

FBQ1: In the Quadratic Formula, , is called the \_\_\_\_\_&nbsp;

Answer: Discriminant

FBQ2: The domain of , will be any real number except \_\_\_\_\_

Answer: -2

FBQ4: The set of all y values of a relation is called the \_\_\_\_\_

Answer: Domain

FBQ5: The set of element in  $\{x \mid x \text{ is a positive even integer less than } 4\}$  is: \_\_\_\_\_.

Answer:  $\{1,2,3\}$

FBQ7: The common ratio is \_\_\_\_\_, when the fourth term is divided by the second term is 9

Answer: 3

FBQ8: In slope-intercept form, the equation of a line passing through the point  $(-3,2)$  and parallel to  $4x-y=7$  is given as \_\_\_\_\_.

Answer:  $y=4x+4$

FBQ9: The distance between the points  $(-3, 19)$ ,  $(-7, -5)$  to the nearest tenth is \_\_\_\_\_.

Answer: 24.3

FBQ20: Polar form of a complex number is \_\_\_\_\_

\_\_\_\_\_

Answer:  $r(\cos \hat{I} + i \sin \hat{I})$

FBQ21: Set that have unlimited numbers of elements are referred to as \_\_\_\_\_.

Answer: infinite set

FBQ22: The radius of the circle with the equation: is \_\_\_\_\_&nbsp;

Answer: 5

FBQ24: The cardinality of the Power set of the set  $\{0,1,2\}$  is \_\_\_\_\_

\_\_\_\_\_

Answer: 6

FBQ25: The values of x in equation is \_\_\_\_\_

Answer: 5 and 1

FBQ3: In terms of their elements, two sets are called disjoint if they have -----

\_\_\_\_\_

Answer: no element in common

FBQ6: The centre of the circle is \_\_\_\_\_

Answer:  $(1,-3)$

FBQ10: Power set of empty set has exactly \_\_\_\_\_ number of subset.

Answer: Zero

FBQ11: The x intercept of  $9x-2y=18$  is \_\_\_\_\_

Answer: (3,0)

FBQ12: What is the coordinate of the y-intercept of the linear equation  $9x-2y=18$  is \_\_\_\_\_.

Answer: (0,2)

FBQ13: The leading coefficient of  $y=6x^3-3x^2+4x+5$  is \_\_\_\_\_

Answer: 6

FBQ14: If A and B are sets and  $A \cap B = A \cap B$ , then the two sets are \_\_\_\_\_.

Answer:  $A=B$

FBQ15: The intersect of the sets {1, 2, 5} and {1, 2, 6} is the set.....

Answer: {1, 2}

FBQ16: The solution of a quadratic equation is sometimes called \_\_\_\_\_

Answer: Roots

FBQ17: Given the circle, the radius of the circle is \_\_\_\_\_

Answer: Zero

FBQ18: The equation of the line passing through the point (-3,7) with slope zero can be written as \_\_\_\_\_

Answer:  $y=7$

FBQ19: The Common difference of sequence 2, -2, -6, \_\_\_\_\_ is \_\_\_\_\_

Answer: -4

FBQ23: The sum of  $-5+4i+9+6i$  in standard form ( $a+bi$ ) is \_\_\_\_\_.

Answer:  $4+10i$

FBQ26: The union of the sets {1, 2, 5} and {1, 2, 6} is the set .....

...

Answer: {1, 2, 5, 6}

FBQ27: The individual objects in a set are called \_\_\_\_\_

Answer: Element

FBQ28: The Common difference of sequence 5, 8, 11, 14, \_\_\_\_\_ is \_\_\_\_\_

Answer: 3

FBQ29: Collection of well-defined objects is called a \_\_\_\_\_.

Answer: Set

FBQ30: The set of positive integers is an example of \_\_\_\_\_ set

Answer: Infinite

FBQ31: If  $A \cap B = B \cap A$ , then the sets A and B are \_\_\_\_\_.

