

CONFIDENTIAL



UTHM
Universiti Tun Hussein Onn Malaysia

UNIVERSITI TUN HUSSEIN ONN MALAYSIA

**FINAL EXAMINATION
SEMESTER II
SESSION 2021/2022**

- COURSE NAME : CONTRACT AND ESTIMATION
- COURSE CODE : BFC 31602
- PROGRAMME CODE : BFF
- EXAMINATION DATE : JULY 2022
- DURATION : 2 HOURS 30 MINUTES
- INSTRUCTION
1. ANSWER ALL QUESTIONS.
 2. THIS FINAL EXAMINATION IS AN **ONLINE** ASSESSMENT AND CONDUCTED VIA **CLOSE BOOK**.
 3. STUDENTS ARE **PROHIBITED** TO CONSULT THEIR OWN MATERIAL OR ANY EXTERNAL RESOURCES DURING THE EXAMINATION CONDUCTED VIA CLOSED BOOK

THIS QUESTION PAPER CONSISTS OF **SIX (6)** PAGES

CONFIDENTIAL

TERBUKA

Q1 (a) Your construction company is planning to submit a tender document for tendering a double storey bungalow project. If the company is being successfully in the tendering process and awarded as the main contractor, you need to prepare all necessary contract matters. Explain **FIVE (5)** essential elements that need to be understood before a contract between the bidder and the owner is formed. (Open Ended, C2)

(15 marks)

(b) **Figure Q1** shows an example of a relatively severe building failure during construction work due to negligence and errors during the design and construction processes. (Open Ended, C3)

(i) Based on the statement in the **Figure Q1**, suggest **TWO (2)** reasons which the building owner can use to terminate the contract of the contractor involved and justify your answer.

(6 marks)

(ii) There are certain rights stipulated in the contract document to protect the interests of innocent party, which in this particular case, the building owner. Suggest **TWO (2)** forms of action that can be taken by the building owner against the contractor involved.

(4 marks)

Q2 (a) As a project engineer, you are responsible for overseeing and coordinating the construction of the project site, as well as communicating with project team members and contractors to resolve any technical issues that emerge. You are in charge of a new industrial building construction project, and you need to approve the main contractor site possession as soon as possible so that they can enter the site and start the project. Based on Clause 28, Condition of Contract, PWD 203A, with appropriate example, discuss the circumstances that allow you to delay in giving approval of site possession to the main contractor. (Open Ended, C3)

(10 marks)

(b) Advanced payment is a financial aid serves as a capital (cash flow) for contractor to commence the works. Based on the information given, determine the amount of advanced payments that the contractor is eligible to be paid for. C3

Contract Value	=	RM	3,500,000.00
Prime Cost Sum	=	RM	300,000.00
Provisional Cost Sum	=	RM	200,000.00

(3 marks)

- (c) The advanced payment shall be recouped when the value of the works executed and certified in the progress payment certificates reaches a certain percentage of the total contract value. This also shall be based on the recoupment formula provided for in the terms of the contract. Based on the information given, determine the total recoupment of advanced payment from the contractor's progress claim. C3

Contract value	=	RM	13,800,500.00
Prime Cost Sum	=	RM	100,500.00
Provisional Cost Sum	=	RM	100,500.00
Value of work done	=	RM	3,500,000.00
Value of materials on site	=	RM	20,000.00

(12 marks)

- Q3** (a) Universiti Tun Hussein Onn Malaysia plans to build a new branch university campus in Pengerang Johor which will include four faculties. However, the short-term allocation to fund the project is insufficient. Suggest and explain the most suitable type of construction contract for the project to overcome this financial constraint in funding the project. State **TWO (2)** advantages and **TWO (2)** disadvantages of the suggested type of construction contract. (Open Ended, C4)

(10 marks)

