

Problem 6.1

Table 6.7: Experimental Results in Session 1

| | |
|---|----------|
| Mean Price | \$22.93 |
| Number of Lawn Ornaments Sold | 15 |
| Total Profits of Sellers from Transactions | \$69.00 |
| Total Profits of Buyers from Transactions | \$146.00 |
| Total Cost of Pollution | \$300.90 |
| Total Profits of All Residents, Net of Pollution Costs | -\$85.90 |

Problem 6.2

Table 6.8

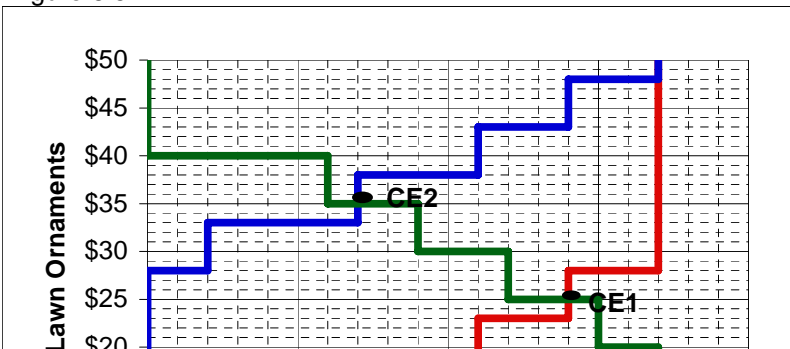
| | |
|---|----------|
| Mean Price | \$31.71 |
| Number of Lawn Ornaments Sold | 7 |
| Total After-Tax Profits of Sellers from Transactions | -\$4.00 |
| Total Profits of Buyers from Transactions | \$38.00 |
| Total Tax Revenue | \$140.00 |
| Total Cost of Pollution | \$140.42 |
| Total Profits and Tax Revenue of All Residents, Net of Pollution Costs | \$33.58 |

Problem 6.3

Table 6.9: Experimental Results in Session 3

| | |
|--|----------|
| Mean Price of Ornaments | \$29.25 |
| Mean Price of Permits | \$8.06 |
| Number of Lawn Ornaments Sold | 8 |
| Profits of Lawn Ornament Sellers from Transactions | \$50.50 |
| Profits of Lawn Ornament Buyers From Transactions | \$71.00 |
| Total Revenue of Permit Sellers | \$64.50 |
| Total Cost of Pollution | \$160.48 |
| Total Profits of All Residents, Net of Pollution Costs. | \$25.52 |

Figure 6.5



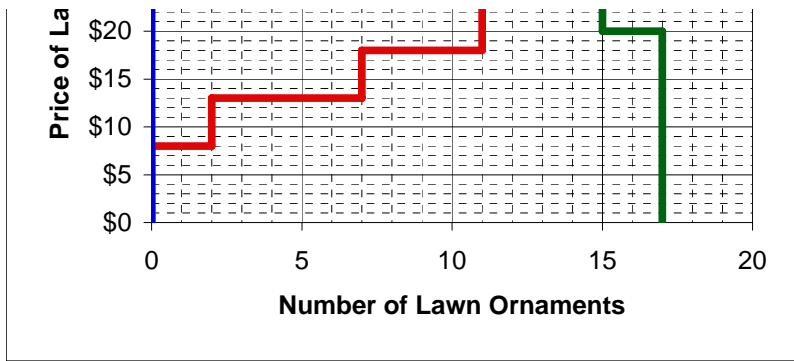


Table 6.10: Predictions of the Theory: Session 1

| | |
|--|----------|
| Mean Price | \$25 |
| Number of Lawn Ornaments Sold | 14 |
| Total Profits of Sellers from Transactions | \$128.00 |
| Total Profits of Buyers from Transactions | \$135.00 |
| Total Cost of Pollution | \$280.84 |
| Total Profits | -\$17.84 |

Problem 6.6

Part a) Shifts the supply curve up by \$20.

Part b) No effect on demand curve.

Problem 6.7

Table 6.11: Predictions of the Theory-Session 2

| | |
|--|----------|
| Mean Price | \$35.00 |
| Number of Ornaments Sold | 7 |
| Total Profits of Buyers | \$30.00 |
| Total Profits of Sellers | \$24.00 |
| Total Tax Revenue | \$140.00 |
| Total Cost of Pollution | \$140.42 |
| Total Profits and Tax Revenue of All Residents, Net of Pollution Costs | \$53.58 |

The total income of all residents is higher when the pollution tax is imposed.

Problem 6.8

Competitive equilibrium prediction for price of ornaments is \$35.00

Competitive equilibrium prediction for quantity of ornaments is 8

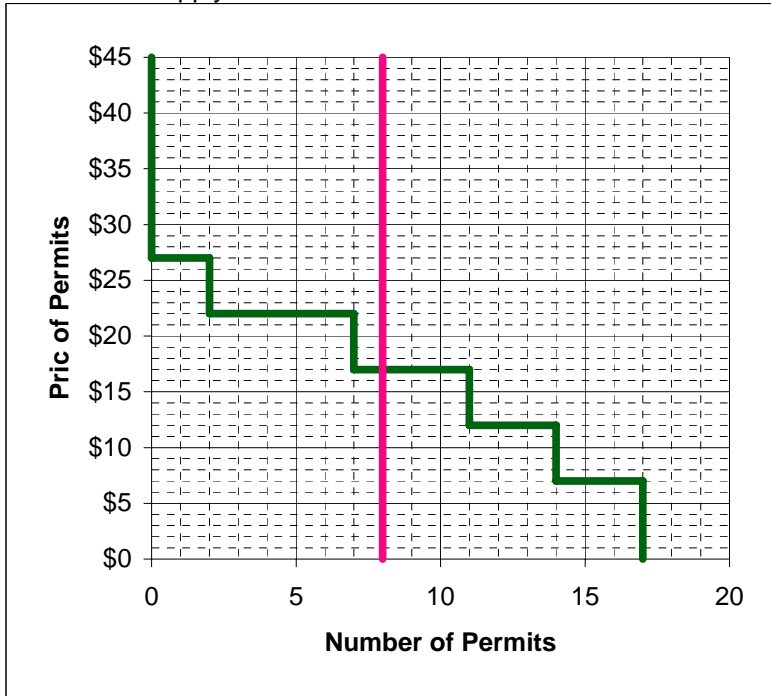
Problem 6.9

Table 6.12: Willingness to Pay for Pollution Permits

| Seller | Number in Market | Willingness to Pay for a Permit |
|--------|------------------|---------------------------------|
| 8 | 2 | \$27.00 |
| 13 | 5 | \$22.00 |
| 18 | 4 | \$17.00 |
| 23 | 3 | \$12.00 |
| 28 | 3 | \$7.00 |

Problem 6.10

Table 6.6: Supply and Demand for Permits.



These curves intersect where the price of permits is \$17