



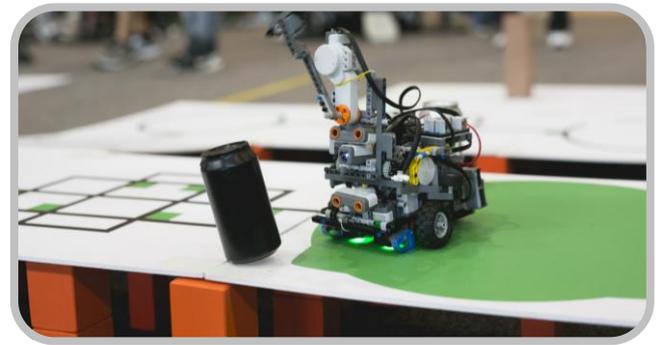
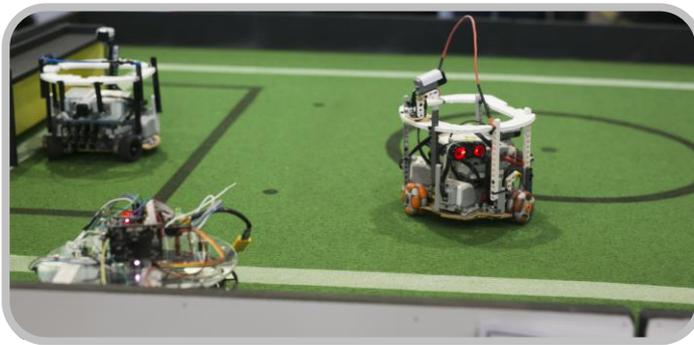
FREQUENTLY ASKED QUESTIONS

VERSION 3.0 UPDATED 20 JUNE 2019

WHAT IS ROBOCUP?

RoboCup Junior Australia is a project-orientated robotics competition and educational initiative for Australian students and mentors. Students are required to work together over the course of the year to design, build and program robots that can compete in one of three robotic challenges (OnStage Performance, Rescue or Soccer). Robots are built by students, not teachers, with the additional requirement that all robots must feature a unique and original design. At various points in the year, students and robots come together to compete in local, regional, state and national competitions that take place all around Australia.

RoboCup Junior empowers students to develop and apply their skills across the combined disciplines of Science, Technology, Engineering and Maths (STEM). RoboCup Junior has been described by the office of the Australian Chief Scientist as the number one STEM competition currently operating in Australia.



WHEN IS ROBOCUP JUNIOR WA?

The RoboCup season in WA runs from approximately February to August each year. Throughout the season, the RoboCup Junior WA committee aim to provide a series of workshops and competitions across Perth and regional WA. These events culminate in the epic RoboCup Junior WA state event at Curtin Stadium, hosted by our event partner Scitech.

The two-day WA state event takes place over a full-day Friday and half-day Saturday, in August. There is no requirement to qualify for the state event and registration is open to all. Participation in additional RoboCup events taking place throughout the year is strongly recommended as an opportunity for students to develop their skills and understanding.



Robocup Junior WA is Supported By:

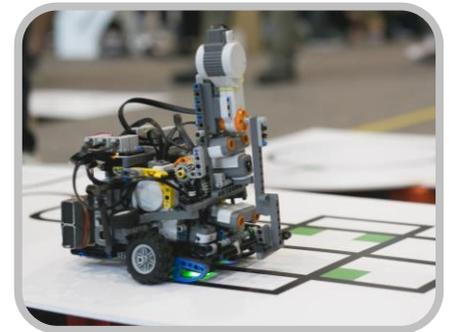


WHAT ARE THE CHALLENGES?

Each team must choose one challenge in which to compete. Challenges are set by the RoboCup Junior Australia national committee and are currently as follows:

ONSTAGE PERFORMANCE

Design and perform a short robot performance such as a dance. Program your robot (or robots) to move in time to music or any other audio track of your choice, with human team members performing alongside. Artistic and coding skills are emphasised in scoring criteria. Sensors and Bluetooth may be used to enhance the performance. This is a great challenge for newcomers.



RESCUE

Design, build and program a robot which can autonomously navigate a maze or obstacle course, then conduct rescue operations. The standard version of the challenge involves following a series of lines and rescuing a silver can from a danger zone. Courses are set randomly on the day and the maze features various obstacles. Rescue is a good intermediate challenge.



