Task 1

Welcome to NB theme!

QUANTPAEngineering a better tomorrow

Rulebook >

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eYRC 2020-21: Nirikshak Bot (NB)

Task 2

2A - Develop Ball Tracking Algorithm

2B - Generate Maze in CoppeliaSim with Remote API

Task 3

Task 4

Task 5

Practice Task

Instructions for Task 6

Task 6 Scene Details

Coding Standard

Git and GitHub

Live Session 1 - 24th October 2020

Live Session 2 - 21st November 2020

Live Session 3 - 12th December 2020

Live Session 4 - 10th January 2021

Changelog

Task 2

[Last Updated on: **02nd November 2020, 16:44 Hrs**]

Welcome to Task 2 of Nirikshak Bot.

The aim of this task is to **adapt, improvise and build** on the concpets of Image processing, Algorithm Building and Robotic Simulation learnt in Task 1.

This task is divided into **two** parts:

• (1) Task 2A

- This task is based on Image Processing using Vision Sensors in CoppeliaSim.
- Teams should apply the concepts learnt in Task 1A and 1B and build a Python Remote
 API file to find the correct Shape, Color, Centroid X and Centroid Y of the ball(s) in the
 dynamic CoppeliaSim scene using a Vision Sensor.

• (2) Task 2B

- This task is based on maze generation in CoppeliaSim using the output of Task 1B.
- Teams should use **python remote API** to **transmit the encoded maze array** (output of task 1b) to a **Lua script** in CoppeliaSim scene to **generate walls of the maze**.

ALL THE BEST!!