## CONFIDENTIAL



# **UNIVERSITI TUN HUSSEIN ONN MALAYSIA**

# FINAL EXAMINATION (ONLINE) SEMESTER II SESSION 2019/2020

COURSE NAME	: ALGORITHM AND PROGRAMMING
COURSE CODE	: BIC 10204
PROGRAMME CODE	: BIS / BIM
EXAMINATION DATE	: JULY 2020
DURATION	: 3 HOURS
INSTRUCTION	<ul> <li>1. ANSWER ALL QUESTIONS.</li> <li>2. PLEASE MAKE SURE TO CLICK "SAVE ANSWER" BUTTON FOR SUBJECTIVE QUESTIONS. OBJECTIVE QUESTIONS ARE SAVED AUTOMATICALLY.</li> </ul>

THIS QUESTION PAPER CONSISTS OF THREE (3) PAGES

CONFIDENTIAL

#### BIC10204

### CONFIDENTIAL

Q1

(a) Write a while statement that print the value of an integer number for 10 times.

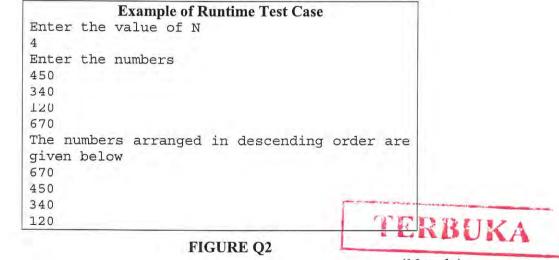
(10 marks)

(b) By using if ... else statement and looping in Q1 (a), write a program that check whether the number is an odd number. If the integer is an odd number, print the value. Given x = 0 and  $x \le 10$ .

(9 marks)

- Q2 Write a program that will implement a one-dimensional array and sort the array in descending order. The steps are as follows.
  - i. Start
  - ii. Declare an array, a of some fixed capacity, 30
  - iii. Take the size of the array as input from the user.
  - iv. Define all the elements of the array using for loop.
  - v. Sort the elements of the array in descending order.
  - vi. Print sorted elements of the array as a final output.
  - vii. Exit

Refer to the above description and the example of the runtime test case in Figure Q2.



(16 marks)

## CONFIDENTIAL

Q3 (a)

You are going to develop a grade scoring system which will print out the user current test mark and grade. You are required to use function and if ... else statement to determine their grade and mark and at the end of the program it will print out the user's mark and grade.

TABLE Q3(a)		
Marks	Grade	
80 - 100	A	
60~79	В	
41~59	e	
0~40	D	

(10 marks)

(b) Write C Program using function that will display e-wallet interface. The program will prompt the user to choose the operation (each of operation has their own function (receive and return function definition). The e-wallet current balance is RM10. U are also required to TOP-UP RM5 into the system

Continue? N Thank you for using e-wallet	TERBUKA
successful. Your balance after transfer: B	
Your transfer to phone number 012-3456789 is	
Enter the amount u wanted to transfer.	
to: 012-3456789	
Enter the phone number u wanted to transfer	
Continue? (Y/N) Enter your choice. 3	
Your New Balance is: A	
Enter your choice: 2	
Continue? Y	
Your Balance is: 10	
Enter your choice: 1	
3. Transfer	
2. Top Up	
1. Check Balance	

FIGURE Q3 (b)

(15 marks)

### - END OF QUESTIONS -