SOCCKER

Design, build and program two robots to compete in a Soccer match against two other robots from an opposing team. Play takes place on a specially marked field of green carpet, and goals are scored using an infra-red emitting ball (or a simple orange ball in the case of Open Soccer). Multiple specialist sensors mean Soccer is great option if you are looking for an extended challenge.

WHAT ARE THE RULES?

Rules and guidelines are set nationally by the RoboCup Junior Australia national committee. The latest rules are released in approximately March each year and can be found at www.robocupjunior.org.au.

In addition to the national rules, the RoboCup Junior WA committee may sometimes implement regional variations. Information regarding any regional variations will be announced via the RoboCup Junior WA website and mailing list.

WHO ARE ROBOCUP MENTORS?

The role of mentor can be held by a teacher, a parent or any other responsible adult. Mentors may accompany multiple teams to RoboCup events, but each team should have a clearly identified adult mentor (not several).

At least one adult mentor must accompany all competitors from your school or organization, and mentors retain duty of care of all competitors during events. Mentors help students prepare for RoboCup by providing coaching and encouragement, assisting with team registrations and payment, transporting teams to the event, and lending emotional support on the day.

In the interests of promoting independent learning, please note that adults and mentors may not assist students with any design, building or programming at RoboCup events. Mentors may offer advice and encouragement but must not under any circumstances help build the robot or operate the device used to create the program.

Robocup Junior WA is Supported By:





HOW MANY STUDENTS ARE ALLOWED ON A TEAM?

The minimum size of a team is 2 competitors. All team members must be present on the day of the event for which they are registered. Exceptions may be considered, but must be approved in advance (and in writing) by the WA committee. In WA there is no maximum limit for the size of each team, however the recommended team size is 4 or 5 students. Small teams often work more productively and provide a better experience for students.

HOW TEAMS CAN ENTER FROM EACH SCHOOL?

RoboCup Junior WA continues to grow, with new schools entering the competition every year. Each school or organization therefore is permitted to enter up to a maximum of **4 teams per challenge** in each RoboCup Junior WA event.

For the purposes of this restriction, Rescue Line and Rescue Maze are considered to be separate challenges.

OnStage Performance	Novice	} Maximum 4 teams per school or organization (combined across all divisions)
	Experienced	
	Open	

Rescue Line	Primary	} Maximum 4 teams per school or organization (combined across all divisions)
	Secondary	
	Open	

Rescue Maze	Open	Maximum 4 teams per school or organization
--------------------	------	---

Soccer	Standard League	} Maximum 4 teams per school or organization (combined across all divisions)
	Lightweight	
	Open	

WHAT AGE AND EXPERIENCE LEVEL IS ROBOCUP FOR?

RoboCup Junior WA is for all students of Primary and Secondary school age. There is no minimum age limit for Primary students, but students must be competent enough to design, built and code their own robot without help from an adult.

OnStage Performance (Novice)	Teams may only enter the Novice division of OnStage Performance if this is the first or second year that they have participated in OnStage Performance (or its predecessor, Dance). If a team contains any students who are competing in OnStage Performance (or Dance) for their third year or more, the entire team is required to enter the Experienced or Open division.
Rescue Line: (Secondary)	Teams may only enter the Secondary division of Rescue Line if this is the first or second year that they have participated in Rescue Line. If a team contains any students who are competing in Rescue Line at a Secondary level for their third year or more, the entire team is required to enter the Open division.

Robocup Junior WA is Supported By:

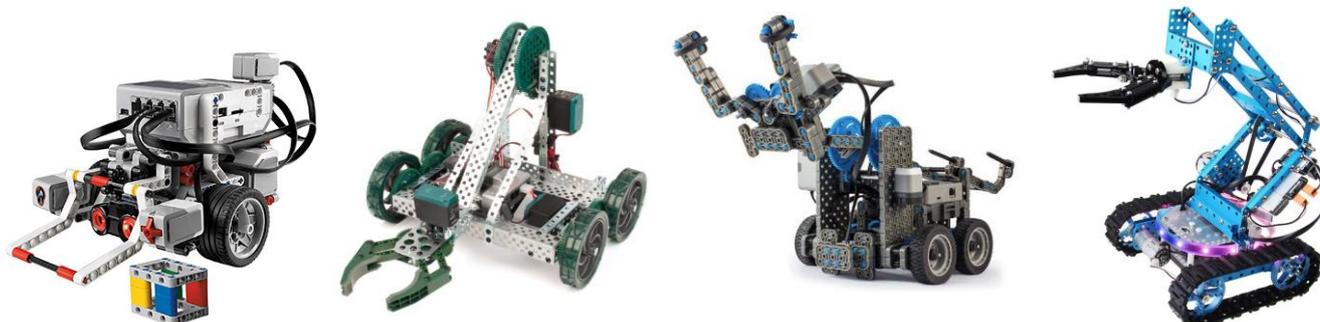




WHAT ROBOT EQUIPMENT CAN BE USED?

