

CAP Advisory Group Agenda ~ October 29, 2008

- 3:00 – 3:05 Review agenda
- 3:05 – 3:35 Review Greenhouse Gas Inventory and Trends
- 3:35 – 4:45 Review and Discuss Options for CAP Work in 2009
- 4:45 – 4:50 Next meetings: combine Nov. and Dec. on Dec. 10?
- 4:50 – 5:00 CAPAG updates and next meeting agenda discussion

Members present:

Moe Tabrizi
Paul Norton
Henry Mueller
Ann Livingston
Sheila Horton
Pam Milmoie
Amy Ellsworth
Francoise Poinatte
Howard Geller

Staff present:

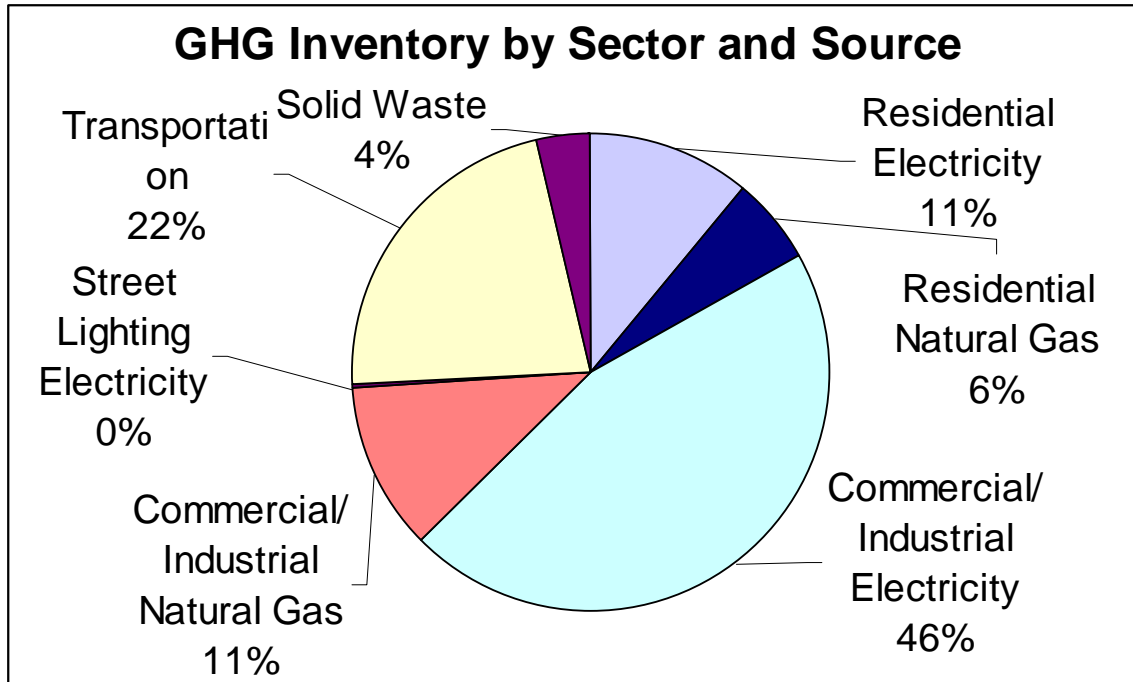
Sarah Van Pelt
Drew Bascue
Yael Gichon
Jonathan Koehn

Updates from Staff

Staff is very busy working on the greenhouse gas emissions inventory and memo for the November 18th Study Session on the CAP.

The memo includes a greenhouse gas inventory update by Econergy – both an update with new conversion factors and additional trend analysis and other evaluations to answer council's questions.

Natural Gas in residential sector is 5% of inventory, as is commercial natural gas



Pam - Reducing carbon intensity as we grow will offset our growth in employment and population

The efficiency of homes has been getting better but the energy consumption is growing

Craig – how do you make the leap that carbon intensity per employee is the issue and that the RPS will answer this growth

Staff – the BAU analysis shows RPS helping and to clarify, the GHG goal is an absolute goal and we are using energy intensity per employee or resident is a way of gauging the impact

Henry - What about doing just by population or just by employees?

