Quiz 3

Spring 2016

MATH 222-004

Name: _____

For full credit please explain all of your answers. **No calculators** are allowed.

Problem 1. Use rational substitution to find $\int \sqrt{x^2-4}\,dx$. For sake of time, you may leave your answer in terms of t, but you should know how to convert back to x.

Problem 2. Compute $\int \frac{1}{4x^2-8x-5}\,dx$. Recall that $\int \sec(\theta)\,d\theta = \ln|\sec(\theta)+\tan(\theta)| + C$.