



**UNIVERSITI KUALA LUMPUR
BUSINESS SCHOOL**

**FINAL EXAMINATION
JULY 2024 SEMESTER**

COURSE CODE	: EGB30903
COURSE NAME	: PUBLIC FINANCE
PROGRAMME NAME	: BACHELOR OF SCIENCE (HONS) IN ANALYTICAL ECONOMICS
DATE	: 23 SEPTEMBER 2024
TIME	: 9.00 AM – 12.00 PM
DURATION	: 3 HOURS

INSTRUCTIONS TO CANDIDATES

1. Please **CAREFULLY** read the instructions given in the question paper.
2. This question paper has information printed on both sides of the paper.
3. This question paper consists of **TWO (2) Parts; Part A and Part B**. **60 marks** are allocated for **Part A** and **40 marks** are allocated for **Part B**.
4. Answer **ALL Questions in Part A and Part B**.
5. Please write your answers on the answer booklet provided.
6. All questions must be answered in **English** (any other language is not allowed).
7. This question paper must not be removed from the examination hall.

THERE ARE FOUR (4) PAGES OF QUESTIONS, INCLUDING THIS PAGE.

PART A (60 marks)

INSTRUCTION: Part A carries 60 marks, and each question bears 30 marks. Answer both questions in this part.

Question 1 (30 marks)

Consider that Majlis Bandaraya Klang (MBK) or Klang City Council is considering building a small bridge that will connect the area of school complex to the town across the river. The proposal for this project is currently in motion for the approval from the state government and it will be financed through the state tax collection. This project is expected to cater a lot of potential users in promoting better efficiency in terms of time spent by the public as the bridge is going to connect the most concentrated area to the small town, with which the business activities in that area will further flourish due to the expected inflow of the residents across the river.

However, upon knowing that there will be another bridge to be built, the local development unit of the council has discovered that not everyone is happy with the project. Further research and interviews conducted among the neighbourhood reveals some findings:

1. School bus operators are dissatisfied with the project as there will be a decline in income as parents who live on the town side will now walk their children to school.
2. Parents who live in town area that are currently sending their children to school by driving across the existing bridge are happy since they can simply drop off their children to walk across the new bridge.
3. Local fishermen are somewhat indifferent with building of the bridge. On one hand, the construction will disrupt their fishing activities as the area yields the most catch on average. On the other hand, they are also keen to have the bridge completed as their cost of sending their children are going to be reduced, although not significantly.

The chairman of MBK believes that everyone in that area should be benefiting from the building of the new small bridge, but he also knows that at one point, a sort of policy must be implemented to accommodate the parties that are going to be negatively impacted from the building of this small bridge.

- (a) Based on the passage above, do you think that Lindahl pricing strategy for the bridge will give the best result to MBK? Briefly explain.

(3 marks)

- (b) Suppose the total number of three categories of potential beneficiaries in the passage above is equally distributed, determine the outcome of the survey if MBK decides to exercise three rounds of pairwise voting system for all parties.

(9 marks)

- (c) Suppose that MBK would like to have the school bus operators subsidized with fuel incentive if and only if the construction of the bridge is approved through high payment of tax. Show the result of this special privilege through a new pairwise voting system of three rounds. Then, show the result by illustrating a new Arrow's impossibility theorem. Analyse your answer whether this proposed project achieves the final decision.

(18 marks)

Question 2 (30 marks)

- (a) There are **THREE (3)** policy options that a government may be able to choose in the effort of internalizing the externalities. Analyse the policy options with the support of relevant diagram(s).

(15 marks)

- (b) A particular industry of a country has a relatively steep marginal damage (MD) curve of environmental degradation. The government would like to propose a solution that will internalize the damage inflicted within the industry. However, the government may have vague knowledge of the industrial marginal cost (MC) which could possibly lead to a higher or even lower actual MC. Using this information, evaluate the policy option that is best for this industry if the actual MC is higher than what has been assessed by the government.

(15 marks)

Part B (40 marks)

INSTRUCTION: Part B carries 40 marks, and each question bears 20 marks. Answer both questions in this part.

Question 3 (20 marks)

There are 20 students enrolled in EGB30903 Public Finance in this semester. Usually, out of those 20 students, eight of those are constantly coming late to the class. This has caused the lecturer to explain what they have missed in the first hour of the lecture, consequently leaving the early and punctual students to wait until the lecturer is able to finish imparting the information again to them.

- (a) Based on the passage above, describe whether this is a negative or positive form of externalities.
(2 marks)
- (b) Based on the externality concept, identify the party that has to bear all the costs of the latecomers. Briefly explain why.
(5 marks)
- (c) Is it fair if the lecturer penalises the latecomers by not allowing them to scan their attendance? Explain this situation in accordance with your understanding of the costs and benefits of private and social context.
(8 marks)
- (d) Based on your answer in (c), show diagrammatically the relationship between these costs.
(5 marks)

Question 4 (20 marks)

Consider that a government would like to impose taxes on several goods in different markets that have different elasticities of both demand and supply curves. Evaluate **ALL FOUR (4)** of the possible effects of taxation on the burden of producers and consumers using the **elasticity properties** of both demand and supply curves.

(20 marks)

END OF EXAMINATION PAPER