

C Language Programming: Homework #6
Assigned on 12/13/2016(Tuesday), Due on 12/20/2016(Tuesday)

Please re-write the poker program in Chapter 10 by doing the following:

1. Use an array of size 52 to implement 52 cards.
2. Implement the shuffle process of these 52 cards by a randomization process.
3. Deal (Give) each of the four players 5 cards.
4. Compare the cards holding by these four players and determine who win.
5. Put the main() in one .c file, put the codes for shuffle and deal (steps 2 and 3 above) in the second .c file, and put the remaining codes in the third .c file.
6. Try to write a header file for each of these three .c files.
7. Try to write a Makefile as in chapter 15 to compile this program.

大小順序：

Ranks: 2<3<4<5<6<7<8<9<t<j<q<k<a

Suits: c (梅花) < d (鑽石) < h (紅心) < s (黑桃)

組合由大到小：

- straight flush (both a straight and a flush)
- four-of-a-kind (four cards of the same rank)
- full house (a three-of-a-kind and a pair)
- flush (five cards of the same suit)
- straight (five cards with consecutive ranks)
- three-of-a-kind (three cards of the same rank)
- two pairs
- pair (two cards of the same rank)
- high card (any other hand)

網站上ch10 ppt有類似程式碼可以參考

Output:

(不會有重複的牌)

P1: 2s 5s 4s 3s 6s

P2: 2c 7d 9s ts ks

P3: 9c 5c 5h 6c 6h

P4: 2d 5d 7s kh as

Winner : P1—**straight flush**

(印出每個人的牌與勝者，以及贏的組合)

Score:

Code正確性 50%

write a header file for each of these three .c files 15%

write a Makefile as in chapter 15 to compile this program 15%

report 20%

請大家記得建立hw6的目錄，裡面檔案名稱可以自訂，這次編譯方式是直接執行你們寫的makefile，產生的執行檔請命名為hw6，請大家注意一下。