OTOMATIKS®

PROUDLY PRESENTS

ROBOTICA-2G™

7TH INTERNATIONAL ROBOTICS COMPETITION

ROBOTICA 26 – International Robotics Competition 2026

EVENT NAME: ROBO RACE

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1) GENERAL INFORMATION

In the **RoboRace event**, teams **design and build robots** capable of completing a **series of challenges** on a specially designed **competition field**. Each robot must adhere to specific **design** and **technical specifications** provided by the organizers. The event features **different missions tailored to various age groups**. These challenges are designed to test the **creativity**, **technical skills**, and **problem-solving abilities** of the participants. At **higher levels**, especially in **international competitions**, the event emphasizes **innovation**, **precision**, and **teamwork**, encouraging participants to **push the boundaries of robotics design and control**.

2) EVENT DETAILS

- **Event Name**: Roborace – Robotica 26
- **Date**: January 30, 2026
- **Venue**: VIT University, Chennai, Tamil Nadu
- **Registration Fee**: Rs. 1000 per team
- **Team Size**: Maximum 2 members
- **Eligibility:** Students aged **12 to 18 years** (Grades 6–12)
- **Categories:** Junior - Grade 6^{th} – 8^{th}

  Senior - Grade 9^{th} – 12^{th}

3) Event Objectives

The main objective of the **RoboRace event** is to **encourage participants to design and develop intelligent robots** capable of **navigating a challenging race track** through **remote control**. The event aims to test the **speed**, **accuracy**, **stability**, and **problem-solving abilities** of the robots while promoting **innovation**, **creativity**, and **teamwork** among participants. It provides a **platform for students and enthusiasts** to apply their knowledge of **electronics**, **sensors**, and **programming** in **real-world scenarios**, fostering a deeper understanding of **robotics** and **automation technologies**.

3) EVENT FORMAT:

In the RoboRace event, each team will compete with a single bot designed according to the given specifications. The race track will feature **curves, turns, and obstacles** to test the bot's **speed, stability, and control**. Teams must complete the track within a time period (the exact time will be announced during the arena map reveal). The timer starts when the bot begins moving and stops at the finish line. Winners will be decided based on the point system which will be revealed later on in November. **Cash prizes and certificates** will be awarded to the top-performing teams. The event encourages **creativity, innovation, and problem-solving skills** while providing a fun and educational robotics experience.

4) EVENT RULES AND REGULATIONS

A. BOT SPECIFICATION:

- The maximum dimensions of the bot should not exceed **25 cm × 25 cm × 15 cm (L × B × H).**
- For Junior and Senior categories, robots should be **wireless.**
- The **maximum weight** of the **bot must not exceed 3 kg**.
- Participants will be provided with **220V, 50Hz AC supply,** but they must arrange their **own adapters or batteries for operation.**
- The bot must **not be constructed using Lego parts** or any pre-assembled kits. Any robot found violating this rule will be disqualified.
- **RC cars** or commercially available **remote-controlled toys** are strictly not allowed.
- Bots must operate via participant-controlled wired/wireless systems; **no external assistance is permitted during the run.**
- Teams must ensure their bots are **safe to operate** and will not damage the arena, track, or other bots.

B. Batteries & Power:

- The machine must be powered electrically only. **Use of IC engines is not allowed**.
- Batteries must be sealed, immobilized electrolyte type **(gel cell, lithium, NiCad, or dry cells).**
- The electric voltage anywhere in the machine **should not be more than 12V DC** at any point of time.

5) ROBO RACE ARENA

The **RoboRace arena**, including the **track size** and **obstacles**, will be revealed soon in the month of **November**. It will feature a variety of challenges designed to test your bot's **speed, control, and stability** across multiple terrains and hurdles like,

- **Sand Pit** – challenges wheel traction and motor torque.
- **Marble Pit** – checks for stability and control on uneven surfaces.
- **Wobble Bridge** – tests balance and suspension over an unstable bridge.
- **Sloped Ramp** – challenges acceleration and power on inclined surfaces.
- **Speed Breakers** – test suspension, precision, and steady movement.
- **Zig-Zag Path** – tests navigation accuracy and turning capability.
- **Sliding Bridge** – examines traction on loose or rough terrain.

*Few details about Event format and Race tracks and the exact obstacles will be revealed soon in the https://www.robotica.org.in on November, 2025

6) **REGISTRATION DETAILS**

- **Fee**: Rs.1000 per team
- **Deadline**: Dec 31, 2025
- **How to Register**:
  - Online: https://www.robotica.org.in
- **Contact**: +91-81485 18703
- **Email**: robotica26@otomatiks.in

Why Participate in Robotica 26?

- Compete internationally with the best minds in STEM.
- Boost your technical profile and creativity.
- Be part of an inspiring and innovative community.

We highly encourage students and robotics enthusiasts across India to join us at **ROBOTICA 26** and showcase your robot design and racing skills. This is an excellent opportunity to push the boundaries of robotics, innovation, and technical creativity in a fun, competitive, and educational environment.

Get ready to race into the future of technology — where innovation meets speed!

–Team Otomatiks
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