

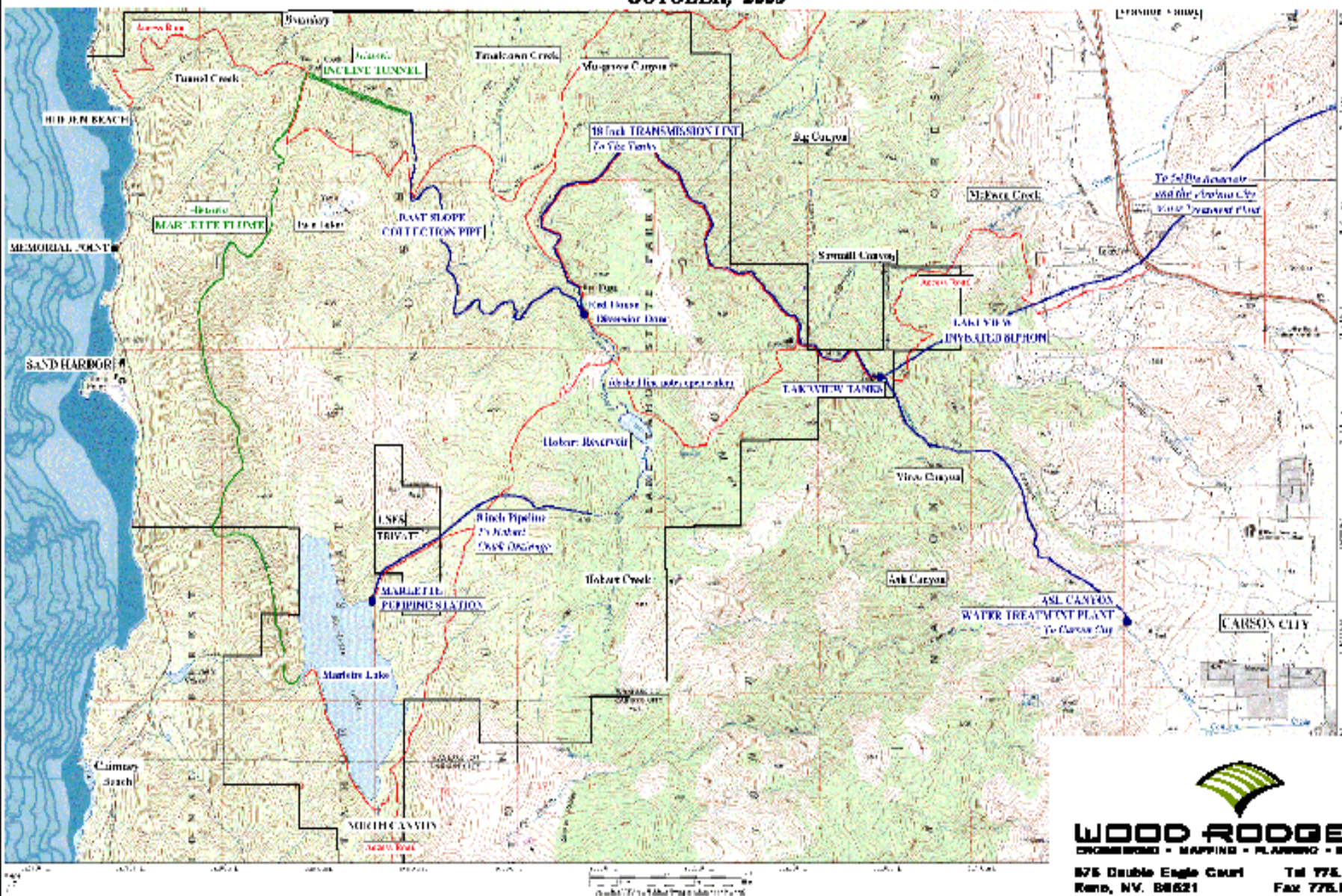
MARLETTE WATER SYSTEM

For
Legislative Committee for Review and Oversight of TRPA and
Marlette Water System

