

- Show all your work for each problem; show enough work to fully justify your answer.
- Simplify all answers as far as possible.

(1) [Points: 20] Let  $x = y^5 + 5y^2 - 3$ . [NOTE: It should be  $x = y^5 + 5y^2 - 7$ .]

(a) Find  $dy/dx$ .

(b) Find the equation of the normal line at  $(-1, 1)$ .