

STUDENT'S NAME:			
ID NO:			
UNIT CODE AND TITLE: FIT3143 PARALLEL COMPUTING			
SEM/YEAR: 2/2019			
CAMPUS: CLAYTON/MALAYSIA			
ASSIGNMENT 2 - DEMONSTRATION WITH Q&A (10 MARKS)			
ASSESSOR:			
DATE:		TIME:	

PART A: ASSIGNMENT DEMONSTRATION

	Criteria	Marks	0 (Unacceptable)	1 (Weak)	2 (Satisfactory)	3 (Good)	4 (Excellent)	Rating Awarded by Assessor (1 - 4)	Scaled marks	Comments
1	Implementation of Wireless Sensor Network (WSN) rules: Analysis of program at runtime and generated log file/s Important: All messages to be logged must be sent from the nodes to the base station.	3	No program to execute	Unable to meet the event detection criterion as per the assignment specifications. Program crashes or hangs at runtime.	Meets the event detection criterion as per the assignment specifications with moderate logging information (i.e., lack of proper timestamp, no activation value, etc.). Program does not terminate properly.	Meets the event detection criterion as per the assignment specifications with good logging information, which includes correct timestamp information (Date&Time), event reporting node detail, adjacent node details and reported activation values. Program terminates properly.	Meets the Event Detection Criterion as per the assignment specifications with excellent logging information, which includes correct timestamp information (Date&Time), event reporting node details (Node number, IP and/or MAC addresses), adjacent node details (Node number, IP and/or MAC addresses), communication time between nodes and base-station, reported activation values , summary of communication between the nodes and summary of activations. Program also terminates properly.		0	

2	Encryption/Decryption of messages	2	No program to execute	No encryption and/or decryption algorithm applied	Correctly encrypts and decrypts the messages sent between the nodes and to the base station, but no OpenMP implementation in the encryption/decryption algorithm.	Correctly encrypts and decrypts the messages sent between the nodes and to the base station, with OpenMP implementation in the encryption/decryption algorithm. However, no visible speed up is observed or reported in the log files.	Correctly encrypts and decrypts the messages sent between the nodes and to the base station, with OpenMP implementation in the encryption/decryption algorithm with speed up greater than 1 (Speed up needs to be mentioned in the report)		0	
3	Program requires fewer than four message per event being reported to the base-station	1	No program to execute	More than seven messages per event being reported to the base-station.	Six to seven messages per event being reported to the base-station.	Four to five messages per event being reported to the base-station.	Less than four messages per event being reported to the base-station.		0	
4	Submitted code is well structured, commented and easy to understand	1	No submitted code	Poorly structured code with weak or no modularity, no proper code indentation and little or no comments	Some form of proper code structure and modularity is visible, code is properly indented, basic comments included.	Proper code structure and modularity is visible, code is properly indented, detailed comments included.	Excellent code structure and modularity is visible (e.g., multiple C files with each file containing module/s representing a base station or node), code is properly indented, detailed comments included, proper use of MAKEFILE to compile multiple C files.		0	
Sub-Total (7 marks)									0	

PART B:Q&A										
	Criteria	Marks	0 (Unacceptable)	1 (Weak)	2 (Satisfactory)	3 (Good)	4 (Excellent)	Rating Awarded by Assessor (1 - 4)	Scaled marks	Comments
1	Describing the IPC algorithm design, implementation, results and analysis.	3	The student has not prepared, cannot answer event the most basic questions and likely has not even seen the code before.	The student may have seen the code before and can give some very basic answers. However, the student clearly can't engage in a serious discussion of the code and demonstrates a poor understanding of the algorithm/code	The student may have seen the code before and can give answers that are partially correct but he/she clearly can't engage in a serious discussion of the algorithm/code	The student is reasonably well prepared and can consistently provide answers that are mostly correct. The student may lack confidence or speed in answering.	The student has clearly prepared and understands the code. The student can answer questions correctly and concisely with little to no prompting.		0	
Sub-Total (3 marks)									0	
Total (10 marks)									0.00	