FIRST LEGO LEAGUE CHALLENGE

Tournament Manual

Rev. Sept. 2024

FIRST® LEGO® League Challenge is the result of an exciting alliance between *FIRST*® and the LEGO® Group.

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DISCLAIMER

The purpose of this manual is to provide an overview of the basic framework necessary to prepare and deliver an official *FIRST*® LEGO® League Challenge in-person tournament. While it provides general guidelines and best practices, each tournament is unique and may vary in its execution. Therefore, teams and participants should not use this manual to create specific expectations for their own event. Organizers are encouraged to adapt the recommendations in this manual to fit the unique needs and circumstances of their tournament. For detailed and specific information about a particular event, please refer to the communications from the event's organizing committee.

DEFINITION OF KEY TERMS:

Program Delivery Organization (PDO): the organization contracted by *FIRST*® or LEGO® Education to offer the *FIRST* LEGO League program in a specific geographic location.

Program Delivery Partner (PDP/partner): the person or persons appointed by the PDO to manage and deliver the *FIRST* LEGO League program, including all official tournaments, in the specific geographic location.

***FIRST* Event Hub:** The online tool used for setting up events; including scheduling, assigning volunteers and teams to judging pods and Robot Game matches, scoring Robot Game matches, completing judging rubrics, viewing the Official Judging Spreadsheet, allocating awards, marking teams for advancement, and returning scoresheets and rubrics to teams following the event.

DEFINITION OF KEY ROLES:

Tournament Director (also referred to as Event Admin/Event Director): oversees all aspects of the tournament and reports to the region's *FIRST* LEGO League PDP. This manual does not supersede that responsibility. The Tournament Director should plan according to the PDP's policies and procedures and communicate regularly with the partner.

Judge Advisor: oversees the judging process and judging quality for the event. Ensures that *FIRST* LEGO League Challenge standards for judging and awards are followed and that *FIRST* LEGO League event rubrics are used. Responsible for overseeing all Judges for the event, including any necessary pre-event communication and training. Ensures paperwork is provided for the Judges (including rubrics, session flowchart, judge questions and script, and awards list) for each judging pod. Being a Judge Advisor requires familiarity with the advancement policy and training to use the Official Judging Spreadsheet or *FIRST* Event Hub..

Head Referee: helps recruit, train, and oversee all tournament Referees. Has comprehensive knowledge of the season field setup, missions, rules, and challenge updates. Responsible for tracking and timing Robot Game matches and coordinating Referees with the master of ceremonies, scorekeeper, and field manager. Performs quality assurance on tournament challenge sets as well as all competition and practice fields in advance of the event. Provides scores to the Judge Advisor for final judging allocations.

Volunteer Coordinator: is responsible for the onsite management of event-day volunteers, including setting up registration for volunteers, managing any walk-on volunteers, and problem-solving. They work closely with the Tournament Director/Event Admin and venue on all volunteer logistics, including pre-event planning and communication. Please note, this is a key position that involves a large amount of work in advance of the event; individuals should only sign up for this role if directed to do so by a *FIRST* LEGO League Program Delivery Partner or *FIRST* LEGO League Tournament Director/Event Admin.

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This manual is intended to help you plan your resources and needs for your in-person event. Please adjust as your specific circumstances require.

Global Standard or Best Practice
Marks an item that is a ***FIRST* LEGO League Challenge Global Standard or Best Practice**

Contact Us
Please reach out to fllquestions@firstinspires.org with support requests related to this manual.

FIRST® LEGO® League Challenge and *FIRST*®

FIRST® LEGO® League Challenge

FIRST® LEGO® League Challenge is the oldest of three divisions of *FIRST* LEGO League, created to inspire youth to experiment and grow their critical thinking, coding, and design skills through fun, hands-on STEM learning and robotics. Once a child progresses through the *FIRST* LEGO League divisions (Discover, Explore, and Challenge), they are encouraged to "move up" to *FIRST*® Tech Challenge (grades 7-12/ages 12-18) and/or *FIRST*® Robotics Competition (grades 9-12/ages 14-18). As you are planning your *FIRST* LEGO League Challenge tournament, consider inviting teams from the other programs to show the younger students what comes next. You may also want to represent the younger divisions to show young spectators where they can begin.

All *FIRST*® programs are built on a foundation of Core Values, celebrating discovery, impact, inclusion, innovation, teamwork and fun. All participants at events should be familiar with and practice Core Values.

What have teams been doing?

For roughly 12 weeks, teams of students ages 9-16* have engaged in problem-solving, coding, and engineering to build and program a LEGO® Education robot for the Robot Game, while also creating an Innovation Project solution related to the annual theme. While some teams may appear further along in their work than others, all have been building and improving on their work using the Engineering Design Process in both portions of the program.

What Happens on Tournament Day?

Judging: Teams will have 30-minutes to share what they have learned and get valuable feedback on their Robot Design, Core Values, and Innovation Project in the judging session. Judges will use *FIRST* rubrics to assess teams' work and provide some immediate verbal feedback to encourage and inspire them. Each team will leave their judging session with something they did well and something to improve.

Robot Game: In addition to judging, each team will play three separate 2.5-minute matches of the Robot Game. They will try to have their robot score as many points as possible by solving the missions of the Robot Game. Only their highest score counts.

The Robot Game allows teams to demonstrate how well their design and code worked. In between matches, you may see them working together to iterate and improve their robot for their next round.

Referees at the Robot Game table will also be watching how the teams embody *Gracious Professionalism*® – the spirit of friendly competition unique to all *FIRST* programs. When all the matches and judging sessions are complete, the top-performing teams will take home awards, but all teams will share in the celebration of a season well done.

Team Networking: In addition to competing in Robot Game matches and participating in judging, teams also benefit from opportunities to meet and network with other teams at events.

Learn more at: www.firstlegoleague.org

*Ages vary by division and country

FIRST® Progression of Programs

FIRST combines the rigor of STEM learning with the fun and excitement of traditional sports and the inspiration that comes from community through a progression of programs that have a proven impact on learning, interest, and skill building inside and outside of the classroom.

Children can join any of our three programs based on age or grade level. Ages may vary by region.

Grades PreK-8 · Ages 4-16

Young Innovators Using Skills and Imagination to Solve Problems as a Team

THE CHALLENGE
Through a guided, global robotics program, students are introduced to STEM learning and exploration at an early age. Children can begin with Discover (ages 4-6) and progress through Explore (ages 6-10) and Challenge (ages 9-16), or join at any division based on their age or grade level.

THE JOURNEY
Young children are introduced to STEM concepts and develop habits of learning through engaging, fun challenges and competitions using LEGO® Education materials.

THE OUTCOME
Students gain real-world problem-solving experiences that inspire them to experiment and grow their critical thinking, coding, and design skills while building confidence, growing their knowledge, and developing habits of learning.

Grades 7-12 · Ages 12-18

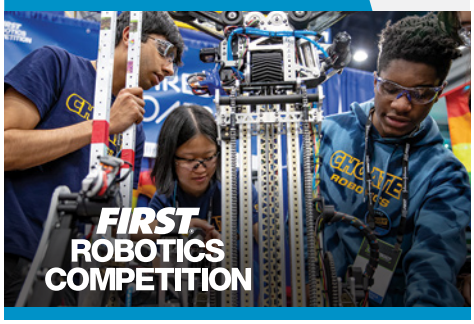
It's Way More Than Building Robots

THE CHALLENGE
Robots are built from a reusable platform, powered by Android technology, and programmed using Java-based programming languages to compete head-to-head in an alliance format. Students are encouraged to create team brands and be an ambassador for *FIRST* and STEM in their communities.

THE JOURNEY
Teams compete at local and regional events, qualifying up to the *FIRST* Championship. They earn awards based on their teamwork, creativity, innovation, and the engineering design process.

THE OUTCOME
While developing their STEM skills and mastering engineering principles, students learn the value of persistence, innovation, teamwork, and the engineering design process. High school students have access to education and career discovery opportunities, connections to scholarships and employers, and a place in the *FIRST* community for life.

Grades 9-12 · Ages 14-18



An Exciting Sport Built Around the World of STEM

THE CHALLENGE
Under strict rules, with limited time and resources, high school teams use sophisticated technology to build and program industrial-size robots for a challenging field game. Each team creates a team identity, raises funds to meet its goals, and works to promote STEM in the local community.

THE JOURNEY
At district and regional events, cheering crowds root for qualifying teams as students compete with their robots for prestigious awards and a coveted spot at the *FIRST* Championship.

THE OUTCOME
As students learn real-world engineering concepts, they build their confidence and workforce skills, and connect with professional team mentors and sponsors who can help them succeed. Plus participants and alumni have access to education and career discovery opportunities, connections to scholarships and employers, and a place in the *FIRST* community for life.

