Part I Problems

Problem 1: Find a particular solution to the DE

$$\ddot{x} + x = t^2 + \cos(2t - 1)$$

Problem 2: Find the general solution to

$$y'' + y' + y = 2xe^x$$

Problem 3: Find a particular solution to the DE

$$y^{(4)} - 2y'' + y = xe^x$$

18.03SC Differential Equations
Fall 2011