

Negative Numbers & Integers: Hard Practice

Paper 6

Q1. What is $(-3)^2 - (-3)$?

- A. -12 B. -6 C. 6 D. 9 E. 12

Q2. What is $-84 \div (-7)$?

- A. -12 B. -7 C. 7 D. 12 E. 14

Q3. What is $-7 - 5 \times (-3)$?

- A. -36 B. -22 C. 8 D. 22 E. 36

Q4. The table shows the temperature recorded at four times in one day. What is the mean temperature?

Time	Temperature
06:00	-7°C
12:00	5°C
18:00	2°C
00:00	-4°C

- A. -4°C B. -2°C C. -1°C D. 0°C E. 1°C

Q5. A sequence begins 23, 16, 9, 2, ... What is the first term below -20 ?

- A. -19 B. -22 C. -26 D. -33 E. -40

Q6. If $p = -4$ and $q = 3$, what is the value of $p^2 - 2q$?

- A. -22 B. -2 C. 2 D. 10 E. 22

Q7. Which of these calculations gives the answer -24 ?

- A. -4×6
- B. $-3 \times (-8)$
- C. $-12 - 10$
- D. $-30 + 5$
- E. $-20 - (-3)$

Q8. A diver at -18 m descends 4 m every minute for 5 minutes, then rises 12 m. What is her depth now?

- A. -50 m
- B. -38 m
- C. -26 m
- D. -14 m
- E. 26 m

Q9. Solve for x .

$$5x - 4 = -29$$

- A. -7
- B. -5
- C. -1
- D. 5
- E. 7

Q10. What is the range of these numbers?

$-16, 4, -9, 12, -3$

- A. 12
- B. 16
- C. 21
- D. 28
- E. 32

Q11. The table shows how a reservoir's water level compared with its normal level each month. In which month was the level furthest from normal?

Month	Level
January	-40 cm
February	25 cm
March	-55 cm
April	60 cm
May	-15 cm

- A. January
- B. February
- C. March
- D. April
- E. May

Q12. At 22:00 the temperature was 3°C . It fell 2 degrees every hour until 04:00, then rose 5 degrees by 07:00. What was the temperature at 07:00?

- A. -9°C B. -7°C C. -4°C D. -1°C E. 4°C

Q13. Two numbers multiply to give -36 and add to give -5. What are the two numbers?

- A. 4 and -9 B. -4 and 9 C. 6 and -6 D. -3 and 12 E. -2 and 18

Q14. A pupil says that -7 is greater than -2 because 7 is greater than 2. What is wrong with this?

- A. -7 lies further left on the number line, so it is smaller than -2
B. Nothing is wrong; -7 really is greater than -2
C. -7 and -2 are the same size
D. Both -7 and -2 are greater than 0
E. -7 is greater because it is further from zero

Q15. The top of a mast is 34 m above sea level and the bottom of its anchor chain is 47 m below sea level. What is the distance from the bottom of the chain to the top of the mast?

- A. 13 m B. 47 m C. 71 m D. 81 m E. 91 m