



SUSTAINABILITY

FEBRUARY 7, 2009



SECTION NO. 1

**Describe what
your department
currently does
that it considers a
sustainable
activity, process,
or project.**

Purchasing/Finance:

- In accordance with the City's recycle & environmentally preferred products policy – stock paper in warehouse with minimum of 30% post consumer recycled content, we are currently stocking some papers with 35% recycled content thereby exceeding the policy. Where possible, have switched certain products in warehouse to more environmentally friendly products, such as Graffiti remover from petroleum based product to environmentally friendly soy based product.
- When possible, all documents are printed two sided. Only print documents on an as needed basis, leaving in electronic format if possible.
- Assist departments in locating products that are more environmentally friendly, such as the recent purchase of recycling barrels in Solid Waste, using the RFP process located a vendor that could provide recycling barrels using recycled material in the construction of the barrels themselves.

City Clerk:

- Reduce Paper Waste:
 - ✓ Posting agenda to website.
 - ✓ Encourage receipt of agenda through website access or email receipt.
 - ✓ Recycle paper – copies of agenda reports, daily printouts no longer needed, junk mail.
 - ✓ Run two sided copies of lengthy staff reports.
- Reduce Carbon Emissions – Plan outing when running errands.
Example: purchase snacks and dinners, supplies in one trip.
- Reduce Energy
 - ✓ Turn office lights off in the evening.

Engineering:

- The Engineering department operates one Compressed Natural Gas (CNG) truck and one CNG car. Operation of these vehicles substantially reduces the emissions that would occur with a normal gasoline engine.

- Ink jet cartridges for small printers are currently recycled.
- Major portions of paper waste are currently recycled through collection in one large bin. Cans and bottles are also recycled.
- An accepted mitigation measure for the Commons at Madera Fair is to provide traffic signal coordination between Schnoor Avenue and Country Club Drive of Cleveland Avenue. This will be online by the first week or two of January and will represent the first coordinated street in the City of Madera. If it functions as planned, traffic should experience fewer stops and delays. This measure would also be helpful on other road segments such as Gateway between 4th and SR99 as well as Howard Road between Schnoor and Yosemite at such time as funds can be identified.

Fleet:

- The Fleet Services preventive maintenance program which currently schedules vehicles in at 3000 miles or every 4 months which ever comes first. This insures the best performance from our vehicles to keep greenhouse gas emission to a minimum.
- As per Resolution # 03-55 declaring the City of Madera's desire to integrate zero emission and low emission vehicles into the City fleet we have added or replaced 65 alternative or low emission vehicles since this resolution was adopted in March of 2003.
- The Fleet Department currently works with all departments in purchasing new and replacement alternative fuel vehicles when feasible. This also takes in consideration the CARB rules and mandates.
- The recycling of waste oil, anti freeze, and all other recyclable products.
- Ongoing technical training for staff on (CNG) alternative fuel vehicles.

Grants:

- The OOR program currently works with RDA to identify PG&E funded projects to assist low income homeowners retrofit their homes with energy efficient materials and appliances. These projects include the installation of dual pane windows, insulation, weather stripping, and Energy Star appliances. Under this program, we should also be able to install water saving fixtures or flow restrictors for kitchens, bathroom sinks, showers, and bathtubs.
- The Transit program utilizes a transit fleet replacement and expansion plan consistent with CARB rules. The program is in the process of phasing out all diesel vehicles in favor of CNG and gas vehicles.

- HUD regulations encourage the use of renewable energy sources and other “green” construction and rehab techniques in CDBG funded projects.
- Efforts were conducted to incorporate energy efficiency for the Centennial Park Pool Rehabilitation Project. PG&E provided a grant of approximately \$9,000 for energy efficient pool equipment.
- Staff worked with HUD and ICF International to draft a resource document for energy efficiency measures for residential projects.

