Name: _____ Date: _____ Period: _____

5.2 Adding & Subtracting Polynomial Functions DAY TWO CYU

CONCEPTS	BASIC	INTERMEDIATE	ADVANCED
Combining Like Terms (CLT)	1 – 4	5, 7	6
Degree of a term or expression	1 – 4 (b)	5, 7 (b)	6 (b)
Classifying expression based on numbers of terms	1 – 4 (c)	5, 7 (c)	6 (c)
Writing expressions in standard form	1 – 4 (a), 8, 12	5, 7 (a), 10	6 (a), 11, 13
Adding & Subtracting polynomial	8, 12	9, 10	11, 14 - 25

Simplify each of the following by combining like terms (CLT).
(a) Write your final answer in standard form.
(b) State the degree
(c) Classify each expression based on the number of terms: monomial, binomial, trinomial, or polynomial.

1. $14x^2 + 9x^2$ 2. $18x^3 - 4x^3$ 3. $12k^3 - 9k^3 + 11$ 4. $5y + 7y - 6y$

5. $7.6y + 3.2y^2 - 8y - 2.5y^2$ 6. $\frac{1}{6}x^4 - \frac{1}{7}x^2 + 5 - \frac{1}{2}x^4 - \frac{3}{7}x^2 + \frac{1}{3}$ 7. $x^2y + xy - y + 10x^2y - 2y + xy$

Perform the indicated operations and write the final answer in standard form. Show all work for full credit.

8. $(3x - 8) + (4x^2 - 3x + 3)$ 9. $(5x^2 + 4) - (-2y^2 + 4)$ 10. $4 - (-y - 4)$

11. $(-7x^2 + 4x + 7) - (-8x + 2)$ 12. $(3r^2 + 4) + (5r^2 - 8)$ 13. $(5u^5 - 4t^2 + 3t - 7) - (3u^5 + 6u^2 - 8u + 2)$

Perform each indicated operation and write the final answer in standard form. Show all work for full credit.

14. Subtract 4x from $(7x - 3)$.

15. Subtract y from $(y^2 - 4y + 1)$.

16. Add $(4x^2 - 6x + 1)$ and $(3x^2 + 2x + 1)$.

17. Add $(-3x^2 - 5x + 2)$ and $(x^2 - 6x + 9)$.

18. Subtract $(19x^2 + 5)$ from $(81x^2 + 10)$.

19. Subtract $(2x + xy)$ from $(3x - 9xy)$.

20. Subtract $(5x + 7)$ from $(7x^2 + 3x + 9)$.

21. Subtract $(5y^2 + 8y + 2)$ from $(7y^2 + 9y - 8)$.

22. Subtract $(2x + 2)$ from the sum of $(8x + 1)$ and $(6x + 3)$.

23. Subtract $(-12x - 3)$ from the sum of $(-5x - 7)$ and $(12x + 3)$.

24. Subtract $(4y^2 - 6y - 3)$ from the sum of $(8y^2 + 7)$ and $(6y + 9)$.

25. Subtract $(4x^2 - 2x + 2)$ from the sum of $(x^2 + 7x + 1)$ and $(7x + 5)$.

CYU Reflection: *How far can you go: basic, intermediate, or advanced?*
Rate your mastery level!
How confident are you with the skills this CYU covered? Circle the score you would give yours elf.

| 1 2 | 3 4 5 | 6 7 | 8 |
| Basic | Intermediate | Advanced | Solved ALL! |