SALT LAKE CITY COUNCIL STAFF REPORT

DATE: May 5, 2009

SUBJECT: Energy Efficiency and Conservation Block Grant (EECBG) Projects

STAFF REPORT BY: Jennifer Bruno, Budget and Policy Analyst

AFFECTED COUNCIL DISTRICTS: Citywide

ADMINISTRATIVE DEPT:

AND CONTACT PERSON: Vicki Bennett, Sustainability Director

KEY ELEMENTS:

- A. The Administration has forwarded a prioritized list of projects for Council consideration and adoption, to be funded with the Energy Efficiency and Conservation Block Grant (EECBG) Program, created by the Federal government and administered by the Department of Energy (DOE).
 - 1. The Administration will use this prioritized list of projects in order to inform the grant applications for Salt Lake City's grant award of \$2,116,500 (see attached). Even though Salt Lake City has been tentatively awarded the funds based on a formula (similar to CDBG), the City still needs to submit individual grant applications for each project in order to receive the full amount.
 - 2. When and if funding is received for each project, Council action will still be required to accept and expend the grant fund award.
 - 3. The Council can amend and adopt this list of prioritized projects. The Administration has indicated that they would need the Council to adopt the final priority list by May 12th in order to have sufficient time to complete the grant writing process.
 - 4. The attached priority list includes a project description, tentative amount, energy benefits and savings, jobs created, ability to leverage other funds, and public input received on each project. *The Mayor's prioritization list results in Projects 1-6* (highlighted in gray) receiving funding.
 - 5. The Council has set a public hearing date for tonight, May 5th.
- B. **EECBG General Information** This is the first year the City has undergone this process. While EECBG legislation was passed over a year ago, it was not funded until the recently-passed federal American Recovery and Reinvestment Act (ARRA). While the current year funding should be considered one-time money, the Federal Government, as well as the City Administration, is hopeful that funding of this program will become on-going after this year. Attached is an information sheet which details the purpose of the legislation and the criteria and requirements that each project must meet, including reporting requirements.
- C. **Public Process** The EECBG legislation does not require the City to go through any formal public process in order to consider and adopt project priorities. However, the Administration went through the following process:
 - 1. *April 16, 2009* Open House held in conjunction with regularly-scheduled Planning open house. 75 people attended, and one project was submitted by a member of the

- public that met the criteria (see attachment for criteria) this is project #9 on the attached spreadsheet. Both the Mayor and Community Development and Capital Improvement Program Advisory Board (CDCIP) ranked this project last in priority order, due to the limited impact on energy savings.
- 2. April 27, 2009 CDCIP Board review and ranking of projects. The CDCIP board discussed and reviewed the attached projects. They agreed with the Mayor's ultimate ranking with the exception of projects #6 and #7, which they ranked near the top, just behind the #1 ranking of a revolving loan program. Because of the high costs of these projects, this would have resulted in 3-4 projects receiving funds, instead of the Mayor's prioritization, in which 6 projects receive funds.
- D. **Mayor's ranking and recommendation** the Mayor has prioritized the attached projects in order to get as broad an impact as possible with the money available (Revolving Loan Program, Transportation Infrastructure, transportation lighting, code review). The detailed project prioritization is attached. A general breakdown of how the total award would be used, as prioritized by the Administration, is as follows:

<u>Uses by General Category</u>	<u>Amount</u>	Notes
10% DOE Allowable Administrative Costs	\$211,650	The Administration indicates that it may not need to use all funds to cover Administrative and/or Grant-writing costs. Any left over funds will be re-programmed to cover projects. These funds will be administered by the Sustainability Division.
20% DOE Long-Term Planning and Public Outreach	\$423,300	The Administration will use these funds to fulfill the DOE requirement to create an "energy strategy" to determine the best use of on-going funds, complete a community-wide carbon baseline study and develop reduction goals, support a community energy strategy through legislative support, support community education and outreach including developing a website. The DOE has informed the Administration that this will be a one-time percentage allowance. These funds will be administered by the Sustainability Division, with multiple Divisions participating.
Financial Incentive Programs	\$400,000	
Transportation	\$545,000	
General/Zoning Code	\$200,000	
Lighting	\$400,000	
Total Projects Prioritized for Funding	\$2,179,950	Note: The approximately \$63,450 difference between total grant award and total projects prioritized for funding could come from the Administrative allowance, or from the scalable projects. The Council may wish to discuss this matter further.

