

# mobius

## **Quadratic Equation Word Problem To** Optimization (x) - Revenue with Price



### Change

Α

## What price would maximize

A movie theater sells 70 tickets for \$3 each. For every \$0.08 increase in price 1 fewer will be sold.

the revenue?

p	=	\$0.	01	p	=	\$0.	04

В

2

A movie theater sells 70 tickets for \$7 each. For every \$0.08 increase in price 1 fewer will be sold.

What price would maximize the revenue?

3

What price would maximize the revenue?

A lemonade stand sells 40 drinks for \$4 each. For every \$0.05 increase in price 1 fewer will be sold.

A B 
$$p = \$0.01$$
  $p = \$0.02$ 

4

A movie theater sells 40 tickets for \$8 each. For every \$0.08 increase in price 1 fewer will be

What price would maximize the revenue?

$$\begin{array}{l}
 & A \\
 & p = $0.03 \\
 & p = $0.02
 \end{array}$$

5

#### What price would maximize the revenue?

A lemonade stand sells 20 drinks for \$10 each. For every \$0.11 increase in price 1 fewer will be sold.

$$\begin{array}{l}
 \mathbf{p} = \$0.06 \\
 \mathbf{p} = \$0.00 \\
 \mathbf{p} = \$0.01
 \end{array}$$

A movie theater sells 60 tickets for \$10 each. For every \$0.10 increase in price 1 fewer will be sold.

What price would maximize the revenue?

$$\frac{A}{p} = \$0.05$$
  $\frac{B}{p} = \$0.10$   $\frac{C}{p} = \$0.03$ 

7

What price would maximize the revenue?

A movie theater sells 100 tickets for \$4 each. For every \$0.06 increase in price 1 fewer will be sold.

A lemonade stand sells 90 drinks for \$11 each. For every \$0.11 increase in price 1 fewer will be sold.

What price would maximize the revenue?

p = \$0.05	p = \$0.09
p = \$0.11	