Name _____ Date _____ Pd _____

7.1 Rational Functions DAY TWO CYU

CONCEPTS	BASIC	INTERMEDIATE	ADVANCED
Domain in interval notation.	1, 2	3, 4	5, 6
Simplifying Rational Expressions	7 - 9	10 - 12	13 - 17

Find the domain of each rational expression in interval notation.

1. $f(x) = \frac{4-3x}{2}$

2. $g(x) = -\frac{5x+x^2}{3x}$

3. $h(x) = \frac{-4x}{-2+x}$

4. $R(x) = \frac{-2}{2x+5}$

5. $C(x) = \frac{3+2x}{2x^2-14x+20}$

6. $h(x) = \frac{x+3}{x^2-4}$

Simplify each expression. Restrict the domain in interval notation too.

7. $\frac{x-7}{7-x}$

8. $\frac{y+9}{9+y}$

9. $\frac{3}{9x+6}$

10. $\dfrac{-5a-5b}{a+b}$

11. $\dfrac{x+5}{x^2-4x-45}$

12. $\dfrac{12x^2+4x-1}{2x+1}$

13. $\dfrac{x^3+7x^2}{x^2+5x-14}$

14. $\dfrac{x^4-10x^3}{x^2-17x+70}$

15. $\dfrac{ab+ac+b^2+bc}{b+c}$

16. $\dfrac{24y^2-8y^3}{15y-5y^2}$

17. $\dfrac{4-x^2}{x-2}$

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 yourself.

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