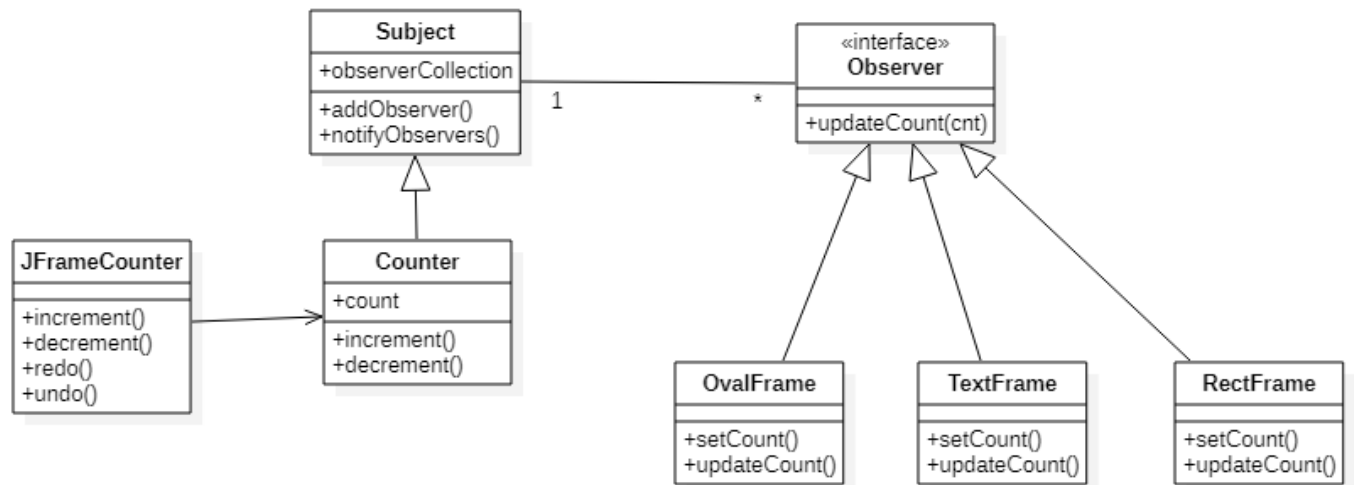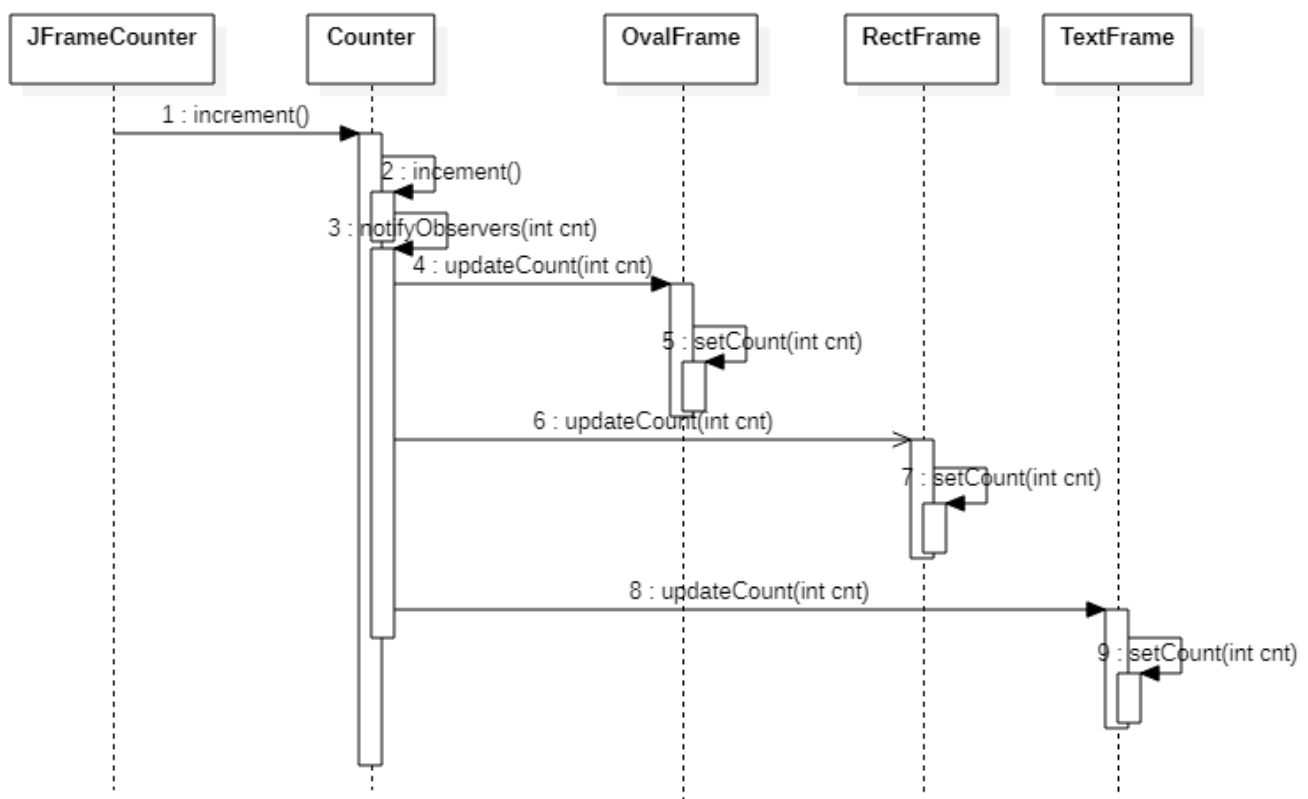A) Modified