

BALANCE ON LINE

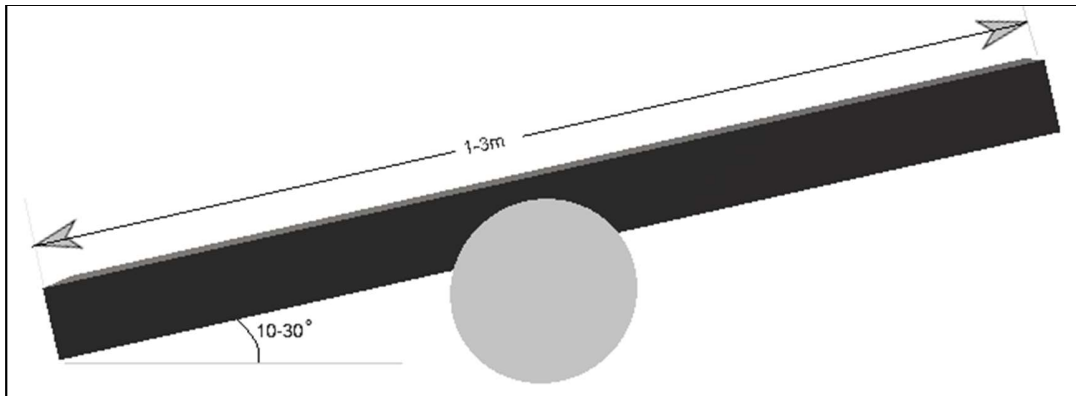
INTRODUCTION

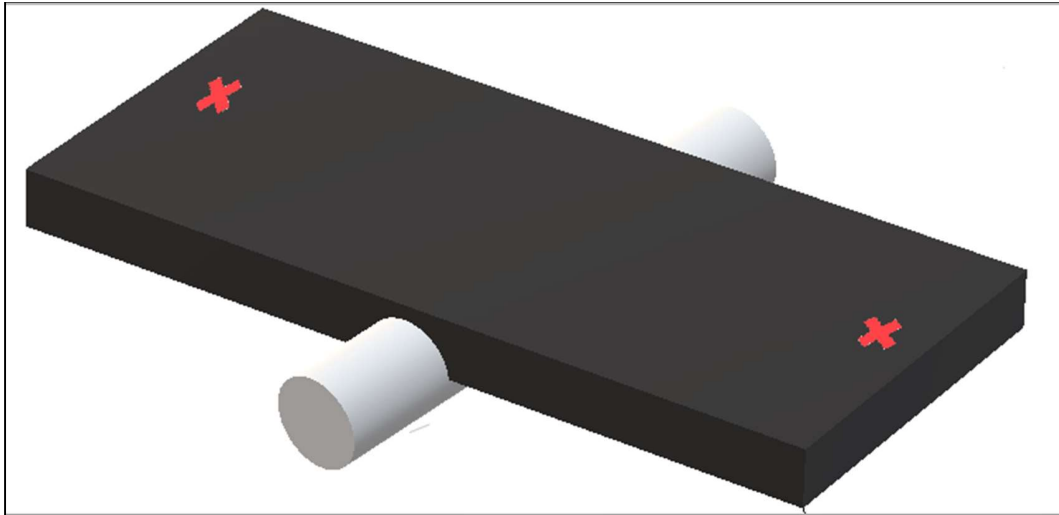
What is Balancing? Can a human do it? If yes, why can't a Robot? Answer it by completing this Event challenge. Be ready to make the manually control robot which can balance the see saw and complete as many rounds as possible in a given time to become a legend of balancing.

PROBLEM STATEMENT

A manually controlled wired or wireless robot which must transverse through a track mounted on a see-saw

QUALIFYING ROUND





1. The robot will be placed at start line and starts the lap when time starts.
2. Lap is a round from one cross mark to the other and back to the same cross mark again.
3. If the robot falls off the track, there will be a penalty and will start from the same place. Timer won't be stopped.
4. Width of the track varies from 30cm to 35cm for qualifying round. The length of track will vary from 1-3 m for qualifying round.
5. The angle made by the track and ground varies from 10-30 degrees for qualifying round. It may change in further rounds.
6. The see saw action will be partially random.
7. The robot will be disqualified if it damages or tends to damage the track or seesaw.
8. Scoring and penalty rules will be announced on the day of event

NOTE: Subsequent rounds will be disclosed at the time of the event.

ROBOT SPECIFICATIONS

1. Size limitations are 30cmx30cmx20cm.
2. The chassis should not be ready made.
3. The potential difference between any two points should not exceed a limit of 12V.
4. Robots can be wired, wireless, or autonomous.
5. Power supply must be ON board.
6. There is no weight limit for robots but it is suggested to have a weight under 5 Kilograms
7. Tolerance of 5% on dimensions and power supply will be allowed but not suggested.

RULES

1. A team can consist of a maximum of 4 members.
2. Members of different institutions can form a team and must carry your respective college ID cards.
3. Only 2 members of a team are allowed to stay around the arena (for controlling and assisting).
4. Only Undergraduates are allowed to participate in the event.
5. Any kind of damage to the arena will not be entertained, and if done, the robot will be immediately disqualified.
6. No technical assistance will be provided by the coordinators during the time of the event.
7. No practice runs will be provided.

8. Human interference (e.g. touching the robot, stepping into the arena) during the game is not allowed.
9. No external power supply will be provided at the time of event.
10. A robot with the base of a toy car and its gearbox as a machine part will be disqualified. Also, LEGO kits are strictly prohibited.
11. Participants with wired robots are strictly advised to get wires of length 3m or more. The wires should be given slack throughout the gameplay.
12. Member participated from a team cannot participate in another team for the same event.
13. A robot is allowed to participate only once in that particular event.
14. The organisers are not responsible for any kind of damage to your robot.
15. In case of any discrepancies, the decision of the coordinator and the event head shall be final and no further arguments shall be entertained.

CERTIFICATE POLICY:

1. A certificate of participation will be awarded to all participating teams except for the disqualified teams.
2. A certificate of appreciation (or excellence) would be awarded to the winners.