GE23131-Programming Using C-2024





Question 1

Correct

Marked out of 3.00

Flag question

Write a program that determines the name of a shape from its number of sides. Read the number of sides from the user and then report the appropriate name as part of a meaningful message. Your program should support shapes with anywhere from 3 up to (and including) 10 sides. If a number of sides outside of this range is entered then your program should display an appropriate error message.

Sample Input 1

3

Sample Output 1

Triangle

Sample Input 2

Sample Output 2

Heptagon

Sample Input 3

11

Sample Output 3

The number of sides is not supported.

Answer: (penalty regime: 0 %)

```
#include<stdio.h>
    int main()
 2
 3 🔻
        int n;
        scanf("%d",&n);
        switch(n)
 7 🔻
            case 3:
 8
            printf("Triangle");
10
            break;
11
            case 4:
            printf("Square");
12
13
            break;
            case 5:
14
            printf("Pentagon");
15
16
            break;
            case 6:
17
            printf("Hexogen");
18
19
            hreak.
```

```
UI Cak,
23
            case 8:
            printf("Octagon");
24
            break;
25
            case 9:
26
            printf("Nonagon");
27
28
            break;
            case 10:
29
            printf("Decagon");
30
            break;
31
32
            default:
            printf("The number of sides is not supported.");
33
            break;
34
35
        return 0;
36
37
```

		Input	Expected	Got	
	~	3	Triangle	Triangle	~
	~	7	Heptagon	Heptagon	~
	~	11	The number of sides is not supported.	The number of sides is not supported.	~

Passed all tests! <

Question **2**

Correct

Marked out of 5.00

The Chinese zodiac assigns animals to years in a 12-year cycle. One 12-year cycle is shown in the table below. The pattern repeats from there, with 2012 being another year of the Dragon, and 1999 being another year of the Hare.

2000	Dragon					
2001	Snake					
2002	Horse					
2003	Sheep					
2004	Monkey					
2005	Rooster					
2006	Dog					
2007	Pig					
2008	Rat					
2009	Ox					
2010	Tiger					
2011	Hare					
Write a program that reads a year from the user and displays the animal associated with that year. Your program should work correctly for any year greater than or equal to zero, not just the ones listed in the table.						

Sample Input 1

2004

Sample Output 1

Monkey

```
2010
Sample Output 2
Tiger
Answer: (penalty regime: 0 %)
      #include<stdio.h>
       int main()
    2
   3 🔻
    4
           int n;
           scanf("%d",&n);
    5
           if(n==2000||(n-2000)%12==0)
    6
           printf("Dragon");
           else if(n==2001 | (n-2001)\%12==0)
    8
           printf("Snake");
    9
           else if(n==2002||(n-2002)%12==0)
   10
           printf("Horse");
   11
           else if(n==2003||(n-2003)%12==0)
   12
           printf("Sheep");
   13
           else if(n==2004 | (n-2004)\%12==0)
   14
           printf("Monkey");
   15
   16
           else if(n==2005 | (n-2005)\%12==0)
           printf("Rooster");
   17
```

else if(n==2006||(n-2006)%12==0)

else if(n==2007||(n-2007)%12==0)

else if(n==2008||(n-2008)%12==0)

else if(n==2009||(n-2009)%12==0)

else if(n==2010||(n-2010)%12==0)

else if(n==2011||(n-2011)%12==0)

printf("Dog");

printf("Pig");

printf("Rat");

printf("0x");

printf("Tiger");

nrintf("Hare").

18 19

20

21

22

23

2425

26

2728

29



	Input	Expected	Got	
~	2004	Monkey	Monkey	~
~	2010	Tiger	Tiger	~

Passed all tests! <

Question $\bf 3$

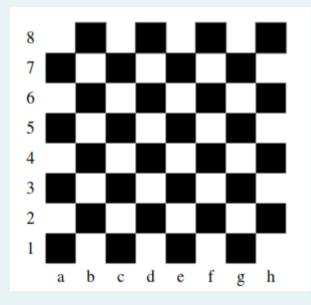
Correct

Marked out of 7.00

▼ Flag question

Positions on a chess board are identified by a letter and a number. The letter identifies the column, while the number identifies the row, as shown below:

11



report the color of the square in that row. For example, if the user enters a1 then your program should report that the square is black. If the user enters d5 then your program should report that the square is white. Your program may assume that a valid position will always be entered. It does not need to perform any error checking. Sample Input 1 a 1 Sample Output 1 The square is black. Sample Input 2 d 5 Sample Output 2 The square is white. **Answer:** (penalty regime: 0 %) 1 #include<stdio.h> int main() 3 ▼ int r; char column; scanf("%c %d".&column.&r):

