

CAC Feedback on CAP Strategies – Opportunities and Barriers – February 2016 Meeting

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| SI Team | Strategy | |
| Energy Efficiency | Strategy: Business Efficiency Portfolio | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - New standards and codes - More frequent updating of energy codes, and possibility of creating city based voluntary energy conservation programs - New construction will result in ongoing energy savings using energy efficient construction over lowest first cost construction - Straightforward. with our forward-thinking City/utilities staff leading the charge, our code should continue to evolve and be more aggressive - benefits all - seems easy to implement - new technology - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Builder's perceptions - Monitoring compliance with new energy codes could be difficult - Convincing owners and buyers that the life cycle cost really does have value over lowest first cost for construction - Curious if there's been struggles in the past with attaining desired stringency in the bldg code - Resistance from builders and developers; projects outside the city but in the GMA? - Increased cost to affordable products - - |
| | Strategy: Business Energy Scoring | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Ubiquitous adoption, required disclosure in advertising - Provides bench mark data to determine where community is regarding building energy performance. May uncover best practices for building operation that can be leveraged. - part of this team so my pros and cons were addressed - long-term benefits in seeing a buildings energy performance - - | <p>Barriers:</p> <ul style="list-style-type: none"> - City Manager's office obstruction - Equal participation may be hard to achieve - Access to data, ability to make study results available (privacy issues). - Love this. curious how it gets implemented (i.e. are homeowners on hook to pay for a HERS rating) - huge initial effort for building owners - - |
| | Strategy: Business Efficiency Portfolio | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - On-bill financing for tenants - Huge potential for energy reduction! Expansion of existing program would make implementation easier. - Improve Energy efficiency - Rebates make adding energy efficient upgrades when doing routine replacements/installs - Great to see Efficiency Works continuing on. - Provides businesses with details that may not be readily available - We know how to do it, can get very focused and make progress fast - Greatest GHG reduction out of all strategies. Great impact on overall health of city. Cost effective strategy. - - | <p>Barriers:</p> <ul style="list-style-type: none"> - FCU billing system and staffing - Time, Efforts, and Costs associated - Non-technical decision makers may not be comfortable with the technology or have confidence in the savings. - Fully confident that program will be sufficiently/more funded moving forward? - apples vs olives - scaling up delivery of the "service" - Upfront costs to businesses in order to meet benchmarks. - - |

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| | Strategy: Home Efficiency Portfolio | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Market research and proper marketing - Public awareness and community involvement is an essential aspect - Improve energy efficiency - Neighborhood may attract more participation through relationships & best practices - Affordable housing under the Low Income Tax Credit program requires Enterprise Green Communities to be followed. As a result, FCHA's new and rehabilitated units are meeting efficiency requirements in addition to Green Code requirements. - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Lack of marketing professionals - Time and money - Getting started, need some quick wins to generate excitement - Cost is always a consideration when balancing energy efficiency with development budgets. - - |
| | Strategy: Street Lighting Upgrades | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Scheduled replacements or repairs should leverage the new technology - Part of this team so my pros and cons were addressed - Visible to community - I think this is great because it is one strategy that people will "see" and "experience" - even if the GHG reductions are low, the community will see and believe "we" are doing something. Can't get that insulating houses... - - | <p>Barriers:</p> <ul style="list-style-type: none"> - High implementation costs for relatively low GHG reduction - Costs of upgraded equipment - perceived cost/benefit ratio - - |
| S.I. Team | Strategy: Increase Bicycle Ridership | |
| Multi-Modal Planning & Development | <p>Opportunities:</p> <ul style="list-style-type: none"> - Reducing VMT is a key component of GHG reduction - Expand the low stress network during routine maintenance. - Tie in with safe routes to schools programs - Plenty of momentum & enthusiasm from residents & businesses alike - More healthy happy people - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Only works for the young and fit demographic - Safety on the streets used to bike to work - Curious why such big TRC and Societal Costs, and what they entail. I might also call out local businesses as a key partner since the Zagster bike share business model the City selected seems to be dependent largely on private rather than public funding in order to succeed. - Perceptions of safety - access in places such as along Harmony Road - it's a raceway - - |
| | Strategy: Improve Pedestrian Network | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Gets cars off the road - How does this tie into safe routes for schools programs - Good visible project for the community - lots of co-benefits - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Culture shift – resistance - Cost per walker - Curious why such big TRC and Societal Costs, and what they entail. - |

