

```

#include <iostream>
using namespace std;
#include <string>

/*
"card" is assigned as a class name.
each element assigned a data type
*/
struct Card{
    string cardName;
    string suit;
    int cardValue;
};

// both of element assigned get the value of card
//
void getCardValue(Card &myCard);
void getCardSuit(Card &myCard);

int main( )
{
    // assign value for score which is 0.
    //

    int score = 0;
    srand((unsigned) time(0));

    // pack total value is 52
    //using array for total value.
    // string data type is use to make guess fpr any of
    // the 52 cards randomly.
    Card *Pack;
    Pack = new Card[52];
    string guess;

    //each element assigned a number between 1 and 13
    // the index is between 0 to 52.
    for (int index = 0; index < 52; index++){
        getCardValue(*(Pack + index));
        getCardSuit(*(Pack + index));
    }
}

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//change loop to change number of guesses – up to 52
    for (int index = 0; index < 5; index++){
        int myNum = rand() % 52;
        Card myCard = *(Pack + myNum);
        // for testing
        //comment out for live version
        //cout << "revealeded – " << myCard.cardName
    of " of " << myCard.suit<< "\n\n";
        cout << "Guess the card?";
        getline(cin, guess);

        // if guess value is equal equal to mycard
        value print the value correct and
        // add one to the result.
        // if else the value is not equal to my card
        value then print the value as wrong.
        // at the end output wether mycard value is
        correct or incorrect.

        if (guess == myCard.cardName){
            cout << "correct\n";
            score ++;
        }
        else{
            cout << "wrong!\n";
        }

        cout << "It was the " << myCard.cardName << "
    of " << myCard.suit<< "\n\n";
    }
    // use of pointer

    cout <<"you scored: " << score;

    return 0;
}

// card value is assigned till number 13.
// use random naumber to select a random choice for
following cards names.
// if the number is less than 10 add card value plus

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one.

// if else the card value is not less than 10 then
the card value is equal to 10

```
void getCardValue(Card &myCard){  
    int myNum = rand() % 13;  
    string cardChoice[13] ={"ace", "two", "three",  
"four", "five", "six", "seven", "eight", "nine",  
"ten", "jack", "queen", "king"};  
    myCard.cardName = cardChoice[myNum];  
    if(myNum < 10){  
        myCard.cardValue = myNum +1;  
    }  
    else{  
        myCard.cardValue=10;  
    }  
}
```

```
void getCardSuit(Card &myCard){  
    int myNum = rand() % 4;  
    string cardChoice[4] ={"hearts", "clubs",  
"diamonds", "spades"};  
    myCard.suit = cardChoice[myNum];  
}
```