

Brentwood Christian School
VIP Coordinator Job Description

Leadership Title: First Lego League (FLL) Head Coach

Overall Job Description: Responsible for leading a team of children through necessary requirements to compete in the annual FIRST Lego League competition (typically in Nov).

Essential Duties and Responsibilities – In order to receive the full 20 credit hours, you must complete the following:

1. Be responsible for interacting with FIRST Lego League (centraltexasfll.org). This includes registration, procurement of funds and competition materials, and any other interaction with FLL.
2. Guide the students through their research paper. The topics and criteria are provided by FLL. Students will present this paper to a team of engineers at the competition. Team work and understanding of the topic & paper are key aspects to competition score.
3. Hold extra-curricular meetings with the students to work on the assignments. This is typically a 10-week effort start to finish for the research, report, and robotics.
4. Assist students in designing a robot to meet the competition challenge.
 - a. Assist students in debugging mechanical design and software programs for the robot.
5. Coordinate activities for the team for the actual competition.

Qualifications: To perform this job successfully, an individual must be able to perform each essential duty or responsibility satisfactorily. The requirements listed below are representative of the knowledge, skill and/or ability recommended.

Talents/Skills/Experience:

- Fundamental concepts in mechanical physics, programming, and engineering
 - Programming with I/O is essential, but knowledge of a specific language is not necessary. Students are required to use Lego Mindstorms NXT (LabVIEW for kids).
 - Understanding sensors and the concepts of timing loops and variability is extremely helpful.
 - Problem solving
 - Electronics is not needed.
- Guiding teams- FLL is about engineering teamwork. The students will need to act as a team (this is part of the criteria they're graded on).
- *Patience*- the concepts are not easy for all kids to understand at this age.

Written By: Lee Mohrmann

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