Answer: Commutative

FBQ32: The product of  $4+i$  and  $4-i$  is \_\_\_\_\_.

Answer: 17

FBQ33: A linear system of equations made up of two intersecting lines has \_\_\_\_\_ solution(s).

Answer: 2

FBQ34: The Sum of the roots of the quadratic equation  $3x^2 - 5x - 2$  is \_\_\_\_\_.

Answer:  $5/3$

FBQ35: The solutions of a quadratic equation  $x^2 + 5x - 6 = 0$  are \_\_\_\_\_ and \_\_\_\_\_.

Answer: 1, -6

FBQ36: In standard form  $a+bi$ ,  $3-5i-5+11i+(9+6i)$  can be reduced to \_\_\_\_\_.

Answer:  $17-10i$

FBQ37: Any set that contains a definite number of elements is called \_\_\_\_\_.

Answer: finite set

FBQ38: One factor of the expression  $8x^2 - 19x + 6$  is  $x - 2$ . The other is \_\_\_\_\_.

Answer:  $8x-3$

FBQ39: Expansion of  $3-6i$  is \_\_\_\_\_.

Answer:  $-27-36i$

FBQ40: If the difference between the third term and the second term is 12, then the common difference is \_\_\_\_\_.

Answer: 12

FBQ41: If Set  $D = \{x: x \text{ is an odd number between } 10 \text{ and } 18\}$ , the elements

Answer:  $\{11, 13, 15, 17\}$

FBQ42: The minimum value of \_\_\_\_\_ is \_\_\_\_\_.

Answer: -4

FBQ43: The numerator of the quotient  $5-3i+7i$  in standard form  $(a+bi)$  is \_\_\_\_\_.

FBQ43: If  $z = -11 - 4i$ , then  $z^2 + 22z + 153$  is

Answer:  $-11 - 4i$

FBQ44: When  $b^2 - 4ac < 0$ , then the equation  $ax^2 + bx + c = 0$  has

Answer: two complex solutions

FBQ45: The first and seventh terms of a geometric progression are 812 and 329 respectively. Hence, the common ratio is

Answer:  $2/3$

FBQ46: If two sets have distinct elements, they are said to be

Answer: Disjoint

FBQ47: The slope of the linear equation  $y = 12x - 2$  is

Answer:  $2/3$

FBQ48: The slope of the linear equation  $y = -14x + 7$  is

Answer:  $-1/4$

FBQ49: If  $U = \{a, b, c, d, e\}$ ,  $A = \{a, c, e\}$  and  $B = \{a, b, e\}$ , then  $(A \cap B)$

Answer:  $\{a, e\}$

FBQ50: The value of  $i^{15}$  is

Answer:  $-i$

MCQ1: Evaluate

Answer: 5

MCQ2: Solve for x:

Answer:  $x = 3$

MCQ3: Find the product of  $4 + i$  and  $4 - i$ .

Answer: 17

MCQ4: What are the center and radius of

Answer:

MCQ5: Simply

Answer:

MCQ6: Expand

Answer:  $-27 - 36i$

MCQ7: Find the next term of each sequence 4, -16, 64, -256, 1024,

Answer: -4096

MCQ8: Find the next term of each sequence 4, 16, 36, 64, 100

Answer: 144

MCQ9: Find the next term of each sequence 4, -12, 36, -108, 324

Answer: -972

MCQ10: Expand and simplify  $(2x - 1)(x + 3)$

Answer:  $x^2 + 5x - 3$

MCQ11: Factorize completely .  $9x^2 - 24x - 16$

Answer:  $(3x - 4)^2$

MCQ12: is equal to \_\_\_\_\_

Answer:

MCQ13: Find an equation whose roots are -2 and 1.

Answer:  $x^2 + x - 2 = 0$

MCQ14: When solving a linear system of equations, you are looking for which of the following?