At the heart of *FIRST* are its Core Values, which emphasize the contributions of others, friendly sportsmanship, teamwork, learning, and community involvement. These include *Gracious Professionalism*® (respect for others, being a good sport, and sharing what you learn) and *Coopertition*® (competing hard but also helping the other teams). **www.firstinspires.org**

Planning Team & Resources

Key Roles and Resources for Managing Challenge Tournaments

The key to a successful tournament is a strong planning team. Filling the required key volunteer roles well before the event will ensure the work is divided into manageable tasks. Additional role descriptions and role-specific volunteer resources are available. Local tournament resources may also be provided by your regional Program Delivery Organization.

Key Volunteer Roles

- **Program Delivery Partner (PDP):** Assigns teams to events and provides regional guidance for event implementation. Ensures all global standards are upheld.
- **Tournament Director (also referred to as Event Admin/Event Director):** Oversees all aspects of the tournament and reports to the region's *FIRST* LEGO League PDP.
- **Judge Advisor:** Responsible for overseeing all Judges, including any pre-event communication and training. Ensures that global standards for judging and awards are followed and *FIRST* LEGO League event rubrics are used. Requires familiarity with the advancement policy and training to use the Official Judging Spreadsheet or *FIRST* Event Hub.
- **Head Referee:** Helps recruit, train, and oversee all tournament Referees. Has comprehensive knowledge of the season field setup, missions, rules, and challenge updates. Responsible for tracking and timing Robot Game matches and coordinating Referees with the Emcee, Scorekeeper, and the Field Manager. Performs quality assurance on challenge sets and all competition and practice fields before and after the event.
- **Volunteer Coordinator:** Responsible for recruitment and onsite management of event volunteers, including volunteer registration, assignments, managing any walk-on volunteers, and problem-solving. Works closely with the Tournament Director and venue on all volunteer logistics, including pre-event planning and communication.

Resources for Planning Team Members

- Tournament Manual
- *FIRST* Event Hub
- *FIRST* Volunteer Management System (VMS)
- Judging Toolkit
- Referee Toolkit

Tournament Directors or Program Delivery Partners should share relevant chapters of this manual with key volunteers to assist with managing their areas of responsibility.

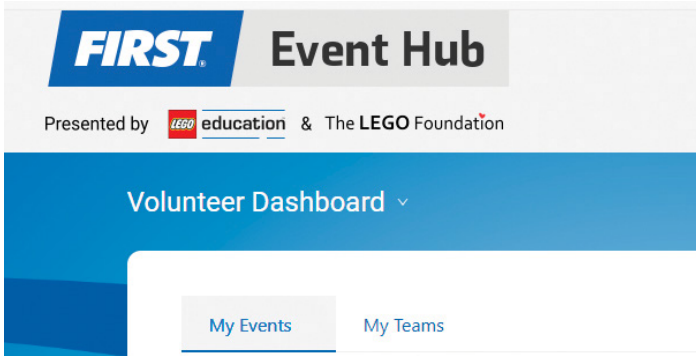
The *FIRST* Event Hub

The *FIRST* Event Hub is an online tool for setting up and managing events. Access is given to Program Delivery Partners to create events and assign the role of Event Admin so others can manage all other aspects of the event. Within the *FIRST* Event Hub you will be able to:

- Create and manage event schedule
- Invite key volunteers
- Invite coaches
- Assign roles to volunteers
- Assign Judges to judging rooms
- Assign Referees to tables
- Complete/edit team rubric and scoresheet data
- See team rankings and assign awards and advancement

FIRST Volunteer Management System

The *FIRST* Volunteer Management System (VMS) is designed to assist in management of event volunteers across all *FIRST* programs. Volunteers will also need to complete a Volunteer Registration and background screening to be assigned a role in VMS for your event.



In-Person Venue

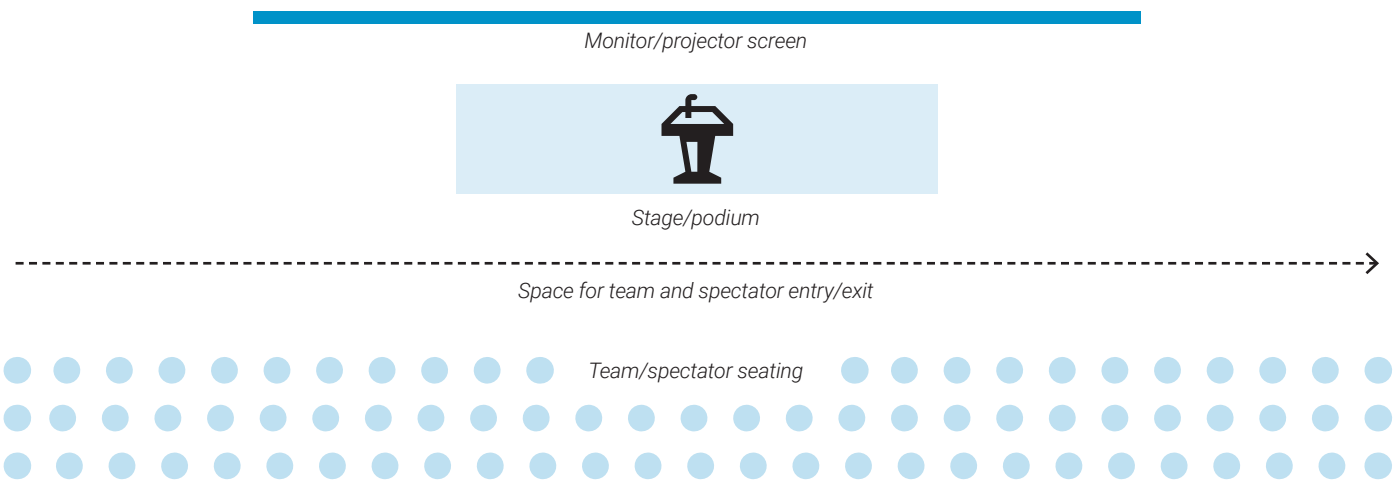
Seven Primary Areas

Every *FIRST* LEGO League tournament should have these areas.

1. Opening and Closing Ceremony
2. Robot Competition Area
3. Judging Space(s)
4. Judge Meeting Room
5. Team Pit
6. Volunteer Room
7. Welcome/Team Check-In/ Volunteer Check-In

1. Opening and Closing Ceremony

This area often doubles as the Robot Competition Area. See Chapter 12 for more details.

