

Black Jack: Part 6 – The Final Game

BlackJack.java

Dealer.java

Card.java

BlackJackCard.Java

Deck.java

Player.java

Write the BlackJack class which is the game itself

```
import static java.lang.System.*;
```

```
public class BlackJack
{
    //add in Player instance variable
    //add in Dealer instance variable

    public BlackJack()
    {

    }

    public void playGame()
    {

    }

    public static void main(String[] args)
    {
        BlackJack game = new BlackJack();
        game.playGame();
    }
}
```

Here is an algorithm for playGame()

dealer shuffles the deck of cards

do{

 1st - deal the player two cards one at a time
 dealer deals himself two cards

 2nd - print out player's hand value and cards
 while(hand value < 21 and the player wants to hit)
 deal the player the next card
 print out player's hand value and cards
 if the player is over 21, the dealer wins and skip to part

5.

 3rd - print out dealer's hand value and cards
 while(dealer wants to hit)

```
code to add cards should be in dealer hit method
print out dealer's hand value and cards
```

- 4th - determine which player won
- 5th - update the win total for the winner
- 6th - dealer shuffles cards and players reset their hands

```
}while neither person has won 3 games
```

Here is a sample output

```
PLAYER
Hand value:9
Hand size:2
Cards in Handhand = [SIX of CLUBS | value = 6, THREE of HEARTS | value = 3] - # wins
0
PLAYER
Hand value:13
Hand size:3
Cards in Handhand = [SIX of CLUBS | value = 6, THREE of HEARTS | value = 3, FOUR of
HEARTS | value = 4] - # wins 0
DEALER
Hand value:20
Hand size:2
Cards in Handhand = [TEN of CLUBS | value = 10, JACK of SPADES | value = 10] - #
wins 0
Dealer wins
Dealer has won 1 times.
Player has won 0 times.
PLAYER
Hand value:17
Hand size:2
Cards in Handhand = [SEVEN of SPADES | value = 7, KING of HEARTS | value = 10] - #
wins 0
PLAYER
Hand value:26
Hand size:3
Cards in Handhand = [SEVEN of SPADES | value = 7, KING of HEARTS | value = 10, NINE
of CLUBS | value = 9] - # wins 0
DEALER
Hand value:10
Hand size:2
Cards in Handhand = [THREE of CLUBS | value = 3, SEVEN of DIAMONDS | value = 7] - #
wins 1
Dealer wins
Dealer has won 2 times.
Player has won 0 times.
PLAYER
Hand value:13
Hand size:2
```

Cards in Handhand = [FIVE of DIAMONDS | value = 5, EIGHT of SPADES | value = 8] - # wins 0
DEALER
Hand value:14
Hand size:2
Cards in Handhand = [THREE of DIAMONDS | value = 3, ACE of DIAMONDS | value = 11] - # wins 2
DEALER
Hand value:25
Hand size:3
Cards in Handhand = [THREE of DIAMONDS | value = 3, ACE of DIAMONDS | value = 11, ACE of SPADES | value = 11] - # wins 2
Player wins
Dealer has won 2 times.
Player has won 1 times.
PLAYER
Hand value:8
Hand size:2
Cards in Handhand = [TWO of CLUBS | value = 2, SIX of SPADES | value = 6] - # wins 1
PLAYER
Hand value:18
Hand size:3
Cards in Handhand = [TWO of CLUBS | value = 2, SIX of SPADES | value = 6, TEN of HEARTS | value = 10] - # wins 1
DEALER
Hand value:14
Hand size:2
Cards in Handhand = [JACK of HEARTS | value = 10, FOUR of DIAMONDS | value = 4] - # wins 2
DEALER
Hand value:19
Hand size:3
Cards in Handhand = [JACK of HEARTS | value = 10, FOUR of DIAMONDS | value = 4, FIVE of DIAMONDS | value = 5] - # wins 2
Dealer wins
Dealer has won 3 times.
Player has won 1 times.