

Defn: Demand Elasticity of an object = $(1 + \epsilon) = \left[1 + \frac{P}{Q} \cdot \frac{dQ}{dP} \right]$

$|\epsilon| > 1$: Good being considered is price elastic

Hence: percentage change in $Q >$ percentage change in price
 $\% \Delta Q > \% \Delta P$

★ Conclude: From lower prices, total revenue increased. | From increase price, total revenue decreases.

Defn: ① $|\epsilon| > 1$, Then say that the good is price elastic ($|\epsilon| > 1 \leftrightarrow \epsilon < -1 \rightarrow R'(P) < 0$)

② $|\epsilon| < 1$, Then say that the good is price inelastic ($|\epsilon| < 1 \leftrightarrow \epsilon$ between 0 & -1)

$|\epsilon| < 1$: Good is price inelastic

$$\% \Delta Q < \% \Delta P$$

★ Conclude: Price of good should be increased to have a higher revenue.

③ $|\epsilon| = 1$, Then say that the good is limit elastic ($|\epsilon| = 1 \leftrightarrow \epsilon = -1$)

$|\epsilon| = 1$: Good is price unit elastic

$$\% \Delta Q = \% \Delta P$$

★ Conclude: Revenue maximized at the price point.

