



REPORT TO MAYOR AND CITY COUNCIL

AGENDA ITEM

TO: THE HONORABLE MAYOR
AND CITY COUNCIL

DATE: March 4, 2008

SUBJECT: Mobile Crane Purchase Authorization

Report in Brief

During the expansion of the Water Pollution Control Facility (WPCF), it was determined that the current crane truck (#660) being used at the plant was inadequate for the heavier lift requirements of the facility and that this vehicle needed to be replaced (see attached BP-8 for \$120,000). At the same time, needs for a large lift gantry crane (Capital Project 07-35 totaling \$115,000 including fence around the sewer lift station) and a new Water Meter Tech truck (with moderate lift crane capabilities) were identified.

By reassigning #660 to the Water Meter Tech and combining the funds budgeted in three programs, the City can purchase a new heavy lift truck crane and save the City an estimated \$49,000/year in recurring rental costs and resulting in a payback for the mobile crane in less than three years. The mobile crane will meet all the other heavy lift needs of the organization short of major jobs that will still require a full size crane (i.e. HVAC unit placement on roof tops, roof removal on lift station, etc). For these unique situations the equipment needed will still be rented as it is now.

Staff recommends the City Council authorize the purchase of a new 5-ton crane truck as proposed herein for a cost not to exceed \$136,167 for use at both the Spring Lake Sewer Lift Station and the WPCF.

Background

Environmental Operations used a 2005 Chevrolet boom truck (#660) for lifting heavy motors, shafts, etc. This vehicle is outfitted with a bed mounted crane, with a lifting capacity of 1.5 tons, which is undersized for removing motors and pumps at the newly upgraded waste water treatment plant. Current needs at the Facility and the Spring Lake Lift Station require a 5-ton crane with a 25' boom to reach and lift the equipment and materials used at those locations. In addition, several other sites throughout the City also require the heavy lift capability and extra reach of the new crane. In order to maximize the effectiveness of the fleet, avoid duplication of equipment that would be underutilized if more than one were purchased, and minimize additional costs, O&M determined that the original medium crane truck (#660) should be reassigned to the Water Meter Tech, obviating the need to

purchase a new vehicle for that position. In addition, a new 5 ton crane truck could be purchased to meet the needs of the WPCF, including the lift requirements at the Sewer Lift Station in Spring Lake, that were to be met by a new stationary gantry crane. This can be accomplished using a mixture of fund sources and will achieve a higher economical utilization, with several work responsibilities and assignments combined into the proposed new 5 ton crane truck.

Discussion

Three different fund sources were identified, combined, and planned for in the replacement of the vehicle.

#1 – The 07/08 budget included a new Water Meter Tech Position in Operations and Maintenance Division of Public Works (O&M). In addition, a new medium sized crane truck was also authorized. \$34,364 was included in the 07/08 O&M budget (Water Enterprise Fund) for this purpose. As the specifications were being developed for the new vehicle, it was recognized that the crane truck being replaced (#660) had remaining service life and matched the needs for the Water Meter Tech's truck. It was decided to transfer the vehicle, which is in excellent condition, to the Water Distribution Branch for the Meter Tech's use and leave the remaining funding available to upgrade as necessary for a new, larger, crane truck at the Water Pollution Control Facility. After utilizing \$6,047 to prepare #660 for field use on City streets, the remaining amount of \$28,317 is available for the new crane truck.

#2 – The new pump station in Spring Lake also has heavy lift requirements that were not addressed in the initial project design/construction. In order to meet this need, a stationary gantry crane was programmed in the attached CIP project 07-35 for 2007/8 (\$115k). By utilizing other funds as indicated herein and shared use of the vehicle, all maintenance lift needs can be met with only \$65,000 from Spring Lake SLIF fees, instead of approximately \$85k out of 07-35 (balance is for the fencing which is also included in 07-35). If the funds are applied to the purchase of the new crane truck, the needs of the station will be met on a 24/7 on-call basis and the crane will have a greater utilization than the stationary gantry that was originally planned.

#3 – During the planning for the new heavy lift crane for the WPCF, the additional necessary funds was programmed in the Sewage Treatment Plant O&M budget. By using combined funding sources, only \$42,850 from the sewer fund is needed to purchase the vehicle. This amount was included and approved as part of the 07/08 budget.

Purchasing the new heavy lift crane will allow the vehicle to be used in many different applications throughout the City, increase the vehicle's utilization, and creatively fund a piece of equipment with minimal impact on the current budget.