- E. It should be noted that of the nine projects on the Administration's prioritization list, four are flexible, and could be funded in smaller increments as funding allows. The projects are as follows:
 - *Project #1* Financial Incentive Programs The Administration is recommending funding this project in the amount of \$400,000, but a revolving loan fund could be established with any amount. The Administration's proposal is detailed on the attached spreadsheet. Final details of a revolving loan fund (terms and conditions) would be subject to Council approval.
 - Project #6 Installing LED Street and Traffic Lights The Administration is recommending funding 1332 Yellow traffic signal bulbs (currently most of the City's LED traffic lights are only the red and green bulbs), and 430 street lights with LED

- technology, for \$400,000. The Council could fund more or less of these light replacements.
- *Project #8* Solar Hot Water for Fire Stations The Administration is not recommending prioritizing this project high enough to obtain funding. This project would cost approximately \$25-\$30,000 per fire station. The Council could choose to prioritize this project in a smaller amount than the \$350,000 it would cost to retrofit all 14 City Fire Stations, and retrofit a few fire stations.
- *Project* #9 LED Holiday Lights The Administration did not prioritize this project high enough to receive funding. The Council could choose to fund this project at a lesser amount, and only replace a portion of the Downtown Alliance's holiday lights.
- F. **Environmental Subcommittee Review** The Environmental Subcommittee reviewed the Mayor's prioritized list of projects on April 28, 2009, with Council Member Simonsen in attendance at the meeting. In general the subcommittee concurred with the Administration, with the following caveats:
 - *Project #1* The Subcommittee and Council Member Simonsen recommended that the Administration broaden the scope of the revolving loan fund to include building systems other than electrical (to leverage programs offered by Questar, etc).
 - *Project* #2 If after further review, the Administration is not confident that this project will result in significant reduced emissions, the subcommittee would be comfortable spending these funds elsewhere.
 - *Project #5* The subcommittee indicated that this project could benefit the City even better with additional funds. One member of the subcommittee suggested using these funds to hire an FTE in the Transportation Division to help implement bicycle paths.
 - Project #8 The subcommittee and Council Member Simonsen, who was present at the subcommittee meeting, requested that the Administration investigate if it is possible to pursue this project without upgrading all aspects of the various Fire Stations. If the Department of Energy concurs that the City can upgrade the water heating system without upgrading other building systems (windows, electrical, etc), the Subcommittee and Council Member Simonsen encouraged the Administration to spend funds on a couple of Fire Stations (this item is scalable), possibly using funds from Project #2. The Administration estimates that a solar hot water system would cost \$25-\$30,000 per Fire Station.

MATTERS AT ISSUE

- A. The Council may wish to ask the Administration if the "general re-write" project (Project #4) could be funded with the 20% DOE planning allowance.
- B. The Council may wish to ask the Administration to identify projects from the existing CIP 10 Year Plan that may be eligible for this program in the future, in order to supplement the general fund contribution.
- C. The Council may wish to ask the Administration what internal controls will be used to administer the 10% "Administrative Costs" allowance.
- D. The Council may wish to discuss a desired process for subsequent years of EECBG funding, should it be made available.
- cc: David Everitt, Lyn Creswell, Vicki Bennett, Frank Gray, Tim Harpst, Rick Graham, Bob Farrington, LuAnn Clark, Sarah Behrens, Cindy Gust-Jenson

The Energy Efficiency and Conservation Block Grant (EECBG)

The Energy Efficiency and Conservation Block Grant (EECBG)

As included in the Energy Independence and Security Act of 2007

What is the Purpose of the EECBG Program?

