IoT Assignment-1 [4 Marks]

Problem: In a developing country like India, there is a major problem of intrusion in the agriculture fields where the cattle's may enter into the fields and spoil the crops.

Task: Design an '***Agriculture Intrusion Prevention System***' by using Arduino UNO, a PIR sensor, a buzzer (horn), an LED (Flash light) and a servo motor (idol) to work in the following way:

As the intruder is detected by PIR sensor, the horn will sound up loudly, the flash light will glow at intense level and the servo motor will make an idol to move (turn) at angles of 0 to 60 to 0 repeatedly.

Steps for submission:

(1) Design your project in Tinkercad and put the **snapshot of circuit** and **copy-paste of the code (editable)** in a word document.

(2) Subsequently, paste the snapshots of running simulation (with results) in the word document.

(3) Finally, paste the link to access and simulate (verify) your Tinkercad design in the word document. *[The steps of generating the link are provided below]*.

(4) Name the document as '***CSE Section No_Your enrolment No***' and submit it as a word document in your respective Google Classroom Sections. The deadline to submit this assignment is 09 Feb till 11:59 PM. After this deadline, the G-Class link will not accept any assignment and the emailed assignments will NOT be accepted.

Important things to note:

(1) Only the fully worked-upon assignments (all above steps-1, 2, 3 completed) will get full marks.

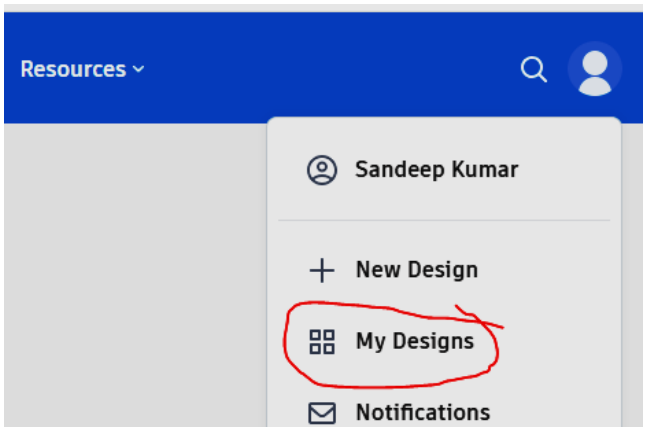
(2) If the link to your assignment (step-3 above) is **not found**, zero marks will be awarded.

(3) If the link to your assignment (step-3 above) is **found as NOT-WORKING**, zero marks will be awarded.

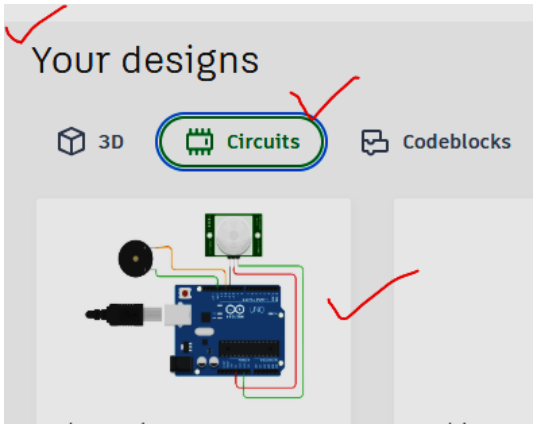
(4) If the link to your assignment (step-3 above) is found bearing **SOMEONE'S ELSE NAME**, zero marks will be awarded.

How to share the link to simulate (verify) your design:

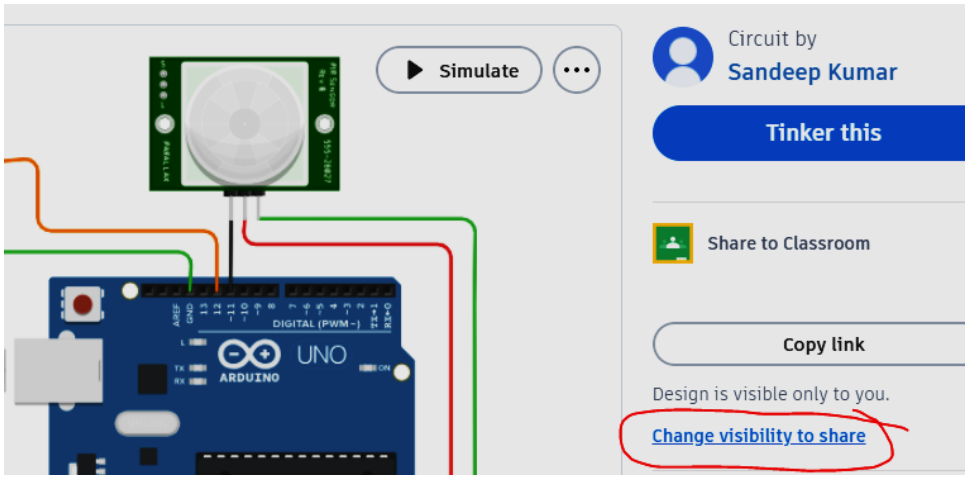
Login to your Tinkercad account and select ‘My Designs’.



