

Chapter-6

Worksheet-1

Answer Key

1. (b) 2. (b) 3. (a) 4. (c) 5. (d) 6. 63

7. 2 8. $A = 7$, $B = 9$

9. even (52×68)

52 and 68 both are even numbers.

Since, even \times even = Even

10. $2n + 3$,

$6n + 5$,

$4n + 3$,

$10n + 5$

11.

8	1	6
3	5	7
4	9	2

12. Yes, we can draw, after doubling each number, we will get a new magic square with the magic sum 30.

16	2	12
6	10	14
8	18	4

13.

-3	2	1
4	0	-4
-1	-2	3

14.

7	12	1	14
2	13	8	11
16	3	10	5
9	6	15	4

15.

25	60	18
9	20	27
16	35	10



$$\begin{array}{r} \text{(i)} \quad \begin{array}{r} 3 \ 2 \ 5 \\ + 7 \ 5 \ 3 \\ \hline 10 \ 7 \ 8 \end{array} \end{array}$$

$$A = 5, B = 7$$

$$\begin{array}{r} \text{(ii)} \quad \begin{array}{r} 8 \ 9 \ 7 \\ - 4 \ 6 \ 6 \\ \hline 4 \ 3 \ 1 \end{array} \end{array}$$

$$A = 6, B = 4$$

17. 57, by Reversing 75, then $57 + 75 = 132$, $132 \div 11 = 12$, $R = 0$ (you can take any number by your own choice)

18. Yes, 2-digit number = $10a + b$

By reversing the digits we get = $10b + a$

$$\text{Sum} = (10a + b) + (10b + a)$$

$$10a + b + 10b + a = 11a + 11b$$

$$= 11(a + b)$$

so, the sum is always a multiple of 11 so that remainder is always 0.

19. (i) 79 (ii) 576 (iii) $100x + 10y + z$ (iv) 5739

20. Remainder = 0

for example, Number = 349

By reversing number becomes = 943

$$\text{Difference} = 943 - 349 = 594$$

$$\text{Division} = 594 \div 99 = 6$$

$$\text{Remainder} = 0$$

(you can take any number by your own choice)

Assertion & Reason

1. (a) 2. (a) 3. (a)

Case Study Based Questions

1. i. (c) ii. (a) iii. (d) iv. (c)

2. i. (c) ii. (d) iii. (b) iv. (a)