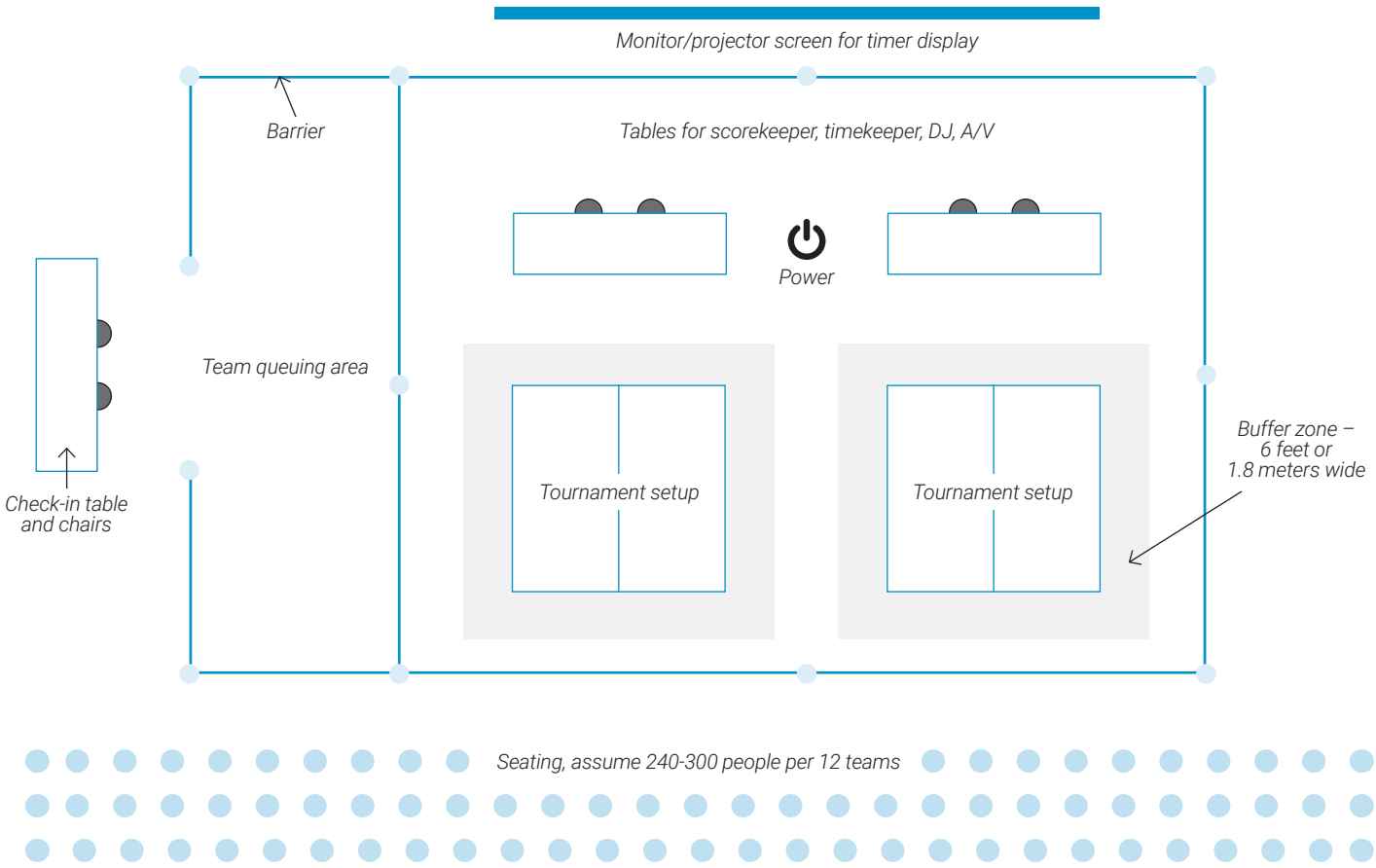


SUPPLIES AND EQUIPMENT

OPENING AND CLOSING CEREMONY	CLOSING CEREMONY ONLY
Access to electricity	Table to display recognition items
Audio and video capabilities (screen, microphone, and sound system)	Additional seating for guest speakers
Podium and/or stage	Camera/photographer for awards photos
Ample seating for spectators	
Accessible seating for teams and spectators	

2. Robot Competition Area

This area often doubles as the Opening and Closing Ceremonies Area. See Chapter 12 for more details.

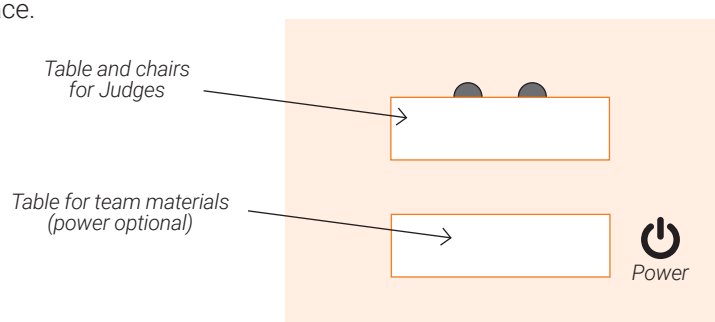


REQUIRED SUPPLIES AND EQUIPMENT		
ITEM	**DESCRIPTION**	**QUANTITY**
Tournament setup	One (1) tournament setup = two (2) 4' x 8' competition tables together	1 per 12 teams
Table supports (legs, folding tables, saw horses, or milk crates)	If not permanently attached, supports are required for competition tables (must support six corners for each tournament setup and four corners for each solo practice competition table)	Based on table type
Challenge sets	Robot Game challenge field with mat, mission models, and 3M Dual Lock fasteners	2 per tournament setup, plus 1 per practice table
Referee scoring materials (electronic or paper scoring)	If using the *FIRST* Event Hub or digitized scoring, each Referee will need an internet-connected device (tablet or laptop) to enter team scores at the end of each match. Backup devices and charging cables are also recommended. If using paper scoresheets, each Referee will need a clipboard/writing utensil and enough blank scoresheets for each practice and official match at their table, plus a few extra.	2 devices per tournament setup 2 clipboards per tournament setup, plus # paper scoresheets = # teams x # matches
Timer/stopwatch	To measure time remaining in each match (can be projected using scoring software or measured at each table by a stopwatch or cell phone timer)	1 overall or 1 per tournament setup
Computer or Tablet	For score calculation/input and audio/visual needs	1 or more
Extension cords and power strips	For scoring, audio/visual, and video camera support	Varies
Standard-size table	For scorekeeping, timing, and audio/visual needs; may be reused for awards	1 or more
Chairs	For scorekeeping, timing, and audio/visual needs	1 or 2 per table
Spectator seating	Chairs or stadium seating is recommended for all spectators. At minimum, accessible seating for spectators with mobility challenges is required.	Assume 240-300 people per 12 teams

RECOMMENDED SUPPLIES AND EQUIPMENT	
ROBOT GAME & SCOREKEEPING	**AUDIENCE COMFORT/CROWD CONTROL**
Wood screws to hold competition tables (2 per table)	Projector or screen to display scores
Vacuum or duster	Audio/video system
Referee shirts or sports pinnies	Audience seating
Mission models spare parts	Stanchions, cones, or pipe and drape to mark areas
Measuring stick to verify robot height	
Tape measure to verify longer distances	
Additional clipboards for volunteers	
Table signage (if using more than one tournament setup)	
Table skirts	
Additional tables and tablecloths	
Additional paper scoresheets	

3. Judging Space(s)

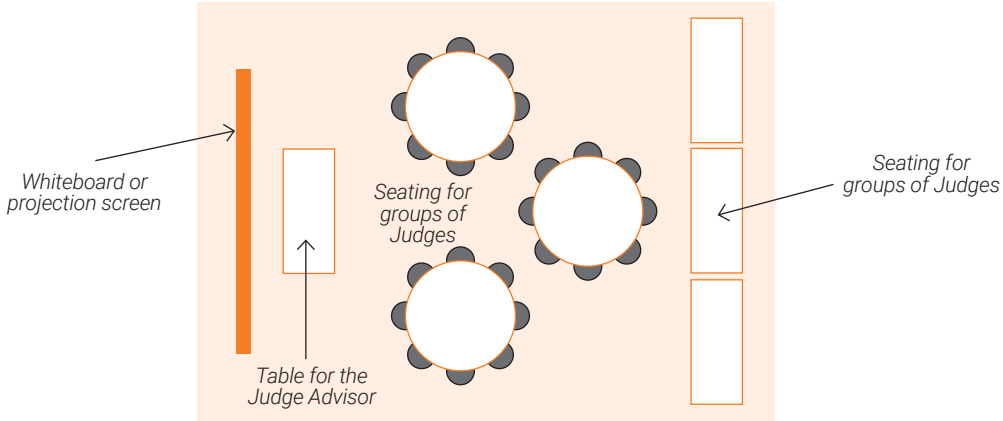
A judging space is a room or designated location where teams participate in their judging session. A judging pod is a group of Judges assigned to work together in a judging space. One judging space is recommended for every 4-6 teams, depending on event size and schedule. 2 Judges per pod is required, 3 Judges per pod is recommended. Judging space may double as Judge Meeting Space.



REQUIRED SUPPLIES AND EQUIPMENT	RECOMMENDED SUPPLIES AND EQUIPMENT
1 table for teams to set up their project and robot design materials	An extension cord and power strip for teams
1 table for Judges with rubrics and judging materials	Extra paper rubrics for Judges (in case of technology failure)
Chairs for Judges	Chairs for team members (maximum of 10 team members and two coaches)
Paper rubrics or a tablet/computer for completing digitized rubrics	Chairs for spectators, if allowed
Scratch note paper and pens for Judges	

4. Judge Meeting Room

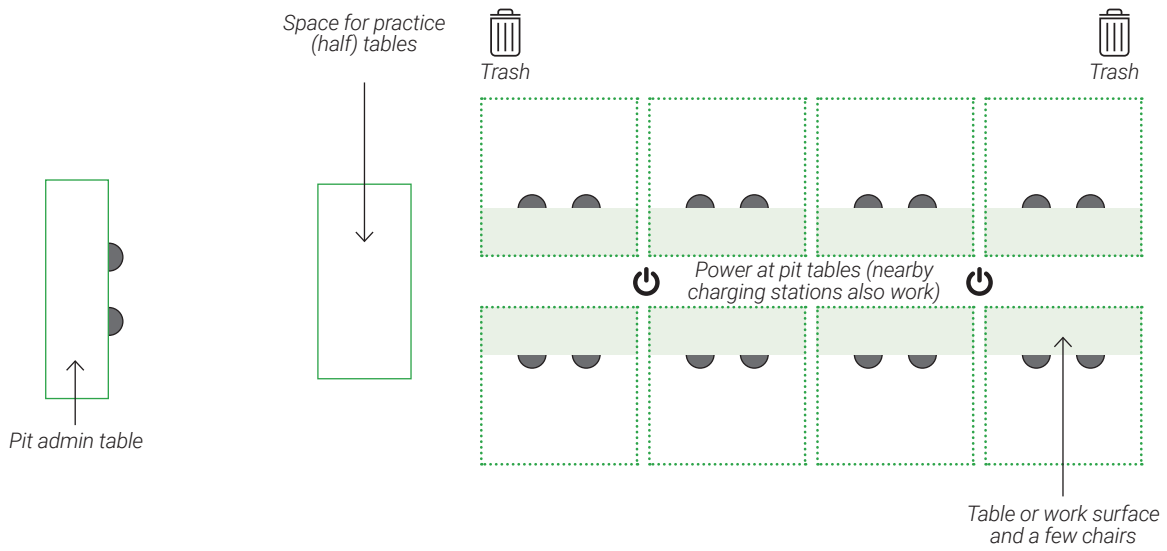
Must be out of view of teams and spectators. A quiet, secure room that is not accessible to teams and spectators is recommended. Can double as the Judging Space or Volunteer Room.



