

CS4012 Lab 4

In the following questions, please use draw.io to construct the charts and flowgraphs. These can be saved as images and then inserted into a word document. The PAC and pseudocode can be created in a word document.

Q1. Draw a coupling diagram for the following pseudocode (See Figure 4.10 on pg. 83 for an example of a coupling diagram). Remember a call-by-reference edge will have an arrow on each end and a call by value edge will have an arrow on just one end.

ControlModule

```
Process Calc(AgeSum, Count, *Average)
Process Print(Average, Count)
Process Calc(Length, Width, *Height, *Volume)
Process Print(Length, Width, Height, Volume)
```

End

Q2. Construct a PAC, Interactivity Chart, flowchart and pseudocode for the following problem.

(This is a similar question to the questions on Lab 3)

A painter wants to know the amount of paint needed to paint only the walls and the interior side of the door in a room. The length, width and height of the room are measured in meters. The chosen paint covers 15 square meters per litre.