

Name : _____ Matric No : _____ Date : _____	<b>SCSJ 1013</b> <b>Programming Techniques I</b>
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Write a complete program that calculates the total and the average of marks for any number of subjects taken by a student. The marks are stored in a dynamically allocated array. Basically, the program will perform the following tasks:

- i. Prompt the user to enter the number of subjects taken by the student.
- ii. Create an array with a dynamically allocated memory to hold the specified number of marks.
- iii. Prompt the user to enter the marks for each subject and store them in the allocated array.
- iv. Calculate total of the marks.
- v. Calculate average of the marks.
- vi. Display the output (total marks and average).
- vii. Free the allocated memory and make the pointer point to null.

The output of the program would be as follows.

```

Please enter number of subjects taken:  5
Please enter the marks of each subject.
Subject 1:  95.5
Subject 2:  90
Subject 3:  85.5
Subject 4:  88.5
Subject 5:  92
Total of Marks:  451.5

```

Figure 1 : The sample run

Item	Criteria	Marks
A	i) The program is able to run and display correct output	2
	ii) Using an appropriate structure for the program (e.g. all required header files are included and the function main is properly written)	2
B	Using pointer concept in the program	26
<b>Total</b>		<b>30</b>