class diagram using observer pattern
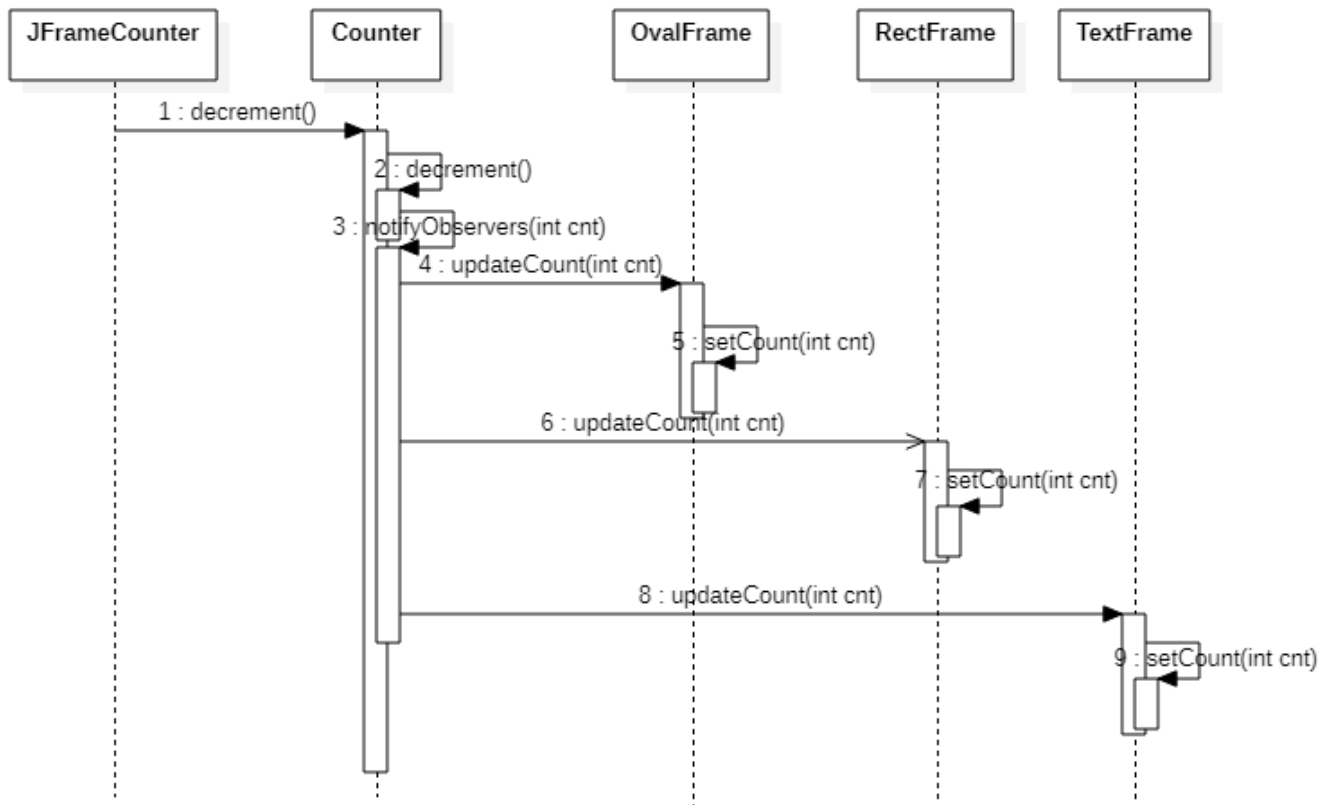