To assist eligible entities in implementing energy efficiency and conservation strategies—

- to reduce fossil fuel emissions created as a result of activities within the jurisdictions of eligible entities;
- to reduce total energy use; and
- to improve energy efficiency in the transportation, building, and other appropriate sectors.

What Activities are Eligible Under the EECBG Program?

- Developing/implementing an energy efficiency and conservation strategy;
- Retaining technical consultant services to assist in the development of such a strategy;
- Conducting residential and commercial building energy
- Establishing financial incentive programs for energy efficiency improvements (e.g., loan programs, rebate programs, waive permit fees):
- Providing grants to nonprofit organizations to perform energy efficiency retrofits;
- Developing/implementing programs to conserve energy used in transportation (e.g., flex time by employees, satellite work centers, promotion of zoning requirements that promote energy efficient development, transportation infrastructure: bike lanes/pathways, pedestrian walkways, and synchronized traffic signals);
- Developing and implementing building codes and inspection services to promote building energy efficiency;
- Implementing energy distribution technologies;
- · Developing public education programs to increase participation and efficiency rates for recycling programs;
- Purchasing/implementing technologies to reduce and capture methane and other greenhouse gases generated by landfills or similar sources;

- Installing light emitting diodes (LEDS);
- Developing, implementing, and installing on or in any government building of onsite renewable energy technology that generates electricity from renewable resources (solar and wind energy, fuel cells, and biomass); and
- Any other activity as determined by the Secretary of Energy in consultation with the Secretaries of Transportation and Housing and Urban Development and the Administrator of the Environmental Protection Agency.

What are the Requirements for Direct Block Grant Recipients under the EECBG Program?

- Not later than one year after receipt of first year funding, eligible communities are required to submit to DOE Secretary a proposed Energy Efficiency and Conservation Strategy as described under eligible activities, and which includes the goals and proposed plan for the grant.
- The Strategy shall be approved or disapproved by the Secretary within 120 days or returned to the entitlement communities for revision.
- No more than 10%, or \$75,000, whichever is greater, may be expended on administrative expenses (e.g., staffing);
- No more than 20% or \$250,000, whichever is greater, may be used for the establishment of revolving loan funds.
- No more than 20% or \$250,000, whichever is greater, may be used for the sub-granting to non-governmental organizations for the purpose of assisting in the implementation of the Energy Efficiency and Conservation Strategy.

Annual Report—

- No later than two years after the date on which funds are initially provided to eligible communities and annually thereafter, the eligible communities shall submit to the DOE Secretary a report describing
 - the implementation of the Energy Efficiency and Conservation Strategy, and
 - energy efficiency gains.

Energy Efficiency and Conservation Block Grant (EECBG) Projects \$2,116,500 Total Budget

Three Year Program Administration, Policy Development, and Energy Planning (Total Cost \$600k)

Based on recommendations from DOE and others familiar with the EECBG program, during this first round of grants, we are directing \$133k per year into developing baselines and strategic plans for long-term energy programs. We have also been advised to set \$67k per year aside to cover program administration costs and fees. The Energy Policy Development and Planning activities will include:

- ☆ Completing a community-wide carbon inventory and energy baseline, and developing reduction goals
- Verifying, registering, and reporting the City's internal carbon inventory and energy baseline
- ☆ Developing a long-term energy strategy and a City Sustainability Plan
- ☆ Supporting Utah Clean Energy's development of community strategy and energy efficiency outreach and education
- ☆ Developing a website resource for community energy efficiency and sustainability

Potential Project List (Total Funds Available: \$1.51 M)

