

EV Challenge Webinar
November 22, 2019
Minutes

Attendees:

CEVC: Ewan, Ken, Heather
DEQ: Robin, Melissa
Topsail: Michael
Vernon Malone: Jason
SVGS: Vincent

After introduction, Ken reminded us all why we are involved with the EV Challenge. Not only are we inspiring the next generation of engineers, we are teaching them about electric vehicles as a solution to our world's energy and climate problems. The Board is involved because we are not teachers, but we want to support teachers in their efforts to inspire students. Ken asked the team leaders to explain why they are involved: great fit for students involved in the race car club at Vernon Malone, teamwork and hands on problem solving, outreach to build communication skills, and to continue a personal interest in electronics. Ken also mentioned that he is trying to engage ABB since they are title sponsors of Formula E. His goal is to get them to fund a trip to see the race in New York City in July 2020. But he noted that we'll probably wind up with ABB tshirts or something.

We also discussed the recent changes to the program rules. All attendees understood the creative component and supported it. We clarified the following issues:

- Billboard: Teams are encouraged to develop this digitally with Adobe Illustrator or similar software. DEQ proposed that the winner of this category might actually get their design published as a life size billboard so starting with digital format would be preferred. We noted that digital files should start as vector based images so they can scale to the 14 feet by 48 feet size of a billboard. However, the version printed for the competition should only be 14 INCHES by 48 INCHES. Teams do not have to start by using software and can use any media they wish: painting, ink drawing, whatever.
- Presentation: Heather will create a rubric for this category of the competition and share it with the teams as soon as possible.
- Range Event: We clarified that batteries can be charged or swapped BEFORE the range event but not during the range event.

For the troubleshooting event, the rules on the website are mostly correct. The image of the troubleshooting board is the old board which we no longer use. The updated boards are housed in plastic tool boxes and operate using 6 volt lantern batteries. Ewan will work to locate the other boards and get them to teams that need them to practice before the event.

We briefly discussed how teams raise money and process donations to the teams.

- Topsail is raffling off donated furniture to raise money. They also have some corporate sponsors and grants. Some companies donated components to the team. In their case, the EV program is actually a class at the high school so all funds flow through the school. Purchasing involves multiple forms and approvals.
- SVGS funding also flows through the school but actually requires two approvals due to their special situation as a Governor's School.
- Vernon Malone operates their team as a club. They received a grant from the school that covers their expenses.
- Corporate sponsors are great and those on the call suggested using personal connections at local companies.

We discussed ways to recruit new schools. SVGS plans to visit other schools to showcase their vehicle. We clarified that this outreach does qualify for participation points. Vernon Malone plans to showcase their vehicles at several events where other schools will attend. Bringing other teachers to the Final Event is highly encouraged.

The recruiting discussion led to a debate about the EV Challenge curriculum. The general sense is that we do not need our own curriculum but should provide supporting material to teachers to use as they can. DEQ pointed out that they promote the ["It's Our Air" program](#) throughout North Carolina and can work in references to the EV Challenge as part of that outreach. The SVGS team works with CTE teachers to allow students to earn credits by welding the frame of their vehicle. This also supports their goals of skill based certifications.

Thanks again to all who could make the call. We'll see everyone on March 7 at the RTP Headquarters. Teams are encouraged to bring team photographers to capture the moments at the Final Event.

Action Items

1. Ewan: contact teams that have troubleshooting boards and make sure each participating team has one before February 1.
2. Heather: prepare rubric for presentations that is not constrained by the medium (ie, able to apply to videos, skits, speeches, etc.)
3. Ken: coordinate invitation to regional high schools to attend the Final Event and participate in non-vehicle events.
4. Ken: provide information to DEQ to integrate into "It's Our Air" promotions.