

Name: Noah Garthwaite
Created on February 10, 2024, 4:03 PM
Purpose: Project2_Blackjack_V7

System Libraries:
<iostream>
<iomanip>
<fstream>
<string>
<cstring>
<cstdlib>
<ctime>
<cmath>
<vector>

Global Constants:
const char N_DECK = char(52);
const short MAXRNDs = 200;
const short MAXCOLS = 5;

Function Prototypes:
bool askMore(bool &);
float takeBet(float, float [], float []);
void endGame(float [], float [], short);
void dckInit(short [], char [][MAXCOLS], short decks = 1);
short calcHnd(short [], char [][MAXCOLS], short);
void shwStrs(vector<string>, short);
void shwStrs(vector<string>, short, bool);
void selSrt(float [], short);
void bublSrt(float [], short);
bool binSrch(float [], short, float);

Main

B

betAmnt = takeBet(usrCash, allCash, allBets);

usrCash -= betAmnt;

shuffle(valDeck, strDeck, decksNo);

usrVals.clear();
usrStrs.clear();
dlrVals.clear();
dlrStrs.clear();

usrStnd = hndOver =
dlrShow = false;
char i = 0;

i < 4

usrVals.push_back(valDeck[i]);
usrStrs.push_back(strDeck[i]);
dlrVals.push_back(valDeck[i+1]);
dlrStrs.push_back(strDeck[i+1]);
i += 2;

C

bool askMore(bool &moreDck)
Ask if user wants to choose no. of decks.
cin >> strInpt;

usrInpt == 'y' ||
usrInpt == 'Y'
moreDck = true;
moreDck = false;
return moreDck;

float takeBet(float usrCash,
float cash[], float bets[])

bool validIn;
float betAmnt;
static short roundNo = 0;

usrCash < 50

Display "game over" message.

roundNo == MAXRNDs

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.

Display "casino closed" message.

Display "new hand" message.
cin >> betAmnt;

betAmnt < 50 ||
betAmnt > usrCash

validIn = false;

validIn = true;

validIn == false

betAmnt == 0

roundNo++;

return betAmnt;

void endGame(float cash[],
float bets[], short rnds)

Display "walked away" message.

Display "game over" message.