Rent vs. Purchase - Rental of a 5 ton crane truck when needed for heavy lifting jobs was evaluated and rejected based on the January 19, 2008 memo from Chief Plant Operator, Mark Hierholzer. In addition to saving money by purchasing rather than renting, a lack of readily available, properly sized cranes, with drivers that are trained to work in and around hazardous substances, would cause continuous delays in work schedules. This is not to say that the cranes and drivers are not out there,

it's just that finding the right one and getting it here on short notice is not only time consuming, but expensive. Staff would have to do this on a weekly, and sometimes daily, basis. Even if the City provided for all of the heavy lift capabilities through rentals, we would still have to purchase an additional medium lift crane truck to provide our day-to-day needs.

Lease Purchase - While the City Policy is to lease purchase replacement vehicles over \$80k and 10 year life, additions to the fleet typically have had separate funding, as is the case here. The funding for this vehicle is currently planned for, approved by Council in both the 07/08 Operating budget and the 07/08 Capital budget, and available in the Water, Sewer, and Capital programs. There is no impact to the General Fund. A lease requires an ongoing finance charge that would be unnecessary in this case.

Savings Summary - The crane rental has been projected to cost approximately \$49,000/year, which could exceed the proposed crane cost (\$136K) within 3 years. By purchasing the vehicle now, the City will be saving \$49,000/year, starting three years after the purchase date. The City will also have the use of the vehicle for an additional 12 years, without the accompanying rental charges.

Fiscal Impact

The new crane truck cost is estimated at \$136,167. Funding for the new crane truck comes from the following:

\$28,317 - (Fund 210 – Water Enterprise Fund) available from the Meter Tech truck purchase.
(210-86-7852-5545)

\$65,000 - (Spring Lake Development) from the \$85K programmed in 07-35 for a gantry crane at the Spring Lake Lift Station. (The mobile heavy lift crane truck will be able to handle all of the gantry crane requirements) Note: ~\$30K of the original \$115K in 07-35 is for fencing which is still needed.

\$42,850 - (Fund 220 - Sewer Enterprise Fund) programmed in 7854-5262 for the new Heavy Lift Crane Truck.

\$136,167 required for the new Crane truck (No General Fund Impact)

If approved by the City Council, staff would prepare an appropriations transfer to move the capital budget funds and the water enterprise funds into the Wastewater Treatment Plant program (sewer enterprise) so that the truck can be purchased from a single funding source which is required for asset tracking and depreciation.

Significant savings will be realized through both reduced lifetime rental rates, time expended by staff, and efficient completion of tasks through use of an on-site vehicle.

The expected life of the proposed truck is approximately 15 years. At that time its replacement would be leased. Because this vehicle would be purchased with the expectation that its replacement would be leased, there would be no need to budget the amortized replacement costs.

Public Contact

Posting the City Council agenda.

Council Committee Recommendation

The issue was favorably reviewed by the City Council Infrastructure Committee.

Alternatives Available to Council:

1. Authorize the purchase of a new 5-ton crane truck as proposed herein for a cost not to exceed \$136,167 for use at both the Spring Lake Sewer Lift Station and the WPCF.
2. Direct staff to proceed with the single purpose gantry crane at the Spring Lake Sewer Lift Station (07-35), and budget an additional \$65K from the Treatment Plant Budget for the purchase of a 5 ton crane truck for the WPCF (to combine with the \$28,317 and \$42,850 programmed above).
3. Direct staff to make other arrangements for routine heavy lift requirements throughout the City (rental costs expected to exceed the proposed \$136k mobile crane purchase cost within 3 years).

Recommendation for Action

Staff recommends that the City Council approve Alternative No. 1.

Prepared by: Loida Osoteo,
Environmental Operations Manager

Reviewed by: Joan Drayton
Finance Director

Reviewed by: Dick Donnelly
Acting Public Works Director

Mark G. Deven
City Manager

Attachments PPSS 07-35 Spring Lake lift station gantry & fence
FY 07/08 BP 8 with backup

Project Programming Summary

1

Revision # 1 Date 2/20/2007

Project No.: 07-35 Revision #: 1 Project Title: Spring Lake lift station gantry & fence

PM: Baxter, Doug Owner: PW-Operations

Construction	\$75,000.00	Admin & PM	\$30,000.00
Other/Contingency	\$10,000.00		
Project Total:	\$115,000.00		

Project Description:

Currently as constructed, the turning radius for truck and other maintenance equipment does not have sufficient room to maneuver. The pumps in the wet well cannot be pulled for maintenance and repair. The gantry will provide support for other equipment in order to maintain and repair the pumps in the wet well. Also, the existing fence is low and does not prevent vandalism.