AUGUST 15, 2008 STATUS
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Buildings and Grounds
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Marlette Water System

MARLETTE HOBART WATER SYSTEM

FIGURE 2
OCTOBER, 2005



WOOD RODGERS
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MARLETTE CONSTRUCTION PROJECTS

- PERMANENT PUMP STATION PHASE A CONSTRUCTION
- INSTALL FLOW CONTROL UPGRADES AT RED HOUSE DIVERSION AND LAKEVIEW TANKS
- PERMANENT PUMP STATION PHASE B CONSTRUCTION STARTED
- 2008 CONTROL UPGRADES

PERMANENT PUMP STATION PHASE A

- Constructed 7390 Total Feet of 12 inch pipeline from Marlette to Hobart Creek
 - 4380 Feet of ductile iron pressure pipe
 - 828 Feet above ground in SEZ and Mountain Beaver Habitat
 - 3010 Feet of C-900 PVC pipe
 - Demolished existing pipeline except in Mtn. Beaver Habitat
 - Blasted a tunnel for the pipeline in TRPA zone
- Drilled and Lined the Pump Can at Marlette

PERMANENT PUMP STATION PHASE A (Continued)

- Installed two 4 inch diam. conduits from generator site to pump site for pump power and fiber optic control for Phase B
- Improved the road drainage from Lakeview to Marlette

INSTALLATION OF FLOW CONTROLS

- Replaced the manual control valve at Red House with an automatic valve controlled through the Marlette System SCADA
 - New building at diversion
 - Solar and LPG/Natural gas generator for control power
- Added an LPG generator at Lakeview Tanks to backup and augment existing solar

CONTROL ENHANCEMENTS

- Able to control flow from Hobart at Red House Diversion into collection system year around
- Backup gas generated power at Red House and Lakeview to keep batteries charged in worst of weather

FUNDING SOURCES

- EPA Grant to Carson Water Subconservancy District \$1,001,900
- Direct Contribution from CWSD \$500,000
- Direct Contribution from Carson City \$160,500
- State Revenue Bonds Paid by Carson City and Virginia City through rates (Control System/Maintenance Upgrades)
- Bond Issues to Date:
 - 2006B series \$2,200,900
 - 2008A series \$5,392,000

PARTNERS

- USEPA Grant through Carson Water Subconservancy District
- Nevada State Parks
- Nevada Department of Wildlife
- Nevada State Lands
- Laxalt Family Trust
- TRPA
- Nevada State Public Works Board
- Nevada Division of Environmental Protection
- Carson City
- Virginia City
- US Army Corps of Engineers
- Southwest Gas Corporation
- Nevada Department of Transportation

Permanent Pump Phase B

Summer of 2008 Construction

- Pump, Transformer, Controls and Intake at Marlette
 - Construction Cost Estimate \$3,359,400
 - Generator Building and Generator Outside Tahoe Basin
 - Electric and Control Cables from Generator
- Gas Line from Piaute Pipeline to Generator Building \$1,992,500

2008 CONTROL UPGRADES

- Tie Marlette Generator and Pump telemetry to Marlette SCADA
- Level monitoring at Hobart
- New building on Dam

Ductile Iron Pipe

Typical Mechanical Joint and Fitting



Beaver Zone Crossing



Pump Can Drill on Site



Drill from Lakeside



August 15 Blasting



4" Gas Line



A yellow trencher machine is shown in the process of laying a 4-inch gas line. The machine is a large, yellow, tracked vehicle with a large spool of yellow pipe on its back. A worker in an orange safety vest stands next to the machine, guiding the pipe as it is laid into a trench. The trench is filled with dark soil. In the background, there is a dirt road and a wooded area. A red diamond-shaped sign with the text "UTILITY WORK AHEAD" is visible on the right side of the road. The date "07/02/2008" is printed in yellow in the bottom right corner of the image.

07/02/2008

12" Iron Pipe in SEZ



10/12/2007

Bldg on Hobart Dam



Generator Site



Marlette Water System

- Questions?