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| Strategy: Expand Congestion Management System | |
| <p>Opportunities:</p> <ul style="list-style-type: none"> - Will improve air quality and benefit public - Community satisfaction - faster commute times - less vehicle emissions - Great to see this as a proactive strategy, as it seems to be an increasing issue as population grows - Signal timing wins many friends - Reduce GHG reduction and improve traffic issues at the same time. - | <p>Barriers:</p> <ul style="list-style-type: none"> - Upgrade disruptions - Three strategies all wrapped in this one. Could lead to confusion or competition within the strategy for priorities - Implementing changes in a timely manner and keeping up with population growth. - - |
| Strategy: Change Land Use Patterns with New Plans | |
| <p>Opportunities:</p> <ul style="list-style-type: none"> - New Belgium has added Smart Growth as a category of focus in our philanthropy program, and local NPOs working toward smart growth-related efforts within the City may qualify for funding. - Working with neighboring communities - Reducing VMT and readdressing current city plans is beneficial - Increased land use density can make destinations closer and allow alternative transportation to access needed services - An awesome future - By shortening trips and reducing the need to drive has the potential to benefit all citizens in reducing expenses and improving well-being. - | <p>Barriers:</p> <ul style="list-style-type: none"> - Costs - upgrade disruptions - Developers need to buy in so new uses are constructed - Retrofitting existing poor patterns - creates inequities? - Changing habits on a large scale. - - |
| Strategy: Transit System Expansion | |
| <p>Opportunities:</p> <ul style="list-style-type: none"> - Designated transit funding district - Energy efficient transit equipment - increased access to destinations - For those living outside of Fort Collins, what are the options when working in Fort Collins - Opportunity to link development sites with transportation. - Ride the wave of enthusiasm for MAX - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Inertia of government - High cost for undetermined community usage - Community buy in - Public transportation is not currently viable for many low-income households who still must rely on their own transportation. - Is this still in the "chicken or the egg" phase? are there places that having a bus route to would actually result in increased ridership, or is this a long term goal that happens once the City has more transit-oriented neighborhoods like Old Town - Cost - Sunday service - getting people to actually ride the bus for everyday activities (need increased frequency) but, we don't have enough riders yet... - |

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| | Strategy: Trip Reduction Programs | |
| | Opportunities: <ul style="list-style-type: none"> - Implementation of a ride sharing program in partnership with CSU would be beneficial! (especially with their lack of parking spaces due to construction) - Neighborhood targets with the home energy efficiency program - | Barriers: <ul style="list-style-type: none"> - Culture - folks are dependent on having a car available - - |
| S.I. Team | Strategy: Community Shared Solar | |
| Clean Energy | Opportunities: <ul style="list-style-type: none"> - more CEC - Alternative energy sources should be introduced - Chance to participate in renewable energy for population that does not own residence or business property - There is an opportunity to develop large solar farms with individuals and groups buying in and sharing the cost on a pro rata share. - Larger private businesses likely have interests in - but not land available for - solar investment via a model that allows them to claim the env attributes and reduce their own Scope 2 (&1) emissions - Anyone with \$ can participate - | Barriers: <ul style="list-style-type: none"> - I'm asking myself that same question - Locations for the solar farms - Curious to learn more about the mentioned incentives and likelihood of approval. - Takes \$ to participate - - |
| | Strategy: Solar Power Purchase Program | |
| | Opportunities: <ul style="list-style-type: none"> - Gets renewables installed w/o first time investment costs. - There is an opportunity with solar tax credits for affordable housing to install solar and realize a return on investment from both the tax credit equity investor and the City's SPPP. - Great and well-recognized program. Is CPACE approved in Larimer County? - Climate and space - Utilities has control - they like that - | Barriers: <ul style="list-style-type: none"> - Solid partners to construction and operate equipment - Currently there is not enough funding and the awards are based on a lottery versus an in-depth underwriting process. - Business ROI - Limited opportunity given limited utilities funding - - |
| | Strategies: Utilities Rooftop Solar Incentives | |
| | Opportunities: <ul style="list-style-type: none"> - Already committed population targeted - Climate and space - Get more citizens involved in the game or renewable energy! - - | Barriers: <ul style="list-style-type: none"> - Existing infrastructure may not be easily expanded - Curious to learn more about the mentioned incentives and likelihood of approval. - Business ROI - Incentives get too small to inspire adopters? - |

