SWATeam Recommendation

Name of SWATeam: Transportation

SWATeam Chair: Wojtek J. Chodzko-Zajko

Date Submitted to iSEE: 03/19/2015

Specific Actions/Policy Recommended (a few sentences):

Perform a general analysis and recommendations regarding the potential to transition the University fleet to renewable fuels. This analysis would review the types and usage of University vehicles, the current and short term expectation for vehicle availability and propose various plans (i.e. conservative, moderate and aggressive) for GHG emission reductions along with approximate fiscal impact for each plan.

Rationale for Recommendation (a few sentences):

There is a desire to reduce, or potentially eliminate, GHG emissions from University vehicles. Goals have been proposed without an analysis on what reduction is reasonable when combined with current technologies, the transportation needs of the University and the financial implications of attaining those goals.

Connection to iCAP Goals (a few sentences):

This recommendation will provide clarity to an existing and specific iCAP strategy/objective and provide tactical guidance on how to meet that objective.

Perceived Challenges (a few sentences):

Primary challenges consist of either obtaining funding for an external entity to perform the analysis or availability/ability of existing staff to perform the analysis to the extent necessary

Suggested unit/department to address implementation:

Facilities & Services, Transportation & Automotive Services

Anticipated level of budget and/or policy impact (low, medium, high):

It is expected that the budget impact of this analysis is relatively low. The potential impact of the results is significant depending on the plan identified by the University that provides the desired outcome. A choice of rapid GHG reduction over a short period could have both a high policy impact as well as a high budget impact.

Individual comments are required from each SWATeam member (can be brief, if member fully agrees):

Team Member Name	Team Member's Comments
Garrett Fullerton	I believe this data collection effort is necessary if the University wants to reach its goals of carbon reduction.
Rick Langlois	Agree.
Wojtek Chodzko-Zajko	Additional information is needed about all aspects of the transition of the university fleet to renewable fules. Integrating this data into DMI and other reporting mechanisms is an important and necessary first step.
Grace Kyung	Gathering more data and doing a further analysis of renewable fuels will allow us to work more effectively as a campus towards understanding which methods would be better suited to pursue. This should be a collaborative effort between F&S and other campus stakeholders who would benefit from this information.
Bumsoo Lee	Agree
Pete Varney	Agree. It is critical that realistic goals be set and that associated impacts to operations be understood and acknowledged. Setting goals without an understanding of fleet needs and industry realities will not further the University's progress on sustainability.

Comments from Consultation Group (if any; these can be anonymous):

Explanation and Background (can be supplied in an attachment):

The following strategy has been proposed for inclusion into the current iCAP:

Convert the Fleet to Renewable Fuels within Fifteen Years

The GHG emissions from the fleet totaled 5,621 metric tons in FY14. These emissions resulted from burning 463,257 gallons of gasoline, 121,611 gallons of diesel, and 24,914 gallons of E85 fuel. To eliminate these emissions campus could gradually switch the entire fleet to fuel sources that do not require fossil fuels. Options for this may include sustainably-produced biodiesel, compressed natural gas from anaerobic digestion of agricultural wastes, and electricity from zero-carbon sources such as solar and wind.

This strategy does not take into account the transportation needs of the University or the availability of vehicles which can both address the University's needs and meet the non-fossil fuel requirement indicated. In order to provide a reasonable timeline and attainable goals this recommendation is to undertake a general review of University vehicles and associated usage. A general understanding of vehicle usage, including vehicle types and general operating areas, will permit goals to be established that are feasible give the current state of the automotive industry. As the state of the industry changes, these goals can be revisited with further updates of the iCAP.