

# Cognitive Robotics

# Competition Rules

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# Competition

Become the Champion of the  
Rijeka RoboNewbie Competition 2018!

There will be a **final championship**

with your programs at the end of the course on **Wed. Oct. 17**

**Each group gives a 3-minutes explanation about their trials, achievements, and experiences**

A **test championship** will be on **Mon. Oct. 15**

Competition between 4 student teams.

- 4-5 members per team.
- Teams constituted on Wednesday, Oct. 10

# Student Teams

**Team name: Kernel Panic**

Sanja Božić

Mauro Orlić

Marijan Ribarić

Dominik Varelija

# Student Teams

**Team name: Cereal killers**

Denis Zornada

Ivana Lovrinović

Leo Gašparović

Mateja Klobučar

# Student Teams

**Team name: Forza Juve**

Dario Ognjanović

Gabriel Saganić

Marko Sišul

Dorian Beli.

.

# Student Teams

**Team name: Istra 1961**

Luka Otočan

Josipa Katić

Marko Matijević

Bagić, Ivan

.

Petrović, Milan ???

# Competition Programs

Each team needs

2 projects for playing as **offenders** resp. as **defenders**.

Give your teams in the programs the following names:

- <team\_name>\_offenders
- <team\_name>\_defenders

Give your Netbeans-Projekt the same names.

Zip the projects and send by email  
to [hdb@informatik.hu-berlin.de](mailto:hdb@informatik.hu-berlin.de)

**For test competition: before 8 a.m. on Mon, Oct. 15**

**For final competition: before 12 p.m. on Wed, Oct. 17**

# Competition Programs

Sample programs are provided by packages

*examples.agentSimpleSoccer*

*examples.agentSoccerTeam*

which have already some basic skills for walk, turn, kick, ...

You can modify and extend them with

- new/better skills (e.g. walk/kick sideways or backwards),
- better perception,
- more intelligent behavior etc.

More details below.



# Competition Rules

Each team can have **at most 2 players** in the field.

You can develop different strategies for playing as offending resp. defending team.

Your players may act according to specific roles e.g. Attacker, Supporter, Defender, Goalkeeper, ... That is up to your choice (and programming).

The initial poses must regard special constraints (depending on attacking/defending team, see next slide)

# Initial poses

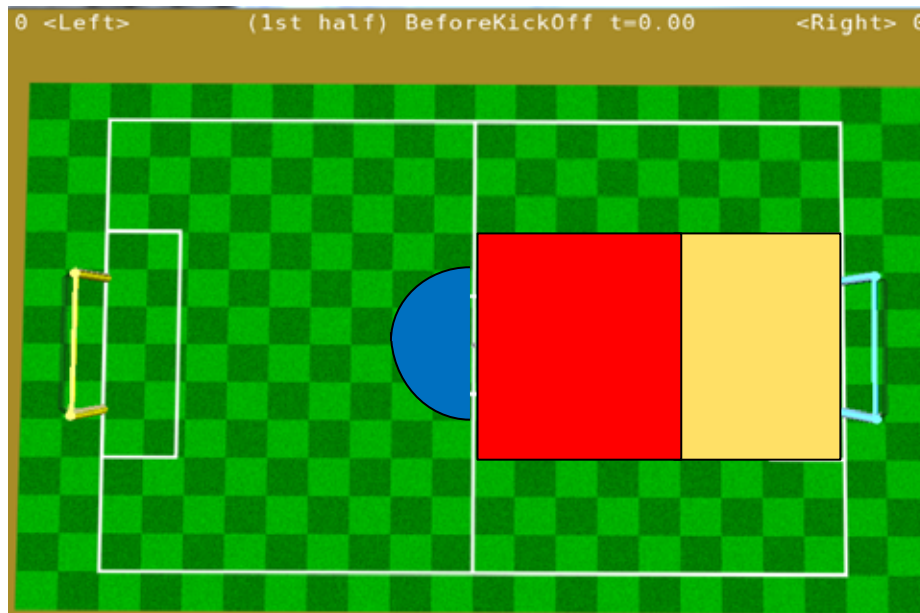
## Offending team (left team with kick-off):