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| | Strategies: Power Purchase Agreement for CSU CHP Plant | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - CSU accounts for a substantial amount of our energy use and GHG emission. This partnership plan would be extremely beneficial in reducing GHG emissions. - Great partner to implement and manage ongoing operations - potentially good location for deployment of this strategy - | <p>Barriers:</p> <ul style="list-style-type: none"> - Business case that will prove itself over time - Cost, PRPA contract (?), NO2 (?) - - |
| | Strategies: PRPA Renewables Generation | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - 100% renewable - Utility likely needs to expand capacity as community expands - PRPA has dispatchable control - High GHG reduction. - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Lack of leadership - Costs - How strong is their commitment to more renewables in mix beyond existing and Rawhide Flats? look forward to hearing how the convo is progressing with PRPA - PRPA :) ... and FC is only one city of four, we need allies! - Eliminating coal-fired power sources and integrating new systems (solar and wind) effectively - |
| S.I. Team | Strategy: Construction and Demolition Sorting Facility | |
| Road to Zero Waste | <p>Opportunities:</p> <ul style="list-style-type: none"> - Great opportunity for small business partnership - Central community location for recycled materials - Strong local partners & knowledge in construction waste recycling, such as Waste-Not. - Great idea - needed | <p>Barriers:</p> <ul style="list-style-type: none"> - Convenient location, might be making two trips to deal with waste over one to the landfill - Sounds messy, complex, and expensive |
| | Strategy: Municipal Biomass Burner Feasibility Study | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Use waste to make energy rather than bury it. - Learn from other municipalities; beetle kill fuel source - Figure out if it is a viable idea - | <p>Barriers:</p> <ul style="list-style-type: none"> - Business case that supports the strategy - Title V - A few bucks? - - |
| | Strategy: Municipal Biomass Burner | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Use to heat swimming pools - Dealing with lots of dead trees instead of landfilling - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Site location not object able to neighbors - Not a barrier but a comment, is the biomass really currently ending up in a landfill? Seems to be what the "other benefits" states? - Start-up costs & timing, operational consistency, what to do after the "crisis"? - |
| | Strategy: Drake Water Reclamation Facility Co-Generation Site | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Implementation of a recapture system would allow us to convert "waste" into energy - Might reduce heat introduced to the river - Anaerobic generation of methane to fuel power generators - Get more organics out of the landfill - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Cost, technology - Careful selection of co-gen system that will perform well with limited maintenance requirements over time is crucial. New Belgium has experienced multiple issues with our engine powered off our PWTP biogas. - Title V - Getting other large commercial kitchens / restaurants to install pulpers - - |

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| | Strategy: Neighborhood Food Scraps Composting | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Might be useful at the water reclamation facility - Love this idea. Connecting neighbors via the next door app could be added to the arsenal of ways to engage & get the word out. - Makes people feel good - - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Collection, storage, and transportation - Currently composting is limited in vendors and extremely costly to do, need to make sure this is affordable - Huge effort for small return, more trucks, etc. - - |
| S.I. Team | Strategy: Water Treatment Facility Hydropower | |
| Water & Land Use | <p>Opportunities:</p> <ul style="list-style-type: none"> - Augment solar during the night - cloudy days - Use a resource at our disposal - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Cost to benefit - project payback - Dam - Willpower? - - |
| | Strategy: Carbon Sequestration through Enhanced Tree Health | |
| | <p>Opportunities:</p> <ul style="list-style-type: none"> - Enhances outdoor recreation - Beautification of the city - Build on great tradition of open space and land conservation - - | <p>Barriers:</p> <ul style="list-style-type: none"> - Weather influences - water to support the trees - Real quantification? - Urban growth pressure - Development pressure - - |
| Suggestions for better communication and/or overall organization of the strategies? | 1. Making sure the average community member can understand the terms for PAC, TRC and SC tests, can the average citizen understand the one page summaries - I tried something similar at a school district & was shocked at how simple I thought the graphics were and how complicated the community made it | |
| | 2. For a first appearance, I think it was laid out very well and was very easy to follow and understand. | |
| | 3. Maybe a one page "index" of all the categories / strategies | |
| | 4. A bit more detail, but I assume that's to come. | |
| | 5. I understand that a much longer document would've been cumbersome at this introductory stage for the CAC, and I appreciate us not having been given a 200-pg document to review. In some cases, however, the very brief descriptions of each strategy provide a limited understanding of how they might be implemented, and therefore make it tricky to provide meaningful insight on barriers & opportunities. | |
| | 6. 1) Cost tests are confusing to me. 2) Unclear whose job it is to implement the strategy. When, where (or how) is it the City, a business, or a citizens job to do ... to adopt or participate? Maybe we need a line for "Responsible party" - and maybe sometimes that says "shared" or "all". We might want to be clear, what are you (the City) doing for me & what do I (the citizen) need to do for you? 3) these strategies add up to 468,500 MT of reductions... that is 20% below baseline given the BAU If we don't "get" the PRPA related assumptions outlined on pages 28-29 of the Framework - will we be hung out to dry for failing? This is confusing and complicated - we need to be very clear about what these strategies might deliver and how they are a still just a component of the larger Framework of things we need to have happen to get to 80 reductions by 2030. We can't over-promise or misrepresent what these strategies are likely to achieve. | |
| | 7. I appreciate the structure of the CAP Strategic Plan. It is very easy to follow. One suggestion is to create a pie chart for each section (i.e. Energy Efficiency) representing the GHG reductions for each strategy (i.e. Energy Code Performance, Building Energy Scoring, etc.) w/in each section. | |
| | 8. Perhaps a better sense of the size of the homework - pages and hours estimated for review. | |
| Is there any additional information you would like? | 1. Perhaps a couple moments spent on the terminology used in the Cost Tests. For Total Resource Cost, how are you defining "the incremental measure costs" and "monetized emissions savings." And does "monetized emissions savings" mean that you've modeled what costs would be in a typical/most-likely carbon tax scenario? For Societal Cost Test, I'd like to be sure we're all clear on what is meant by "benefits that are not currently valued by the market, externalities" and the "social discount rate." | |
| | 2. I might appreciate a little coaching and information on the types of costs tests, not sure I get all the language. | |