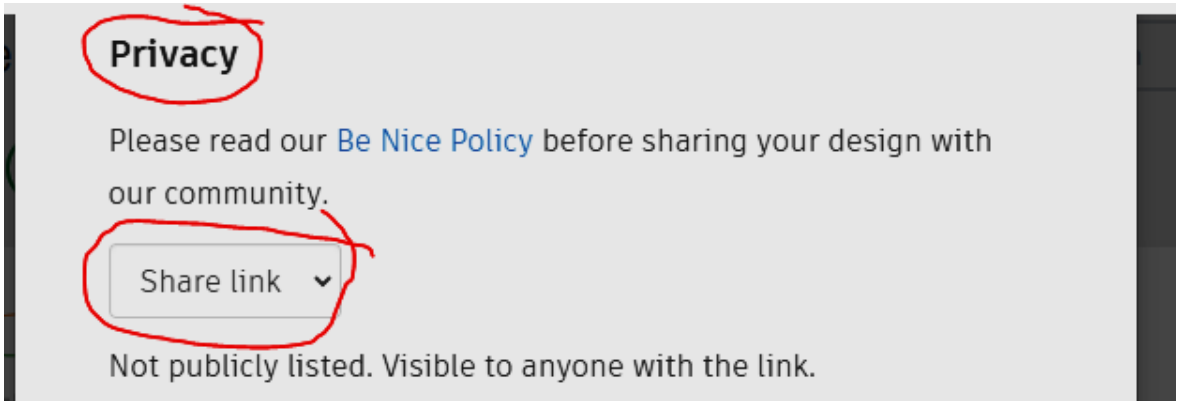
Then, select the circuits tab and select your circuit (design)



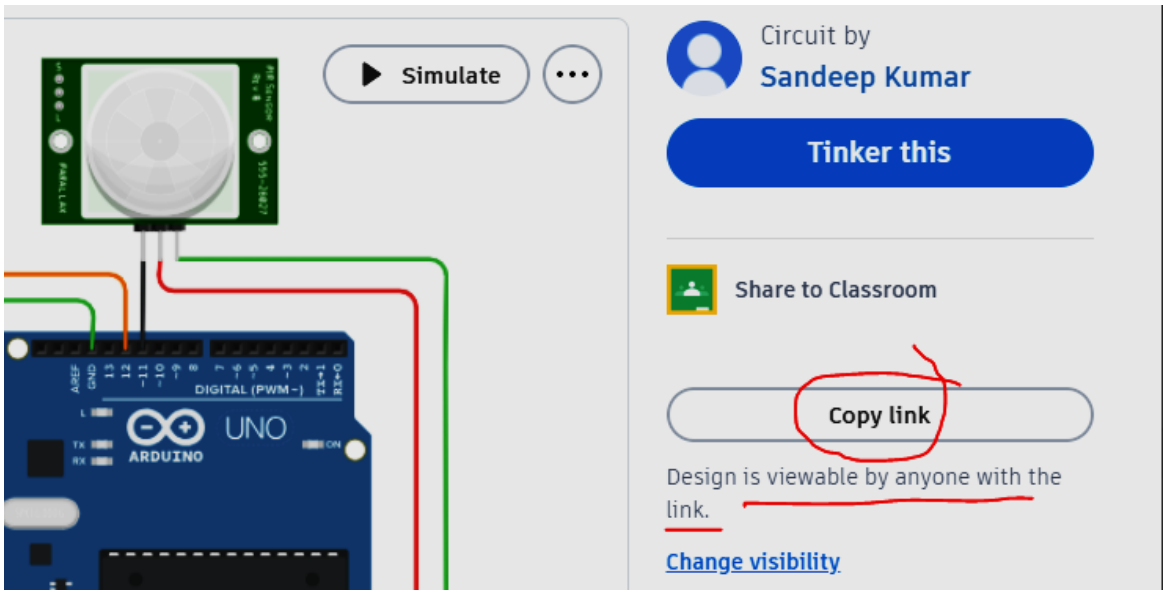
In the opened circuit (design), CLICK ON ‘Change visibility to share’



In the opened window, change privacy to ‘Share Link’ and click on save changes at the bottom.



Then copy the link and paste in your assignment (solution) to share with us.



Once we will open your design (with link), **your name must be displayed there**.