REQUIRED SUPPLIES AND EQUIPMENT	RECOMMENDED SUPPLIES AND EQUIPMENT
Seating for Judges	Whiteboard or computer with projector screen to display scores and rankings
Table and chair for Judge Advisor	Extension cord and power strip
	Writing utensils and/or sticky notes
	Snacks or refreshments

5. Team Pit

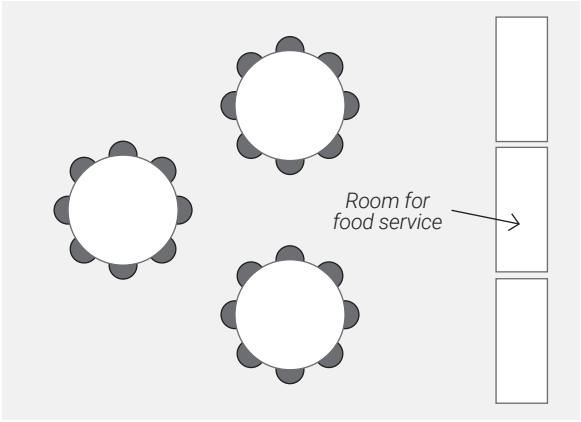
Works best in a large, open space with good traffic flow. Space must be accessible to all teams, spectators, and volunteers. Team pits can be arranged in the center of the space with ample room between and around for traffic flow, or with the team pits around the perimeter of the space with ample space in the middle for traffic flow.



REQUIRED SUPPLIES AND EQUIPMENT	RECOMMENDED SUPPLIES AND EQUIPMENT
1 table and 2 chairs per team (minimum 8'x8' pit space per team)	Additional tables and chairs for teams and family members
Access to electricity (at pit tables or nearby)	Additional table and chairs for pit admin, if used
	Practice tables (usually 1 table per 6-8 teams) and seating for practice table attendants
	Extra tournament documents at pit admin (schedules, award nomination forms, etc.)
	Audio system for announcements
	Designated eating space (if outside food is permitted)

6. Volunteer Room

A secure, monitored space is recommended. Teams and spectators should not have access to the Volunteer Room.

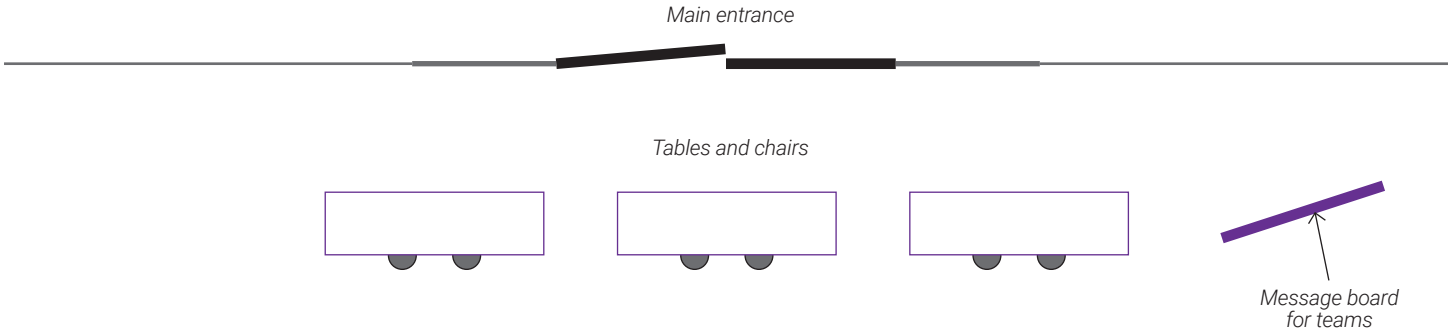


SUPPLIES AND EQUIPMENT

CONSIDER THE FOLLOWING
Seating for all event-day volunteers
Room to set out volunteer lunch and refreshments
Space for coats and personal items

7. Welcome/Team Check-In/Volunteer Check-In Area

A space near the entrance that is easy to find, highly visible, and has room for several tables where teams will check-in as they arrive at the event. A separate area (or additional space) for volunteer and/or spectator check-in can be created, if desired.



SUPPLIES AND EQUIPMENT

CONSIDER THE FOLLOWING
Tables and chairs for check-in volunteers (recommend 1 table and 2 chairs for every 6-8 teams)
Printed documents
Writing utensils
Safe or cash box (if teams are paying registration fee onsite)
Computer and access to power (if using digital check in)

Other Site Considerations

Set up and Access Times. When will you set up and tear down your event? Confirm with your venue contact that you will have access to the venue with ample time for setup before teams arrive and teardown after the event ends.

Internet and WiFi access. Does your venue offer free WiFi access for using the *FIRST* Event Hub? Ensure eventhub.firstinspires.org is added to the approved website list if the venue restricts certain websites.

A/V Support. What is available in-house and at what cost? Ensure all A/V is set up and tested before the event begins and that there is an onsite contact who can provide support in case or technology issues.

Contract. Does the venue require that you sign a contract? If a contract or fee is required, ensure that it is properly planned with the venue contact in advance of the event and that payment is made before or after the event.

Venue Insurance. Many venues require insurance that covers the event. Confirm with your venue contact.

Custodial. Will you need custodial services during the event and who will provide this service? Confirm with venue contact.

Emergency Services/Procedures. Ensure that emergency preparedness requirements are met and communicate these plans to teams and volunteers at the event. Additional information is provided in Chapter 9.

Security Personnel. Does the venue require security personnel for your event? Confirm with venue contact.

Parking. Where will teams, guests, and volunteers park? Is there ample parking? Confirm with venue contact and communicate with teams and volunteers ahead of time.

Exterior Signage. Does the venue have multiple entrances? Do teams and spectators have different entrances? Confirm with venue contact and communicate with teams and volunteers ahead of time.

Lunch for Teams and Volunteers. Will there be food available for purchase? Is there a designated place for teams and spectators to eat? Volunteer lunches should be provided at no or low cost.

Interior Traffic Flow. Will it be easy for teams to get from one area to another? Create and display additional wayfinding signage or maps, as needed.

Space Summary

Use the following table to see the recommended numbers of Judging Spaces and Robot Game competition tables that you will need for your event.

NUMBER OF TEAMS	MINIMUM NUMBER OF JUDGING SPACES	MINIMUM NUMBER OF INDIVIDUAL COMPETITION TABLES
6	1	2
7-12	2	2
13-18	3	2 or 4*
19-24	4	2 or 4*
25-30	5	4 or 6*
31-36	6	4 or 6*
37-42	7	6 or 8*
43-48	8	6 or 8*
49-54	9	8 or 10*
55-60	10	8 or 10*
61-66	11	10 or 12*
67-72	12	10 or 12*

*Depending on the time available for your event.

Preparation Timeline

Advance Preparation

Eight to 12 months before the event:

- ☐ Confirm the date and location of each event you are planning.
- ☐ Confirm the number of teams who will compete at each event.
- ☐ Confirm your venue availability and costs.
- ☐ Write your tournament budget. See Chapter 5 for sample costs.
- ☐ Develop a plan and begin fundraising to support your event.

Four to six months before the event:

- ☐ Set up your event in the *FIRST* Volunteer Management System (VMS).
- ☐ Identify your Judge Advisor, Head Referee, and Volunteer Coordinator.
- ☐ Identify your Accommodations Coordinator, if being used at your event.
- ☐ Ensure your key volunteers are trained and have access to all materials needed for their role.
- ☐ Create packets for volunteers with documents and resources specific to their assigned area.

