

## **AIChE Middle East Regional Chem-E-Car Competition® Frequently Asked Questions**

### **What is the AIChE Chem-E-Car Competition®?**

The Chem-E-Car Competition® engages undergraduate students, in designing and constructing a car powered by a chemical energy source that will safely carry a specified load over a given distance and stop.

### **Where and When will the competition be held?**

The 2015 International Chem-E-Car Competition® will be hosted by AIChE and MEPEC. The competition will be held during the MEPEC conference, taking place September 14-17, 2015 in Manama, Bahrain.

### **Who is eligible to compete?**

Teams should be comprised of a minimum of 6 and a maximum of 12 students. Any undergraduate student is eligible to compete. If a student completes their studies before the competition in September, they are eligible to compete, as long as they were undergraduate students when the team was formed. On the day of the competition only 6 students are allowed on the competition floor.



### **Does a team need a faculty advisor?**

Yes, all Chem-E-Car teams need one advisor to serve as a faculty advisor. The undergraduate team members are responsible for the design and construction of the car, but the faculty mentor should monitor the process to ensure that all safety guidelines and rules are followed.

### **Is there a registration fee?**

No, there is not a registration fee.

### **What is the registration process?**

To register for the competition, please contact Allison Cargile at [studentchapters@aiche.org](mailto:studentchapters@aiche.org) by March 8, 2015. Once a team fills out the required forms, you will receive the official training packet, competition rules and an AIChE Chem-E-Car mentor team.

### **What is an AIChE Chem-E-Car Mentor?**

AIChE will be providing each team with a mentor team to assist in the design and creation of the car. The mentor will be a team from the United States who has won their regional competition and competed in the Annual Chem-E-Car competition. The mentor team will host webinars, answer questions and be a source of information for the new competitors.

### Is travel assistance provided?

At this time we are not offering travel assistance. Teams will be responsible for covering the cost of travel and accommodations. Teams are permitted to seek corporate sponsors.

### Where can I find videos and photos of cars from past years?

Visit the Chem-E-Car Competition® website at: [www.aiche.org/chem-e-car](http://www.aiche.org/chem-e-car).

### What are the competition rules?

The official competition rules will be provided once a team registers, but you may view the domestic rules online here: [www.aiche.org/chem-e-car](http://www.aiche.org/chem-e-car) to get an idea of what the international rules will include.

### Competition Description:



Each car will be given two opportunities to traverse a specified distance carrying a certain additional load. The required load and distance will be given to each team one hour prior to the start of the performance competition. The distance will be between 15 and 30 m  $\pm$  0.005 m and the load will be between 0 and 500 ml of water. A judge will measure out the prescribed water for each team. Teams may not add or remove any "load" (or other inert items) to adjust their vehicle weight. Teams are allowed to adjust "fuel" or chemical reactants used in the car's chemical reaction.

### Course Layout Description:

The car will start with its front end just touching the designated starting line. There will be a designated finish line. The distance will be measured with respect to the front most point of the car. The goal of the competition is to have your car stop closest to the specified finish line (in bounds) while carrying the specified load.

The course will be wedge-shaped with a starting line and the prescribed distance clearly marked in an arc of constant distance from the starting point.



A vehicle that goes outside the course will have its distance measured to where it went out of bounds, and a penalty of 3.0 m will be added to the measured distance.

### Who should I contact with additional questions?

Please contact Allison Cargile at [studentchapters@aiiche.org](mailto:studentchapters@aiiche.org) with any additional questions.

### **What is AIChE?**

Founded in 1908, AIChE is a nonprofit organization providing leadership to the chemical engineering profession representing 46,000 members in industry, academia, and government. AIChE's vision is to provide value as the Global Leader of the Chemical Engineering profession, the lifetime center for professional and personal growth, and security of chemical engineers, and the foremost catalyst in applying chemical engineering expertise in meeting societal needs.

To learn more about AIChE, please visit: [www.aiche.org](http://www.aiche.org).

### **What is MEPEC?**

The Middle East Process Engineering Conference is the largest technical conference in the region, MEPEC 2015, the 3rd Edition will be held in the Kingdom of Bahrain. MEPEC 2013 welcomed 3,520 unique participants over 4 days, which included 333 speakers and 240 students.

To learn more about MEPEC, please visit: [www.mepec.org](http://www.mepec.org).