Final Review

EGRIS

Math 95 Math Rocks

GameBoard

Full Screen

Quit

Logs & Det for 100.

Solve for x, $\log_3(x-3) = 2$

$x = 0$

$x = 12$

$x = 10$

none of them

Logs & Det for 200.

$\log(7^3 \cdot 48)$ is equal to

$\log(7^3) \cdot \log(48)$

$\log(7^3) - \log(48)$

$3\log(7) - 2\log(4) + \log(3)$

$3\log(7) + 2\log(4) + \log(3)$

Logs & Det for 300.

What is the value of $\begin{vmatrix} 1 & -2 \\ 3 & 2 \end{vmatrix}$?

-1

+1

-4

+8

none of them

Logs & Det for 400.

Use Kramer's rule to solve

$$x + y = 0$$
$$-x + y = 4$$

$x = \ 0, \ y = 0$

$x = \ 2, \ y = 2$

$x = \ -2, \ y = 2$

$x = \ 4, \ y = 0$

$x = \ -2, \ y = -2$

Math 95 Math Rocks

GameBoard

Full Screen

Quit

Simplify $\dfrac{2}{3 - \frac{2}{3}}$

$3/2$

$2/3$

$6/7$

$1/2$

none of them

Math 95   Math Rocks

GameBoard

Full Screen

Quit

Simplify $\dfrac{\sqrt[3]{x^7}}{\sqrt[5]{x^2}}$

x^{3+5}

$x^{7/2}$

$x^{3/5}$

x^{7-2}

$x^{29/15}$

Math 95 Math Rocks

GameBoard

Full Screen

Quit

Simplify for 300.

Simplify $\dfrac{y^2 - 25}{y^2 - 7y} \div \dfrac{y + 5}{y - 7}$

$$\dfrac{(y - 5)(y - 7)}{y}$$

$$\dfrac{(y + 5)(y + 7)}{y - 7}$$

$$\dfrac{y - 5}{y}$$

$$\dfrac{y(y + 5)}{y - 8314578}$$

none of them

Simplify for 400.

Factor $81w^{20} - 4x^6$

$(9w^5 + 2x^3)(9w^4 + 2x^3)$

$(2w^{10} + 9x^3)(2w^{10} + 9x^3)$

$(9w^{10} - 2x^3)(9w^{10} + 2x^3)$

$(9w^3 + 2x^{10})(9w^3 + 2x^{10})$

none of them

EGRIS

Math 95 Math Rocks

GameBoard

Full Screen

Quit

Numbers Fun for 100.

Rationalize $\dfrac{\sqrt{5}}{3 - \sqrt{8}}$

$3\sqrt{5} - \sqrt{40}$

$2\sqrt{5} - 3\sqrt{40}$

$3\sqrt{5} + 2\sqrt{10}$

$\sqrt{5} + \sqrt{40}$

none of them

Math 95   Math Rocks

GameBoard

Full Screen

Quit

Numbers Fun for 200.

Express $\dfrac{3}{2+i}$ in the form $a + bi$.

$\dfrac{3}{2-i}$

$\dfrac{2-i}{3}$

$3 - 2i$

$\dfrac{6}{5} + \dfrac{3}{5}i$

$\dfrac{6}{5} - \dfrac{3}{5}$

Numbers Fun for 300.

Find $1 + 5 + 5^2 + \cdots + 5^{1000}$

$$\frac{1 - 5^{999}}{1 - 5}$$

$$\frac{1 + 5^{999}}{-1 - 5}$$

$$\frac{5^{1001} - 1}{4}$$

$$\frac{1 - 5^{999}}{1 + 5}$$

none of them

Numbers Fun for 400.

Third and Fourth terms of a geometric sequence are $4, 32$. Find the second term.

64

16

-3

4

1/2

Graphs & Fun for 100.

$f(x) = x^2$, $g(z) = \sqrt[3]{1+z}$. Find $g(f(x))$.

$1 + x$

$\left(\sqrt[3]{1+x}\right)^2$

$(\sqrt[2]{1+x})^3$

$1 - x^2$

I don't care

$\sqrt[3]{1+x^2}$

Graphs & Fun for 200.

The graph of $h(x) = x^2 - 3x + 1$

is a straight line passing by (0,0)

is a circle

consists of two straight lines

is a straight line and doesn't pass by (0,0)

None of the above

Math 95   Math Rocks

GameBoard

Full Screen

Quit

Graphs & Fun for 300.

When graphing the inequality $|2x + 3| \geq 10$ we obtain

all the real line

a small interval

an infinite interval

two intervals

Graphs & Fun for 400.

When graphing the inequality $|2x + 3| < 10$ we obtain

all the real line

a small interval

an infinite interval

two intervals

Surprise for 100.

The sum of the two shorter sides of a right triangle is 19. The area of the triangle is 44. Find the lengths of the two shorter sides.

22,2

10,9

4,15

10,4

11,4

none of them

Surprise for 200.

Carlitos' mom has 5 children, their names are Ta, Te, Ti, To, what is the name of the last one?

- You
- Tu
- none of them

Surprise for 300.

Find greatest common divisor of 45 and 30. Write your answer in the box.

Math 95   Math Rocks

GameBoard

Full Screen

Quit

Surprise for 400.

The sum of two numbers is -13. Their product is -30.
Write the numbers in the box

Example :   -3,+2

GameBoard

Full Screen

Quit