Palo Alto, California
United States of America

Palo Alto has taken the lead in implementing environmentally sustainable policies at the local level. The city, adjacent to Stanford University, is moving forward to share its experiences with other cities around the world as part of an effort to address the environmental crisis of our time.

The Council of Palo Alto has approved the following programs and ordinances over the last 2-3 years:

**ZERO WASTE:**

Council approved a goal of 73% diversion of waste from the landfill by 2011 and to strive for Zero Waste by 2021, along with:

- Enactment of a commercial garbage ban at the Palo Alto Landfill
- Approval of a new garbage recycling contract to start July 1, 2009, which includes new services including commercial organics collection, increased construction and demolition waste diversion, and enhanced commercial recycling
- Mandatory recycling ordinance
- Funding of zero waste grants – A funding opportunity for innovations to increase waste prevention, reuse, recycling, and composting efforts in the Palo Alto community
- Comprehensive Reusable Bag Program – The City’s Bring Your Own Bag (BYO Bag!) campaign encourages shoppers to bring their own bags when they shop. Retailers are asked to commit to activities at their store to encourage shoppers and reward them when they bring their own shopping bag.

On March 16 2009 Council will consider a draft ordinance to Eliminate Single-Use Plastic Checkout Bags at Larger Supermarkets. The ordinance would require all retail stores to offer either only paper bags, or neither paper and plastic. All supermarkets
would have to offer only reusable and/or recyclable paper bags, by September 18, 2009. Of Palo Alto’s seven large supermarkets, three have already voluntarily discontinued the distribution of plastic bags.

**UTILITIES’ CONSERVATION-RELATED PROGRAMS:**

The City of Palo Alto Utilities (CPAU) has long been a leader among municipal utilities in implementing efficiency and conservation programs, including:

- PaloAltoGreen, a voluntary green energy purchasing program. PaloAltoGreen now boasts a membership of one in five ratepayers, while the national average for enrollment in similar programs is less than two percent. PaloAltoGreen is ranked the number-one renewable energy program in the U.S., according to the National Renewable Energy Laboratory (NREL). For an additional 1.5 cents per kilowatt hour (kWh), community ratepayers can volunteer to enroll in the green energy program. In 2007, members of PaloAltoGreen reduced CO₂ emissions by 39,678,150 pounds, equivalent to taking 3,896 cars off the road for a year.

- Demand-side efficiency programs, large long-term supply-side efficiency improvements, and installation of over 270 photovoltaic systems. Energy savings of 5,500 MWh were achieved in 2007-08 as a result of these programs.

- The Gas and Electric Utilities implemented a Residential Energy Assistance Program that repairs or replaces furnaces, refrigerators, weather stripping, window caulking, attic insulation, showerheads, and more, saving a total of 11,462 therms of natural gas and 116,588 kilowatt hours of electricity in 2007-08.
- The Water Utility partners with the Santa Clara Valley Water District to reduce residential and business water use by cost-sharing water conservation programs. A total of 39,810 hundred cubic feet (CCF) of water and over 11,663 therms of gas were saved over fiscal year 2007-08.

**CLIMATE PROTECTION PLAN**

Council adopted a Climate Protection Plan in December 2007 which included the following reduction targets for carbon dioxide and other warming emissions (N2O), all compared to the 2005 baseline emissions levels:

- 5% of City operations-generated emissions by December 2009
- 5% of City and community-wide emissions by December 2012
- 15% of City and community-wide emissions by December 2020

Council also directed staff to complete a cost-benefit analysis of the Plan, which was delivered in July 2008. This analysis ranked the possible ways to reduce the emission of CO2 in the cost order. Following presentation to Council, staff brought that information to departments for incorporation into their emissions reduction plans.

