Precalculus: Homework
9/25 – 9/29

due: Wednesday: read pp. 74-76

1. pg. 83 / #29, 31, 33, 35, 36
2. Find the zeros of each function:
   a. $f(x) = x^3 - 25x$ b. $f(x) = 5x^3 - 5x^2 - 10x$ c. $f(x) = \frac{x+1}{x^2-4}$

Thursday: read pg. 205

pg. 210 / #43, 44, 47

Friday: read pp. 122-123, 127-129

1. Determine whether the given number pairs are in the given relation:
   a. $(1,2);\ x^3 + 3y = -1$ b. $(3,4);\ x^2 + y^2 = 25$ c. $\left(2, \sqrt{2}\right);\ x^3 - 3y^2 = 2$
2. Find a complete graph of the given parametric equations $x = t, y = t^2 - 3$ with the parameter *t* satisfying $-2 \leq t \leq 2$.
3. pg. 135 / #3, 4, 5

Monday: read pp. 129-132

1. pg. 136 / #41, 42
2. Write a pair of parametric equations that define the inverse relation for the given pair of parametric equations: $x = t^3 - 2, y = 2t$
3. Find a complete graph of both the given relation and its inverse for $-2 \leq t \leq 2$:
   (a) $x = 2t, y = t^2$ (b) $x = t - t^3, y = 2t$
4. Sketch a complete graph of the inverse of the relation given: