

---

---

**INTEROFFICE MEMORANDUM**

---

---

**TO:** DR. CASHMAN & MR. SIPES  
**FROM:** JAMES LANDER  
**SUBJECT:** SERC & CCAT TRIP MEMO  
**DATE:** NOVEMBER 18, 2016  
**CC:** NA

---

**PURPOSE**

The purpose of this memo is to provide the reader knowledge of the trip to Schatz Energy Research Center (SERC) and the Campus Center for Appropriate Technology (CCAT).

**SUMMARY**

This memo outlines what the trip to SERC and CCAT was like and the information that the speakers conveyed to the class of Engineering 115.

**DISCUSSION**

Approximately at 3:30pm at the date stated the class of Engineering 115 left their class room and proceeded to the southern part of HSU campus. There, the class was divided into two groups taking turns visiting the SERC and CCAT facilities.

At the SERC, Meg (the speaker) explained the different projects that the SERC is part of. Originally SERC was founded for hydrogen fuel cell innovation but since then the SERC has expanded to solar, battery, and biomass technologies. The biomass technology was particularly interesting the speaker explained how the left over green mater from logging is used to make relative efficient bio bricks these bricks then are burned like coal to create usable energy. The speaker explained that this is useful because it uses the left overs of logging but its drawback is that it still contributes to carbon dioxide emissions. Overall the speaker conveyed the concepts of SERC well and the class of Engineering 115 had a good experience.

At the CCAT, Darby (the speaker) explained the different projects that the CCAT is part of. The CCAT is a house that was founded in 1982 and is run by students. The house main focus is to contribute the least to negative impacts of the environment and how to use the environment to get to the houses goal of net zero. One particular project the speaker talked about is how the house has a rain water capture system. This project collects rain water and then stores it into tanks. The idea of this is to have water on hand on dry days to be able to water the houses gardens. Overall the speaker was extremely knowledgeable about living off the earth and conveyed the houses projects well to the class of Engineering 115.

**CONCLUSION**

The trip to the SERC and CCAT produced knowledge for the class of Engineering 115 about different ways to be more efficient in living and energy usage. These two facilities and many more like it are accentual to the human grown and knowledge for sustainability.