



## **Emerging Scientists and Engineers Program Invitation to Alameda County Title I and other Schools**

*\*Space is limited to the number of mentors available - Early contact is recommended.*

The Alameda County Science and Engineering Fair has created a standards-based, non-competitive science fair within the existing science fair to increase the inclusion of grade 6-12 students from Title 1 and other schools for \*the 2025 Fair.

Emerging Scientists and Engineers is a program offered to all Alameda County middle and high schools that do not hold a science fair, nor do the students receive mentoring from a parent, teacher or other adults. A specific percentage of mentors are reserved for Title I school students.

Each student or team of up to 3 students will receive a mentor until all mentors are assigned. We do have a limited number of mentors. Mentors are provided by our Student Leadership Board (SLB). The mentors are all past participants at ACSEF with a desire to help the county Title I and other school students learn and be engaged in hands-on - minds-on science research projects.

At the science fair, the ESAE participants will be involved in friendly face-to-face discussions with ACSEF volunteer judges and will focus on what the students learned from their research. Past student participants and visitors to the county science fair emphatically state that being around the wide variety of research projects showcased at the fair was an eye-opening, valuable learning experience promoting increased creativity, curiosity, and the desire to participate again.

Interested students and their parents/guardians need to access the Google Form to participate. See the Google form at the end of page two.

**THE FAIR WITHIN A FAIR CONCEPT**

- This program focuses on the experience of hands-on/mind-on outcomes. Mentors will be provided through the Fair's **Student Leadership Board (SLB)** program per each project being performed by 1, 2, or 3 persons.
- We want this program to focus on the students learning more about their interests so they can become strong thinkers, communicators, and doers of science in a data-gathering format.
- The program develops a greater understanding of how science works and improves inquiry skills--including the ability to communicate and share research results. Involving the parents and teachers will support the learning environment at home and school through science inquiry and their students' increased interests and abilities in a collaborative environment.
- A standards-based science fair builds on the strengths of traditional science fairs. By having students participate through the standards, the projects become more student-centered.
- The format of this new segment of the Fair, **Emerging Scientists and Engineers**, features many opportunities for students to communicate their full inquiry projects and not compete against each other as in a traditional science fair environment.
- Standards-based awards will be provided 1st-4th and special awards within their category will be provided..
- The Next Generation of Science Standards aligns with the Emerging Scientists and Engineers program goals to benefit the school-wide accomplishment of NGSS.

<b>NGSS Aligns With Science Fair</b>	
<b>NGSS Eight Practices</b>	<b>Steps to complete science fair project</b>
1. Asking questions	Choose topic, ask question
2. Using models	Build model, make a prediction
3. Experiment design & execution	Design and perform experiment
4. Analyze and interpret data	Data analysis
5. Use mathematics	Statistical analysis, significance of results
6. Constructing explanations	Draw conclusions
7. Engaging in argument	Design a poster advocating for conclusions
8. Communicating information	Present results to teachers, fair judges

- **How to sign up: Student and Parent complete this Google Form**  
[Emerging Scientists and Engineers Mentor Request Form](#)

**Questions:** email:Founding Director/President Patti Carothers M.S.  
[directoracsef@gmail.com](mailto:directoracsef@gmail.com) Fair Phone: 925-353-4414 Website <https://acsef.org>