IB - Managerial Economics

Session 1- Managerial Economics theory

Discussion Questions

1. What is the difference between the science of economics in general and of managerial economics?

2. How does the theory of the firm provide an integrated framework for the analysis of managerial decision-making across the functional areas of business?

3. What effect would each of the following have on the value of the firm:
   a) A new advertising campaign increases the sales of the firm substantially.
   b) A new competitor enters the market.
   c) The production department achieves a technological breakthrough that reduces production costs.
   d) The firm is required to install pollution control equipment.
   e) The workforce votes to unionise.
   f) The rate of interest rises.
   g) The rate of inflation changes.

4. Why is it crucial to introduce an international dimension into managerial economics?

Problems:

1. The owner of a firm expects to make a profit of 100 units for each of the next two years and to be able to sell the firm at the end of the second year for 800 units. The owner of the firm believes that the appropriate discount rate for the firm is 20%. Calculate the value of the firm.

2. Determine which of two investments projects a manager should choose if the discount rate of the firm is 10%. The first project promises a profit of 100,000 units in each of the next four years, while the second project promises a profit of 75,000 units in each of the next six years.

3. The cost of attending a private college for one year is 6,000 for tuition, 2000 for the room, 1500 for meals, and 500 for books and supplies. The student could also have earned 15000 by getting a job instead of going to college and 10% interest on expenses he or she incurs at the beginning of the year. Calculate the explicit, implicit and the total economic costs of attending college.

4. A lady managing a photocopying establishment for 25,000 per year decides to open her own business place. Her revenue during the first year of operation is 120,000 and her expenses are as follows:

Salaries to hired help	45,000
Supplies	15,000
Rent	10,000
Utilities	1,000
Interest on bank loan	10,000

Calculate a) the explicit costs b) the implicit cost c) the business profit, c) the economic profit, and d) the normal return on investment in the business

5. Samantha Jones has a job as a pharmacist earning 30,000 units per year, and she is deciding whether to take another job as a manager of another pharmacy for 40,000 units per year or to purchase a pharmacy that generates revenue of 200,000 units per year. To purchase the pharmacy, Samantha would have to use her 20,000 savings and borrow another 80,000 at an interest rate of 10% per year. The pharmacy that Samantha is contemplating purchasing has additional expenses of 80,000 for supplies, 40,000 for hired help, 10,000 for rent and 5,000 for utilities. Assume that income and business taxes are zero and that repayment of the principal of the loan does not start before three years.

   a) What would be the business and economic profit if Samantha purchased the pharmacy? Should Samantha purchase the pharmacy?

   b) Suppose that Samantha expects that another pharmacy will open nearby at the end of three years and that this will drive the economic profit of the pharmacy to zero. What would the revenue of the pharmacy be in the fourth year?

   c) Suppose that Samantha expects to sell the pharmacy at the end of three years for 40.000 less than the price she paid for it and that she requires a %15 return on her investment. Should she still purchase the pharmacy?