Two to three months before the event:

- ☐ Set up your event in the *FIRST* Event Hub, if being used.
- ☐ Recruit event volunteers for all required and any recommended roles.
- ☐ Schedule any necessary contracted event support (AV, security, custodial, etc.).
- ☐ Schedule all necessary volunteer training (Judges, Referees).
- ☐ Invite local sponsors, guest speakers, and/or media to attend.

One month before the event:

- ☐ Communicate event-specific information to teams and volunteers.
- ☐ Share all required forms with teams, such as the *FIRST* Consent and Release form.
- ☐ Purchase or obtain all necessary supplies.
- ☐ Create an overall tournament schedule, including judging sessions and Robot Game matches.

Week of the event:

- ☐ Communicate final updates and information to teams and volunteers.
- ☐ Confirm all challenge sets are complete/functional, and that competition tables are in good condition.
- ☐ Charge all electronic devices (laptops, tablets, etc.)

Tournament Day Set Up

It is recommended to set up the day or evening before your event. If you must set up on the morning of the event, make sure you leave enough time to complete all tasks before teams and spectators arrive. See Chapter 3 for detailed supply lists and recommended floor plans.

Opening and Closing Ceremonies Area

Setup for this space is typically led by the Tournament Director and/or Technical Staff.

- ☐ Set up and test all audio, video, and electrical equipment.
- ☐ Cover all wiring with tape.
- ☐ Hang flags, banners, and other signage.
- ☐ Set up seating.
- ☐ Unpack and prepare trophies and medals.

Robot Competition Area

Setup for this space is typically led by the Head Referee, Technical Staff, and/or Field Manager.

- ☐ Set up the competition tables and challenge sets.
- ☐ Attach signs to tournament tables.
- ☐ Set up the queuing area for the Robot Game matches (chairs, signage, barriers, etc.).
- ☐ Set up spectator seating.
- ☐ Set out printed materials (scoresheets, team list, schedules, ***Robot Game Rulebook***, challenge updates, etc.).
- ☐ Set out office supplies (pens, paper, clipboards, etc.).
- ☐ If using digitized scoring, set up and test all internet-connected devices.
- ☐ Set up and test scorekeeping station, timer, and all A/V equipment (if different from ceremonies A/V equipment).
- ☐ Lay out Referee shirts, if applicable.
- ☐ Set out snacks and water, if applicable.

Judge Meeting Room and Judging Spaces

Set up for this space is typically led by the Judge Advisor and/or Judging Assistant.

- ☐ Set out office supplies in each space (pens, paper, clipboards, markers for whiteboard, etc.).
- ☐ Hang any signage.
- ☐ Set out printed materials in each space (rubrics, flowcharts, script and questions, team list, schedules, maps, etc.)
- ☐ If using digitized rubric scoring, set up and test all internet-connected devices.
- ☐ Lay out Judge shirts, if applicable.
- ☐ Set out snacks and water, if provided.

Volunteer Room

Set up for this space is typically led by the Volunteer Coordinator.

- ☐ Set up tables, chairs, and/or coat racks.
- ☐ Lay out volunteer shirts and recognition items, if applicable.
- ☐ Hang any signage.
- ☐ Set out snacks and water, if provided.

Team Pit Area

Set up for this space is typically led by the Tournament Director, Pit Admin, and/or available setup volunteers.

- ☐ Set up team tables and chairs, and label with team signs.
- ☐ Set up pit admin tables and chairs, if applicable.
- ☐ Set out extra copies of printed materials (schedules, maps, emergency procedures, etc.)
- ☐ Set up and test announcement system, if applicable.
- ☐ Set up practice tables, if applicable.
- ☐ Hang up any signage.
- ☐ Set up lunch tables and/or concessions table, if applicable.
- ☐ Set up trash cans.

Welcome/Team Check-in/Volunteer Check-in Area

Set up for this space is typically led by the Tournament Director, Volunteer Coordinator, and/or available setup volunteers.

- ☐ Set up tables, table covers, and chairs.
- ☐ Hang up any interior and exterior signage.
- ☐ Set out printed materials (team list, team packets, volunteer list, schedules, maps, emergency procedures, etc.)
- ☐ If using digitized check in, set up and test all internet-connected devices.

Budget

Collaborate with your Program Delivery Partner in the Budget Planning Process

- Ensure clarity on the division of responsibilities and resources by confirming with your partner what they will contribute and what you are expected to provide, including the necessary number of challenge sets and competition tables. This is especially critical for qualifying tournaments.
- Adhere to any requirements set by your partner.

Develop your budget early.

For a typical tournament, the largest costs tend to be:

- Venue and rental fees
- Food for volunteers
- Awards/medals
- Volunteer shirts

A sample budget may be provided by your regional PDP.

Venue

Your venue costs can range from nothing (if all is donated or in-kind) to your largest budget item. Have a clear understanding of your venue costs.

- Venue rental/charges for room/space usage
- Charges for audio and/or video equipment and staffing
- Parking fees
- Custodial fees
- Security fees
- Other charges

Common Budget Items

REUSABLE

- Competition tables ✹
- Signage
- Referee shirts
- Timers
- Extension cords
- Clipboards
- General office supplies

CONSUMABLES

- Team recognition items (medals, etc.) ✹
- Food for volunteers
- Printing
- Volunteer identification
- Gaffer's tape
- First-aid kits

EQUIPMENT, FEES, IN-KIND, AND/OR BORROW

- Challenge sets ✹
- Venue-usage fees
- Audio/Video
- Printers
- Rentals, such as tables/chairs
- Computers

Tournament Schedule

Preparing a Schedule

The schedule for your event should be tailored to suit the needs of your teams and the physical layout of the venue. The following list should be used to guide you through the process of creating your event's custom schedule.

Scheduling

All official events must have an appropriate schedule provided (or at least visible) to all teams and event attendees. When drafting your schedule, account for the following key elements of *FIRST* LEGO League Challenge events:

- Volunteer Arrival/Check-in
- Team Arrival/Check-in
- Coaches' Meeting
- Opening Ceremony
- Robot Game Rounds
- Judging Sessions and Award Allocation
- Awards Ceremony

Additional scheduling elements to consider: Practice matches, lunch break, team photos, team pit clean-up, guest speakers, games and activities, etc.

FIRST provides schedule templates available in two 12-team versions which are available on the event volunteer resources page. There is also a scheduling tool within the *FIRST* Event Hub capable of scheduling and assigning teams and volunteers. Tournament organizers should adjust these template schedules as needed to accommodate your tournament's size and scale. It is normal to go through several iterations before finalizing the schedule with accurate timings and resources. Check with your PDP once your schedule is complete and revisit this guide to ensure nothing has been overlooked before sharing the schedule with teams.

Calculating Resources:

The number of Judging Spaces and Robot Competition Tables at your event is critical for creating your schedule. A table that can help calculate the number of judging spaces and competition tables needed for your event is found in Chapter 3. Consider the following factors during your calculation:

- **Number of Judging Spaces for your event:** A maximum of six teams should be seen in each space by a judging pod, or group of Judges working together, in a single day. Each team will get a minimum of 30-minutes for judging, and judges will need time after the team leaves the judging space to complete the rubrics (recommended 15-minutes). Consider increasing the number of judging spaces and judging pods to accommodate all sessions within your event time frame.
- **Number of Robot Competition Tables for your event:** Typically, a 10-minute interval is allocated per match, which includes 2.5-minutes for team setup, 2.5-minutes for the Robot Game match, 2.5-minutes for scoring, and 2.5-minutes for resetting the table. Using this timing, it is possible to accommodate six Robot Game matches per hour. For events with one tournament setup (two competition tables), this equates to 12 teams participating in a Robot Game match each hour. Every team must be allowed at least three Robot Game matches, so consider adding more competition tables and Referees to accommodate all teams' required matches within your event time frame.

Additional Timing Considerations

- **When will you be able to set up your event?** If set up takes place on the morning of your event, leave enough time for all set up tasks to be completed before teams and spectators arrive.
- **What time will the event start?** Consider the distance that teams and volunteers will have to travel to get to the venue. Consider what time the Robot Game matches and judging sessions will start, then work backwards to plan your arrival and registration time.
- **What time do you want the event to finish?** You will need to include an awards ceremony at the end of your event.
- **Will the judging sessions and Robot Games span the whole day?** Your event may choose to schedule all judging sessions in the morning and all Robot Games in the afternoon or vice versa, if time allows.
- **Will you schedule any practice Robot Game matches?** Consider when these will take place, before the official matches begin.
- **Will you schedule any breaks or lunchtimes?**
- **Are you going to schedule anything else, such as guest speakers or team photos?**

When you have all this information, you can schedule your event.

