



Exercise 6A

Q1

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and adding column-wise, we get:

$$\begin{array}{r}
 8ab \\
 - 5ab \\
 3ab \\
 - ab \\
 \hline
 5ab
 \end{array}$$

Q2

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and adding column-wise, we get:

$$\begin{array}{r}
 7x \\
 - 3x \\
 5x \\
 - x \\
 - 2x \\
 \hline
 6x
 \end{array}$$

Q3

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and adding column-wise, we get:

$$\begin{array}{r}
 3a - 4b + 4c \\
 2a + 3b - 8c \\
 a - 6b + c \\
 \hline
 6a - 7b - 3c
 \end{array}$$

Q4

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and adding column-wise, we get:

$$\begin{array}{r}
 5x - 8y + 2z \\
 - 2x - 4y + 3z \\
 - x + 6y - z \\
 3x - 3y - 2z \\
 \hline
 5x - 9y + 2z
 \end{array}$$

Q5

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and adding column-wise, we get:

$$\begin{array}{r}
 6ax - 2by + 3cz \\
 - 11ax + 6by - cz \\
 - 2ax - 3by + 10cz \\
 \hline
 - 7ax + by + 12cz
 \end{array}$$

Q6

Answer :

On arranging the terms of the given expressions in the descending powers of x and adding column-wise:

$$\begin{array}{r}
 2x^3 - 9x^2 + 0x + 8 \\
 0x^3 + 3x^2 - 6x - 5 \\
 7x^3 + 0x^2 - 10x + 1 \\
 -4x^3 - 5x^2 + 2x + 3 \\
 \hline
 5x^3 - 11x^2 - 14x + 7
 \end{array}$$

Q7

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and adding column-wise:

$$\begin{array}{r}
 6p + 4q - r + 3 \\
 -5p + 0q + 2r - 6 \\
 -7p + 11q + 2r - 1 \\
 0p + 2q - 3r + 4 \\
 \hline
 -6p + 17q + 0r + 0 \\
 = -6p + 17q
 \end{array}$$

Q8

Answer :

On arranging the terms of the given expressions in the descending powers of x and adding column-wise:

$$\begin{array}{r}
 4x^2 + 4y^2 - 7xy - 3 \\
 x^2 + 6y^2 - 8xy + 0 \\
 2x^2 - 5y^2 - 2xy + 6 \\
 \hline
 7x^2 + 5y^2 - 17xy + 3
 \end{array}$$

Q9

Answer :

On arranging the terms of the given expressions in the descending powers of x and subtracting:

$$\begin{array}{r}
 -5a^2b \\
 3a^2b \\
 \hline
 -8a^2b
 \end{array}$$

Q10

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and subtracting column-wise:

$$\begin{array}{r}
 6pq \\
 -8pq \\
 + \\
 \hline
 14pq
 \end{array}$$

Q11

Answer :

Writing the terms of the given expressions (in the same order) in the form of rows with like terms below each other and subtracting column-wise:

$$\begin{array}{r}
 -8abc \\
 -2abc \\
 + \\
 \hline
 -6abc
 \end{array}$$

***** END *****