Parks:

- Parks and Golf Course Crews are trained and encouraged to assess, maintain and repair plumbing fixtures, pipes and irrigation systems in a timely manner to minimize water usage.
- The Parks and Golf Course Divisions have established an organic material recovery program for green waste from agency parks and facility landscaping. Additionally, recycled materials are mulched and/or composted and used in agency landscaping.
- City Crews participate in “grasscycling” by leaving clippings on the lawn after mowing. The results are: reduction in landfill waste, reduction in transportation of waste costs, reduction of fertilizer costs as clippings act as nourishment, reduction of man-hours (fertilizing time, transportation etc) reduction in water use and water run-off.
- Turf selection made with water conservation in mind. This practice will continue and increase as new parks (Sunset for example) come on line.
- The Vern McCullough Fresno River Trail, complete with newly constructed under crossings, offers the community an alternative to vehicular travel, reducing the communities’ vehicle miles traveled (VMT).
- The PCS Parks Division’s truck fleet uses Compressed Natural Gas (CNG). Additionally, the PCS vehicles used by Recreation and Community Services staff are fueled with CNG.
- PCS started an extensive office recycling program for cans, bottles, and paper products in early 2008.
- PCS Mascot, *Terry the Talking Tree*, is used to teach and reinforce environmental stewardship principles to Madera’s youth.
- The PCS Team manages parks, open space, recreational facilities and other natural areas owned or operated by the agency to ensure the long-term health and viability of the urban landscape.

- Many tree grants have been sought in the last several years, with many being awarded. PCS was awarded a grant for 500 trees last year, but the State of California de-funded the program in the 11th hour. An additional grant has been submitted and staff is awaiting award notification. If successful, 502 will be added to Madera's urban forest in 2009.
- Smart Clocks are being installed and PCS is moving to a central irrigation control system. While the project will not be fully operational until next year, much progress has been made. PCS will expand the program as new parks and facilities come on line.

Planning:

- The City requires that best practices are followed to reduce PM10 emissions and storm drainage contamination during construction.
- The City continually encourages:
 - ✓ denser residential developments
 - ✓ development features that enhance walkability
 - ✓ enhanced transit facilities

Public Works:

- Most buildings have been audited and upgraded over the past 12 years. We regularly work with PG&E to identify projects that can utilize PG&E funds to retrofit buildings. Energy efficient light bulbs and automatic on-off switches have been installed in past years. All remaining buildings will be audited this fiscal year.
- Facility maintenance regularly recycles lumber, light fixtures, doors, and hardware for future projects.
- Public Works regularly has replaced incandescent traffic and crosswalk lights with energy efficient light emitting diodes (LED's). This department regularly budgets \$10,000 / year for this purpose. All the green and red lights have been previously replaced, along with 30% of the yellows. In addition, incandescent street lights and mercury vapor lights throughout town have been replaced with high pressure sodium lights, thereby saving electricity.
- All water well pumps have been audited for energy efficiency. As pumps are replaced, new highly efficient motors are utilized. Staff works with PG&E, as part of the SMART program, to identify funding for premium efficient motors.
- Water conservation measures are in place to control the excessive use for water. Water use regulations are enforced from April to October.

- E-waste programs are in place for recycling electronic waste. The City worked with Madera County to develop a receiving facility at the County landfill for electronic waste. A household hazardous waste collection center is also available at the County landfill. This facility will accept batteries, paint, florescent light tubing, etc.
- Regulatory and street signs are recycled, reconditioned and reused.
- All metal scrap is recycled.
- “Blue can” residential recycling has been implemented.
- “Blue can” commercial recycling has been implemented in the Public Works and Engineering departments.
- Green waste programs have been implemented.
- Oil recycling programs have been implemented.
- Christmas trees are recycled annually in December.
- White goods (refrigerators / stoves) are recycled during the annual curbside cleanup program.
- Wood debris is regularly sorted and recycled during the annual curbside cleanup event.
- Construction and Demolition debris programs have been implemented, requiring a 50% diversion of construction waste.
- A voluntary commercial “blue can” recycling program has been implemented in December.
- Left over rock from the chip seal program and AC grindings from the AC patch program are crushed / recycled and used to repair alleys.
- Waste sand from the road reclaimed program is used in the alleys.
- Tree trimmings that are run through the chipper are used as mulch on the trails.
- During the annual leaf pickup program, leaves are mulched at the airport.

