**Choose the best answer for each question. Record answers on the Answer Sheet. DO NOT Write on the Exam.**

**For questions 1-3, use the algebraic expression**

1. Identify the term(s) in the expression

\_\_\_\_\_\_\_

1. Identify the constant(s) in the expression \_\_\_\_\_\_\_
2. Identify the coefficient(s) in the expression \_\_\_\_\_\_\_
3. Which of the following examples is an algebraic expression?
   1. Example:
   2. Example:
   3. Example: = 21
   4. Example:

**For questions 5-7, write an algebraic expression to represent the situation.**

1. Ashley’s earns $10 per hour. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
2. Eight less than 3 time a number. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
3. Five more than 3 times James’ age. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

For questions 8 – 11 Write and algebraic express for the

1. There are double the number of seats at the stadium as there are people entering the stadium. If there are *p* people, write an algebraic expression to find out how many jobs available.
2. Jackie went to the movies with friends and they bought a ticket package for $12.00. If *p* represents the number of people, create an algebraic expression to determine the price per person.
3. Laura is looking to buy a new pair of jeans. She has a coupon for $15 off the price of the jeans. What is the variable?
4. Aliyah and some friends went out to Six Flags. Each girl ordered exactly the same meal which cost $15.00. The tax on the total bill was $6.01. Which expression represents the total cost of the bill?
5. Add. (3x- 7y) + (-x – 9y) \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
6. Subtract (7a2 + 8a - 2) – (6a2 + 7a - 6) \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
7. Multiply: (x -6)(3x – 4) \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
8. Multiply (x - 6)(x + 8) \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
9. Multiply? (x + 5) (2x2 – 4x – 8) \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Simplify the radicals in radical form

17. 18. 19. 20

Circle all the irrational numbers. Then tell why rational and irrational

|  |  |  |  |
| --- | --- | --- | --- |
| Irrational because the square root of a non-perfect square will be a non-terminating decimal |  |  |  |
|  | 3.14 | **π** | **.333333333…** |
|  |  | .5366356425168995… | .125125125125… |
| 6π  π | -½ | 22/7 | .1757566785324… |
| .179817981798… |  | 5/8 |  |

Find the area and perimeter of the rectangle if the length is 2x+1 and the width is (x-6)