Both players outside of blue area (Distance to ball  $\geq 1\text{m}$ )

## Defending team (right team)

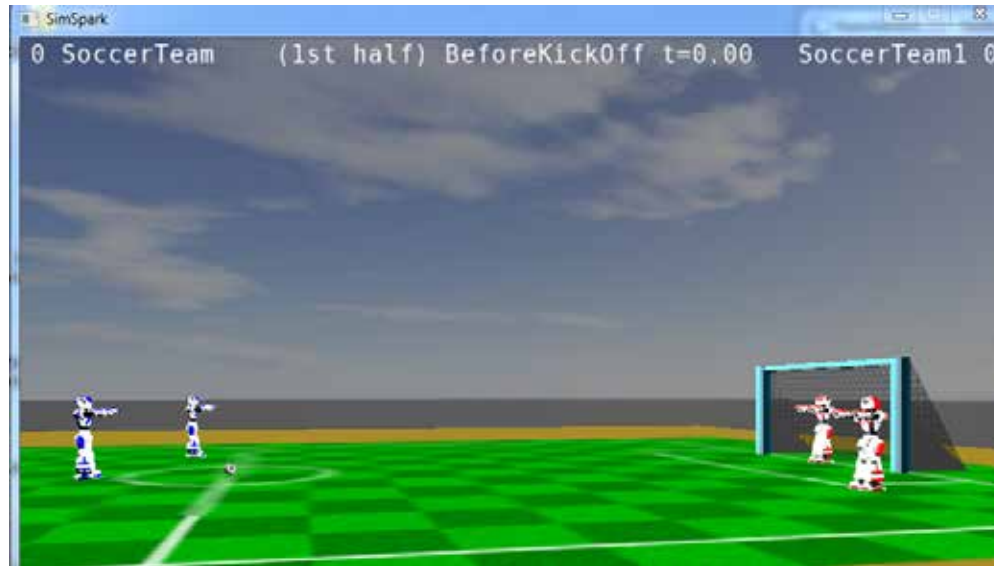
Player 1: outside of red area (BeamX  $< -3$  &  $-1.5 < \text{BeamY} < 1.5$ )

Player 2: outside of red and yellow areas ( $-1.5 < \text{BeamY} < 1.5$ )



Each half starts with kickoff (“k” and “b”)

- ball at the point in the middle,
- players at initial positions.



After scoring, the match is continued with kickoff (“k” and “b”) from the same initial positions (left side team remains offending).

If ball goes outside field , the game is started again, elapsed time is regarded.  
Special rules can apply for crowding and unfair blocking.

If goalkeeper does not stand up after 15 sec.:

Goal for opponents, start again, elapsed time is regarded..

# Competition Rules

A match consists of 2 halves (2 minutes each).

Playing offenders/defenders is changed in 2<sup>nd</sup> half.

The **winner of a match** is determined by goal difference.

Winner gets 3 points. In case of draw, both teams get 1 point.

The **winner** is the team with the most points.

In case of draw, the total goal difference counts.

If still draw, the direct matches are regarded.

If there is no result, a coin toss will be used.

# Preparation

Each group prepares 2 complete RoboNewbie projects for

- Offending team

*final String team = "<name of your team>\_Offenders";*

- Defending team

*final String team = "<name of your team>\_Defenders";*

Give your projects the same names. Each project must be complete for playing (with all programs and keyframe files).

Prepare 2 zip-files and send by email as requested.

For each match: Start of the programs by one group member.

# Test Competition on Oct. 15th

	Kernel Panic	Cereal killers	Forza Juve	Istra 1961	Points	Goals	Rank
Kernel Panic	X						
Cereal killers		X					
Forza Juve			X				
Istra 1961				X			

# Final Competition on Oct. 15th

	Kernel Panic	Cereal killers	Forza Juve	Istra 1961	Points	Goals	Rank
Kernel Panic	X						
Cereal killers		X					
Forza Juve			X				
Istra 1961				X			