Math.Econ.Anal.Quiz.2. 15.oct.5.

1. Compute $\lim_{n\to\infty}\left(1 - \frac{6}{5n}\right)^{3n-2}$!

2. Let $f(x) = 3x^2 - 5x$, $x_0 = 7$. Compute $\frac{f(x_0 + \Delta x) - f(x_0)}{\Delta x}$!

3. Let $f(x) = 3x^2 - 5x$, $x_0 = 7$. What is the prediction of the linear approximation of f around x_0 for the value of $f(7 + \Delta x)$?

4. Compute $((x + 3)\cos(4x))'$!