



## «FREESTYLE» CONTEST RULES

*Version 2.5 dated August 17, 2016.*

### 1. General provisions

- 1.1.1. Robot is an automatic machine or device with feedback which is acting by program incorporated into it. Robot is able to interact with environment and has artificial intellect or rudiments of it.
- 1.1.2. Any robot engineering project meeting the criteria of the par. 1.1.1 may be presented in the Freestyle category.

### 1.2. Objective of the contest

- 1.2.1. Engagement of children to science and engineering creativity process.
- 1.2.2. Forming and development of cooperation, results presentation and communication skills.
- 1.2.3. Identification and distinguished of the most interesting projects.

## 2. Requirements for projects

### 2.1. Equipment

- 2.1.1. Requirement or restrictive list of details must be used or not used in the projects is not provided in this contest.
- 2.1.2. Project must be safe for visitors and viewers, must not pollute the air, produce excessive loud and unpleasant sounds, damage exhibition place and disturb its neighbors.
- 2.1.3. Project may be developed, produced and programmed by the group of participants with help of adult people (like parents and teachers). However, participants must indicate which part of the project was performed by them and which one is performed by adults.

### 2.2. Teaser

- 2.2.1. Each the team must present in a time specified by competition organizers the teaser – brief presentation of the team project accompanied with slides.
- 2.2.2. Duration of presentation must not exceed one minute.
- 2.2.3. Count of slides must not exceed three ones.
- 2.2.4. Teaser should perform a general impress of the project (briefly describe goals set by the participants and actuality of these goals, technical characterize project, describe technologies and equipment used in the project).
- 2.2.5. Everyone may take a part in teasers watching.



## 2.3. Poster

- 2.3.1. Each team is obliged to decorate their stand with a poster. The poster size should be 1200 × 800 mm, page orientation is book.
- 2.3.2. The poster must contain the following information:
  1. Project name;
  2. Keynotes;
  3. Basic design image;
  4. Functional diagram.

## 2.4. Registration

- 2.4.1. During the registration procedure each team has to present:
  1. Project description;
  2. Project photos;
  3. Video demonstrating the project work. Video duration should not exceed two minutes;
  4. Presentation for teaser.

## 3. Contest procedure

### 3.1. Exhibition stand

- 3.1.1. For the project demonstration all the teams will be provided with the following equipment:
  1. An exhibition stand with size in range by 1.5×0.5×2.0 to 2.0×2.0×2.0 m (W×D×H).
  2. A table with size of 1.2×0.6 m;
  3. Two chairs;
  4. Electrical socket (AC 220 V)
- 3.1.2. Participants are allowed to request contest organizers of additional equipment beforehand.

### 3.2. Peer review process

- 3.2.1. Each the team will be obligated to take a part in a process of other project evaluation as a reviewer. Quality of team working as a reviewer will be counted in a final score.
- 3.2.2. Each the team will have its own reviewer. Hereinafter the team performing a review is called “reviewer team” and the team which is being reviewed is called “reporter team”.
- 3.2.3. The project which the team will be obligated to review is determined by the competition organizers.
- 3.2.4. The team will have no less than two hours for familiarization with reviewed project. In this time reviewing team should familiarize with reviewing project and



prepare a general review for the project – a brief message in which the following items should be marked:

1. Positive and negative sides of the reviewed project;
  2. Actuality and adequacy of the goals and objectives set by the team;
  3. General level of project implementation;
  4. Ways for the project to be enhanced.
- 3.2.5. If the competitions holds in a two days, by a second competition day reviewing team should prepare a reviewed project presentation (hereinafter – ‘the presentation’) in which the positive sides and strengths of the reviewed project (and only it) should be marked.
- 3.2.6. The presentation should be performed as a video or any other kind of advertising message (like sketch, song, verse etc.) of duration no more than one minute.
- 3.2.7. The reviewing team must prepare all the media materials for presentation (photos and video) on one’s own. In case of absence of the needed equipment (like smartphone or camera) the team may request competition organizers to supply this equipment. In this case organizers are obligated to supply the equipment in a time but the time of equipment usage may be limited. Organizers are obligated to supply all the media materials in no later than two hours after the end of the first competitions day.
- 3.2.8. The reviewing team should post its presentation on the video hosting by one’s own and publish the link on it on the forum (specified by the competition organizers).

### 3.3. Defense procedure

- 3.3.1. The presentation is carried out in the form of demonstration of the project to the jury.
- 3.3.2. The reporter team will have:
1. Five minutes for the project presentation and demonstration of its operability;
  2. Five minutes for the answers of the juries’ questions<sup>1</sup>.
- 3.3.3. The project must be presented on the exhibition stand during all the exhibition day (not only for jury but also for other participants and viewers).
- 3.3.4. Several jury brigades may come to a stand during the exhibition day.