Project Justification:

SAFETY- THIS PROJECT IS TO ENSURE PROPER EQUIPMENT FUNCTIONING AND TO PREVENT OCCUPATIONAL HAZARDS FOR EMPLOYEES. THIS PROJECT IS SPECIFIC TO THE SEWER LIFT PUMP STATION IN SPRING LAKE AND IS CHARGED TO THE SPRING LAKE DEVELOPMENT.

Project Staging:

Fund No.	Program No.	MPFP No.	Total / Partial	Total Amt, \$K	Prior	06-07	Next	Future
220	0735	Wste-108	P	8.1	0.0	3.5	4.6	0.0
594	0735	Wste-101	P	107.0	0.0	46.5	60.5	0.0
Project Total:				115.0	0.0	50.0	65.0	0.0

Source of Funding:

% Springlake Infrastructure	93.00
% Sewer Improvement	7.00

Recommended for Submittal _____ **Date** _____

Recommended for Approval (Dept Head) _____ **Date** _____

MPFP Approval (Public Works) _____ **Date** _____

Finance Department Approval _____ **Date** _____

City Manager Approval _____ **Date** _____

APPROVED
by cc 2/20/07

MEMORANDUM

DATE: April 30, 2007
TO: Rick Kirkwood, City Manager
FROM: Gary Wegener, Director of Public Works
 Greg Meyer, Deputy Director of Public Works
VIA: Phil Marler, Assistant City Manager
SUBJECT: VEHICLES APPROVED FOR REPLACEMENT IN FY 08

The Vehicle Committee met on Wednesday, April 18, 2007 to review the list of vehicles submitted for replacement in FY 08. Attached is a list of vehicles that were either Approved or Denied by the Committee during this process. Please note that all departments came in under their proposed replacement total for FY 08 according to the 5-Year Plan. Please also note that the two vehicles with a "Pending" status will be dealt with separately.

If you concur with this list, please sign below and return to Gary. We will then submit signed copies of this memo with the list attached to all members of the Vehicle Committee to record what was approved or denied.

If you have any questions, please contact Gary or Greg.

Approved by City Manager _____ Date _____

Attachment

cc: All Vehicle Committee Members w/Attachment (after signed by City Manager)

**Requested by Department Via BP-8 For FY 08
Updated per 4/18/07 Vehicle Committee Meeting**

Approved or Denied by Vehicle Committee	Dept.	Vehicle #	Allowance #	Model Year	Repl. Year	Repl. Year Per 5-Yr Plan	Replacement Cost	Revised Total	Notes
Approved	Fire	500 01-014		1999	2008		\$27,012.00	\$27,012.00	
Approved	PD	568 01-203		2001	2008		\$33,000.00		
Approved	PD	575 01-017		2003	2008		\$44,120.00		
Approved	PD	576 01-026		2003	2008		\$42,550.00		
Denied	PD	609 01-037		2003	2008		\$44,650.00		Defer to FY 09 for review
Denied	PD	640 02-041		2003	2009		\$44,650.00		Defer to FY 09 for review
Approved	PD	582 01-207		2001	2011		\$37,871.00		
Approved	PD	546 01-054		2000	2009		\$27,250.00		
Denied	PRCS	047 04-060		4997	2008		\$26,624.00	\$184,431.00	Defer to FY 08 for review
Approved	PRCS	021 01-106		1996	2008		\$25,675.00		Defer to FY 08 for review
Denied	PRCS	544 04-067		4996	2008		\$24,000.00	\$25,675.00	Defer to FY 09 for review
Approved	PW	596 01-183		1995	2008		\$36,000.00		
Denied	PW	506 04-140		4986	2008		\$4,980.00		Defer to FY 09 for review
Approved	PW	600 01-118		2005	2015		\$21,000.00		Defer to FY 09 for review
Pending	PW	660 01-118		2005	2015		\$120,000.00	\$57,450.00	Will be reviewed separately - Not included in total - May switch to BP-9
REVISED TOTAL								\$284,572.00	Approved Total Only - Does not include Denied nor Pending
VEHICLES TO BE LEASED									
Pending	Fire	108 01-004		1999	2006		\$38,000.00		Still need approval from Vehicle Committee/Finance
Denied	Fire	328 04-141		4986	2008		\$157,367.50		Withdrawn by Dept. - Pending future review of funding capabilities
Denied	RAW	445 04-159		1999	2008		\$94,820.00		Withdrawn by Dept. - Pending future review of funding capabilities
Denied	RAW	246 04-158		1999	2008		\$134,687.50		Withdrawn by Dept. - Pending future review of funding capabilities
REVISED TOTAL								\$388,000.00	