B) Sequence diagram that shows when,

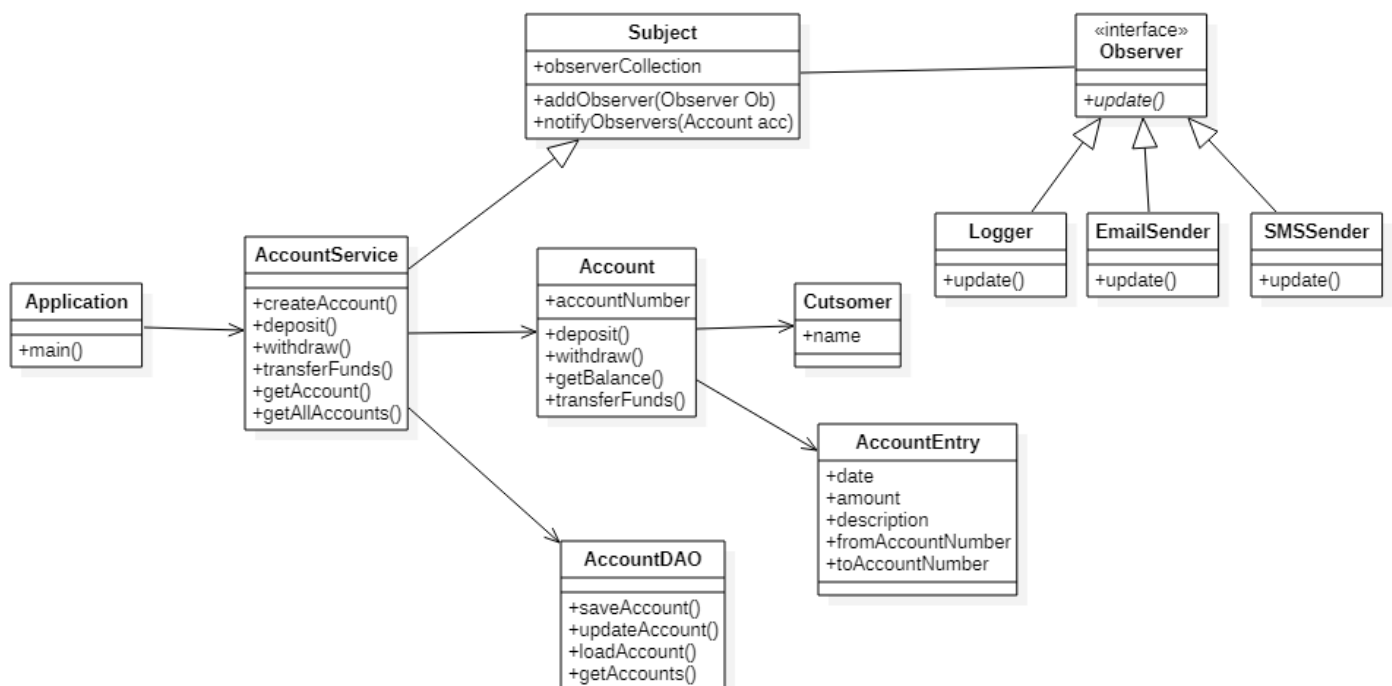   i.   The user clicks the increment button