- WWTP solids from the digester are regularly composted and recycled. All water from the WWTP is percolated in the ground for recharge.

Police Department:

- The Madera Police Department operates one Compressed Natural Gas (CNG) automobile for non emergency use.
- Ink jet cartridges for small printers are currently recycled.
- Major portions of paper waste are currently recycled after shredding which is accomplished by a private service provider.
- The Madera Police Department relocated to its current facility in February 2007 – the facility being of new construction is equipped with energy saving appliances, light fixtures equipped with automatic “on/off” motion switches.
- “Blue” receptacles are on site for the purpose of collecting recyclables.

SECTION NO. 2

Explain what your department plans to initiate as a sustainable activity, process, or project from now until June 30, 2009 using existing budget dollars.

Purchasing/Finance:

- With the expiration of the existing copier leases, we will be looking at new systems that may afford the opportunity for electronic document processing. We could realize a considerable savings in the process of documents such as council reports that are currently printed and circulated in hard copy and then printed again for the agenda packets. Will be working with Finance on document management possibilities.
- On a case by case basis, identify products currently stocked in the Warehouse that could be effectively switched for environmentally preferable products. Encourage vendors to use more environmentally friendly packaging for products.
- Develop and include environmentally preferable products verbiage for all RFP's.
- Introduce the Cal-Card program as another method of document reduction by reducing the number of individual open accounts and thereby reducing the number of checks being produced in Finance.
- Introduce to Council a new purchasing policy which will be used along with a procedures manual that will further strengthen the City's Recycle and Environmentally Preferred Products Policy. This tool will enable us to better inform the City employees on how to make sustainable choices and provide easy access to the information they need to make good decisions.
- The utility billing office takes and generates a tremendous amount of paperwork for utility account applications and account maintenance. We will be reviewing various scanning operations and using our I/T staff to write an open source software program to archive the scanned images. This will reduce the amount of paperwork in the utility billing office and future use is to expand into the entire finance department for accounts payable and other uses. The result will be in time an entire room of filing cabinets will be able to be removed and put to use for office space. The budget being used will be pulled from a computer replacement account. We are staging the replacement of computers within the department to free up additional dollars for a high speed high volume scanner/copier.

City Clerk:

- Reduce Paper Waste:
 - ✓ Copy all council reports and copy requests two sided when feasible.

- Recycle Misc. Items:
 - ✓ Use indoor blue containers for recycling bottled water containers, soda cans, misc plastic containers. (Contingent on Solid Waste providing containers)

Engineering:

- Effective immediately, all printing is expected to be done using the two sided setting as an effort to reduce paper waste. All staff has been asked to set default on printer to double. This has been a policy but not strictly enforced until now.
- Recycling of toner cartridges.
- Provide blue containers at or near all desks in an effort to further reduce paper waste. When contacted by Engineering, the Solid Waste Division indicated a plan was already in place to order at no cost to the department
- Install Electronic (Timer) Thermostat in Engineering Trailer to reduce electrical consumption. Staff has already been directed to turn thermostats up or down at the close of business every day but this is not remembered as consistently as would be desired. Therefore, timed thermostats would likely be an effective measure Payback on thermostat would likely occur within several months.
- Prepare revised standards to incorporate Pedestrian/Bicycle Accommodations into Arterial and Collector Standards in an effort to increase non-motorized modes of travel for consideration by City Council. (Opposition to this could be likely from the development community due to increased right-of-way and construction requirements.)
- Incorporate bus turnouts into Arterial and Collector Standards in support of a much greater effort to reduce single occupant vehicles.
- Encourage the use of all feasible water efficiency strategies in all municipal projects and new developments.

