the problem figures.

Problem figures

Answer figures





77. If A + B means 'A is the daughter of B'

 $A \times B$ means 'A is the son of B'.

A - B means 'A is the wife of B'.

Given $T - S \times B - M$, which of the following is not true?

(1) B is the mother of S.

(2) M is the husband of B.

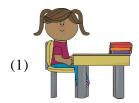
(3) S is the daughter of B.

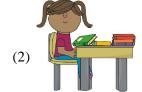
(4) T is the wife of S.



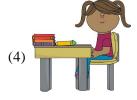
78. Choose the Mirror Image of the given figure (X).











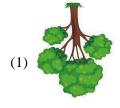
79. Find the missing number in the series.

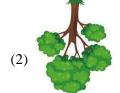
13, 16, 22, 26, 38, 62, ?, 102

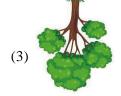
- (1) 74
- (2) 89
- (3) 70
- (4) 90

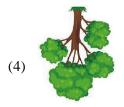
80. Choose the Water Image of the given figure (X).













SPACE FOR ROUGH WORK

ALLEN System



Orientation Session



Classroom Session



Prarthana



Open Session & Medal Distributions



Regular Test



Test Result - (CSAT)



Continuous Communication



Doubt Removal Counters



Online Practice Lab

Comprehensive Study Material	Ultimate Care	Board Work Sheets, Booklets
RACE : Regular Analysis through Continuous Exercise	Best Faculties	Expert Counselling



ALLEN Students Bring Glory to Nation through their International Achievements-2016

International Chemistry Olympiad



48th International Chemistry Olympiad IChO-2016 TBILISI, GEORGIA



Silver Medal SHARVIK MITTAL

International Physics Olympiad



47th International Physics Olympiad IPh0-2016 **SWITZERLAND**



Silver Medal DIVYANSH GARG (Classroom)

International Biology Olympiad



27th International **Biology Olympiad** IBO-2016 HANOI, VIETNAM



LAJJA BEN PATEL



Silver Medal VIDUSHI VARSHNEY

International Earth Science Olympiad



10th International Earth Science Olympiad (IESO) 2016 JAPAN



Silver Medal AMARJIIT VIKAS PANDE

ALLEN Results: Pre-Nurture & Career Foundation (2015-16)

STAGES OF OFFICIAL OLYMPIADS MENTORED BY HBCSE

IJSO

STAGE 1

35 Selections in NSEJS STAGE 2

16 Selections in INJSO STAGE 3

3 Selections in OCSC **NISHANT ABHANGI AYUSHMAN TRIPATHY GAURANG**

selected for IJSO 2016

International **Junior Science Olympiad**



IB0

STAGE 1

3 Selections in NSEB STAGE 2

3 Selections in INBO

3 Selections in OCSC **VIDUSHI VARSHNEY Got Silver Medal In**

International **Biology Olympiad**

JEEVESH is the youngest in the country so far to qualify stage-1 of IB0

IChO

STAGE 1 1 Selection in NSEC

DHYEY SANKALP GANDHI

is the youngest in the country so far to qualify stage-1 of ICh0

International Chemistry **Olympiad**



IOAA

STAGE 2 **RAYYAN SHAHID** selected in **INJAO 2016**

International Astronomy Olympiad Junior





IMO

STAGE 1

IBO 2016

190 Selections from Gujarat & 11 from

Maharashtra for RMO through PRE RMO.

3 STUDENTS SECURED 100% MARKS STAGE 2

14 Selections in RMO for INMO

International



Maths

Olympiad

IESO

STAGE 1

NET - 6 Selections Conducted by Geological Society of India

International **Earth Science** Olympiad



IJSO

IJSO-2015



12th International **Junior Science Olympiad** (IJSO) 2015 **KOREA**



Gold Medal BHASKAR GUPTA (Classroom)



Gold Medal LAKSHYA SHARMA (Classroom)



Silver Medal VIDUSHI VARSHNEY (Classroom)

International Junior Science Olympiad

APTITUDE IN SCIENCE / MATHEMATICS

NSO

571 Selections in NSO (Level-1)

NISHANT ABHANGI: AIR-1 (Level-2) NSO National Science Olympiad

Conducted by Science Olympiad Foundation, New Delhi



STSE 2015

36 Selections for Scholar Certificate

155 Selections for Distinction Certificate

Conducted by Rajasthan Board of Secondary Education STSE
State Talent
Search
Examination



NSTSE

232 Selections in NSTSE (Level-1)

63 Selections in NSTSE (Level-2)

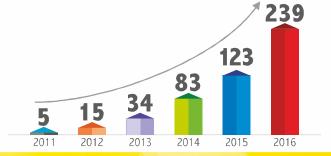
NISHANT ABHANGI: AIR-1 (Level-2) NSTSE
National
Science Talent
Search
Examination

Conducted by Unified Council, Hyderabad Test - Assest - Achieve

NTSE

239 Students
Selected
From ALLEN

NTSE 2016 (STAGE-2)



APTITUDE IN MATHEMATICS

NMTC

274 Selections in NMTC (Prelim)

17 Selections in NMTC (Final)

NMTC

National Mathematics Talent Contest

Conducted by Association of Mathematics Teachers of India, Chennai



IMO (SOF)