Staff – commercial energy use is factored with employment numbers

There was some discussion of the year in which the emissions forecast was calculated – it is perceived that at this point there is a drop in consumption and that it may not be the best long term representation.

Pam – What is council going to be most interested in?

Staff – Maybe some information on the baseline, but we are also trying to give a sense of how we compute the inventory. Possibly a hot issue is how we combined the commercial and industrial sector energy consumption. We are trying to get clear on the difference between industrial parts of the city vs. how Xcel classifies energy users.

Henry – How has the inventory changed over the years?

Staff – Overall it's gone up, due to electricity and that's where we're going to focus our work – specifically on the commercial sector.

Moe – Do you know more specifically where the energy use is most focused? CU energy is going up, but down on a per sq. ft. basis.
100,000 sq. ft. per year on campus and ideally they will grow renewables with building.

Paul – This group needs to manage to the absolute value, not the per sq. ft. or per capita.

Henry – What are the implications of the fact that CU's sq. ft. is growing faster than the city's sq. ft.?

Craig – Suggests thinking in terms of our absolute goal and how far above the goal are we now – was 22% in April, is the same because of the RPS?

Staff – Yes, based on 2007 inventory data.

Paul – Have the DSM benefits for '09 and beyond been rolled in?

Jonathan – Yes. Some other key points are that we are trying to move to the next phase of the CAP. Previously we were asking for voluntary actions, but now we are taking a more direct role in reducing emissions through direct incentives and potential policies. The program conversation we need to have with Council is about the broad/shallow vs. narrow/deep programs – the best approach is the one that will get us to our goal sustainability. Our new package will include direct incentives as well as leveraging the Xcel DSM programs; looking deep into these to see how to enhance, through conversations with Xcel and by finding ways to increase the effectiveness of externally-funded efforts. Similar to the Smart Grid, it is going to take collaboration and communication to maximize the results.

Segue to the Smart Grid Information-

Craig – 18,000 meters installed now, many more by the end of the year. There will be 25,000 bi-directional meters that can communicate with customers, but these serve as a data communicator. A web portal will enable customers to maximize this communication by seeing their energy information online. Some customers may be interactive devices for their homes such as T-stats and some will get other information and gadgets, but others will get nothing. The idea is to stratify the technology deployment so that Xcel can see the effect of the Smart Grid.

Staff – A key point is that Xcel is looking for ideas from the city on how we can collaborate, if the CAP AG has ideas, they are encouraged to share.

Amy – Installing the smart meters may be a good time to talk about DSM!

Jonathan – The CAP AG and EAB were identified as groups that could provide additional ideas about how to increase partnering on the Smart Grid.

Craig – The feedback data on energy usage will be crucial and will be shared with the city, but the city needs to work together with us to define the type of data that is needed.

Jonathan – An additional point is that when the Property Tax 1A ballot measure is passed, that there is an additionality to be had between that funding mechanism and Smart Grid features and technologies.

Staff – The Energy Profile Implementation Program. Based on our findings and those of Econergy, we are going to stop doing audits and begin to focus on direct installations.

Henry – What about the commercial sector and the professionals who do the work, because we may not be able to implement fast enough.

Staff – The '09 budget has a big work force development component to get workers trained to do the whole-house building science improvements. The audits will transfer into Xcel audits.

Howard – For people with below-average income the additional funding may be most important, but for the more affluent residents they may not need the actual funding. Though it is a good point that a few extra hundred dollars may encourage additional work. The combination of the federal tax credit, with 1A and the DSM programs are a good combination that will help further the impact of the program.

Staff – CRC or another partner will be crucial because contacting contractors is time consuming for property owners interested in energy efficiency improvements.

Amy – An audit program with a hybrid approach is to train insulation contractors to do energy audits, or energy auditors to do insulation work. This gets the work done at the same time and captures the resident's interest.

Paul – Savings follows waste, which lowers cost per savings. Is there a way to structure the program so that it focuses on the high users? Xcel has the info, but it's currently confidential. One way is to have Xcel do the analysis and have them target the customers with mailings about city programs, etc. Don't think about the barrier as insurmountable.