Fleet:

- The Fleet Department will continue to work with all departments on the purchasing of alternative fuel vehicles with more emphases on low carbon fuel and hybrid vehicles in addition to our CNG vehicles.

- To implement a plan to meet required retrofit emission control devices or replacement of vehicles to meet the 2009 CARB public fleet rule requirements.
- The addition of 2 CNG transit buses, 2 low emission gas buses and the retiring of 2 diesel transit buses to meet Transit CARB rules.
- The Transit Program will retire diesel vehicles from service by the end of FY 08/09.
- Staff will continue to receive updated technical training on (CNG) alternative fueled vehicles.

Grants:

- The OOR program will continue to work with the RDA to identify other sources of funding in addition to PG&E in order to sustain the energy efficiency plan for low income homeowners.
- The City's Solar Committee will be putting out a Solar RFP by the end of January or early February, 2009 for solar applications on four City sites. The Grants Department will participate on the bid review committee to come up with recommendations to the City Council on which vendor(s) to carry out these projects.
- The Transit Program will order 2 additional CNG vehicles for fixed route service in the coming year.
- The Transit Program will implement a Fixed Route Express service to the College and major Employers in order to encourage the use of mass transportation.
- The Transit Program will remove diesel vehicles from service by the end of FY 08/09.
- Staff will pursue incorporating sustainable features in the pending CDBG projects at Sunrise Rotary Sports Complex Soccer Field and Parking Lots 2 and 3.

Parks:

- Amend City Standards to mandate water efficient landscaping and/or drought tolerant planting specifications for all new development. (For this

action to be successful, PCS will need support from other departments & Council)

- PCS and the Grants Department are preparing to submit a grant to the San Joaquin Valley Air Pollution Control District to help pay for on-line reservation and registration software. The ability to register at home results in fewer VMT in the City of Madera.
- Reduce VMT in 2009 through more efficient scheduling and routes.
- Offer an incentive program for the City staff to identify the most viable, cost-effective VMT strategy. Announce winner/s at the annual employee luncheon.
- Incentivize ride-sharing and carpooling to reduce VMT.
- Inventory products and equipment used by PCS and identify which products could be changed to reduce our carbon footprint. For example, Simple Green ® is a cleaning product whose environmental impact is proven to be far less than cleaning products currently used.
- Establish a blue bin recycling program in City Parks. (For this action to be successful, PCS will need support & cooperation from Public Works.)
- Create a turf aeration schedule for City parks. This practice exists at the Golf Course and will be increased at municipal parks to decrease run-off and expose the root zone to more water which will result in significant water savings.
- Establish and monitor interior temperature standards for the purpose of reducing power.
- Increase covered trash receptacles (outdoors) in parks and municipal settings to reduce pollution of ground water. (Action not entirely Parks specific.)
- Mandate city staff follow existing printing guidelines and use two-sided printing tactics to reduce paper use. (Action not Parks specific.)
- Reduce the number of desktop printers and utilize centrally located networked laser printers to reduce the number of ink-jet cartridges used. Also, recycle toner cartridges where laser is unavailable. (Action not Parks specific.)
- Consider Local preference for municipal construction for building materials manufactured locally (or relatively locally) to reduce the environmental impacts resulting from their transportation. (Action not Parks specific.)
- PCS has increased Environmental Education Programs scheduled for 2009. Programs include specialized day camps (nature camp & canoe

camp), excursions to the San Joaquin River (youth, teens and seniors), and education programs for seniors. The latter grouping of programs will educate seniors in energy efficiency tips, water conservation tips, and will offer suggestions for financial relief for participating in such programs. Additionally, PCS plans to increase programs at the Community Garden and will introduce youth center participants to gardening.

