

| Wednesday | | | | | | | | | | | |
|---|---|----|----|----|---|------|----|---|----|---|---|
| <p>Factor the following expression.</p> $-6x^2 - 3x - 12x - 6$ $-3(2x^2 + x + 4x + 2)$ $\downarrow x(2x+1) + 2(2x+1)$ $-3(2x+1)(x+2)$ | | | | | | | | | | | |
| <p>Solve by elimination</p> $\begin{aligned} 2(3x + y) &= 8 \\ 2x - 2y &= -10 \end{aligned}$ $6x + 2y = 8$ $6x - 2y = -10$ <hr style="width: 50%; margin-left: 0;"/> $\frac{8x}{8} = \frac{6}{8} \quad x = \frac{3}{4}$ | $3\left(\frac{3}{4}\right) + y = 8 \quad \left(\frac{3}{4}, 5\frac{3}{4}\right)$ $\frac{9}{4} + y = 8 - \frac{9}{4}$ $-\frac{9}{4} \quad y = \frac{8 - 2\frac{1}{4}}{1} = 5\frac{3}{4}$ | | | | | | | | | | |
| <p>Find the average rate of change for $-3 < x < 4$ for</p> $f(x) = \frac{3}{2}x - 5$ <p>$x_1 = -3, x_2 = 4$</p> <p>$y_1 = -9.5, y_2 = 1$</p> $RoC = \frac{3}{2} = \frac{10.5}{7} = 6 - 5 = 1$ | $f(-3) = \frac{3}{2}(-3) - 5 = -4.5 - 5 = -9.5$ $f(4) = \frac{3}{2}(4) - 5 = 6 - 5 = 1$ | | | | | | | | | | |
| <p>Find the domain and range of the table below.</p> <table border="1" style="margin-left: 20px; border-collapse: collapse; text-align: center;"> <tr> <td>x</td> <td>-3</td> <td>8</td> <td>-2</td> <td>0</td> </tr> <tr> <td>F(x)</td> <td>-1</td> <td>3</td> <td>-1</td> <td>2</td> </tr> </table> | x | -3 | 8 | -2 | 0 | F(x) | -1 | 3 | -1 | 2 | $D: \{-3, -2, 0, 8\}$ $R: \{-1, 2, 3\}$ |
| x | -3 | 8 | -2 | 0 | | | | | | | |
| F(x) | -1 | 3 | -1 | 2 | | | | | | | |
| <p>Use the graph of $f(x)$ to answer the questions below.</p> <p>$f(1) = 2.5$</p> <p>$f(x) = -2, x = 4$</p> <p>RoC for $0 < x < 2$</p> $(0, 4) \quad (2, 1)$ $\frac{1 - 4}{2 - 0} = \frac{-3}{2}$ | | | | | | | | | | | |