

### **3、 Creative Concept Track Competition Rules**

#### **1. Participation Requirements**

The Creative Concept Track introduces and demonstrates the creative design of underwater robots. The design should be based on the operational tasks and technical requirements of the robot, and creative conceptual design of key technologies and other content should be carried out.

The design scheme of the entries should have innovative functional principles or layout. Introduce the main innovative points, calculation process, design drawings, implementation methods, application analysis, etc. of the participating works through the design manual. The design manual for the work shall not exceed 25 pages (in addition, the technical introduction section of the manual shall not contain identity information such as the name and logo of the participating unit, in order to facilitate online blind evaluation in the later stage).

Contestants are encouraged to submit functional demonstration videos, which can be physical functional demonstrations or 3D model demonstrations. Video production can be prepared in two versions. The demo version should not exceed 2 minutes in length and the file size should not exceed 200M; the full version should not exceed 5 minutes in length and the file size should not exceed 1G.

The work shall not contain any content involving state secrets and shall be reviewed by the participating units.

#### **2. Competition Rules**

##### **2.1 Competition Process**

Each participating team will defend themselves in turn. Experts score based on the team's defense and design specifications, and ultimately determine the competition results.

The total defense time for each participating team shall not exceed 10 minutes. Among them, the exposition time of the work does not exceed 5 minutes, and the rest of the time is for questioning and debate.

The respondent must be a member of the team and cannot be replaced by anyone outside the team.

## 2.2 Scoring Details

The scoring criteria are as follows :

evaluation criteria	weight	criteria explanation
Innovation and Uniqueness	40%	The design is novel and innovative with unique principles, demonstrated by solving similar tasks in new ways or addressing previously unsolved challenges.
Feasibility and Practicality	30%	The design is rational, with clear implementation plans, potential task capabilities and features, application prospects, and engineering feasibility.
Content and Structure of Documentation	20%	The logic is strong, with clear layers, and the arguments are clear and distinct, supported by thorough theoretical analysis and experimental data.
Defense Performance	10%	The presentation is fluent and clear, with concise and precise language, tight logic, and good on-site performance.

The final interpretation rights belong to the competition organizing committee