EECBG Eligible Activity	Project Description	Grant \$\$ (000's)	Total \$\$ (000's)	Energy Benefits	Estimated Number of Jobs Created	Savings Benefits	Greenhouse Gasses Reduced	Ability to Leverage Funds to Create Sustainable Program into Future	Other Benefits	Public Input (8 written comments*)
Financial Incentive Programs - Revolving loan programs	Establish Revolving Loan Fund to help approximately 30 businesses per year with capital costs of efficiency upgrades that reduce electrical use. Program will dovetail with Rocky Mountain Power's FinAnswer Program	\$400 (flexible)	\$650	Reduce community electrical use by 1.0 to 1.3 Million kwh each year (as much as 13 M kwh after 10 years)	17 permanent	savings to 30 businesses	480 to 650 tons reduced the first year, increasing by 170 to 350 additional tons each year thereafter (about 3000 tons annually after 10 years)	City will match 60% of grant funds (250K), Rocky Mountain Power will assist with rebates on projects (assume 30% of loans), business will match at least 10% of loan. All loan repayments will be available to new businesses for additional loans.	Businesses will be required to join the City's e2 Business program. They will receive additional support on other conservations measures, including water, waste, and chemical use.	Two written comments said this was highest priority. Other commentors were also positive, no negative feedback. Supported by the Business Advisory Board.
Transportation - Synchronize traffic signals	Re-time one third of 200 City traffic signals each year to reduce traffic delays by 5% or more (three-year program)	\$210	\$210	Saves 32,000 gallons of petroleum fuel each year by reducing traffic delays	1 permanent City FTE	\$64,000/year community savings in gasoline at \$2/gallon	110 tons in year 1, 220 tons in year 2 and 330 tons per year thereafter	None	Project will reduce VOC emissions by more than 300 pounds per year, and NOx emissions by over 400 lbs/year, resulting in air quality improvements	One positive comment, one concern expressed (with encouraging more vehicle use through reduced congestion) This was Sunnyside's highest priority (6 of 8 ranked it #1)
Transportation - Bicycle facilities	Build Bicycle Transit Center at Salt Lake Central Station (Intermodal Hub) to service 80 commuters/day, operate for 3 years.	\$235	\$470	Save approximately 6,100 gallons of petroleum fuel each year reducing 122,000 VMT	2.5 permanent 4 temporary	\$12,200/year community savings in gasoline at \$2/gallon	61 tons per year.	UTA to match (\$235).	Reduce 40,100 car trips, 122,000 VMTs and 61 tons CO2 and 4 tons criteria pollutants/year. Solves last mile problem.	Two written comments were positive, no negative comments.
General - Re-write zoning & planning codes to promote EE development.	Rewrite zoning and planning codes to promote energy efficient development and support alternative transportation	\$200	\$200	Non-quantified savings in reduced commutes and more transit access	1 consulting position	Non-quantified savings in reduced commutes and reduced vehicle needs	Non-quantified savings in reduced CO2 associated with commuting	Matched by City staff (\$100k)	Project will reduce VOC and NOx emissions resulting in air quality improvements.	One detailed positive comment. 3 members of Sunnyside felt it was fairly important.
Transportation - Bicycle paths	Create bicycle and walking paths to incentive the use of these forms of transportation. May include "green" bike lanes or a path on the N. Temple viaduct.	\$100	\$110	Save approximately 4,000 gallons of petroleum fuel each year reducing 80,000 VMT	4 temporary jobs	\$8,000/year community savings in gasoline at \$2/gallon	40 tons per year.	City will match (\$10k) with staff to design layout and install and maintain bicycle and share-the-lane pavement marking symbols and associated signing	Reduce 20,000 car trips, 80,000 VMTs and 40 tons CO2 and 2 tons criteria pollutants/year.	One commentor included this in top 3 priorities, no negative comments
Installing LEDs - Street and Traffic Lights	LED Traffic Signals: Replace 1332 Yellow 150-W bulbs with 12W LEDs; LED Street Lights: Replace 430 "Cobra-style" street lights. Use resulting annual savings to fund ongoing replacement of 1270 more 250 W street lights within 16 years.	\$400 (flexible)	\$500	Reduce City's electricity use by 417,000 kwh the first year, growing to 1.5 million kwh per year in 16 years.	14 temporary in first year 1 1/2 permanent jobs thereafter	\$46,000/year; \$165,000/year at end of project	186 tons annually in year 1 growing to 418 tons annually by year 10	City can dedicate savings from conversion to convert additional lamps each year. All existing streetlights would be converted in 16 years.	Provides ongoing market demand for LED technology	3 positive written comments, no negative comments. This was Sunnyside's second highest priority. 5 of 8 indicated it was in their top 3.
Renewable Energy - Micro-turbines	Install Micro-turbines at Parleys' Water Treatment plant	\$500	\$1,500	Reduce electricity use by 600,000 to 2M kwh annually, depending on water year (runoff)	50 temporary	\$40,000 to \$80,000/yr.; reinvestment of savings into additional water- related energy efficiency upgrades	275 to 930 tons in year 1, growing each year depending on projects	City will provide \$1M of additional funding in year 1, energy savings will be used for future energy efficiency projects	Use of newer technology, and provides additional plant backup power supply during power outages.	Four positive comments, no negative feedback.
Renewable Energy - solar hot water	Install solar hot water at fire stations.	\$350 (scalable)	\$700	Reduce natural gas usage by 1,300 Dth / Yr.	11 temporary	\$11,000/year	76 tons/year, growing each		Supports solar hot water technology and markets. Highly visible to public.	Three positive comments, no negative feedback. Two additional commentors supported solar PV installations
Installing LEDs - holiday lights	Replace Downtown Alliance holiday lights with LED lights (under grant to non-profit)	\$100 (scalable)	\$110	Reduce electricity use by 39,200 kwh annually	4 temporary	\$3,000 per year (City savings)	18 tons/year	Would provide labor in conjunction with the Downtown Alliance ments from public at large. 8 additional wr	This project would be extremely visible to the public.	Proposed by public during process, not available for comment during public open house