- Equipment and appliances purchased will be done so with sustainability in mind. PCS has started this practice and will continue to do so with the John W. Wells Youth Center and renovation projects such as Bergon Center and Sunrise Rotary, and all else we do.
- A new irrigation booster pump will be installed during the Sunrise Rotary Sports Complex renovation which will ensure more efficient watering resulting in water savings.
- PCS will install new bicycle racks at Parks and City facilities to encourage VMT reduction. This is scheduled in the CIP for FY 2010.
- Encourage the use of all feasible water efficiency strategies in all municipal projects and new developments.
- PCS will investigate the installation of motion detecting lighting controllers in new projects.
- The City of Madera should consider integrated pest management policy that utilizes environmentally friendly approaches to pest management by reducing and/or eliminating the amount and toxicity of chemical treatments.

Planning:

- The City's update of the General Plan will call for:
 - ✓ measuring and development of mitigations of the City's green house gas emissions.
 - ✓ requiring additional shading in parking areas.
 - ✓ new planned neighborhoods to have more compact densities and closer proximity to neighborhood and village features to increase walking and reduce vehicle trips.
 - ✓ new development to install water mains for recycled water where feasible.
- The City is working with a power supply developer to develop a water stripping plant that removes water from the City's sewer waste stream, and treats it to a tertiary level for reuse as recycled water.

- The City is seeking a sustainable water supply for the City's future by soliciting a water attorney to assist with planning and securing future water rights to meet our growth needs.

Public Works:

- A program to install water meters will be conducted this year. This program will cut down on water use by 20% throughout town.
- Public Works will benchmark existing building energy use and identify the energy cost per building.
- Recycling of asphalt rubber will be implemented this spring in the annual chip seal program.
- "Blue can" recycling will be implemented at all City owned buildings this year.

Police Department

- Effectively immediately, when appropriate, all printing is expected to be done using the duplex method (two sided coping) to reduce paper waste.
- Recycling of toner cartridges.
- Encourage all personnel to conserve energy by turning off lights and other electronic devices when not in use.
- Encourage two person mobile deployments when appropriate in an effort to conserve fuel and reduce green house emissions.
- Research the feasibility of conversion to solar power – study is in progress.

SECTION NO. 3

**Describe what
your department
could achieve with
additional staff or
funds to realize a
stellar, signature,
or “silver bullet”
sustainable
project.**

Purchasing/Finance:

- Create an interdepartmental “Green Team” to look at not only green purchasing but potential energy savings, duplication of effort, efficient documents processing, vehicle usage and others. Using the team to identify departments that are making exceptional efforts for the environment and providing a vehicle for recognizing those efforts. Use the team to create friendly competition for ideas and activities to help the City meet and exceed its sustainability goals.
- Develop residential and business outreach programs to educate and assist residents with more environmentally friendly products and procurement opportunities.
- Work to develop a City wide “Lead by Example” program where City employees and Departments are expected to set the standard for sustainable activities including promotion of sustainable activities such as carpooling, bicycle commute credits, promotion of City employees using public transit, recycling both at home and in the office.
- Work with Grants, Transit and Fleet to improve existing fleet and plan for the future to meet or preferably exceed 2010 fleet standards for greenhouse gas emissions by expanding our knowledge about alternative fuel vehicle options.
- Institute a centralized printing/reproduction program where in house reproduction of documents, forms, brochures, etc. will result in an economy of scale, reduction of energy costs by reducing the number of large volume printers and copiers and provide better control related to usage of sustainable environmentally friendly products and supplies.

Engineering:

- Implementation of a city wide bike friendly circulation system that provides formalized bike lanes or trails along or near all major thoroughfares would, in one more way over other measures, show the City of Madera’s commitment to the environment.
- Consider the use, on a citywide basis, of measures to reduce commuting fuel usage. Such measures could include flexible work schedules (9/80 work schedule), car pooling or similar policies.

