



CITY OF HOMER
PUBLIC WORKS
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MEMORANDUM *13-077*

TO: Walt Wrede, City Manager
FROM: Carey Meyer, Public Works Director
DATE: May 24, 2013
RE: **Conversion of City Facilities to Natural Gas
Recommendations for Funding Authorization**

Public Works is preparing to convert City facilities to natural gas over the next two years. Not all of our buildings will have access to natural gas this year. Service applications must be received by Enstar before July 1 if we want a guarantee of service installation this year. The costs associated with service line installations will increase next season. Public Works and the Administration are attempting to make service applications for all City facilities at one time this year.

Public Works has engaged a mechanical engineer to assist in estimating costs associated with natural gas conversions and is working with Enstar to determine service line alignments and meter locations at each facility. After inspecting all facilities, Public Works has estimated the rough order of magnitude cost to complete the work (including main line assessments, installation of service lines and meters, design and installation of heating system conversions, and abandonment of above and below ground heating fuel tanks). These costs (see attached) have been incorporated into the budget ordinance offered up for first reading. Before the second reading of the budget authorization ordinance, firm cost estimates are expected from the mechanical engineer.

Currently, the budget does not include converting the Harbormaster's Office (due to be replaced in the near future), but does include converting the two HERC buildings and the Fish Dock Ice House. An analysis of the payback period of these conversions may remove these facilities from the list of buildings slated for conversion to natural gas.

Public Works costs are higher than others because the boiler will need to be replaced; The Fire Department is high because it is being converted from electric heat; and the Airport terminal and the Sewer treatment plant are high because the cost includes abandonment of an underground fuel tank.

After the gas conversion budget has been approved by the City Council, Public Works will contract with the mechanical engineer to prepare drawings and specifications for required work, submit applications for gas service installations to Enstar, and competitively bid the building conversion work.

Recommendations: The City Council pass an ordinance authorizing a budget for the conversion of City buildings to natural gas and authorize the City Manager to execute all appropriate documents.

**Etsimated Cost to Convert to Natural Gas
City Facilities**

Building	Main Line Assessment Cost	Service Line From Main to Meter Cost	Building Conversion Cost	Abandon Exist. Fuel Tank Cost	Total Cost to Convert Building to Natural Gas
General Fund Buildings					
Public Works	\$3,283	\$7,500	\$22,000	\$7,500	\$40,283
Animal Shelter	\$3,283	\$3,000	\$5,000	\$5,000	\$16,283
Library	\$3,283	\$3,500	\$5,500	\$7,500	\$19,783
City Hall	\$3,283	\$3,000	\$5,000	\$5,000	\$16,283
Fire Dept	\$3,283	\$2,500	\$85,000	\$0	\$90,783
Police Dept	\$3,283	\$3,000	\$8,000	\$5,000	\$19,283
HERC 1	\$3,283	\$5,500	\$9,500	\$10,000	\$28,283
HERC 2	\$3,283	\$3,000	\$3,500	\$4,500	\$14,283
Airport Terminal	\$3,283	\$4,500	\$6,500	\$21,000	\$35,283
Restroom - Ramp 4	\$3,283	\$3,000	\$2,000	\$750	\$9,033
Restroom - Ramp 6	\$3,283	\$3,000	\$2,000	\$750	\$9,033
Restroom - Load and Launch	\$3,283	\$1,500	\$2,000	\$750	\$7,533
Restroom - Ramp 2	\$3,283	\$2,000	\$2,500	\$3,000	\$10,783
Harbor Fund Buildings					
Fish Dock Ice House	\$3,283	\$2,500	\$13,000	\$0	\$18,783
Port Maintenance Facility	\$3,283	\$3,500	\$4,500	\$7,500	\$18,783
Waste Oil Building	\$3,283	\$1,500	\$1,500	\$0	\$6,283
Sewer Fund Buildings					
Sewer Treatment Plant	\$3,283	\$8,500	\$5,000	\$15,000	\$31,783
Sewer Treatment Plant Office	\$3,283	\$2,000	\$1,000	\$500	\$6,783
Water Fund Buildings					
Water Treatment Plant	\$3,283	\$6,000	\$7,500	\$0	\$16,783
Water Treatment Plant Shop	\$3,283	\$1,500	\$1,000	\$500	\$6,283

Total Cost Construction \$422,410
 Total Engineering (10%) \$42,241
 Contingency (15%) \$61,418
Total Conversion Cost \$526,000

General Fund	\$396,000
Harbor Fund	\$54,000
Water Fund	\$28,000
Sewer Fund	\$48,000