

# 1st iRAO 17

## International Reasoning & Aptitude Olympiad



Organized by:  
**SILVER  
 ZONE  
 FOUNDATION**  
 NEW DELHI - INDIA

In association with:  
**SOCIETY OF SCIENCE EDUCATION**  
 New Delhi - India  
[www.silverzone.org](http://www.silverzone.org)

### CLASS : 11 (SYLLABUS & SAMPLE QUESTIONS)

Analogy, Classification, Coding - Decoding, Direction Test, Series Completion, Blood Relation, Syllogism, Inserting Missing Numbers, Logic Venn Diagram, Puzzle Test, Ranking & Language Comprehension, Number System, Symbols Relation, English, Number System, Arithmetic, Geometry, Permutation & Combination, Mensuration, Probability.

*The Actual Question Paper Contains 50 Questions. The Duration of the Test Paper is 60 Minutes.*

**Directions (Questions 1 & 2):** In each of the following, some words are given which are related in same relationship obtains among the words in one of the four alternatives given under it. Find the correct alternative to match the one given in question.

**1. Bone : Skeleton : Nerve**

- (A) House : Door : Window
- (B) Spoke : Wheel : Handle
- (C) Retina : Eye : Pupil
- (D) Snow : Cloud : Ice
- (E) None of these

**2. Iron : Silver : Gold**

- (A) Parents : Father : Mother
- (B) Wheat : Barley : Cereal
- (C) Tree : Branch : Fruit
- (D) Deer : Lion : Wolf
- (E) None of these

**3. Find the odd one out.**

- (A) ACDF
- (B) FGKL
- (C) HIVW
- (D) TUOP
- (E) None of these

**4. If 'REQUIRED' is coded as 'QERIUDER', how will 'SINGULAR' be coded ?**

- (A) NISGURAL
- (B) SINUGRAL
- (C) NISRALGU
- (D) NISUGRAL
- (E) None of these

**5. If 2 = 5, 4 = 18, 6 = 39, then 10 = ?**

- (A) 45
- (B) 81
- (C) 100
- (D) 105
- (E) None of these

**6. A person starts from a point A and travels 3 km eastwards to B and then turns left and travels thrice that distance to reach C. He again turns left and travels five times the distance he covered between A and B and reaches his destination D. The shortest distance between the starting point and the destination is:**

- (A) 12 km
- (B) 15 km
- (C) 16 km
- (D) 18 km
- (E) None of these

7. Which number would replace the question mark (?) in the series 64, 55, 47, 40, 34, [?], 25.

- (A) 33 (B) 30  
(C) 29 (D) 27  
(E) None of these

**Directions (Questions 8 & 9): Following questions are based on the information given below.**

- (i) 'P × Q' means 'P is the father of Q'  
(ii) 'P – Q' means 'P is the sister of Q'  
(iii) 'P + Q' means 'P is the mother of Q'  
(iv) 'P ÷ Q' means 'P is brother of Q'

8. In the expression  $B + D \times M \div N$ , how is M related to B ?

- (A) Granddaughter  
(B) Son  
(C) Grandson  
(D) Granddaughter or Grandson  
(E) None of these

9. Which of the following means 'R is niece of M' ?

- (A)  $M \div K \times T - R$   
(B)  $M - J + R - N$   
(C)  $R - M \times T \div W$   
(D) Cannot be determined  
(E) None of these

**Directions (Questions 10 to 11):** In each of the questions given below there are three statements, followed by four conclusions. You have to take the given statements to be true even if they seem to be at variance to commonly known facts. Read the carefully and decide which of the given conclusions logically follows from the given statements.

10. Statements:

- A. Some oranges are apples.  
B. All apples are guavas.

C. No guavas are bananas.

Conclusions:

- I. Some guavas are oranges.  
II. No apples are bananas.  
III. Some oranges are bananas.  
IV. Some apples are bananas.  
(A) Only I and II follow  
(B) Only I and either II or IV follow  
(C) Only, I, II and IV follow  
(D) Only III and either II or IV follow  
(E) None of these

11. Statements:

- A. Some streets are roads.  
B. Some roads are lanes.  
C. Some lanes are highways.

Conclusions:

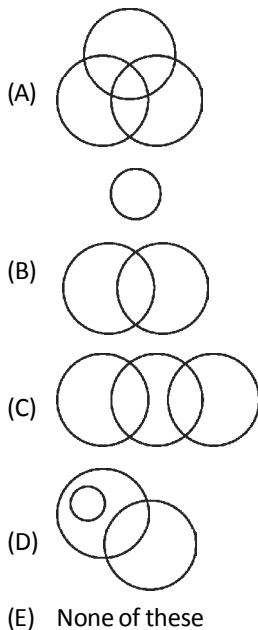
- I. Some roads are not streets.  
II. No highways are streets.  
III. Some streets are not roads.  
IV. Some lanes are not roads.  
(A) Only III follows  
(B) Only III and IV follow  
(C) Either I or III follows  
(D) Both I and III follow  
(E) None of these

12. Find the missing number.

A2	C4	E6
G3	I5	?
M5	O9	Q14

- (A) J15 (B) K8  
(C) K15 (D) L10  
(E) None of these

13. Some of the cricket players are tennis players; Some tennis players are hockey players; No cricket player is a hockey player. Which of the following diagrams correctly represents the above statements?



**Directions (Questions 14 & 15): Study the following information carefully and answer the questions.**

- (i) Six children B, D, C, M, J and K are split into two groups of three each and are made to stand in two rows in such a way that a child in one row is exactly facing a child in the other row.
- (ii) M is not at the ends of any row and is to the right of J, who is facing C. K is to the left of D, who is facing M.

14. Who is to the immediate left of B ?

- (A) M  
(B) J  
(C) D  
(D) Data inadequate  
(E) None of these

15. Which of the following groups of children is in the same row?

- (A) BDC                      (B) BMD  
(C) MJK                      (D) MJD  
(E) None of these

### ANSWERS

- |         |         |         |         |         |        |        |        |        |         |
|---------|---------|---------|---------|---------|--------|--------|--------|--------|---------|
| 1. (C)  | 2. (D)  | 3. (A)  | 4. (D)  | 5. (D)  | 6. (B) | 7. (C) | 8. (C) | 9. (B) | 10. (A) |
| 11. (E) | 12. (B) | 13. (C) | 14. (A) | 15. (E) |        |        |        |        |         |