Robots entering RoboCup Junior are typically built using educational robotic construction kits. RoboCup is open to any and all hardware, subject to the requirement that the competing robot must be designed, built and programmed by competitors. All competing robots must feature a unique and original design, meaning that a pre-built “out-of-the-box” robot using a standard design will not be permitted to compete.

Students must also be able to understand and explain their design choices and coding logic to the judges. Robot-building kits such as Lego Mindstorms, Vex IQ, and MakeBlock provide an easy way for students to begin designing and building their own robots with minimal prior experience.



WHAT DOES ROBOCUP COST TO ENTER?

Perth Metro Events cost \$30 per team. For reasons of fairness, please note that competitors may enter only one Perth Metro event. The cost to enter the **WA State Event** at Curtin Stadium is \$74.94 per team, covering entry to both days of the competition.

Teams will also need to qualify on the first day of the state event in order to compete in the finals on the second day. Payment for entry into the state event will be collected at the time of registration via online credit card payment. In the event of team withdrawal, refunds will be provided to your credit card.

CAN I COME AND WATCH?

Absolutely! Entry is free for spectators and we’d love to see you. Attending a RoboCup event as a spectator is a great way to learn more about RoboCup and share ideas. It’s also great fun! Human spectators are welcome at all events including the WA state event at Curtin Stadium. If you’re new to robotics, why not come along to watch and start preparing for next year.

I’M NEW TO ROBOTICS, HOW CAN I GET STARTED?

Scitech, our WA Event Partner, offers Robotics and Coding incursions for your school in which your students can learn the basics of building and programming robots - no experience required! Scitech also offers a range of Professional Learning workshops for teachers exploring robotics, coding and digital technologies. For more information visit Scitech’s website at www.scitech.org.au.

Modern Teaching Aids, our Platinum National Sponsor, also offers several teacher workshops throughout the year, offering an introduction to robotics using Lego Mindstorms EV3. Information on upcoming sessions is released via the WA mailing list.

Robocup Junior WA is Supported By:





ROBOCUP JUNIOR AUSTRALIA NATIONAL EVENT

Each year, the end of the RoboCup Junior WA season is followed by the RoboCup Junior Australia national competition.

The national competition takes place in approximately September or October each year and is open to **all competitors**, regardless of participation in the WA state event. For further information on the national event, visit the official RoboCup Australia website at www.robocupjunior.org.au.

VOLUNTEER TO HELP AS ROBOCUP EVENT STAFF

If you think you've got what it takes, why not join us and volunteer as event staff? We are always on the lookout for judges, scorekeepers, robot wranglers and general event staff. Volunteering as RoboCup event staff is also an excellent way to learn more about RoboCup and robotics in general. Please note that all volunteers will require a valid Working With Children Check.

WHAT'S INVOLVED IN RUNNING YOUR OWN ROBOCUP EVENT?

The RoboCup Junior WA committee are always looking for opportunities to get more WA students engaged in RoboCup. Please note that RoboCup Junior Australia is a registered not-for-profit organization and use of the RoboCup name is subject to permission; all RoboCup events in WA must first be approved by the RoboCup Junior WA committee. If you would like to run your own RoboCup event, please get in touch with the committee to discuss your options by emailing wa@robocupjunior.org.au.

MAILING LIST AND GETTING IN TOUCH

If you haven't already, ensure you visit www.robocupjunior.org.au/wa and sign up to the RoboCup Junior WA mailing list for the latest news and updates. Any enquiries regarding RoboCup Junior WA may be directed to the RoboCup Junior WA Committee.

If you'd like to take a role in the future growth of RoboCup in WA, why not join the committee? Meetings take place every month throughout the WA season and the committee is always looking for new members. If you would like to join, please express your interest by emailing wa@robocupjunior.org.au.

Thanks for supporting RoboCup Junior WA and we look forward to seeing you at a RoboCup event sometime in the near future. With your help, we can ensure the robotic future of WA (and the world) is in safe hands!

THE **ROBOCUP** Junior W.A. COMMITTEE

wa@robocupjunior.org.au

Robocup Junior WA is Supported By:

