

# Tic-tac-toe in C

int main()

sq  

0
X 0
X X
3
X X
X 0
X 0
7
8

choice 

2 5 4
6

player 

1 2 X 2
1

gamestatus 

1
---

mark 

X O X O X
-----------

player = (1 % 2) ? 1 : 2 → 1  
 2 % 2 9 1 : 2 → 2  
 1 % 2 9 1 : 2 → 1  
 2 % 2 9 1 : 2 → 2  
 1 % 2 9 1 : 2 → 1

if mark = player == 1  
 1 == 1 ✓  
 mark = 'X'  
 else mark = 'O'

markboard (char mark)

- ① choice == 2 5 5 sq[2] == 2  
sq[2] = mark 'X'
- ② choice == 5 5 5 sq[5] == 5  
sq[5] = 'O'
- ③ choice == 6 5 5 sq[6] == 6  
sq[6] = 'X'
- ④ choice == 1 5 5 sq[1] == 1  
sq[1] = 'O'
- ⑤ choice == 8 5 5 sq[8] == 8  
sq[8] = 'X'

check for win ()  
 return value 

0 - 1
-------

- ① all conditions false for first 5 turns so it return 1
- ② 8th condition true  
 sq[2] == sq[4]  
 5 5 sq[4] == sq[6]  
 return 1

displayboard ()

player 1 (x) - player 2 (o)

0	1	1	2
3	4	5	
6	7	8	

player 1, enter num : 2

0	1	1	X
3	4	5	
6	7	8	

player 2 enter num : 5

0	1	1	X
3	4	1	O
6	7	8	

player 1 enter num : 4

0	1	1	X
3	1	X	O
6	7	8	

```
if gamestatus == 1  
    1 == 1 ✓  
    print("player 1 win")
```

display board  
player 2 enter num:1

0	1	0	1	x
<hr/>				
3	1	x	1	0
<hr/>				
6	1	7	1	8

player 1 enter num:6

0	1	0	1	x
<hr/>				
3	1	x	1	0
<hr/>				
x	1	7	1	8

player 1 win