# Design Overview for Bank Management System

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# Summary of Program

Describe what you want the program to do.

The bank management system is an application, which based on dot NET, used for maintaining a personal’s account in a bank. The system provides the access to the customer to create an account, deposit/withdraw the cash from his/her account, also to view reports of all accounts present.

Screencast: (video in .zip file)

<https://drive.google.com/file/d/1YzMU4NwFLdpWvrSufLbGE8TJP8yszqF5/view?usp=sharing>

Describe the main functions:

* Create Account: the account is created based on its type. There are three account types: Credit, Debit, Saving. The account ID will be generated automatically and have the account type’s signal.
* Log in: log in with ID and password, which must be same as those in the register.
* Deposit/Withdraw: add and minus the value of money with the conditions, such as minimum or maximum balance, or the limit in a day.
* Show Account: show the list of account IDs that user has created in the system.

Include updated designs of sample output

Graphical user interface, application

Description automatically generated

Graphical user interface

Description automatically generated

# Required Roles

Describe each of the classes and interfaces you will create using the following table (one per record).

Table 1: Object details

|  |  |  |
| --- | --- | --- |
| Responsibility | Type Details | Notes |
|  | Field type, parameter and return types |  |
| Account | Abstract class | User Information |
| Bank | Class | Have list of account |
| Credit  Debit | Class | Inherit from Account class |
| IDGenerator | class | Generate ID automatically with today date |
| Main | WinForms class | Custom the buttons for all functions |
| AboutUs | Short introduction about the system |
| Contact | User can send feedback |
| Payment | The interface and function to enter they money user want to deposit or withdraw |
|  | | |
| Deposit | Boolean | Have conditions for each card type |
| Withdraw | Boolean | Have conditions for each card type |
| CreateAccount | Void | Have cases based on account type |
| GetAcc | void | Get the account ID |
| Generate | string | Generate ID in IDGenerator class |
|  |  |  |
|  | | |
| \_name | String | Declare variable in Account class |
| \_age | Integer |
| \_balance | Double |
| \_type | String |
| \_amount | Double |
| \_minBalance | Double | Declare variable in Credit class |
| \_dailyWithdrawLimit | Double |
| \_maxBalance | Double | Declare variable in Debit class |
| \_dailyWithdrawLimit | Double |
| \_myId  \_myName  \_myAccType  \_myPassword | String[] | Declare variable in Bank class |
| \_myAge | Int[] |
| \_myBalance | Double[] |
|  | | |
| Register | Buttons in Main class of WinForms Void | For register function |
| Login | For login function |
| Logout | For logout button |
| Deposit | For deposit function |
| Withdraw | For withdraw function |
| Contact | For contact window |
| AboutUs | For AboutUs window |
| Exit | To exit the window |

Table 2: Collection details

|  |  |
| --- | --- |
| Value | Notes |
| AccountType (WinForms) | Credit  Debit  Saving |