City of Woodland
FY 2007/2008

Vehicle/Equipment Replacement Request

*Pending
Copy in 7854* BP 8

Department Public Works Division O&M-WPCF Program 7854
 Director Signature _____ Date 03/15/07

1. Vehicle to be replaced: **10,000# Crane mounted on a F750 Chassis with Auto Crane Titan Body with shelving**

Unit# 660 Make Chevrolet Model C3500
 Year 2005 Total Miles/Hours 6000

2. Is this request a duplicate or an upgrade of the current unit?
 Unit # 660 was not suited for the additional work required at the plant due to the vast expansion, the need for a much heavier duty crane is a must to meet health and safety regulations. Unit # 660 will be utilized in another department of Public Works.

3. Please list upgrade/special equipment items requested on this unit.
 10,000 # hyd. Crane, Hyd. Boom, Hyd., Swivel, Hyd. Outriggers, Utility Body w/ shelving, diesel eng.

4. Please provide any vendor contact information you may have regarding this item.
 American Truck and Equipment, Tracy, CA ph.# (209) 499-8985

5. On a separate sheet of paper, please provide a comprehensive justification for this request. Why should this unit be replaced? List any functional or safety issues concerning this unit. What are the consequences of not replacing this unit? Please be specific.

for Equipment Services use only
 Allowance # 01-118 Activity # 251 Life Term 20
 Age Miles Criteria For Replacement Recommendation
 Maintenance Cost Mechanic Recommendation
Estimated Cost of Replacement
 Base Unit Cost 120,000.00
 Special Equipment included
 Total Unit Cost \$120,000.00
*****VEHICLE WILL BE LEASED*****

***3/27/07 - Per Greg, Vehicle will be purchased, not leased. \$ from Capital (\$75K) & 7854 (\$45K)

CITY COUNCIL ACTION
 Approved Disapproved More Information required

New Unit # _____ for Equipment Services use only
 Disposition of replaced unit: Reuse Auction

Justification for Crane & Vehicle

The utility truck is needed at the Water Pollution Control Facility (WPCF) because of the expansion of WPCF. The utility truck that has been utilized for the past 10 years is insufficient to perform to the new maintenance requirements of the plant. Currently, the truck used to do the work of removing pumps and gear drives at the WPCF, Springlake and Gibson liftstations, is undersized and at risk of becoming damaged while removing heavy equipment for repairs. Further, this utility truck puts the operator at risk of injury, as the crane that is mounted on the truck does not stay securely locked down when working with heavy objects. On several occasions, it responded in unexpected ways while removing large heavy pieces of equipment. Sometimes, the boom will rotate sideways once the weight of the equipment is put on the crane and in other instances, the equipment is located at higher elevations, making it more difficult to control the reaction even with tethers tied up before the equipment is removed for repairs. The current requirements for the maintenance truck is much heavier and wider spread than that of the truck being replaced. (see spec's)

The specifications listed below will meet all of the maintenance and repair needs at the WPCF, Springlake lift station and Gibson lift station and also assist other public works shops when needed.

- To safely remove and replace pumps, motors and gear boxes on the plant and liftstation equipment, the new boom will need the following capabilities:
 - Ability to power boom out to 25 ft. and lift 2,400 lbs.
 - Have the capacity to lift 10,000 lbs at 6 ft.
 - Hydraulic winch with 60 ft. /min. single line speed.
 - 370 ° power rotation. .
- The truck should be heavy duty enough to support the loads the crane will be lifting. The loads will typically be around 3,000 lbs and this will include gear drives, motors and submersible pumps. A Ford F750 is the suggested truck for this operation.
- Standard Cab.
- The outriggers should be heavy duty and hydraulically powered to support the truck while it is lifting heavy loads
- The truck should also be equipped with a tow package and a hydraulic compressor.

The approximate cost of the vehicle is:
 Cost of unit \$ 120,000.00
 Specialized/Add-on Equipment Included
 Total Cost \$ 120,000.00