^{*} Public Input reflects comments from public at large. 8 additional written comments were received from Sunnyside East, this area's priorities are summarized in column but not blended with general results to preserve location-specific nature of priorities

LYN L. CRESWELL DIRECTOR

SAUT'LAKE; GHTY CORPORATION

DEPARTMENT OF MANAGEMENT SERVICES

RALPH BECKER MAYOR

CITY COUNCIL TRANSMITTAL

Date Received:

DATE: April 28, 2009

Date sent to Council:

David Everitt, Chief of Staff

TO:

Salt Lake City Council

Carlton Christensen, Chair

FROM:

Lyn Creswell 3.

SUBJECT:

Energy Efficiency and Conservation Block Grant Projects

STAFF CONTACT: Vicki Bennett, Sustainability Director, 535-6540

DOCUMENT TYPE: Resolution

RECOMMENDATION: The Council is requested to approve a resolution approving the prioritization of projects that the City will apply for from the Energy Efficiency and Conservation Block Grant (EECBG) funding it will receive.

BUDGET IMPACT: The City is eligible for a 2.1165 million dollar formula grant for projects that meet the guidelines of the EECBG guideline document.

BACKGROUND/DISCUSSION:

The EECBG Program was passed into law over a year ago, but just now funded for the first time through the Federal stimulus money. It is a formula grant based on population. Although this program is being funded by the stimulus money, it is hoped that it will continue (like the CDBG program) in the future.

With this in mind, the DOE is not simply providing these funds to cities; there will be a high degree of accountability for how we spend the funds. Regular reporting will be required that shows specifically what programs we have created, their energy savings, costs saved, jobs created and greenhouse gas (GHG) emissions reduced. Successful use of this round of funds will determine our future eligibility for additional funds.

