6015 hw17

1.refactory plan:

My bank and supermarket senario are exactly the same at this moment, so I will just take as I made some mistakes at the implementation. I will just pretend the simulation() methods in each senario are different.

(a). duplicated code:
Except the "assumed different" simulation() method in bank and supermarket classes, there are methods do exactly the same job with the same name in the 2 classes. So maybe remove the duplicated methods and put the common methods in a utl class. Such methods are like static bool sort_using_smaller_than(), printRes()...

(b). loose cohesion:
I have customer structure in both classes. But customer struct might not be part of the bank or supermarket and need to be removed from both classes, and set as a separate hpp file…?

(c) . public member filelds:
Maybe change the data member variables to private.

(d). magic numbers:
change those magic numbers (such as 12*60*60 which is really just 12 hr convert into seconds) into variables with proper names.