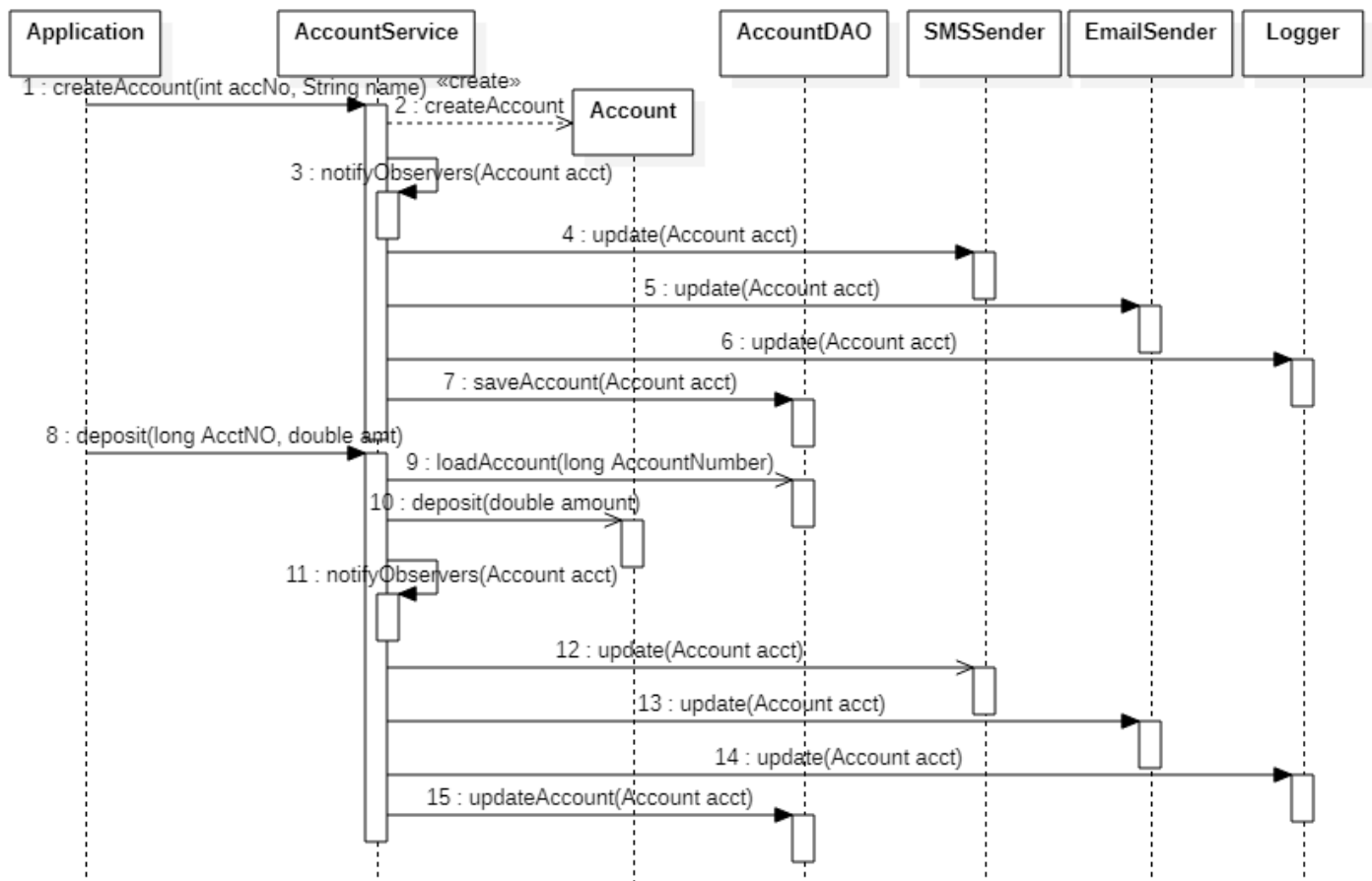ii.   The user clicks the decrement button

C) Modified code attached.

D) Account Question

E) Modified class diagram using the Observer pattern

F) Sequence diagram for creation and depositing into a new account.

| Application | AccountService | | AccountDAO | SMSSender | EmailSender | Logger |

1 : createAccount(int accNo, String name) «create»
2 : createAccount → Account
3 : notifyObservers(Account acct)
4 : update(Account acct)
5 : update(Account acct)
6 : update(Account acct)
7 : saveAccount(Account acct)
8 : deposit(long AcctNO, double amt)
9 : loadAccount(long AccountNumber)
10 : deposit(double amount)
11 : notifyObservers(Account acct)
12 : update(Account acct)
13 : update(Account acct)
14 : update(Account acct)
15 : updateAccount(Account acct)

G) Modified code attached.