Soal Praktikum *Practicum Case* COMP6360 Algorithm and Programming	BINUS MALANG Institute of Creative Technology
Teknik Informatika *Computer Science*	CS-COMP6360-Var01
Periode Berlaku Mulai Semester Ganjil 2018/2017 ***Valid on*** *Odd Semester Year* 2018/2019	**Revisi 01** *Revision 01*

Learning Outcomes

- Write a program in C language in problem solving

Topic

- Session 04 – Repetion

Sub Topics

- Create a program using repetition structure control

Soal
Case

"Simple Phone Service" is a simulation program that designed to check remaining balance, reload, and transfer balance. Here are the descriptions of the program :

- At the beginning of the program, user is asked to input **username** and **password**. The username and password must be "**phone**". Program will ask to input **username** and **password** until user input the right username and password. In addition, user has Rp 0,- for their balance.
- Program consists of 4 menus (main menu):
  1. Remaining Balance
  2. Reload
  3. Transfer Balance
  4. Exit
- User must choose a menu
- Program **will show main menu again until user input one of available number.**
- If user chooses **Remaining Balance** (menu '**1**'), then :
  o Show the user's **remaining balance** and **phone number validity**.
  o Program says "*press enter to continue...*"
- If user chooses **Reload** (menu '**2**'), then :
  o Show current user balance and the reload menu that consist of 4 menus:
     1. Rp 50.000
     2. Rp 100.000
     3. Rp 150.000
     4. Rp 200.000

- o User must choose a product number to reload
- o Program will **show reload menu again until user input one of available number**.
- o If user choose one of available product number, then **user balance is increased** and **show current user balance**.
- If user chooses **Transfer Balance** (menu '**3**'), then :
  - o Show current user balance
  - o User must enter **phone number to be transferred**.
  - o User must type phone number to be transferred with a correct digit unless program will asking for its number again.
  - o User must enter **amount to be transfer**.
  - o If transfer amount is greater than the balance, then transfer process will not be processed. Program says "*Your balance is not enough. Press enter to continue..*"
  - o If user's balance is equal or less than transfer amount, then transfer process will be processed. Program show **amount transferred** and **current user balance** after transferred process. Program says "*Press enter to continue..*

- If user chooses **Exit** (menu '4'), then program says "Thank you for using this application." and program will be end.

Please run the EXE file to see the sample program.

Print Screen of Initial Program if username and password are correct.

Print Screen of Initial Program if username and password are incorrect.

Print Screen of Main Menu

```
              ☺ Simple Phone Service ☺
              ***************************

  1. Remaining Balance
  2. Reload
  3. Transfer Balance
  4. Exit

  Enter your choice :
```

Print Screen of Remaining Balance (Menu '1')

```
  Remaining Balance
  *****************


  Your remaining balance      =  Rp. 0
  Your phone number valid until =  31 December 2019



  Press enter to continue...._
```

Print Reload (Menu '2')

```
  Your Remaining Balance = Rp. 0

  Reload
  ******

  Choose a product to reload
  1. Rp 50.000
  2. Rp 100.000
  3. Rp 150.000
  4. Rp 200.000

  Enter your choice : _
```

Print Reload (Menu '2') if user choose one of the available number

```
Your Remaining Balance = Rp. 0

Reload
******

Choose a product to reload
1. Rp 50.000
2. Rp 100.000
3. Rp 150.000
4. Rp 200.000

Enter your choice : 4


Congrats!
Your balance now = Rp. 200000

Press enter to continue....
```

Print Screen of Transfer Balance (Menu '3') if transfer amount is greater than the balance

```
Your Remaining Balance = Rp. 200000

Transfer Balance
****************

phone number to be transferred [10..14]: 089012345678

balance to be transferred              : 300000


Your balance is not enough.

Press enter to continue....
```

Print Screen of Transfer Balance (Menu '3') if transfer amount is equal or less than the balance

```
Your Remaining Balance = Rp. 200000

Transfer Balance
****************

phone number to be transferred [10..14]: 089012345678

balance to be transferred              : 150000


Congrats!
You successfully transferred Rp. 150000
Your balance now = Rp. 50000

Press enter to continue...._
```

Print Screen of Exit (Menu '4')

```
          ☺ Simple Phone Service ☺
          **************************

1. Remaining Balance
2. Reload
3. Transfer Balance
4. Exit

Enter your choice : 4


Thank you for using this application...
```