

## STRANGE GRID AGAIN

A strange grid has been recovered from an old book.

It has 5 columns and infinite numbers of rows.

The bottom row considered as the first row.

First few rows of the grid are like this:  $\rightarrow$

|    |    |    |    |    |
|----|----|----|----|----|
| 21 | 23 | 25 | 27 | 29 |
| 20 | 22 | 24 | 26 | 28 |
| 11 | 13 | 15 | 17 | 19 |
| 10 | 12 | 14 | 16 | 18 |
| 1  | 3  | 5  | 7  | 9  |
| 0  | 2  | 4  | 6  | 8  |

The grid grows upwards for ever!

Your task is to find the integer in  $c^{\text{th}}$  column in  $r^{\text{th}}$  row of the grid.

For example  $\rightarrow$  Sample  $6^{\text{th}}$  row and  $3^{\text{rd}}$  column is 25.

C code.

```
long long findCellValue(long long r, long long c) {  
    long long baseNumber;  
    // Determine the starting number of the rows  
    if (r % 2 == 1) {  
        baseNumber = (r-1)/2 * 10; // odd rows: 0, 10, 20, .....  
    }  
    else {  
        baseNumber = (r-2)/2 * 10; // even rows: 1, 11, 21, .....  
    }  
    // Add the column offset (columns start from 1, so subtract 1)  
    return baseNumber + (c-1) * 2;  
}  
  
int main() {  
    long long r, c;  
    printf("Enter the row(r) and column(c):");  
    scanf("%lld %lld", &r, &c);  
    printf("The value at (%lld, %lld) is: %lld\n", r, c, findCellValue(r, c));  
    return 0;  
}
```