- (b) Ilham Jaya Berhad is a developer company that plans to hold a community service (CSR) project to construct houses for flood victims in Terengganu and Kelantan who have lost their homes. Based on this urgency, the construction of these houses needs to be expedited. Suggest **TWO (2)** construction contract approaches based on the contractor's responsibilities and the payment methods respectively for this CSR project. Describe **TWO (2)** advantages of each selected construction contract that are appropriate in the context of the CSR project. (Open Ended, C3)

(10 marks)

- (c) With the aid of sketches, describe the responsibilities of each party involve in the traditional construction contract. C2

(5 marks)

Q4 (a) A preliminary estimate is an estimate of the project's cost that is calculated during the conceptual stage, before detailed information is available. Using an appropriate example, differentiate how the following preliminary estimate methods are calculated; (C4)

(i) Floor Area Method

(4.5 marks)

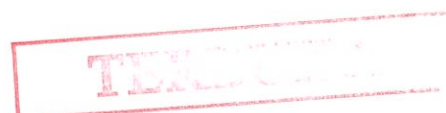
(ii) Volume Method

(4.5 marks)

(b) **Figure Q4** depicts the design of a one-bedroom studio apartment in Bangsar, Kuala Lumpur. The wall thickness is 112.5 mm. According to historical data, the cost of a similar design is RM 1,500 per square meter. Using the floor area method, provide a cost estimate for the studio apartment. C3

(16 mark)

- END OF QUESTIONS -



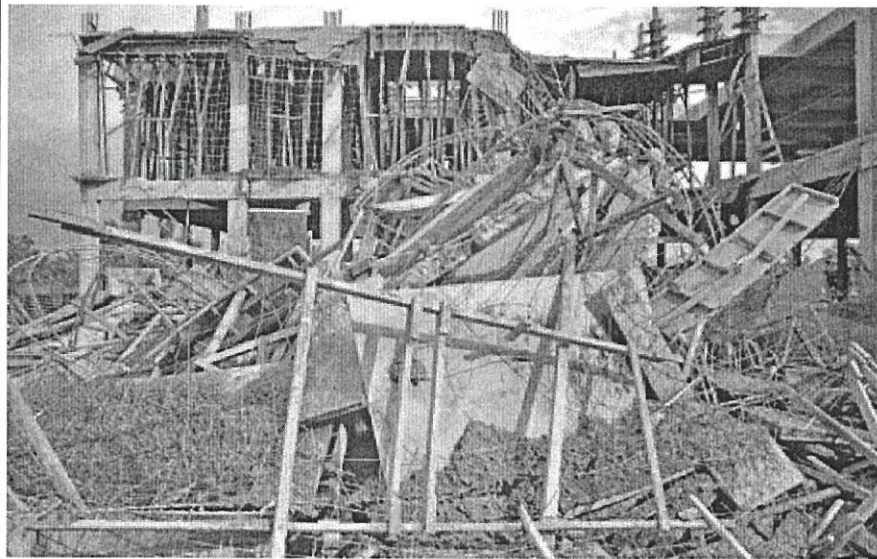
FINAL EXAMINATION

SEMESTER/SESSION : SEM II 2021/2022
COURSE NAME : CONTRACT AND ESTIMATION

PROGRAMME CODE : BFF
COURSE CODE : BFC 31602

6. Four Foreign Workers Escape Death after Structure of a Shop House Under-Construction Collapses at Telok Gong, Port Klang

The structure of second floor collapsed when the workers were carrying out the concrete works on the first floor of a double-storey shop lot at Telok Gong, Port Klang on 23rd January 2016 around 3pm.



Source

One out of four workers rushed to the Tunku Ampuan Rahimah Hospital in Klang for treatment due to broken arm and another three workers experienced light injuries said Mohd Sani Harul who is the Selangor Fire and Rescue Department assistant director of operations.

The structures are not strong enough that caused collapsed might be the possible reason why the second floor collapsed while the first floor did not affected by the loading of rubble fell on it. It shows that the structure of the first floor at the part of building under-construction is stronger than the structure of second floor.

