Math 131 - 03 Quiz # 2 (B)

Name_____ Serial # _____

SHORT ANSWER. Write the word or phrase that best completes each statement or answers the question.

1) Suppose that consumers will demand 800 units of a product when the price is $10 per unit, and 1000 units when the price is $8 per unit. Find the demand equation for the product assuming that price p and quantity q are linearly related.

2) The demand function for a manufacturer's product is $p = f(q) = 600 - 2q$, where p is the price (in dollars) per unit when q units are demanded (per week). Find the level of production that maximizes the manufacturer's total revenue and determine this revenue.

3) Solve the following system algebraically: $\begin{cases} 3x - 4y = 18 \\ 2x + 5y = -11 \end{cases}$

4) Solve the system: $\begin{cases} x^2 + y - 3 = 0 \\ 2x + y = 0 \end{cases}$