**Lab 3 Structures: create an array of structures, add a structure, delete a structure**

1. Modify the code of empdb.c program (covered in lecture 3) to write the program to create a database (an array of structures) that stores process control blocks (PCB): i.e. an array of PCB structures:

/\* A PCB has the following data fields\*/

***Process ID***

***Process status (ready, running, or waiting)***

***Process state***

***Process counter value***

***Process acculumator value***

***Process location (assume it is an integer)***

***Process priority (high (h), low (l))***

***write a menu with the following functionality:***

***add a process and add it to the array***

***delete (mark) a element as deleted***

***display the details of the process control block***

b) Comment the program to **clearly explain** what this program is doing?

c) write code to create a node for a link list- The data element should be a structure similar to a process control block and the pointer part set to null:

display the contents of the node; the address of the node and the contents of the pointer field of the node.

*Additional work if you want and have the time*

Modify **part a** so that *process location* is a *memory address* and not an integer (hint you may need to create a variable to generate the address…) as would be the case in a real P.C.B.