Color Converter

50/100 Points

Our friend Karel is hired to convert the colors of a given world. Your task is to help Karel to convert the world with given rules.

Step I (25/100 Points)

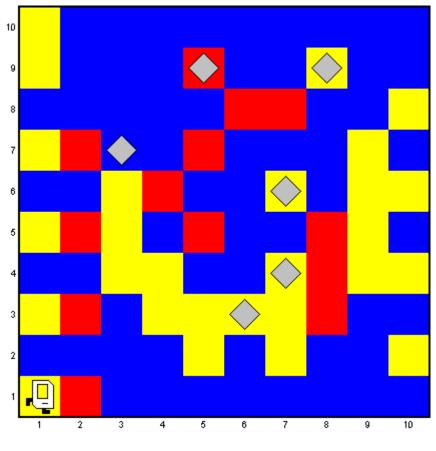


Figure- 1

The world is already painted randomly and Karel should convert the colors according to these rules.

Red \rightarrow Blue

Blue \rightarrow Yellow

Yellow \rightarrow Red

So the world in Figure- 1 will be as follows.

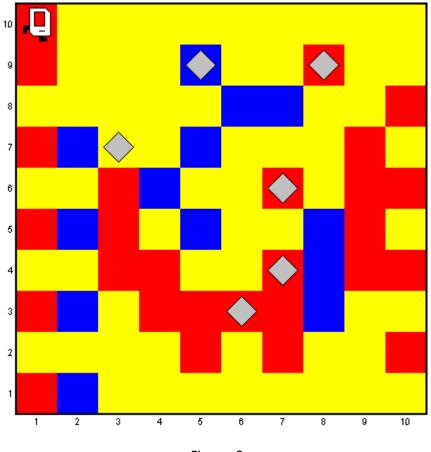


Figure -2

Step II (50/100 Points)

As a second step, Karel is asked to extend the rules depending on the beepers as follows.

If there is not any beepers:

If there is a beeper:

Red \rightarrow Blue

Blue \rightarrow Yellow

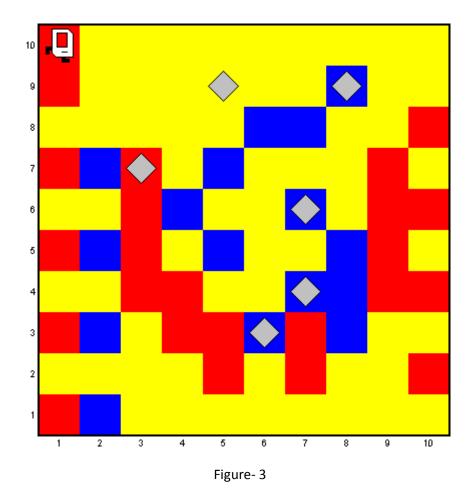
Yellow \rightarrow Red

Red \rightarrow Yellow

Blue \rightarrow Red

Yellow \rightarrow Blue

So the world in Figure-1 will be as follows if Karel applies the new rules.



Since Karel is an experienced robot, you are already given the code that travels around the world. You are only asked to implement the method *ConvertColors()*

Constraints

- In starting position, Karel is at 1st Street and 1st Avenue facing towards East.
- The world will be given with only three colors (RED, BLUE, YELLOW)
- There will be no walls except the boundaries of the world.

Grading Policy:

If you only complete Step - I, you will get 25 points of Quiz-1. To get all the points of 50 for this question, completion of Step— II is enough. Beware that you are only asked to provide one solution for this question.

If you can only manage to apply one or two of the rules, you will get partial credit depending on how many rules you applied.