Fleet:

- To meet CARB Public Fleet Rule requirements for diesel on road vehicles by December of 2009 which would bring us in to compliance 2 years ahead of schedule.
- Replace all light equipment vehicles with hybrid vehicles, and if not practical for hybrid application, require a minimum of 30 miles per gallon fuel efficiency.
- To provide advance training for staff to prepare them for the addition of hybrid vehicles and anticipate all potential benefits to the fleet.
- Investigate potential for recognition for the City, various departments and individuals for their contributions toward attaining various goals relating to the greening of the fleet.

Grants:

- The City of Madera could apply to become one of the next groups of U. S. cities to be designated as a "Solar America Cities" by the U.S. Department of Energy for Spring of 2009. This honor would come well before the end of Mayor Armentrout's term as Mayor (December 31, 2009).
- The city could adopt a residential solar program similar to the cities of Palm Desert and Berkeley. Adoption of this program would support our application to receive designation as a "Solar America City".
- The Transit program could coordinate our services with other area transit programs to provide a regional system of mass transit.

Parks:

- PCS would be pleased to implement and administer a community-wide urban forestry management and reforestation program to significantly increase the carbon storage potential of trees and other vegetation in the community.
Estimated Costs: \$175,000 – \$225,000 per year
- The City of Madera should develop and implement shading requirements for agency and community parking lots, buildings and other facilities to reduce urban heat island effect.
No significant cost associated with the creation of the standard other than political capital.

- PCS could upgrade and retrofit Municipal Park and Golf Course plumbing and irrigation systems with state-of-the-art water conservation technology.
Estimated Costs: \$4,000,000 – \$6,000,000
- At the point when water meters are installed, the City of Madera should incentivize home-owners to replace turf and other high water plant material to xeri-scape and water efficient landscaping. Also, incentives should be offered to home-owners who switch to low flow irrigation systems.
- The City team could implement a city wide bike friendly circulation system that provides formalized bike lanes or trails along or near all major thoroughfares would, in one more way over other measures, show the City of Madera's commitment to the environment.
- PCS will replace sports field lighting with energy efficient alternatives. This project is budgeted in the CIP for 2012. PCS is also working with PG&E to identify demonstration project opportunities for our community.
Estimated Costs: \$450,000
- Municipal leadership should consider the use of actions to reduce fuel and electricity usage. Such measures could include flexible work schedules (4-10s or a 9/80 work schedule) and incentivized car-pooling (also listed above).
- Use recycled water for agency facilities and operations, including parks and medians. Public Works Director to provide estimate.

Planning:

It is proposed that the City in partnership with a number of community members convert non essential alleys to pedestrian paseos.

Currently, the City has many alleys in the older part of town, which are unpaved. These alleys are of concern as they have the potential to generate dust from vehicular traffic and tend to attract refuse and undesirable activity. The Air Board has mandated that they be paved. There are not sufficient funds to do so. While it would be preferable to eliminate the alleys, it poses a problem in that there are utilities in the alleys both above and below ground. As an alternative to paving some of these alleys, it is proposed that we identify those alleys where access to the alley is not essential for parking, and that we instead redevelop these alleys as pedestrian paseos.

As a first demonstration project, the short alley between “D” Street and Sierra Street, south of Green Street be could be converted in conjunction with the currently proposed expansion of the contiguous commercial center.

- Access to the paseo would be restricted and limited by bollards at the ends.
- Rear fences of adjacent properties would be replaced with new composite fencing materials.
- A pedestrian and bicycle path (& emergency path) would be placed down the center.
- The path would be constructed of a green material such as recycled tire pavement or pervious concrete.
- Low water consuming and low maintenance trees and ground cover would be planted along the sides.
- The existing overhead utilities could be undergrounded in conjunction with the undergrounding of the commercial center expansion.
- Trash service, via rolling cans, would be moved from the alley to the street frontages.
- Solar powered path lighting could be installed.

