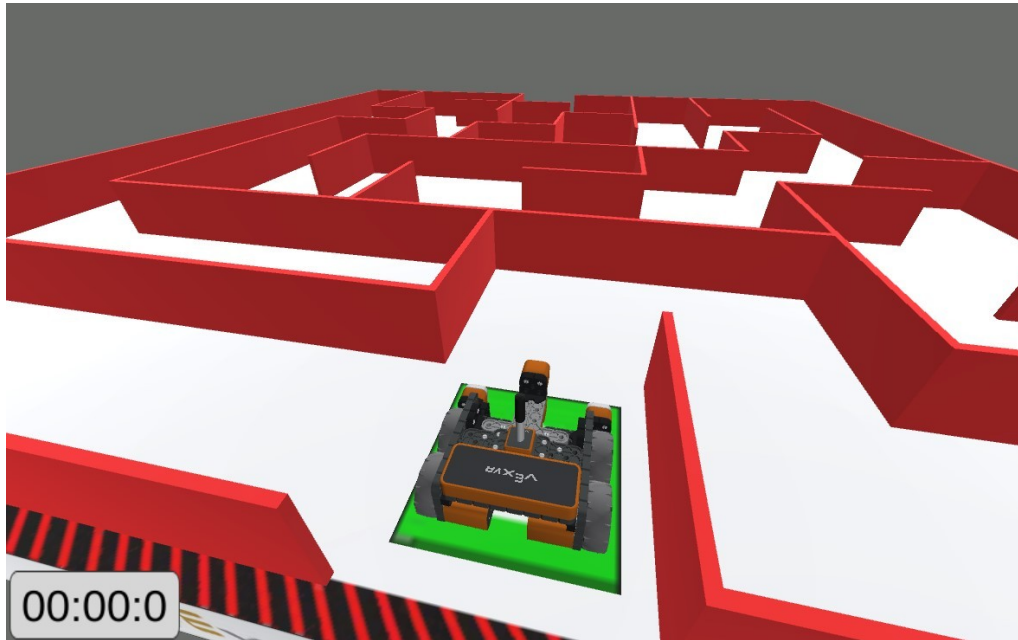


# DYNAMIC LABYRINTH



## **Introduction to VEX VR:**

VEXcode VR allows students to program a virtual robot online in their browser by visiting [vr.vex.com](http://vr.vex.com). The programming environment is based on VEXcode, the same programming environment that is used for all VEX robots. For introductory tutorials on VEX VR in Russian, visit [vexrobotics.kz/vexvr](http://vexrobotics.kz/vexvr).

**Introduction to Dynamic Labyrinth:** The competition is played on the “Dynamic Labyrinth” playground of the VEX VR platform, located at vr.vex.com. The field consists of one of a number of different labyrinths which the Robot must navigate through.

**Objective:** The objective of the game is to program the robot to solve the maze (arriving at the red and black checkered square), in the shortest possible time.

**Eligibility:** Competition is open to students who will be under 19 years of age on January 10, 2021. Teams consist of 1 student only.

**Registration and Submission:** Registration on the website www.kirc.kz must be completed after completing the task, since during registration you must attach your program file. Your program file can be downloaded from vr.vex.com and should have the extension “.vrblocks”; other file types (e.g. pdf) will not be considered.

**Deadline:** The deadline for submissions is January 5<sup>th</sup> at 23:59 Almaty, Kazakhstan time.

### **Rules and Scoring:**

1. The task of the competition is to solve the maze in the shortest time. The maze is considered solved when all wheels of the Robot are touching the red square.
2. Maximum time is 3 minutes (180 seconds). If the Robot has not finished the maze in this time-frame the time will be counted as 200 seconds.
3. The referees will upload your program to VEX VR and run your program twice with the first 2 labyrinths that are randomly given by the software.
4. The team’s average score from 2 attempts will be calculated. The winner is the team with the best average time to solve the maze. If there is a tie, then the team’s best time will be used as a tiebreaker.