- **City Operations CO₂ Reduction** - Staff launched an inter-departmental Climate Protection Team (CPT), comprising one representative from each department. Each department was given a carbon budget, which they needed to “live within” for the coming year, just as they would live within their fiscal budgets. Each department, through its representative to the CPT, was charged with developing a plan for meeting its carbon budget for the coming year. That plan was then reviewed by the members of the CPT, the plans then revised. These plans will be completed in the next month, signed off by each department head, and presented to Council in early April. The Team will continue to meet each quarter to review and measure progress on the plans’ implementation.
• **Community CO₂ Reduction** - The City initiated the creation of a committee of citizens and City staff, called the Community Environmental Action Partnership (CEAP). The CEAP includes representatives of all the segments of the Palo Alto community: schools, businesses, nonprofits, neighborhood groups, government, Stanford, and the faith community. Each segment is responsible for creating and implementing its own actions, and the CEAP meets monthly to coordinate the segments’ work and to discuss issues that come up. CEAP will present a report on its progress to Council and the Palo Alto community in April 2009.

“GREENING” THE ORGANIZATION:

Staff participants in the CEAP decided to create a Green Team among City staff, as an important way to move initiatives forward among City staff. The initial meeting was held in October 2008, with well over fifty (50) people in attendance. The Green Team is voluntary, with projects selected by its members. At the next meeting, members will begin organizing a six-month campaign introducing specific month-long challenges, including Waste, Energy, Water, and Transportation. Participation in these challenges will be open to all City employees. At the end of each monthly challenge, the Team will gather data on how many people participated and what steps they took to get a rough idea of how successful the challenge was.

COLLABORATION WITH BUSINESS COMMUNITY:

It is essential to find existing, respected leaders within a community to champion the ideals of a New American Dream, since people are most likely to listen to leaders they already know and respect. Jim Baer, a successful Palo Alto developer, recently introduced Wave 1, a plan with the ambitious goal of working with at least 100 local businesses to:

• Achieve certification by the Bay Area Green Business Program by March 31, 2009
• Reduce their power usage by 20 percent
• Switch to PaloAltoGreen, the city utility’s renewable power program

Baer’s program meets a critical need of tenant-occupied buildings that may not have the owners’ buy-in to help green their operation. Because Wave 1 is designed by and for developers/property managers, this program reaches an audience that the government-run Green Business Program would have difficulty accessing.

Already Baer’s Wave One plan has had a positive response. Over fifty businesses have signed on and are working towards their green certifications, and numerous others are signing up with Palo Alto Green.

Baer is seeking non-profit status for this project and has hired four part-time staff. 
Baer quote: “We’re just the first wave of a thousand waves. We have to have the business community organize itself to make this happen.”

**GREEN PROCUREMENT:**
Council approved an Environmentally Preferred Purchasing (Green Procurement) Policy in December 2007. Since then, the City has:

• Begun “greening” its key contracts as they come up for renewal, including Office Supply, Custodial Products, and Copier contracts, all of which will be renewed in 2009
• Initiated a print-on-both-sides project to reduce the use of paper
• Participated in statewide Extended Producer Responsibility coalitions to encourage manufacturers to take responsibility for the waste generated by their products’ packaging
• Begun training staff in Life Cycle costing analysis – which takes into account energy and water costs in calculating the relative costs of different products
GREEN BUILDING:

Council approved a new Green Building Ordinance in June 2008, requiring all non-residential construction greater than 500 square feet and some renovation projects to meet established minimum levels of compliance with the U.S. Green Building Council (USGBC) LEED rating system. It also required all residential new construction greater than 1,250 square feet and renovations greater than a $75,000 valuation to meet established minimum levels of compliance with the Build It Green (BIG) Green Point Rated rating system.

In December 2008, Council approved an energy efficiency ordinance would require new residential and non-residential construction projects to meet energy efficiency standards that are roughly 15% greater than minimum standards in current Title 24 Energy Code requirements.

In turn, the City:

- Hired a new staff member to implement the new City Green Building Program. The new staff member is a LEED Accredited Professional with experience in green building policy, standard development, education and project review.
- Maintains an interdepartmental Green Building Working Group responsible for developing and implementing the Green Building Ordinance
- Developed a City Green Building Guide for the community to understand the scope and benefits of green building, Palo Alto’s requirements, the review and approval process, and useful resources
- Began to assess complementary programs in other departments, particularly rebates and incentives, and how they can work together; gaining a better understanding of how the green building program will assist with other department goals
- Trained staff members, the community, and design and construction professionals on the City’s green building requirements and review process
Established program performance indicators and a tracking system to capture the number of applications received for green building, point levels obtained, energy performance, water savings, and resource savings