

Problem #1

Wavefront propagation

The cycle runs until there is an empty cell where the wave can reach.
except for the case that the wave reaches the robot. In this case the propagation should stop.

Guidance

- (i) A single new wavefront must be processed in each cycle.
- (ii) You have to look for empty cells whose neighbor is a wavefront cell.
- (iii) We increase the value of the wavefront in the examined empty cells
by +2 in the vertical and horizontal directions and +3 in the diagonal direction.
You must strive for the minimum cost step.
- (iv) The first step must be handled in such a way where the target cell (containing -1)
must be surrounded with the wavefront.
- (v) Pay attention to increasing the value of cells included in the wavefront (newWavefrontCells)!

Problem #2

Robot path

Guidance

- (i) Search for the shortest path
- (ii) The current environment of the robot (robotPos) must be examined (8 adjacent cells)
and the smallest wavefront value must be selected (minWave)
- (iii) The stepping and route-drawing itself is performed by the framework program!