

Name: _____
(please print clearly!)

Oligopoly Assignment

**Fill out this sheet tonight.
It must be turned in at the beginning of lecture on February 12**

You operate one of the two firms in the wholesale market for spring water. Market demand is given by: $P = 30 - Q$. Both firms have marginal costs of 0.

1. You and your rival choose output simultaneously without knowing the other's output choice. The market price adjusts to clear the market at the combined output level ($P=0$ if $Q \geq 30$). You play this game once.

What output level do you choose? _____

2. You expect to play this game for 10 periods. At the end of 10 periods, both firms' leases expire and the landowners have sold development rights to a company that plans to build large single-family housing developments.

What output level do you choose for the first period? _____

3. Suppose that the tank truck operator who transports water between the springs and the bottling plants announces that she will pump and transport all the output selected by one firm to the bottling plants, then come back to pump and transport the output designated by the second firm. Output decisions are not final until the water is pumped into the trucks. You expect to play this game once.

Would you prefer to schedule your production first or second? _____

What output level do you choose? _____

4. Suppose that you set price, not output. The wholesalers will buy from the firm with the lowest price, the quantity to be determined by the market demand curve. If both prices are the same, each firm will each provide half the market demand at that price. You and your rival set price simultaneously without knowing the price set by the other firm. You play this game once.

What price do you choose? _____