

國立臺北大學 104 學年度碩士班一般入學考試試題

系(所)組別：國際企業研究所

科目：經濟學

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可 不可使用計算機

1. Between July 2014 and January 2015 the price of oil plunged over 55%. The ostensible reason for the price fall was that the Saudis had refused to agree to production decreases being pushed by some OPEC members, instead choosing to let the market play out for the time being. On the other hand, Therramus (2009) pointed out that Black Monday fell into a broader pattern in which nearly every stock market crash and recession of the preceding 50 years had occurred shortly after a large and abrupt change in the price of oil. In the case of the 1987 stock market crash, it was foreshadowed by a tumble in oil price.
 - (1) (10%) Please graphically explain the effect of the collapse of oil price on the price level, rate of interest, output, import and export for OPEC members.
 - (2) (10%) Please graphically explain the effect of the collapse of oil price on the price level, rate of interest, output, import and export for Taiwan economy.
 - (3) (10%) Will collapse in oil price cause a stock market crash? Why or why not?
2. (10%) What is the fundamental balance of payments identity? Is it possible for a country to have a current account deficit at the same time it has a surplus in its balance of payments?
3. (10%) Suppose domestic borrowers borrow foreign debt in terms of US dollars. Please explain the effect on the balance sheet of domestic borrowers when there is an unexpected appreciation in the exchange rate.
4. Consider a duopoly where the demand and cost functions are:
 $p = 200 - 2(q_1 + q_2)$, $c_1 = 4q_1$ and $c_2 = 2q_2^2$.
Assume that each firm maximizes his profit on the assumption that the quantity produced by his rival is invariant with respect to his own quantity decision.
 - (1) Derive each firm's quantity reaction function. (10%)
 - (2) Determine equilibrium values of price, quantity and profit for each firm. (10%)
5. Suppose the duopolists in question 1 recognize their mutual interdependence and agree to act in unison in order to maximize the total profit of the industry. Solve for q_1, q_2 and the profit level. (15%)
6. Connection between risk aversion and insurance:
Consider an individual with a current wealth of \$100,000 who faces the prospect of a 20 percent chance of losing his or her \$20,000 automobile through theft during the next year. Assume this person's von Neumann-Morgenstern utility index is logarithmic-that is, $U(w) = \ln(w)$.
 - (1) What will be the expected utility if this person faces next year without insurance? (5%)
 - (2) In this situation a fair insurance premium would be \$4,000 (20 percent of \$20,000, assuming that the insurance company has only claim costs and that administrative costs are zero). Consequently, what will be the expected utility if this person completely insures the car? (5%)
 - (3) If this person is required to pay administrative costs in addition to \$4,000 premium, what will be the maximum amount of administrative costs this person is willing to pay? Even when such costs are paid, this person is as well off as he or she would be forced to face the world uninsured. (5%)

試題隨卷繳交