



SIEMENS

Indian Institute of Technology Goa
Siemens Digitalization Centre of Excellence

Presents



Floating Structure Design Competition



Q What is a Pedal Boat?



TAP TAP



A pedal boat is an amphibious bicycle powered by a pedal. Pedal boats are only suitable for usage in calm water. There are various types of pedal boats, the most common being two-person boats, 3 meters wide x 4 meters long. They are simple to use and do not necessitate any particular expertise or abilities. (Weight of a person: 80kg)

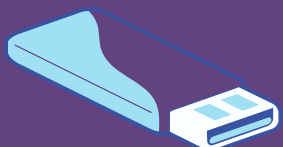
TAP TAP

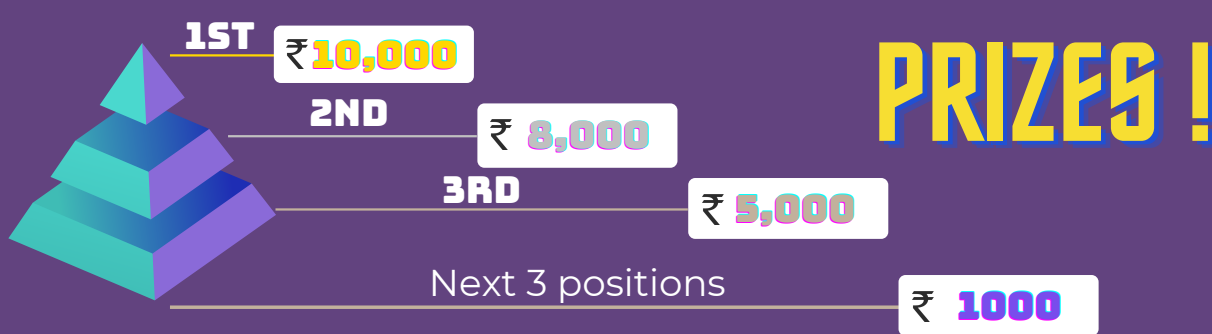


Q What is a Buoy?



A buoy is a floating device that can have many purposes. It can be anchored (stationary) or allowed to drift with ocean currents. The buoy dimensions (max) are one meter in length, width, and height. Not more than 30 kg in weight in order to be portable use. The stability of floating object should not get affected by a small disturbance (force).





Participation e-certificate will be provided to each participant.

What is the task?

- ✦ Design a mechanically driven pedal boat or a buoy for use in calm waters using CAD tools.
- ✦ The pedal boat should be designed for two-person capacity, with an ideal weight of one person can be taken as 80 kg. For a buoy, the dimensions are 1 meter in length and width (maximum). It should weigh less than 30 kg.
- ✦ The materials used to design the pedal boat/buoy must be low density and high strength.
- ✦ The design specifications such as length, width, and height of the pedal boat/buoy must be considered for aesthetically good design.
- ✦ Prepare detailed drawings showing typical components and connections.



How to participate ?

- ✦ The participants have to register for the event by filling out this registration form with all the necessary details. They need to specify if they are designing a Pedal Boat or a Buoy.
- ✦ The zip folder containing all the design submissions and write-up should be uploaded before the submission deadline with the subject Design of Pedal Boat/Design of Buoy,



Who can participate?



IMPORTANT DATES !

REGISTRATION OF TEAM (DEADLINE)

JUNE 10, 2022

SUBMISSION OF DESIGN (DEADLINE)

JULY 20, 2022

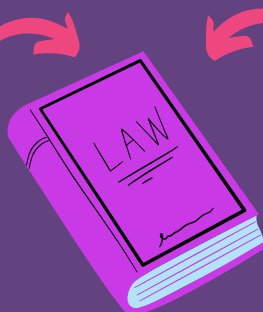
ANNOUNCEMENT OF RESULTS

JULY 30, 2022



TAP HERE!

REGISTRATION!



RULEBOOK !

TAP HERE!



EVALUATION POINTS!