

forNextDay 7

2d Array code

```
1  #include <stdio.h>
2  #include <stdlib.h>
3  int main()
4  {
5      int i = 0, j = 0;
6      int array [5] [5] = {
7          {1,2,3,4,5},
8          {6,7,8,9,10},
9          {11, 12, 13, 14, 15},
10         {16, 17, 18, 19, 20},
11         {21, 22, 23, 24, 25}
12     };
13
14     printf("Before changing the array\n");
15     while (i < 5)
16     {
17         while(j < 5){
18             printf("%d ", array[i][j]);
19             j++;
20         }
21         j = 0;
22         printf("\n");
23         i++;
24     }
25     i = 0;
26
27     while (i < 5)
28     {
29         while (j < 5)
30         {
31             array[i][j] = 0;
32             j++;
33         }
34         j = 0;
35         i++;
36     }
37
38     i = 0;
39     printf("After changing\n");
40     while (i < 5)
41     {
42         while(j < 5){
43             printf("%d ", array[i][j]);
44             j++;
45         }
46         j = 0;
47         printf("\n");
48         i++;
49     }
50     return EXIT_SUCCESS;
}
```

2d Array Terminal Activity (output)

```
Before changing the array
1 2 3 4 5
6 7 8 9 10
11 12 13 14 15
16 17 18 19 20
21 22 23 24 25
After changing
0 0 0 0 0
0 0 0 0 0
0 0 0 0 0
0 0 0 0 0
0 0 0 0 0
```

Makefile

```
mmoustaf@gc112m38:FND7
areDistinct: areDistinct.o main.o
    gcc -o areDistinct areDistinct.o main.o
areDistinct.o: areDistinct.c
    gcc -c areDistinct.c
main.o: main.c
    gcc -c main.c
test0: areDistinct
    ./areDistinct inputs/input0 > outputs/output0
    diff expected/expected0 outputs/output0
clean:
    /bin/rm -f *.o areDistinct outputs/

"Makefile" [readonly] 11L, 307C
11,2-9 All
```

The result of Make

```
[mmoustaf@gc112m38 FND7]$ [mmoustaf@gc112m38 FND7]$ make  
gcc -c areDistinct.c  
gcc -c main.c  
gcc -o areDistinct areDistinct.o main.o  
[mmoustaf@gc112m38 FND7]$
```