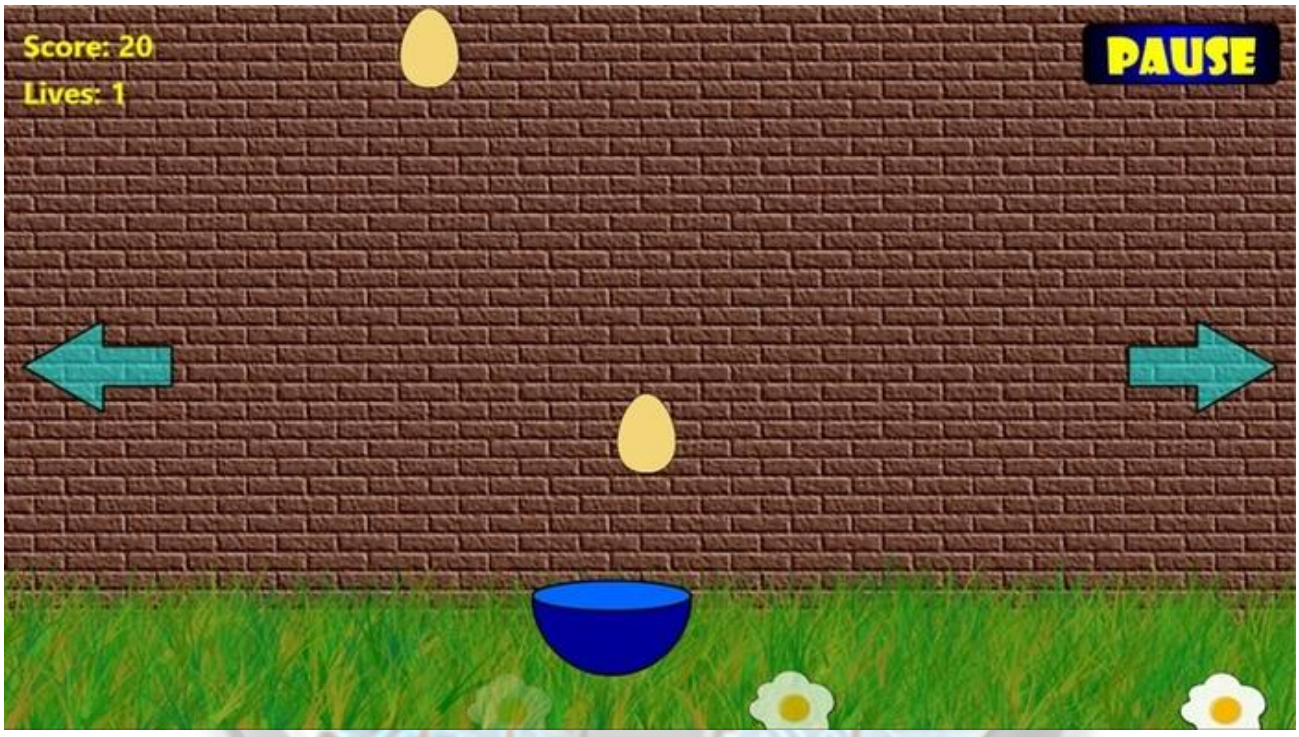
ELECTROMANIA

Team Event (Y15) **Points: 35**

Problem Statement:

You have to design a **"Catch The Egg"** game using LEDs, basic digital ICs (timer, counter, flip flops etc.) and logic gates.



Explanation:

The game should have following basic features:

1. Catching bowl and eggs should be represented by different colors.
2. There must be at least 2 columns of LEDs each having minimum 4 LEDs.
3. The game should be over if any catch is missed.
4. After each egg is collected the score should be incremented.
5. Dropping of eggs should be random.

Constraints:

1. Only non-programmable integrated circuits can be used.
2. Use of any microcontroller or programmable device is prohibited.
3. You have to make your circuit on breadboard.

General Rules:

1. A team of maximum 4 members is allowed to participate.
2. Each team needs to register separately for the event.
3. There can be any number of teams from each pool.
4. You will be issued components only after you have submitted an abstract of your idea.

Judging Criteria:

1. Judging criteria favors a proper layout and robustness of the circuit.
2. Any extra features implemented in your circuit will increase your team score.
3. The circuit should be able to fulfill all the basic features mentioned above, only after that extra features would be evaluated.
4. You need to prepare a flowchart on an A3 size sheet (during evaluation) to present the complete logic of your circuit to the judges.