370 Selections in IMO (Level-1)

IMO International Mathematics Olympiad

Conducted by Science Olympiad Foundation, New Delhi



APTITUDE IN INFORMATION TECHNOLOGY

UCO

140 Selections in UCO (Level - 1)

59 Selections in UCO (Level - 2)

UCO Unified Cyber Olympiad

Conducted by Unified Council, Hyderabad

SCIENTIFIC APTITUDE

BALSHREE HONOUR

14 Selections in Balshree in Local Round Rajasthan-7 | Gujrat-5 Madhya Pradesh-2)

Consist of Plaque, Citation, ₹15000 & Literature set

Conducted by National Bal Bhavan

LANGUAGE PROFICIENCY

TRINITY GESE

38 Selections in TRINITY GESE Distinction: 21 Merit: 17 GESE Grade Examination for Spoken English

Conducted by Trinity College, London



WORKSHOP/CONFERENCES

NMC

9 Selections in NMC Including Ranks 1,2,3 & 4 NMC National Maths Conference

Conducted by Association of Mathematics Teachers of India, Chennai



APTITUDE IN INTELLIGENCE QUATIENT (IQ)

TECHNOTHLON PRELIMS 2015

20 Students (10 Teams) Selected for Techniche

29 Selections for Silver Certificate in Technothlon Prelims

Conducted by IIT Guwahati
Techn thlon

TECHNICHE 2015

2 Students (1 Team) KHUSHI TIBAREWAL STUTI SHAH

won Junior Squad in Techniche

Conducted by IIT Guwahati

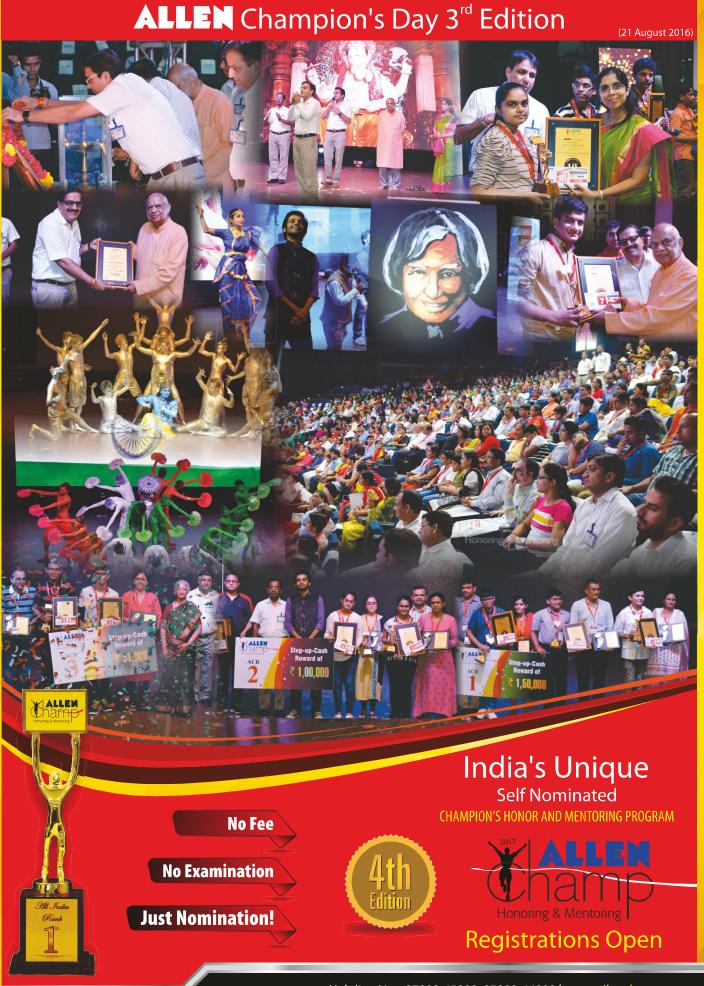


TECHKRITI

7 Students (Including AIR-1 & AIR-3) Selected in Techkriti

Conducted by IIT Kanpur





Answer Key



Class-9th (IX)

Held on: 09 October 2016

Q. No.	Ans.
1	3
2	2
3	2
4	3
5	1
6	1
7	4
8	2
9	2
10	3
11	2
12	2
13	4
14	3
15	2
16	3
17	1
18	2
19	4
20	3

Q. No.	Ans.
21	4
22	3
23	2
24	4
25	3
26	2
27	1
28	2
29	4
30	3
31	1
32	2
33	4
34	2
35	4
36	2
37	3
38	3
39	4
40	3

Q. No.	Ans.	
41	1	
42	3	
43	4	
44	3	
45	3	
46	2	
47	3	
48	4	
49	1	
50	1	
51	1	
52	2	0
53	2	
54	3	
55	2	
56	1	
57	1	
58	2	
59	2	
60	3	

Q. No.	Ans.
61	3
62	4
63	3
64	4
65	3
66	2
67	3
68	4
69	4
70	1
71	3
72	1
73	1
74	4
75	3
76	1
77	3
78	3
79	1
80	3

