

# Quiz #4 ELASTICITY

MID POINT FORMULA :

$$\epsilon_p = \frac{\frac{Q_2^D - Q_1^D}{\frac{(Q_2^D + Q_1^D)}{2}}}{\frac{(P_2 - P_1)}{\frac{(P_2 + P_1)}{2}}}$$

#1.

$$\frac{\frac{(8,000 - 6,000)}{\frac{(8,000 + 6,000)}{2}}}{\frac{(25 - 28)}{\frac{(25 + 28)}{2}}} = -2.52$$

ELASTIC

TR<sub>AFTER</sub> = 2,000  
TR<sub>BEFORE</sub> = 1,680  
+ 320

IF THE PRICE INCREASES BY 1%,  
THE QUANTITY DEMANDED WILL  
FALL BY 2.52%, C.P.

#2.

$$\frac{\frac{(25 - 20)}{\frac{(20 + 25)}{2}}}{\frac{(0.35 - 0.5)}{\frac{(0.35 + 0.5)}{2}}} = 0.629$$

INELASTIC

TR<sub>A</sub> = 8.75  
TR<sub>B</sub> = 10  
- 1.25

IF THE PRICE DECREASES BY 1%, THE  
QUANTITY DEMANDED WILL INCREASE BY 0.629%  
C.P.