Team Communication and Recognition

Team Information Packet

Teams will benefit from receiving event details as soon as they become available and when you are sure they won't change. *FIRST* provides a template ***Team Information Packet*** for customization, available from your regional PDP. Tournament organizers should share the following information with teams ahead of the event:

- Event Date and Location
- Event Fees and Payment Instructions
- Directions and Parking Information
- Overall Tournament Schedule
- Pits, Judging, and Robot Game area Information
- Awards and Advancement Information
- Concessions Information and/or Outside Food Policies
- Any other relevant information that teams or spectators will need to safely attend the event.

When teams arrive for check-in, they should receive any remaining details about the event, including a detailed schedule that communicates their judging session and Robot Game match times.

Coaches' Meeting

A Coaches' Meeting should be scheduled at the beginning of the event, before Robot Game matches and judging sessions begin, to allow the Tournament Director to share important updates, review the day's schedule, and communicate any last-minute changes to procedures with coaches. It is recommended that the Head Referee and Judge Advisor also attend to answer coach questions related to their areas of the competition and to ensure the teams are fully prepared for the day ahead.

Team Recognition

- **Trophies:** To encourage global uniformity/branding, PDOs must provide official LEGO trophies for all required awards at Championship events. Official LEGO trophies may be used at Qualifying tournaments if desired.
- **Other recognition items:** A form of recognition (medals, certificates) for all participants must be provided at Championship events and may be provided at Qualifier events. Season-specific certificates can be found on the Game and Season Resources page.
- **Awards:** 30-50% of teams at your event should receive awards. Check with your partner for the awards that will be distributed at your tournament.
- **Advancements:** Check with your PDO for the number of teams that will advance from your tournament to the next level of competition, if another level is available. The advancement process outlined in the **Award and Allocation** document of the Judging Toolkit must be followed when advancing teams.

Publishing Results

Results released to the public shall NOT include judging evaluations for any team or any information regarding ranking of teams in consideration for awards. Published results should not include any Personally Identifiable Information on coach or student participants – only team names and numbers.

If your event does not use the *FIRST* Event Hub, teams should also leave your event with paper or digital copies of the following:

- **Judging Rubrics**
- **Robot Game Scoresheets**

Event Signage

Venue Signage

Reference the venue requirements in Chapter 3 as you prepare signage for your event. Be sure to consider and plan for the following:

- Schedule a walkthrough of the venue to determine where wayfinding signage may be helpful.
- Each of the seven key areas should be clearly marked with signage (Welcome/Check-in, Ceremonies, Robot Game, Team Pit, Judging Spaces, Judge Meeting Room, Volunteer Room).
- Depending on your venue, plan for additional signage (restrooms, first aid, concessions, lost and found, etc.)
- If available, plan for use of *FIRST* LEGO League branded materials such as tablecloths and pull-up banners and sponsor recognition with banners/signs or other displays.

Parking and Entrance Signage

Parking and other exterior signage helps to identify your venue as the tournament site and directs your volunteers, teams, and spectators to designated parking and entry points. Consider creating welcome signs at the entrances (inside and outside the building) so attendees know they are in the right place. If teams use a different entrance than spectators and/or volunteers, clearly mark each entrance.

Sponsor Recognition

Make sure you honor the recognition promised to sponsors when they made their donation to support the event. Regional sponsor names and logos should be provided by the Program Delivery Partner to the tournament host, if different from local event sponsors. Sponsor recognition signage could include:

- Sponsor names and logos on printed signs and banners
- Sponsor names and logos on projector screens or monitors
- Sponsor names and logos added to the leaderboard in the *FIRST* Event Hub

Logos and Branding

- *FIRST* LEGO League logos
- Season-specific assets

Event Safety, Accessibility, and Cancellation

Emergency and Evacuation Plans

The planning team should know the emergency and evacuation procedures at their venue ahead of time.

What would you do in the case of the following?

- Lost child
- Natural disaster such as tornado, earthquake, tsunami, snow, or ice storm
- Fire
- Loss of power
- Medical emergency
- Disruptive or ungracious person
- Report of verbal or physical abuse

It is recommended that an emergency folder listing these procedures and protocols be created for members of the planning team and key volunteers, such as the pit admin and robot competition area staff.

You should also share key safety information with event guests at check-in or during the opening ceremony. Key information may include the locations of first aid, emergency exits, and tornado shelters.

Safety

- Work with your venue's contact to understand any relevant building or fire codes, any safety and health requirements or regulations, as well as any local and applicable laws.
- Be mindful to tape down or hide cords and wires. Gaffer's tape is excellent for this job. Always check with your venue before applying tape to floors.
- Be aware of room capacity limits.
- Do a walkthrough of your venue looking for trip hazards, especially in high-traffic areas.
- Be careful not to block exits. Make sure paths remain clear and open.
- Local guidance may require that EMTs must be on site and available while students are present.

Data Protection

FIRST adheres to some of the strictest privacy and data protection laws in the world, such as the United States Children's Online Privacy Protection Act (COPPA) and General Data Protection Regulation (GDPR). Remember, if you collect any personal data from event participants, you must dispose of it or delete it completely once the event is over or by the end of the season. Personal data could include paper copies of the ***FIRST* Consent and Release Form**; team rosters; and coach, mentor, or volunteer contact information. Guidance can be found in the *FIRST* Privacy Policy. Here are a few tips to keep personal data safe:

- Treat all personal data with the utmost confidentiality and security.
- Limit data use and availability to only those who need it to perform a specific role at the event.
- Never share personal data with anyone outside of the event.
- If sharing is required among personnel working at the event, always use secure file transfer methods such as Microsoft OneDrive, Microsoft Teams, or encrypted email.
- Confirm that the data is private and not publicly accessible.
- Ensure that digital data is kept in password-protected files.
- Delete any downloads of the data immediately at the conclusion of use. Make sure you delete the file from your downloads folder and trash/recycle bin.
- Destroy hard copies of files or forms containing personal data using methods such as shredding.
- Any data stored in the *FIRST* Event Hub is deleted for you at the end of the season.

Contact privacy@firstinspires.org or the *FIRST* IT help desk at helpdesk@firstinspires.org if you have questions.

Incidents

- With your venue's contact, review the venue's procedure should an incident occur.
- If there is immediate danger, injury, or risk of injury – **call emergency services immediately.** (For example, in the US, call 911.)
- If there is a significant incident, **your *FIRST* LEGO League PDP should be contacted** immediately after you contact emergency services.
- Should there be an incident, a completed **incident report form** should be given to the appropriate Field Operation Manager/Partner Services Manager at either LEGO or *FIRST*. Review the incident report forms ahead of your event.
  - There are two types of incidents that need to be reported – **medical and non-medical**. Report forms can be found on the Youth Protection Program page. Instructions are included on the forms. Several copies should be printed and made available. If using the *FIRST* Event Hub, you can use the Report a Concern button on the home page to report.

Accessibility

- Your venue should **meet all accessibility requirements or regulations**. Inform teams in advance of any known limitations to accessibility and provide the accommodation that will be in place. For example, let them know if the venue does not have a ramp to the ceremony stage and how participants with mobility issues will be able to participate in the awards ceremony.
- Tournament Directors and/or PDPs should contact teams before the event (recommended 1 month prior) to **ask if any of the teams or volunteers attending need specific accommodations**. You may use this language as a starting point: "We strive to host inclusive, accessible events that enable all individuals to engage fully. To request an accommodation or for inquiries about accessibility, please contact (name, email, phone)."
- Consider recruiting an **Accessibility Coordinator volunteer** to collect accommodation requests. Teams are also encouraged to reach out to PDPs or event organizers with accommodation requests.
- **Ensure all volunteers know who they can ask for help** if they are unable to answer a question related to accessibility at the event, whether that is the Accommodations Coordinator or another key volunteer.
- **Inform volunteers of any known accommodations** in place at the event and that these accommodations should not be viewed as "special treatment" for a team, volunteer, or guest.

See the *FIRST* Youth Protection Program for more information or reach out to the *FIRST* Accommodations Inbox at accommodations@firstinpires.org with questions.

Cancellation Policy

- No one likes to think about the possibility of cancellation. However, it is best to have a public cancellation policy that is available and published before all events. The safety of the teams is most important.
- Before canceling the event, consider pivoting to a remote event. The *FIRST* Event Hub is able to provide links to Teams meetings for judging sessions and Referee review sessions of recorded or live matches and a secure place for teams to upload materials, such as images of their Innovation Project work or a document showing their robot code. You may choose to delay assigning awards until all teams can submit their materials and have them reviewed.
- Know in advance the answer to these questions: **Under what conditions will you have to cancel your event? Can you reschedule or move to a remote or hybrid event?**

Work with your PDP to create a comprehensive cancellation policy that includes the reasons for cancellation, methods by which all parties will be notified, and whether the event will be rescheduled. Communicate this policy in advance of the tournament date. If you know the event will not be able to be rescheduled, share how teams will advance and/or what happens to any fees collected as soon as possible.

