Q.4 **Simplify**
15.5 − [3 − {7 − (5 − (14.5 − 13.5))}].

Ans   ✅ 1. 15.5

   ❌ 2. 13.5

   ❌ 3. 12.5

   ❌ 4. 14.5

Q.5 The incomes of P, Q and R are in the ratio 10 : 12 : 9 and their expenditures are in the ratio 12 : 15 : 8. If Q saves 25% of his income, then what is the ratio of the savings of P, Q and R?

Ans   ❌ 1. 15 : 14 : 21

   ✅ 2. 14 : 15 : 21

   ❌ 3. 21 : 15 : 14

   ❌ 4. 21 : 14 : 15

Q.6 The classification of 100 students based on the marks obtained by them in English and Mathematics in an examination is given in the table below. Study the table and answer the question that follows.

MARKS OUT OF 50					
SUBJECT	40 and above	30 and above	20 and above	10 and above	0 and above
ENGLISH	10	31	80	92	100
MATHEMATICS	3	23	65	81	100
AGGREGATE	7	27	73	87	100

If at least 40% marks in Mathematics are required for pursuing higher studies in Mathematics, how many students will be eligible to pursue higher studies in Mathematics?

Ans   ❌ 1. 55

   ✅ 2. 65

   ❌ 3. 70

   ❌ 4. 50

Q.7 In triangles ABC and DEF, AB = FD and ∠A = ∠D. The two triangles are congruent by SAS criterion if:

Ans   ❌ 1. BC = DE

   ❌ 2. AC = EF

   ❌ 3. BC = EF

   ✅ 4. AC = DE

Q.8 Two pipes, A and B, can fill a tank in 10 minutes and 20 minutes, respectively. The pipe C can empty the tank in 30 minutes. All the three pipes are opened at a time in the beginning. However, pipe C is closed 2 minutes before the tank is filled. In what time, will the tank be full (in minutes)?

Ans   ❌ 1. 12

   ❌ 2. 10

   ✅ 3. 8

   ❌ 4. 6

Q.9 A payment of ₹120 is made with ₹10, ₹5 and ₹2 coins. A total of 25 coins are used. Which of the following is the number of ₹10 coins used in the payment?

Ans   ❌ 1. 6

   ❌ 2. 4

   ❌ 3. 10

   ✅ 4. 8