NAME : _____

CLASS : _____

DATE : _____

Homework 7.1 due Mon 3/8

12 Questions

1. Simplify:$(2x^2 + 5x - 7) + (3 - 4x^2 + 6x)$

- [ ] a) $2x^2 + 3x + 1$
- [ ] b) $-2x^2 - 11x - 4$
- [ ] c) $2x^2 + 5x - 7$
- [ ] d) $-2x^2 + 11x - 4$

2. Simplify:$(4x^3-5x^2+3x)+(-2x^3-x^2+6x)$

- [ ] a) $2x^3-6x^2-9x$
- [ ] b) $2x^3+6x^2+9x$
- [ ] c) $-2x^3-6x^2+9x$
- [ ] d) $2x^3-6x^2+9x$

3. Simplify:$(5x^4 - 4x^3 - 2x^2 + x - 19) - (x^4 + 5x^3 + 8x^2 + x + 5)$

- [ ] a) $4x^4 - 9x^3 - 10x^2 - 24$
- [ ] b) $4x^4 - 9x^3 - 10x^2 - 2x - 24$
- [ ] c) $4x^4 - 9x^3 - 10x^2 + 2x - 24$
- [ ] d) $-4x^4 - 9x^3 - 10x^2 - 24$

4. Is b + 8 a monomial?

- [ ] a) yes
- [ ] b) no

5. What is the degree of the polynomial? $5x^5 - 6x^6 + 2$

- [ ] a) 1
- [ ] b) 5
- [ ] c) 6
- [ ] d) 11

6. Which of the following are examples of like terms?

- ☐ a) 2 and 2x
- ☐ b) y^3 and x^3
- ☐ c) y and x
- ☐ d) -3x and 3x

7. Simplify:(2x + 5y) + (3x - 2y)

- ☐ a) 3x + 5y
- ☐ b) 5x + 3y
- ☐ c) 5x + 7y
- ☐ d) 7xy + 1xy

8. Identify the name of the polynomial:$3x^2 + 5y - 3$

- ☐ a) monomial
- ☐ b) binomial
- ☐ c) trinomial

9. Rewrite this polynomial in standard form:$9x^2 + 5x + 27 + 2x^3$

- ☐ a) $27 + 5x + 9x^2 + 2x^3$
- ☐ b) $9x^2 + 5x + 2x^3 + 27$
- ☐ c) $9x^2 + 5x + 27 + 2x^3$
- ☐ d) $2x^3 + 9x^2 + 5x + 27$

10. Rewrite the polynomial in standard form:$7x - 125 - 6x^4 + 14x^2$

- ☐ a) $125 + 7x - 14x^2 + 6x^4$
- ☐ b) $6x^4 - 14x^2 - 7x + 125$
- ☐ c) $125 + 14x^2 + 7x - 6x^4$
- ☐ d) $-6x^4 + 14x^2 + 7x - 125$

11. Simplify: $(3 - 2x + 2x^2) - (4x - 5 + 3x^2)$

- ☐ a) $x^2 + 6x + 8$
- ☐ b) $2x^2 + 5x - 7$
- ☐ c) $-x^2 - 6x + 8$
- ☐ d) $-2x^2 + 11x - 4$

12. Simplify:$(6b^3 + 6 - b^4) - (8b^3 - 6b^4 + 2)$

☐ a) $4b^4 - 2b^3 + 7$

☐ b) $5b^4 - 2b^3 + 4$

☐ c) $b^4 - 2b^3 + 7$

☐ d) $5b^4 - 2b^3 + 7$