Energy efficiency, conservation, and renewable energy programs and projects are building blocks for increased economic vitality, energy security, and environmental quality. EECBG program funds will have maximum impact if invested in ways that

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create and/or retain jobs and stimulate the economy in the short term while laying the foundation for a long-term and sustainable clean energy economy. The Department of Energy (DOE) has specified that they are looking for grantees to complete a variety of activities that meet these goals:

- ➤ **Build programs, not just projects** Develop sustainable energy programs that will produce long-term results that persist beyond the funding period;
- ➤ Create green jobs Show job creation, short and long term;
- ➤ **Partner** With non-profits or other government
- ➤ **Leverage** Use these funds with other grant dollars, or establish programs where the dollars are used in a revolving program.

Additionally, the DOE has listed the following activities as being allowed as use for the funds:

- Development of an Energy Efficiency and Conservation Strategy and Technical Consultant Services to assist in the development of such a strategy.
- Residential and Commercial Building Energy Audits.
- Financial Incentive Programs and Mechanisms for energy efficiency improvements such as energy savings performance contracting, on-bill financing, and revolving loan funds.
- Grants to nonprofit organizations and governmental agencies for the purpose of performing Energy Efficiency Retrofits.
- Energy Efficiency and Conservation Programs for Buildings and Facilities.
- Development and Implementation of Transportation Programs to conserve energy.
- Building Codes and Inspections to promote building energy efficiency.
- Energy Distribution Technologies that significantly increase energy efficiency, including distributed resources, combined heat and power, and district heating and cooling systems.
- Material Conservation Programs including source reduction, recycling, and recycled content procurement programs that lead to increases in energy efficiency.
- Reduction and Capture of Methane and Greenhouse Gases generated by landfills or similar waste-related sources.
- Energy efficient Traffic Signals and Street Lighting.
- Renewable Energy Technologies on Government Buildings.
- Any Other Appropriate Activity that meets the purposes of the program and is approved by DOE.

With these guidelines in mind, we have created a prioritized list of activities that are "shovel-ready" and meet one or more of these goals. This list is attached in spreadsheet format, showing each activity's cost, energy savings, cost savings, job creation and GHG emission reductions. We are proposing a variety of activities that, when combined, will show both long-term program creation but also include projects that provide rapid energy efficiency to be able to show reductions as we report our progress to the DOE.

The DOE is allowing each grantee to set aside 10% of the funds for administrative costs, and another 20% for long-term planning of their energy strategy and public outreach. We do not think that we will need the full amount for administrative costs, but are setting it aside until we receive further guidance from DOE as the grant is prepared. We do wish to set 20% aside for planning, as these funds will be used over a three-year period, and this will be the seed money to determine what additional programs and activities we will need in the future. One of the requirements is for us to create an energy strategy, and to do the needed planning to determine the best use of ongoing funds. DOE has told us that this set-aside will probably not be available in the future, so we need to use it in this first round of funding. These funds will be used to:

- Complete a community-wide carbon inventory and energy baseline, and develop reduction goals;
- Verify, register, and report the City's internal carbon inventory and energy baseline;
- Develop a long-term energy strategy and a City Sustainability Plan;
- Support Utah Clean Energy's development of a community energy strategy, legislative support and energy efficiency outreach and education; and
- Develop a website resource for community energy efficiency and sustainability.

All activity costs are rounded at this time; please consider these numbers to be \pm 15% for each activity. If we are able to reduce our administrative costs as hoped, we will be able to put those dollars towards one of our activities. We also may need to move some amounts around as details of the activities are completed during the grant writing process.

PUBLIC PROCESS: An Open House was held on April 16, 2009 where our potential projects were presented. Over 75 people attended. Comments were received and considered as the projects were prioritized. One additional project from the public was added to the list for consideration. The projects were then taken to the CIP Board to be prioritized based on the guidelines of the grant. The Mayor then reviewed the list, it was presented to the Council Environmental Subcommittee, and is now ready for your approval.