

# Call for Participation

## RoboCup 2017 Soccer Simulation 3D League

July 25 - July 31, 2017 (Nagoya, Japan)

<http://www.robocup2017.org/>

The RoboCup Soccer Simulation 3D Competition provides a great opportunity to experiment with humanoid robots without the need for investing in robot hardware. It facilitates experimenting using different learning and optimization techniques by providing a simulated environment. Since the games are played with teams of 11 players, the league is also a very good environment for experimenting on multi-robot coordination methodologies.

We would like to invite you to participate in the RoboCup 2017 Soccer Simulation League, 3D competition, which will take place July 25 - July 31, 2017, in Nagoya, Japan. If you are interested in participating, please pre-register your team and follow the procedure as outlined below. Important resources you need to participate are:

- the soccer simulation league's wiki: [http://wiki.robocup.org/wiki/Soccer\\_Simulation\\_League](http://wiki.robocup.org/wiki/Soccer_Simulation_League)
- the free simulation server: <http://simspark.sourceforge.net/wiki/index.php>

### Important Dates

Team Pre-Registration Deadline:	Feb 26th (Sunday), 2017 (23:59 UTC)
Team Qualification Materials Submission Deadline:	Mar 12th (Sunday), 2017 (23:59 UTC)
Qualified Teams Announcement:	Mar 28th (Tuesday), 2017
Competition:	July 25 - July 31, 2017

### Waiver of the team fee for NEW Teams

The RoboCup Federation is pleased to continue with a waiver of the team fee for the 2017 International RoboCup competition for NEW teams in the major leagues. A NEW team is defined as a team with new name and all of whose team members have never participated in an annual international RoboCup competition. The waiver concerns only the team fee and does not imply any waiver of fees for team members.

The top teams in Soccer Simulation 3D League had recent release of their base source codes. For example, the source code of UT Austin Villa 3D simulation team which is a winning in

Robocup2016 can be obtained from <https://github.com/LARG/utaustinvilla3d>. This code includes an omnidirection walk, getup behaviours, kick motions, ... of soccer agents. The use of released source codes would be helpful to program development.

## Pre-Registration

All teams who wish to qualify need to pre-register before the deadline (see above). To pre-register, send an E-Mail to [rc17\\_sim3d\\_oc@kis.osakafu-u.ac.jp](mailto:rc17_sim3d_oc@kis.osakafu-u.ac.jp) with the subject '2017 3DSim Pre-registration TEAM\_NAME'. The E-Mail should contain the following information:

1. Team-Name:
2. Team-Leader:
3. E-Mail:
4. Country/ies:
5. Affiliation(s):
6. Number of team members:
7. Apply for the Waiver of the team fee for NEW Teams ? (Yes/No)

You should receive a confirmation E-Mail for your pre-registration within a few days of submission.

## Qualification

Qualification is based on a team's current performance, previous achievements in RoboCup, and scientific contributions in relevant areas in past years, cooperation in the 3D mailing list and development of the simulator. Also, up to six slots will be assigned in priority to new teams.

In RoboCup 2017, up to 24 teams will participate in the 3D simulation competition. The top three teams from RoboCup 2016 (UT Austin Villa, FUT-K, FC Portugal) are automatically qualified after pre-registering their teams and submitting an appropriate Team Description Paper (TDP). The other 21 teams will be selected through a qualification process.

The qualification deadline is March 12th, 2017. The OC does not accept qualification materials from teams who have not been pre-registered by the pre- registration deadline. Qualification material consists of:

1. Team Description Paper (TDP)

The TDP should describe your research focus and ideas implemented in the team. It should clearly describe your own work and your contributions in addition to explicitly specifying what

you have used from others' efforts (including, but not limited to, any source code released by other teams or their scientific work). In qualification, teams must be judged based on their own work, so failing to acknowledge the work of others could result in an immediate disqualification. The length of the TDP must be at least four (4) pages and should not exceed twelve (12) pages in Springer LNCS Style: <http://www.springer.com/computer/lncs?SGWID=0-164-7-72376-0>. Please submit the TDP only as a PDF document, with the name of your team in the filename, i.e. Teamname\_TDP.pdf .

2. A List of Publications and Achievements on previous RoboCup Symposia and in other relevant international journals and conferences. Please do not include TDPs that you submitted to RoboCup in previous years. Please also include your team's achievements in RoboCup and related events of previous years. If you are new to the RoboCup 3D community, you may also include references to relevant research done by your team that shows its potential. Please submit the contribution list as a PDF document, with the name of your team in the filename, i.e. Teamname\_list.pdf .

### 3. Binary

All teams should submit a working binary of their team. The OC will use these binaries to play 11 vs 11 matches, under the rules and with the simulator used during the 2016 competitions. These rules can be found at: [http://chaosscripting.net/files/competitions/RoboCup/WorldCup/2016/3DSim/RoboCup2016-3D-SoccerSimulation\\_Rules.pdf](http://chaosscripting.net/files/competitions/RoboCup/WorldCup/2016/3DSim/RoboCup2016-3D-SoccerSimulation_Rules.pdf)

Submitted binaries should adhere to the following:

- Two scripts should be included: a start up script, called start.sh, to run a full team of agents and a kill script, called kill.sh, to fully kill all agents of the team. The requirements and examples of these scripts can be found at the rules page given above.
- All necessary external libraries should be included and be used locally by the binary. The OC will not make an effort to install extra libraries on the qualification systems. A Java runtime can be assumed to be available.
- The binaries should not create any output, be it through standard output or to files and no graphical (debugging) interface should be used.
- The binary should be compiled for 64 bit systems and should work on a modern GNU/Linux distribution, such as Ubuntu 14.04. You may also send 32 bit binaries, but it is your responsibility to make sure that it runs correctly on 64 bit distributions. You can assume that basic 32 bit libraries (e.g. libc) are installed on the 64 bit OS. To summarize: the binary should run out of the box on a standard, clean, headless system in a restricted sand box environment with the simulation server (possibly) running on a different machine. The OC will not try to fix errors. When a binary fails to run, the respective team will be notified and will have to resubmit their material, before the deadline.

Please put all qualification material in a folder with your team name, create a tarball named teamname.tgz and E-Mail it to rc17\_sim3d\_oc@kis.osakafu-u.ac.jp with the subject: '2017

3DSim Qualification TEAM\_NAME'. If everything works fine you will receive a confirmation. If you did not receive any confirmation within two (2) days, please contact the Organizing Committee.

If you encounter any problem sending your qualification materials please don't hesitate to contact the OC.

Teams will be qualified based on the submitted materials as described in this E-Mail. The following general qualification limitations will also be considered:

- One-Third-Rule: The so called One-Third-Rule rule states that only up to 1/3 of the participants of a competition may be from the same country.
- One-Team-Per-Institute-Rule: The One-Team-Per-Institute-Rule states that only one team from each university or research institute is allowed to participate in a competition. Note that it is okay for different teams from the same institute to participate in different competitions, e.g. 2D and 3D soccer.