Figure Q1



FINAL EXAMINATION

SEMESTER/SESSION : SEM II 2021/2022
COURSE NAME : CONTRACT AND ESTIMATION

PROGRAMME CODE : BFF
COURSE CODE : BFC 31602

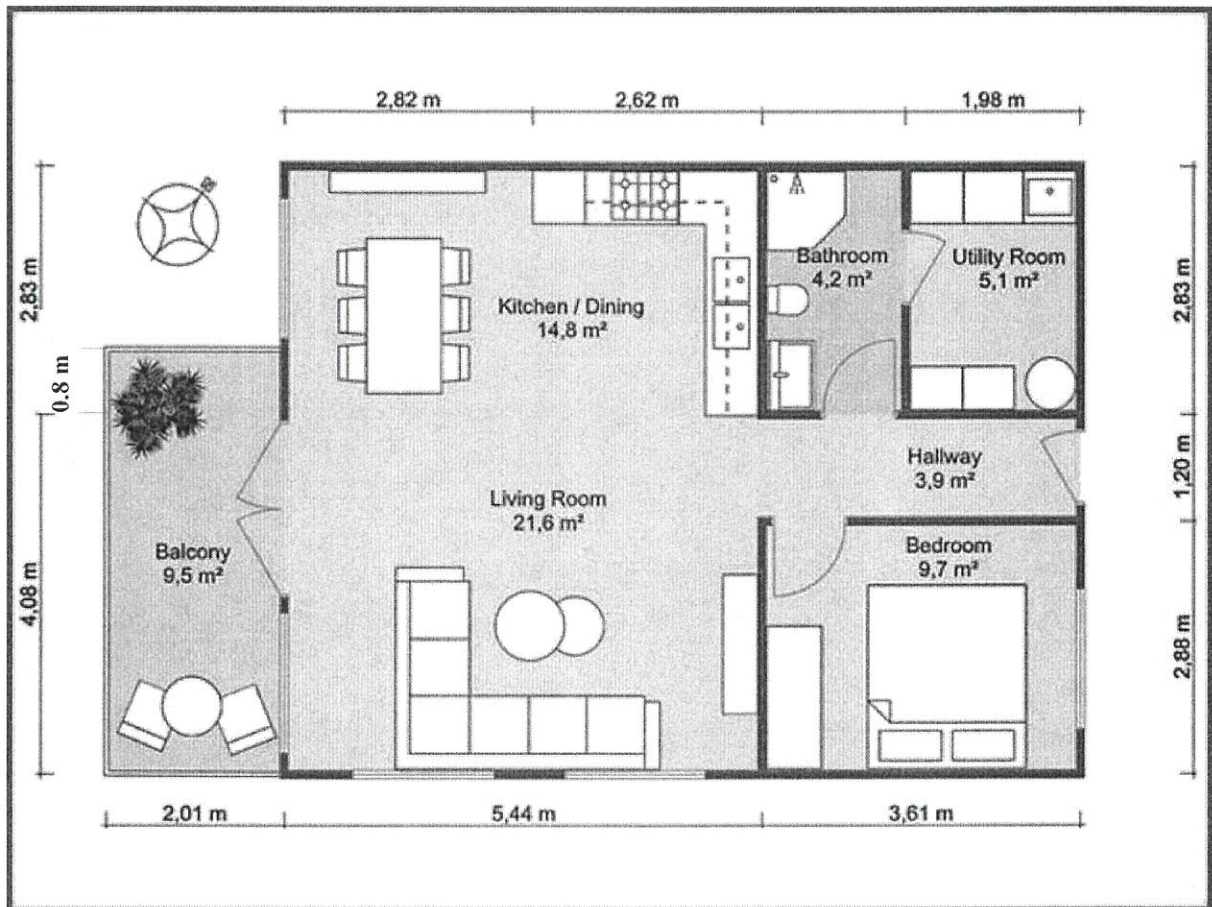


FIGURE Q4
(All dimensions are measured centre to centre)