## 4. Scoring

### 4.1. Contest categories

- 4.1.1. All the teams are classified into 3 categories:
1. «Elementary» – the eldest participant’s age in the contest year not in excess of 12 years
  2. «Junior High» – the eldest participant’s age in the contest year is between 12 and 15 years.

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<sup>1</sup> A supervisor unlisted among the participants cannot participate in the project presentation.



3. «High» – the eldest participant's age in the contest year does exceed 15 years.
- 4.1.2. The winner is selected in the each category independently of the other categories.

## 4.2. Referee score

- 4.2.1. Project and work of the each team is evaluated by the referees in terms of criteria represented in the Table 1. Each the referee evaluate the project individually<sup>2</sup>.
- 4.2.2. On the each criteria team may be evaluated with count of the points which is not exceed maximal score in the Table 1.
- 4.2.3. For the each referee the ranked list of the projects reviewed by him (or her) is formed. If the several projects have the same score they took a place with the same number in this list (the rank). After this all the ranks took by the project is summed. This sum is considered as a referee score of the project.

## 4.3. Teams' score

- 4.3.1. Each the team will be obligated to take a part in a process of other project evaluation. Teams are evaluating other projects in a following order:
  1. Teams of the High category are evaluation projects of the teams of the Junior High category;
  2. Teams of the Junior High category are evaluation projects of the teams of the Junior category;
  3. Teams of the Junior category are evaluation projects of the teams of the High category.
- 4.3.2. Teams are evaluating the projects in score of ten points (from 1 point to 10 points).
- 4.3.3. Each the team is obligated to evaluate each the project of the category marked in paragraph 4.3.1.
- 4.3.4. For the each team the ranked list of the projects reviewed by it is formed. If the several projects have the same score they took a place with the same number in this list (the rank). After this all the ranks took by the project is summed and the raked list where the team with the larger sum takes the lower place is formed. The place of the team in this ranked list is considered as its teams' score.

## 4.4. Final score

- 4.4.1. The sum of the team referee and teams' scores is considered as its final score.
- 4.4.2. Teams are ranked by the final score. The team with lower final score took the higher place.
- 4.4.3. Is two or more teams have the same final score referees decides which project should be evaluated higher.

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<sup>2</sup> The Organizing Committee reserves the right not to disclose the number of points awarded to the project by each individual referee.



Table 1. Project evaluation criteria

#	Criteria	Maximal score	
1	Relevance	3 points	
2	Novelty	3 points	
3	Construction complexity	3 points	
4	Algorithmic complexity	3 points	
5	Operability	6 points	
6	Presentation	3 points	
7	Aesthetics	3 points	
8	Quality of (posted on the web site) materials	Photo	1 point
		Description	1 point
		Video	1 point
9	Teaser presentation	3 points	
10	Review for other project	3 points	
11	Presentation of other project	3 points	
12	Referee's special opinion	3 points	
<b>Total maximum:</b>		<b>41 points</b>	

## 5. Change Log

### 5.1. Version 2.3

- 5.1.1. Version 2.3 was created in February 05, 2016 based on the version 2.2 of these Rules. Change Log is presented below.
- 5.1.2. Sections 2.1, 3.1, 3.2 were renamed;
- 5.1.3. Paragraph 1.1.1 moved to the same section as paragraph 1.1.2;
- 5.1.4. Paragraphs 1.1.1, 2.1.3, 3.1.1.4, 3.2.4 were added;
- 5.1.5. Changes were introduced to the paragraphs 1.1.2, 2.1.1, 2.2.1, 3.1.1, 3.1.1.1, 3.1.1.2, 3.2.3.

### 5.2. Version 2.2

- 5.2.1. Paragraph 1.1.2 was added.

### 5.3. Version 2.1

- 5.3.1. Version 2.1 was created in August 31, 2015 based on the version 2.0 of these Rules. Change Log is presented below.
- 5.3.2. Paragraphs 1.1.2 and 4.1.5 were removed;



- 5.3.3. Changes were introduced into the paragraphs 2, 2.2.1, 2.3.1.3, 3.2, 3.2.1.1, 4.1.1.3, 4.1.3;
- 5.3.4. Paragraphs 2.1.2, 2.2.2.4, 3.1.2 were added;
- 5.3.5. Paragraph 3.1 moved to the section 1 as paragraph 1.2;
- 5.3.6. Paragraph 4.1.4 is represented as Table 1.