

1. Suppose that the demand function for mobile phones takes the more general form $q(p) = (p + a)^{-b}$ where $a > 0$ and $b > 1$, (a) Calculate an expression for the price elasticity of demand at price p . (b) At what price, such product is said to be price inelastic? (10%)
2. Please explain why an oligopolistic producer could obtain an abnormal profit and demonstrate why overall welfare under oligopoly is less than that under perfect competition (15%)
3. Please show the deadweight welfare change of price ceilings, compared to the market without regulation. (15%)
4. Suppose that the production function is $f(x_1, x_2) = (x_1^a + x_2^a)^b$, where a and b are positive constants. For what positive values of a and b are there decreasing returns to scale? (10%)
5. Explain why Friedman's natural rate hypothesis is not compatible with the classical model? (10%)
6. Please explain the relationship between the production function and the labor demand curve? (10%)
7. Please explain an increase in government spending with flexible exchange rates and perfect capital mobility. (15%)
8. Compare the role of aggregate demand in determining output and employment and the relative importance of monetary and other factors as determinants of aggregate demand in the classical model with the Keynesian system. (15%)