





Official rules Triathlon challenge 2020





RoboRAVE France -Craon

http://www.roborave53.fr/



The participants have to design and build a robot (and eventually a second robot) following the rules and the spirit of this RoboRAVE.

This robot must complete the rules below. Each team can be helped by a coach (one coach per team, at the most) but the design and of the robots must be created by the pupils.

The robots will be approved by the RoboRAVE France-Craon at your arrival.

The challenge is going to have one phase.

Chapter 1 Target of the challenge

Article 1: objective

To design, build and program an autonomous robot able to participate at the three challenges (a-MAZE-ing, line following and robot sumo challenges).

Chapter 2 Characteristics of robots

Article 2: characteristics

You need to use the same robot!

Possible amendment to the robot:

- Remove the system which contains the balls for the 2 other challenges.
- Weight need be less than 1000g without the system that contains the balls.
- The floor space of the robot must not exceed 18 cm x 22 cm.

For the a-MAZE-ing challenge, it will be permitted to use the sensors already used in two other challenges.

- The robot have to be autonomous (all platforms are accepted).
- All types of sensors are allowed.
- The energy source is absolutely electric battery type or accumulator.

Chapter 3 General rules

Article 3: general rules

• The robot shaff not suffer any physical charge between each event (except that specified in article 2)

- Teams will have 6 tries to score in a-MAZE-ing and line following.
 The best score is retained for the final ranking.
- For the robot sumo challenge the teams participate in triathlon will meet the team which participate to this challenge. Every victory will earn points.
- The organization could be change during the event

Chapter 4 Points

Article 5: Before the event (deadline Monday, 25th may 2020)

• Slides: 225 pts (annex 1)

• Letter enterprise : 75 pts

• bonus video presentation in English on the slides : 75 pts (annex 2)

• For the HS, presentation of the enterprise: 150 points

Article 6: The day of the event

• Approval: 300 pts (see annex 3)

• Individual presentation of their work by the team in English: 225 pts (annex 4)

Article 7: during the event

For the 2 challenges a-MAZE-ing and Line following, scoring is the same as those who do these challenges (see rules).

For the sumobot challenge, each battle can earn up to 100 points maximum. A meeting consists of 3 fights of 3 minutes each. Each team made at least 6 meetings consisted on the triathlon challenge.

• Équipe A		• Équipe B	
• 2 Yuko	• 100 points	• 0 Yuko	 O point
• 2 Yuko	• 100 points	• 1 Yuko	• 50 points

Ou

• É	Equipe A	• Í	Equipe B
• 0 Yuko	 O point 	• 2 Yuko	• 100 points
• 1 Yuko	• 50 points	• 2 Yuko	• 100 points

Chapter 5 Fair play

The participant must keep calm, courteous and respectful.

Article 7: disqualification

Your team will be disqualified with:

- The robot does not follow the characteristics of robots given by article 3.
- A participant does not exhibit courtesy or respect towards the referee.

Article 8: objection to the referee

• No objection to the referee's decision will be accepted.

Article 9: claims

• All claims must be made in the presence of team manager.

Remember, RoboRAVE France's GOALS ARE:

- 1. FUN while LEARNING
- 2. **SHARING**
- 3. **TEAMWORK**

Chapter 7 Annex

Annex 1: slides points

Requirements	Points	Validation
Deadline respect	prohibited	
Presentation of the project	45 pts	
Presentation of the group members	15 pts	
Organization of the team	45 pts	
Solutions (photo, explication)	60 pts	
Technical innovation	60 pts	
Language quality	15 pts	
Originality of the presentation	15 pts	
Enterprise letter	45 pts	
Total (maximum 300 pts)		

• Annex 2 : English vidéo points

Requirements	Points	Validation
Deadline respect	prohibited	
Read the text	15 pts	
Recited the text	45 pts	
Language quality	15 pts	
Originality of the presentation	15 pts	
Total (maximum 75 pts)		

• Annex 3: approval of the robot

Requirements	Points	Validation
Autonomous robot	eliminated	
Dimensions :220 x 180 mm	eliminated	
Base chassis	0 pt	
Addition of a non-functional part manufactured by the team	100 pts	
Addition of a functional part manufactured by the team	200 pts	
Robot customization → complete aesthetic design	300 pts	
Total (maximum 300 pts)		

■ Annex 4 : English presentation — RoboRAVE 2020

Each team will introduce their project in front of a jury composed of 2 "euro-class" students. This presentation will be awarded with 75 points.

Each presentation will be composed of:

- an introduction of the team's name, names of the participants, school and chosen challenge /60 pts
- a presentation of their robot, its choice and certification / 60 pts
- a question of their choice to go further /45 pts
- language quality /60 pts

You will be judged on your oral production (understanding and fluency). Each member of the team will speak and the quality of your expression will be judged too (vocabulary, grammar mistakes...)

Part 1 : introduction	Points	√ X
Name of the team	/15	
Name of the participants	/15	
Name of their school	/15	
Name of the chosen challenge	/15	
Part 2 : description		
Presentation of the robot	/30	
Its certification, conditions and restrictions	/15	
Strategy chosen	/15	
Part 3 : a question	/45	
Part 4 : language quality		
understanding	/30	
fluency	/30	
Total des points (ı	maximum 225 pts)	

Examples of questions:

Do you like robotics?

Why do you like robotics?

Are you in a robotic club?

Would you like to create one?

Have you ever participated in a robotic competition?

Have you ever participated in a competition? Where?

Would you like to participate in a robotic competition in another country? Where?

Do you like Math? English?

Or any other questions !!!