Event Production

Overview

The production of a *FIRST* LEGO League tournament is designed to engage the audience in the excitement of the ceremonies and Robot Game matches. The goal is to enhance the overall experience, creating a memorable celebration event for teams and spectators.

Two Parts

- **Robot Game**, managed by the Field Manager and/or Technical Staff
- **Ceremonies**, managed by the Technical Staff

Production Elements

- Audio – music, guest speakers, emcees. Be aware of safe audio practices. The expectations for audio levels are found here.
- Video –created in advance to be played at event
- Cameras – Robot Game, Emcee and guest speakers
- Displays – leaderboard with scores and game clock

Production: Robot Game

Consider recruiting a volunteer Field Manager and/or Technical Staff to oversee the following key elements of the Robot Game production:

- Music (See approved Event Music List)
- Game clock
- Play-by-play commentary from game Emcees
- Scores display
- Video feed, if used

Volunteers in the Robot Competition Area are responsible for ensuring that the Robot Game runs on schedule and that all technical aspects are functioning properly. This includes managing the following equipment:

- Computers – scoring, music, video
- Video cameras, if used
- Screens – one for scores, one for other visuals
- Projectors – one for each screen (one or two)
- Sound system – speakers, microphones for Emcees and making announcements

Production: Ceremonies

Consider recruiting volunteer Emcees to manage the following elements, unless these responsibilities are being handled by the Tournament Director:

Opening Ceremonies

- Team entry/exit
- Guest speakers
- Videos
- Recognition and thanks to volunteers, host site, and sponsors
- Safety and Emergency Preparedness announcements

Closing Ceremonies

- Volunteer appreciation and sponsor recognitions
- Awards/Trophies distributions
- Medal/certificate distribution, high five line, etc.
- Event slideshows
- Team photo opportunities

Additional Considerations

Event volunteers may be recruited and assigned to assist with the following production tasks:

Work with Tournament Director to:

- Deliver ceremonies within a set time
- Customize scripts (templates available)
- Create or locate video and audio content
  - *FIRST* videos
  - National anthem (per local protocol)
  - Music
  - Team slideshow
- Identify, invite, greet, and provide seating for performers, guest speakers, sponsors, and other dignitaries
- Produce the ceremonies at the event

Work with Technical Staff to:

- Provide audio support for presenters (wireless/hands-free microphones), video, and music
- Provide visual support – computers, video cameras, screens, projectors, video player, and slideshow creation
- Provide adequate lighting for Robot Game tables and cameras
- Safely secure cables and cords
- Provide volunteers to assist with technical support for camera operators and A/V or DJ

Opening/Closing Ceremony Rehearsal (Optional)

- Rehearse the entire ceremony. You may be unable to practice some elements, such as the parade of teams or guest speaker presentations. Estimate the time it will take for these pieces and use stand-in volunteers when possible.
- The **Emcee** reads the script aloud and confirms pronunciations.
- The **Technical Staff** practices incorporating video components into the ceremony.
- The **Technical Staff** runs a sound check with the systems and sets sound levels.
- The **Emcees** or **Technical Staff** confirm the pattern for team entry/exit and team seating (if incorporated) and determine who will assist with this flow.
- Determine where the **Photographers** will stand. Consider good camera angles for guest speakers (the back of their head is a poor angle, for instance).
- If any elements such as an anthem will be performed live, practice the performer's entrance and exit with them.
- Time the ceremony to ensure it runs on schedule.

Note: Often guest speaker(s) will not be able to join the rehearsal. Make sure you give that person a time limit and offer to prepare some remarks or talking points for them.

Judging Overview

Standards and Guidelines

Refer to the *FIRST* LEGO League Challenge Global Standards document for a complete list of standards that must be met. Specific recommendations and considerations for judging at your event include:

TOPIC	STANDARD	BEST PRACTICE
Training	• Judging at all official events is led by a Judge Advisor. • All Judges at official events are trained. • All training should be delivered using the resources in the Judging Toolkit.	
Judges	All teams are evaluated by a minimum of two Judges.	Three Judges per pod is recommended. A judging pod should see no more than six teams per day.
Rubrics	The official *FIRST* LEGO League Challenge rubrics must be used at all official events in their complete, original form and may be edited for translation purposes, without change to the original intent.	Teams can be sent the official rubrics as a reminder before the event.
Judging Session	• All judging sessions follow the "Session Flowchart" in the Judging Toolkit. • Each judging session should allow 30-minutes per team for evaluation. • Additional time may be given at the Judge Advisor's discretion for teams with special circumstances, such as team members with differing needs or if interpreter or translation services are needed. • A minimum 10 minutes must be allocated for Judges to complete and submit rubrics after each team has left the session.	Additional time can be allocated for Judges to complete and submit rubrics after each team has left the session.
Core Values	All Judges should be familiar with the *FIRST* Core Values, which will be evaluated throughout the judging session.	
Award Allocations	• Awards must be given according to the "Awards and Allocation" document in the Judging Toolkit. • Except for the Robot Performance Award and the Coach/Mentor Award, teams may win only one award from the required awards list. • Ensure that 30-50 percent of teams receive awards.	The *FIRST* Event Hub provides a dashboard of the Official Judging Spreadsheet rankings as scores and rubrics are completed to aid in award allocations.
Conflict of Interest	To avoid any conflict of interest, Judges, Referees, and anyone serving in an event volunteer role must disclose to the Tournament Director a relationship or connection to any team or team member in advance of the event. Judges with conflicts must recuse themselves from allocations and any other activities impacting award or advancement selection.	
Award Eligibility	Only teams as stated in the *FIRST* LEGO League Team Participation Rules are eligible for awards. Participation Rules can be found on the Game and Season Resources page.	
Advancement	The Champion's Rank should be used to identify teams who are advancing to the next level of the competition, if available. The list of advancing teams should be shared with the Program Delivery Partner.	The *FIRST* Event Hub and Official Judging Spreadsheet provide a space to indicate which teams will advance.
Release of Judging Information	• The complete list of all judging evaluations for every team should remain confidential, along with any information regarding ranking of teams. • Rubric-based feedback should be provided to each team, either at the end of the event or within a reasonable time following the event.	Coaches can retrieve their rubrics and scoresheets with feedback by logging into the *FIRST* Event Hub once the Event Admin has published the event.

Judging Roles

See complete list of event volunteer role descriptions here. Additional qualifications and experience/training needed are as follows.

Judge Advisor (1 per event required)

QUALIFICATIONS

- *FIRST* LEGO League Challenge judging experience essential
- Outgoing personality and ability to lead in an inclusive, timely manner to give Judges confidence in their decisions
- Detailed knowledge of the *FIRST* Event Hub or Official Judging Spreadsheet, *FIRST* LEGO League Challenge awards allocation process, and advancement policy
- Strong leadership and mentorship skills
- Strong interpersonal/communication skills
- Strong organizational skills
- Ability to collaborate with others and work as a team
- Ability to train and lead an entire judging team to consensus on award recipients
- Ability to use Event Hub and Official Judging Spreadsheet to lead allocation of awards process

EXPERIENCE/TRAINING NEEDED

This is a key volunteer position. Key volunteers require advanced training as prescribed by *FIRST*.

- *FIRST* LEGO League Challenge Judge Advisor training required

Judge (2 per judging pod required)

QUALIFICATIONS

- Ability to effectively communicate with youth aged 9-14 and adults and serve as a role model
- Strong assessment skills in scoring according to a rubric and facilitating open-ended questions
- Strong interpersonal/communication skills
- Ability to work as a member of a judging pod and in a larger team of Judges

EXPERIENCE/TRAINING NEEDED

- All Judges, regardless of experience level, must participate in judge training facilitated by the Judge Advisor before the event begins. Training may take place in-person or virtually.

Lead Judge (1 per judging pod recommended)

QUALIFICATIONS

- All qualifications for the Judge role must be met, plus:
  - Ability to work as a member of a team and lead that team to consensus
  - Knowledge of *FIRST* LEGO League Challenge rubrics, award criteria, and selection process
  - *FIRST* and/or *FIRST* LEGO League experience preferred

All judges express the FIRST philosophies of Gracious Professionalism® and Coopertition® through our Core Values. The FIRST Core Values are the cornerstones of all FIRST programs.

Recruitment Tools

Judge Advisors can customize the following message to use in judge recruitment:

You don't have to be a rocket scientist to inspire kids!

FIRST LEGO League Challenge is looking for enthusiastic individuals who can offer guidance in a friendly and supportive manner. The philosophy of the competition is that every team member can positively contribute to the success of their team.