Staff – The city is working with Xcel to find ways to address this.

Henry – It's hard to do that because Xcel doesn't know how big the buildings are.

Pam – One strategy in the SEP is to include additional data on energy bills, especially relative to energy use.

Craig – We’re not going to be able to do that.

Staff – Another way around this is to do energy bill analysis on a broad range of residents. One example is the Home Energy Makeover Contest that collected several hundred releases – are there other strategies to get people to opt in to things like the Boulder Energy Project? Possibly through the Smart Grid web portal.

Moe – Maybe couple that with an educational piece that lets the customer know, “If you are at or above X, you are a high energy user and enrolling in this program behooves you.”

Craig – This kind of information will be involved in the Smart Grid and educational pieces that makes it easy for people to understand where they are relative to others or relative to what they could be saving.

Howard – Is there a plan to the funding behind the new energy program? In some other places it has been shown to take years to adopt a 1A-type funding scheme.

Ann – Could start selling bonds in early ’09 and have funding available in March or April. There are some details about how to roll it out. The tax-exempt bonds would carry a lower rate than the taxable bonds. The tax-exempt bonds are capped at \$15k per household and for households at 115% of AMI or less. The taxable bonds may or may not be eligible for energy efficiency tax credits. They will be available first-come first-served. Commercial bonds will be rolled out later. By mid-November the County will be holding a workshop to discuss details on applicable technologies and other details.

Jonathan – Staff is trying to develop some parameters on how to structure a Commercial Energy Conservation Code (CECO) or Residential Code (RECO). We are trying to roll it into the code work we are currently working on and there will be a large amount of public process leading up to enacting any new code.

Staff – Several scenarios will be provided for council to consider. Two scenarios with current funding; one with no RECO/CECO, one with a RECO/CECO. Two more scenarios are outlined with additional funding; one with no RECO/CECO, one with a RECO/CECO. These options will be laid out in wedge chart-like figures that show what each of these pieces could get us in terms of GHG reductions. These will include overall costs.

Moe – Did Econergy provide cost estimates and could they be mapped for the options above?

Staff – The County’s SEP analysis was for used and we have estimated options relative to the data set for the SEP.

Jonathan – Council will be presented with two policy options; do they want to raise the tax and do they want to implement an energy efficiency code for existing buildings.

Staff presented some of the impacts of these options.

Howard – A suggestion about RECO's is to run a code-lite effort. That is because Xcel feels that they are not obligated to incentivize improvements that are required by a code. A suggestion is that the city run a code for two years and tell the building owners know that if they ignore the code as a voluntary approach, they will lose the ability to get the incentives and will be required to make the improvements.

Staff – Xcel expects that Boulder will have a higher participation rate in DSM than other areas and therefore they may not be likely to drop the incentives in Boulder regardless of whether it's code driven or not.

Howard – Recommended giving the voluntary approach a try first and that will allow for a case to go mandatory in the future, especially if the voluntary approach is ineffective.

Jonathan – That's a good idea because there may be push-back from the community if the city proposes a mandatory program. What does the CAP AG see as potential triggers?

Building Permit – maybe has a slow penetration

Rental License – may be fast but could be faster (because there are many rentals that do not have licenses)

Multiple – Branding a building or home as ClimateSmart will be crucial, it could be disclosed to renters, it could influence a building owner's desire to improve efficiency.

Staff – There are several versions of the code that include a range from strong to soft regulation or simple disclosure.

Staff went through all the program areas including the specifics of transportation funding.

Howard – Due to available funding on DSM, maybe it's time to shift some focus to the transportation sector. Without reductions in the transportation sector we will not get to the goal.

Francoise – The EcoPass program is OK, but parking is very effective. Could it be included in the land-use ties and especially with regard to the codes piece mentioned above.

Staff – ClimateSmart at Work outreach may be targeted at businesses that have Eco Passes.

Next meeting, possible dates since the November meeting is currently scheduled for the day before Thanksgiving. The December meeting is currently scheduled for the day before Christmas, so the next meeting will serve as a double.

December 10th will be tried for.