# ———————–ROBOTIZATION———————–

## – Gateway to industry 4.0

**A power – packed robotics event to simulate your inner challenger .**

- ❖ This is a 24 hours dynamic competition using circuits.
- ❖ All the simulations are to be made on **Tinkercad.com**.
- ❖ Leaderboard will be dynamic during the first 22 hours of the contest and for the last 2 hours it will be frozen.
- ❖ The competition will be live till **11.30 pm, April 1, 2021.**
- ❖ Link for the leaderboard- https://bit.ly/39tbLcV
- ❖ After completion of your solution, send the link of your solution to the link provided below **that problem.**
- ❖ An early submission will result in climbing up the ladder of leaderboard too. So, don't miss out this chance to come out on top
- ❖ **Only one submission is allowed for a problem.**

*Keep yourself on the top of the leaderboard to be in the final round.*

## Problem statements for the prelims  --

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### Statement 1

Make a Column of 12 Bulb and number them from 1 to 12 from left to right. Glow the Odd Bulbs for 1 second (even will be off) and then even for 1 second (odd will be off) and this will be continued in loop until simulation is turned off.

1 to 12 led will glow in even and odd pattern
0,2,4,6 …. Even number leds will glow at first for 1 seconds
Then 1 second pause where every led will be off
Then 1,3,5,7 .. odd number led will glow
Submit here: https://forms.gle/rAAr7MXTN3uoZTpr7

**MARKS: 50**

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**Statement 2**
Glow the LED present in the prime places between(1-12)
**consider 1 as the prime number.
Submit here: https://forms.gle/ugP3bdagp4uMkcoY9

**MARKS: 55**

**Statement 3**
Turn leds on serially from 1 to 12
First led will glow for 1.25 second followed by the second and so on for 0.75 second each without any gap in between them. Make sure that once you move on to the next led the previous one should be kept on.
Submit here: https://forms.gle/5YBFZ16LJw4KuxPU8

**MARKS: 60**

**Statement 4**
Turn led from 1 to 12 serially in the pack of three and switch off the previous one
For ex.. 1,2,3 will glow then 1 will be off and 2,3,4 will glow and this pattern will go on until 12.
Submit here: https://forms.gle/1hgdh2rBms2sxLqu5

**MARKS: 65**

**Statement 5**
Make a line of 12 LED ,First and last led will glow for 1.25 second then it will come inwards to the middle and then go outwards back to the initial condition.
Submit here: https://forms.gle/MCp4yHyCBmP8F9217

**MARKS: 70**

**Statement 6**
Use 4 rgb led and program them in a way that they change their colour every second and at no time should any 2 rgb emit the same coloured light.
Submit here: https://forms.gle/dpvv1xYsd1QreVao7

**MARKS: 80**

**Statement 7**
Use the potentiometer to glow the number of LED in increasing order and also drive a motor whose rpm should be in reverse order.
Ex. the more the value of the potentiometer, the more the number of led will glow from 0-12 and lesser should be the motor rpm.
Submit here: https://forms.gle/7fuvWfaywCxNiQqB9

**MARKS: 90**

**Statement 8:**

Make a series of 7 light bulbs

Use push buttons and glow the number of bulb according to the number of times the push button is pressed in the particular time at the beginning

If push button is pressed 1 time the 1st bulb will glow and if 2 times 2nd will glow and first will be turned off

Submit here: https://forms.gle/LPWSqkpokXFJEpam7

**MARKS: 100**

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- **Use of unfair means are strictly restrained.**

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- **After completion of every problem ,you are advised to upload the solution immediately to make it to the top of the leaderboard.**

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