We need people who can interact with students to help measure this impact while acting as a mentor to help develop and nurture them on their journey. Your role is to value all the work they have done throughout the season and show them they can succeed no matter how their robot performs.

Measuring performance is important, but for the program to have the most impact, teams need to leave the tournament feeling that they have made progress and, most of all, had FUN!

Qualities we're looking for:

- Good communicator with young people
- Enthusiasm
- Open-mindedness
- Flexibility
- Approachability
- Compassion and empathy
- Willingness to share your professional insights

No previous *FIRST* LEGO League experience is needed for most roles, and training will be provided.

If you would like the opportunity to shape and grow the next generation of innovators and help to steer them through their STEM journey, then we want to hear from you.

Roles available:

- Lead Judge
- Judge

If you are interested in volunteering as a Judge or in another volunteer role for this event, please **[insert event-specific volunteer registration step-by-step, including link to volunteer registration and event volunteer page]**.

Judging Toolkit

The Judging Toolkit includes resources to support judge training, and all materials needed by teams and Judges for your event. The Judging Toolkit can be found on the *FIRST* Partner SharePoint and the event volunteer resources page.

Toolkit resources for Judge Advisors include:

- Rubrics
- Judging Session Flowchart
- Judging Session Script and Questions
- Challenge Overview
- Awards and Allocation
- Judge Training Script
- Judge Training Videos & Script
- Coach/Mentor Award Nomination Form
- Peer Award Nomination Form
- Partner-Judge Advisor Checklist
- Official Judging Spreadsheet
- Judging Toolkit Contents List

Judging Space Setup and Scheduling

FIRST LEGO League recommends at least one judging space per 6 teams at a single-day event. Refer to Chapter 3 of this manual for detailed space considerations, supplies, and equipment. Chapter 6 of this manual gives guidance for creating an overall event schedule that includes judging sessions.

Robot Game Overview

Standards and Guidelines

Refer to the *FIRST* LEGO League Challenge Global Standards document for a complete list of standards that must be met. Specific recommendations and considerations for refereeing at your event include:

TOPIC	STANDARD	
Training	• All Referees at official events are trained by the Head Referee. • All training should be delivered using the resources in the Referee Toolkit.	
Referees	One Referee per game table is required.	Additional Referees may be recruited to fill in or rotate throughout the event.
Core Values	All Referees should be familiar with the six *FIRST* Core Values, which will be evaluated with the *Gracious Professionalism*® score at the end of each match.	
Game material	The *FIRST* LEGO League field setup, missions, and rules must be used at all official events in their complete, original form and may be altered only for translation.	
Game play	• All teams should participate in three separate Robot Game matches. • Each match is 2.5-minutes and has two teams playing opposite of each other on a tournament setup. • Teams need to follow the rules found in the *Robot Game Rulebook* for the season. Remember, most teams only participate in a single region, so consistency of training and rule interpretation by the Head Referee is important.	
Scoring and Awards	• Robot Game scores must be calculated and shared with the Judge Advisor for use in award allocations. • The Robot Performance Award winner is based on the single highest official match score. In the event of a tie, the next highest match scores are used. No other method, such as average or total score, can be used.	If using the *FIRST* Event Hub, scores will be calculated automatically. If using paper scoresheets, scores must be calculated using an official score calculator.

Robot Game Roles

See complete list of event volunteer role descriptions here.

All volunteers should be comfortable and experienced in interacting with youth aged 9-14. It's crucial that they embody *FIRST* Core Values, exemplify positive behavior, possess a sense of humor & humility, and have an eagerness to help build lasting memories that inspire.

Additional qualifications and experience/training needed are as follows.

Head Referee (1 per event required)

QUALIFICATIONS

- *FIRST* LEGO League Challenge Referee experience essential
- Advanced knowledge of the Robot Game missions and rules of play
- Outgoing personality; high energy
- Ability to be tactful and make quick decisions
- Strong communication and interpersonal skills
- Ability to collaborate with others and work as a team
- Detail oriented with strong assessment skills

EXPERIENCE/TRAINING NEEDED

- This is a key volunteer position. Key volunteers require advanced training as prescribed by *FIRST*.
- *FIRST* LEGO League Challenge Head Referee training required

Referee (1 per table required)

QUALIFICATIONS

- Strong knowledge of Robot Game missions, rules, scoring, updates, and field setup
- Ability to stand for long periods of time
- Outgoing personality; high energy
- Strong communication and communication skills
- Ability to collaborate with others and work as a team
- Detail oriented with strong assessment skills

EXPERIENCE/TRAINING NEEDED

- All Referees, regardless of experience level, must participate in Referee training facilitated by the Head Referee before the event begins. Training may take place in-person or virtually.

Scorekeeper (1 per event required)

QUALIFICATIONS

- Basic data entry skills
- Comfort working with online tools
- Ability to collaborate with others and work as a team
- Detail oriented; driven to achieve high level of accuracy

Field Manager (1 per event recommended)

QUALIFICATIONS

- Basic knowledge of the competition games, rules, and table setup
- Ability to work as part of a team and be an effective communicator
- Ability to keep chain of command informed of critical issues and schedule
- Excellent problem-solving skills
- *FIRST* and/or *FIRST* LEGO League experience necessary

Emcee (1 per tournament setup recommended)

QUALIFICATIONS

- Strong public speaking skills
- Basic knowledge of the Robot Game and rules helpful

Referee Toolkit

The Referee Toolkit includes resources to support Referee training, and all materials needed by teams and Referees for your event. The Referee Toolkit can be found on the *FIRST* Partner SharePoint and the event volunteer resources page.

Resources for Head Referees include:

- *Robot Game Rulebook*
- Robot Game Missions video (team and Referee versions)
- Field Setup video
- Challenge Updates
- Referee Guide and Quiz
- Referee Training Slide Deck
- Partner/Head Referee Checklist
- Table Building Instructions
- Scoresheets and Excel Scorer

Robot Competition Area Setup

FIRST LEGO League recommends at least one tournament setup per 12 teams. Refer to Chapter 3 of this manual for detailed space considerations, supplies, and equipment. Chapter 6 of this manual gives guidance for creating an overall event schedule that includes Robot Game matches and practice matches.

Event Promotion

Available Resources

FIRST standards and policies protect valuable *FIRST* assets and help build and maintain a strong and consistent visual identity while you promote your tournament. The following resources serve as a starting point for generating your own event promotion assets:

- Download *FIRST* program logos and guidelines here.
- Download season-specific graphics and recruitment posters here.

Get the Word Out About Your Event

- Promote your event before, during, and after on social media using logos, season hashtags, and photos of the venue and the excitement.
- Encourage teams and volunteers to post on social media about their experience at your event, and share their posts.
- Tag the *FIRST* LEGO League and *FIRST* social media channels in your event posts, so they can share updates with the *FIRST* community.
- Alert local media about your event. Consider creating a press release about the event.

Post Event

Collecting Feedback

Consider asking the teams and volunteers at your event for their feedback. Check with your partner first for any region-wide efforts. If you reach out to teams and volunteers, keep it simple and short.

- Use free online survey tools, such as SurveyMonkey or Google forms.
- Include a survey card with each team's rubrics.
- Send a simple email asking for the three best things and three things that need improvement.

Be sure to comply with privacy policies and dispose of any unnecessary Personally Identifiable Information (PII).

Tournament Documentation

What to return to your PDP

- Robot Game scores*
- List of award winners*
- List of teams advancing to the next event (if applicable)*
- Completed Official Judging Spreadsheet (if applicable)*
- Team rosters, with any paper consent forms, collected at team check-in (US/CAN only)
- Walk-on volunteer forms
- Incident report forms

*If using the *FIRST* Event Hub, Partners will have access to the complete list of scores, rankings, award winners, and advancements. Once an event is published in the Event Hub, coaches will have access to their team's rubrics and scoresheets

Thanking Sponsors

Follow up with your donors and sponsors, as promised. They want to hear from you. This is considered good stewardship.

Consider sharing with sponsors:

- Pictures from the tournament*
- Team stories, including local teams that moved on to a World Festival or Open Invitational event.
- Thank you cards or items signed by teams.
- Post-event report with meaningful statistics such as who attended, social media reach, and any media coverage.
- Program booklet, showing sponsor recognition.

You may also share post-event information and photos with the Community team at *FIRST* HQ. Tag *FIRST* official accounts and use season-specific hashtags on social posts.

*Ensure all participants have completed *FIRST* Consent and Release forms on file, as well as signed photo release forms.

Best of luck with your *FIRST* LEGO League Challenge Tournament!

Contact Us

Please reach out to fllquestions@firstinspires.org with support requests related to this manual.