Answer: Point(s) of intersection

MCQ15: A linear system of equations made up of two intersecting lines has \_\_\_\_\_ solution(s)

Answer: one

MCQ16: If the legs of a right triangle measure 5 and 12 cm respectively, the measure of the third side is

Answer: 13 cm

MCQ17: Which of the following is an equation of a circle?

Answer:

MCQ18: The set of all  $y = f(x)$  values of a relation is called the \_\_\_\_\_.&A

Answer: domain

MCQ19: If a system of equations has one solution, then the equations will have \_\_\_\_\_.&

Answer: different slopes

MCQ20: The solution(s) of a Quadratic Equation is/are also sometimes called \_\_\_\_\_.&

Answer: root(s)

MCQ21: The function completely factorized is \_\_\_\_\_.&

Answer:

MCQ22: All the solution(s) for are \_\_\_\_\_

Answer:

MCQ23: What is the Leading Coefficient of

Answer: 6

MCQ24: What is the constant of  $\hat{A}$

Answer: 5

MCQ25: Â

Answer: 5

MCQ26: What is the y-intercept of the line determined by the linear equation

Answer:

MCQ27: What is the slope of the linear equation:  $\hat{A}$

Answer:

MCQ28: Which ordered pair(s) are all the y-intercept(s) of the equation:

Answer: . (0,1)

MCQ29: When is  $\hat{\alpha}$  not positive?

Answer: never

MCQ30: What is the radius of the circle graphed by the equation:

Answer: 5

MCQ31: The square root of a number is the same as raising the number to the

Answer: (1/2) power

MCQ32: The x intercept of \_\_\_\_\_ is \_\_\_\_\_.

Answer:

MCQ33: The domain of, will be any real number \_\_\_\_\_.

Answer:

MCQ34: Expand and express your answer in simplest complex form.

Answer:  $11+7i$

MCQ35: What is the minimum value of

Answer: -6

MCQ36: Solve: .&nbsp;

Answer:

MCQ37: Solve for x.  $\hat{A}$

Answer: 5and 1 only

MCQ38: Approximate the distance between the points  $(-3, 19)$ ,  $(-7, -5)$  to the nearest

tenth:Â

Answer: 24.3

MCQ39: The number of elements in the Power set  $P(S)$  of the set  $S = \{\hat{a} \dots, 1, [2, 3]\}$

is

Answer: 4

MCQ40: If A and B are sets and  $A \hat{=} B = A \hat{\cap} B$ , then  $\hat{A}$

Answer:  $A=B$

MCQ41: The union of the sets  $\{1,2,5\}$  and  $\{1,2,6\}$  is the set ..... $\hat{A}$

Answer:  $\{1,2,5,6\}$

MCQ42: The intersection of the sets  $\{1,2,5\}$  and  $\{1,2,6\}$  is the set  $\hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{A}$

Answer:  $\{1,2\}$

MCQ43:  $\hat{A}$  Two sets are called disjoint if their  $\hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in}$  is empty set. $\hat{A}$

Answer: intersection

MCQ44:  $\hat{A}$  Which of the following two sets are disjoint?

Answer:  $\{1,3,5\}$  and  $\{2,4,6\}$

MCQ45:  $\hat{A}$  The complement of the set A is  $\hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in}$ .

Answer: element not in A but in the universal set

MCQ46:  $\hat{A}$  Individual objects in a set are called  $\hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in}$ .

Answer: element

MCQ47:  $\hat{A}$  Set  $\{x: x \text{ is an odd number between } 10 \text{ and } 18\}$

Answer:  $\{11,13,15,17\}$

MCQ48:  $\hat{A}$  Polar form of a complex number is  $\hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in}$

Answer:  $r(\cos \hat{I}_r + i \sin \hat{I}_r)$

MCQ49:  $a^2 + b^2$  is equal to  $\hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in} \hat{\in}$

Answer:  $(a+ib)(a-ib)$

MCQ50:  $\hat{A}$  The solution of a quadratic equation  $x^2 + 5x \hat{\in} 6 = 0$  is

Answer:  $x=1, x=-6$