The project would be a collaboration of the Community and private partners. The City would ask the Air Board to allow the improvements to be funded/installed by local builders as offsets to paying individual source reduction mitigation fees. Ideally, the fencing for the initial project would be a new composite/recycled material donated by a fencing materials manufacturer. The Redevelopment Agency may play a role in financing design and other essential project costs. The Neighborhood Preservation group could also survey the residences and see what revitalization efforts/funding might be available.

The City could increase the information provided to the public about greener buildings and incentive projects that endeavor to meet standards such LEED or provide sustainable features such as solar.

There is an exhaustive amount of information that can be provided to the public about greener development practices. The City could develop a program that clearly identifies the City's desire for development to be green and provides incentives to encourage projects that have voluntary green or sustainable features.

The City could develop detailed landscaping requirements that have increased shading requirements to address heat island issues and passive solar concerns.

In conjunction with the revision of the Zoning Ordinance, the City could choose to adopt progressive shading requirements and develop informational material to educate applicants about the need, benefits, and the City's requirements for shading.

The City could develop detailed landscaping requirements that incentivize or require efficient irrigation systems, and water efficient landscape materials.

In conjunction with the revision of the Zoning Ordinance, the City could choose to adopt progressive landscaping and irrigation requirements and develop informational material to educate applicants about the need, benefits, and the City's requirements.

The City could incentivize the use of recycled materials and green technologies in new developments.

In conjunction with the revision of the Zoning Ordinance, the City could choose to adopt policies and procedures to provide incentives for the use of recycled materials and green technologies.

Public Works:

- The City of Madera could install a methane recovery system and generator unit at the WWTP to generate power. The cost estimate for this work was estimated at \$750,000 during the WWTP expansion. The amount of power savings will depend on the size of unit installed, the amount of gas available and is currently unknown.
- The City could install a tertiary water treatment system at the WWTP and pipe the water back to the City for use in parks and for landscape irrigation. We would be one of the first to recycle water in the central valley. Exact costs to install will depend on the siting of the facility, whether located at the WWTP or a satellite plant along Avenue 13 & SR 99. A cost estimate is not available, but would likely be substantially beyond resources available in the current and projected budgets. A funding source, or substantial adjustments to existing allocations, would be necessary to implement this action.
- The City could retrofit all City buildings with water conservation faucets and toilets. A cost estimate is not available, but would likely be substantially beyond resources available in the current and projected budgets. A funding source, or substantial adjustments to existing allocations, would be necessary to implement this action.
- The City could work with Madera County to implement a waste composting program for household garbage and include with the green waste program. Citizens could receive a voucher in their utility bill yearly for a free load of compost. A cost estimate is not available, but would likely be substantially beyond resources available in the current and projected

budgets. A funding source, or substantial adjustments to existing allocations, would be necessary to implement this action.

- The City could implement a reconstruction program to recycle construction materials. A cost estimate is currently not available, however, this action would have significant effects on the local building community and limited effects on City programs.
- The City could implement a mandatory commercial recycling program, thereby reducing the impact to the landfill. A cost estimate is currently not available, however, this action would have some effects on the local commercial and retail community and limited effects on current City programs.
- The City could implement an Intelligent Transportation System and synchronize all traffic signals in town, thereby reducing traffic delays and minimizing greenhouse gas emissions. Staff estimates the cost to provide a full blown timed based coordination system (radio read only) is \$300,000. Currently, only 20% of the traffic signals need to be coordinated. The remaining signals are basically stand alone units and do not impact the timing of other signals.

Police Department:

- Research and implement, if feasible, the conversion to alternative fuel vehicles or hybrids.
- Investigate alternatives to better insulate the building to conserve energy for heating and air conditioning systems.
- Investigate alternatives to the current shredding of paper documents, IE purchase the necessary equipment versus contract service currently in place.
- Expand where possible the move to paperless data collection.