Quiz #9, Friday October 30
Math 221 Lecture EL1

**Instructions.** Be sure to show your work and explain your reasoning where necessary for full credit. **This quiz has two problems. They are each worth five points.**

1. Find the most general antiderivative of the function \( g(t) = \frac{1 + t + t^2}{\sqrt{t}} \), and check your answer by differentiation.
2. Find $f(\theta)$ if $f''(\theta) = \sin(\theta) + \cos(\theta)$, $f(0) = 3$, and $f'(0) = 4$. 