

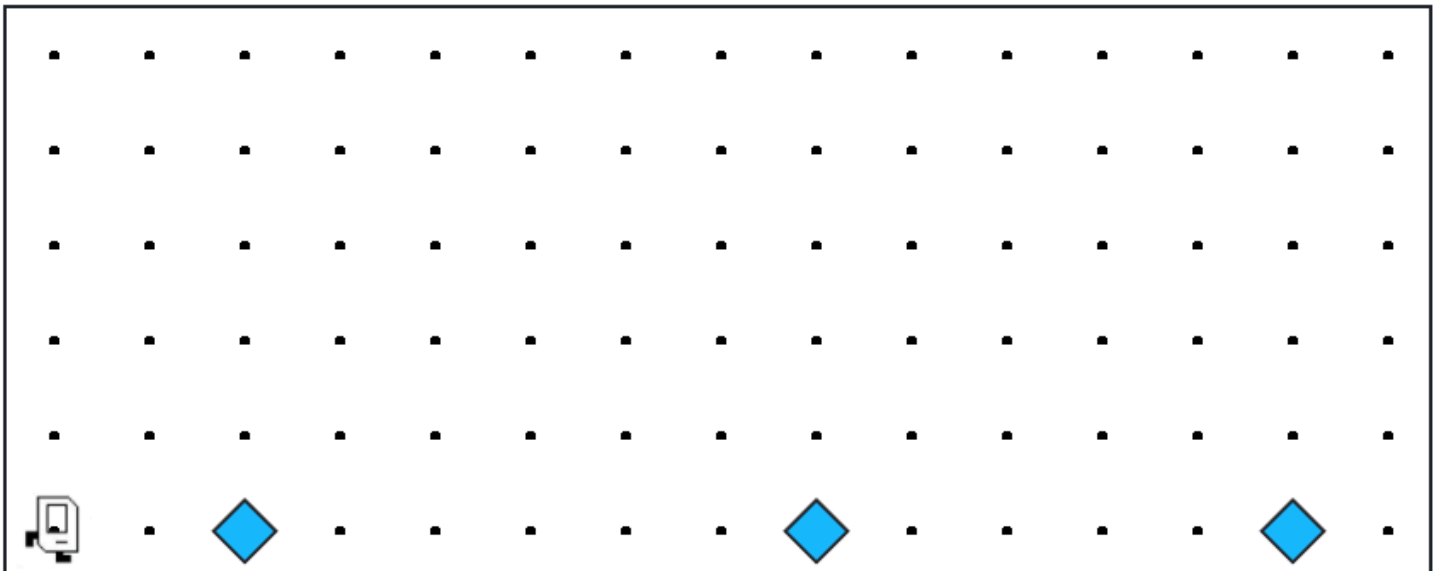
Section 1: Karel the Robot

This week in section, your first priority is to meet your section leader and discover what sections in Code in Place are all about. Your section leader will therefore spend the first part of section on introductions and course logistics. Afterwards, you'll solve a Karel problem together using decomposition and stepwise refinement.

Here's the [Link to the Section 1 Code](#)

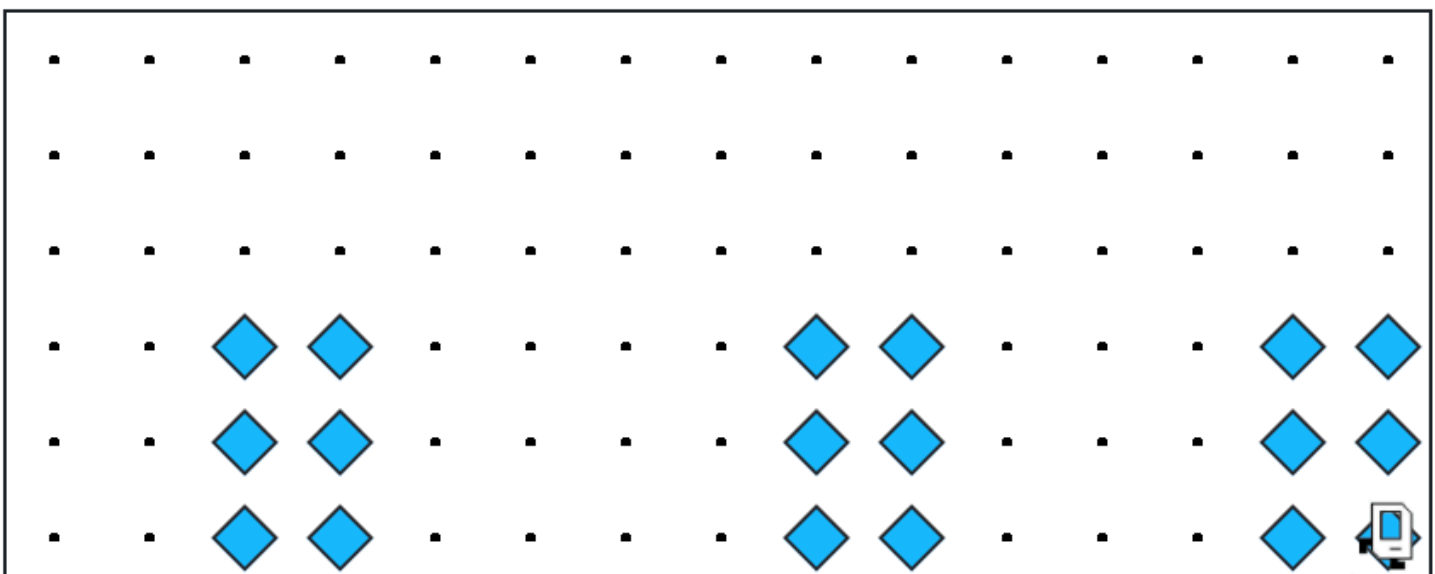
1. Hospital Karel

Countries around the world are dispatching hospital-building robots to make sure anyone who gets sick can be treated. They have decided to enlist Karel robots, and your job is to program those robots. Karel begins at the left (west) end of a row that might look like this:



Each beeper in the figure represents a pile of supplies. Karel's job is to walk along 1st row and build a new hospital in the places marked by each beeper. The new hospital should start at the point at which the bit of debris was left.

At the end of the run, Karel should be at the east end of 1st row having created a set of hospitals that look like this for the initial conditions shown above:



Keep in mind the following information about the world:

- Karel starts facing east at (1, 1) with an infinite number of beepers in its beeper bag.
- The beepers indicating the positions at which hospitals should be built will be spaced so that there is room to build the hospitals without overlapping or hitting walls.
- There will be no supplies left on the last column.
- Karel should not run into a wall if it builds a hospital that extends into that final corner.

Write the code to implement Hospital Karel. **Use helper functions.** Think, "what are the high-level steps Karel needs to take?" and make these steps into helper functions. Remember that your program should work for any world that meets the above conditions.