

# *A Loan Application For:* **Raw Water Projects**

---

*Big Elk Meadows  
Lyons, Colorado*



## **FEASIBILITY STUDY APPROVAL**

Pursuant to Colorado Revised Statutes 37-60-121 & 122, and in accordance with policies adopted by the Board, the CWCB staff has determined this Feasibility Study meets all applicable requirements for approval.

*Ryan Edul*  
Signed

11-15-2011  
Date

## **Submitted To:**

Colorado Water Conservation Board

Finance Section

Attn: Kirk Russell, P.E. & Anna Mauss, P.E.

1580 Logan Street, Suite 600

Denver, Colorado 80203

## **Submitted By:**

The Big Elk Meadow Association & The Big

Elk Meadows Water Association

P.O. Box 440

Lyons, Colorado 80540

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# COLORADO WATER CONSERVATION BOARD

## WATER PROJECT LOAN APPLICATION

**Instructions:** This application should be typed or printed neatly with black ink. Attach additional sheets as necessary to fully answer any question or to provide additional information that would be helpful in the evaluation of this application. When finished, please sign and return this application to:

**THE COLORADO WATER CONSERVATION BOARD**  
 Finance Section  
 1580 Logan St., Suite 600  
 Denver, CO 80203  
 Attn: Kirk Russell, P.E. or Anna Mauss, P.E.  
 Phone (303) 866-3441 x3232 Fax (303) 894-2578  
 Email [kirk.russell@state.co.us](mailto:kirk.russell@state.co.us) or [anna.mauss@state.co.us](mailto:anna.mauss@state.co.us)

**Part A. - Description of the Applicant** (Generally, the applicant is also the prospective owner and sponsor of the proposed project)

1. Name of applicant Big Elk Meadows Association (Primary)

Mailing Address P.O. Box 440

Lyons, Colorado 80540

Business Phone ( 303 ) 823.6369 Fax ( 303 ) 823.0854

Federal ID Number 84 - 0580347 email larnold@elkridgeconsulting.com

2. Person to contact regarding this application:

Name Leonard Arnold

Position/Title Second Vice President, Big Elk Meadows Association

Address 527 Hickory Drive, Lyons, Colorado 80540

Business Phone ( 303 ) 823.5279 Cell ( 970 ) 215.3567

Email larnold@elkridgeconsulting.com

3. Type of organization (Ditch Co., Irrigation District, Municipality, etc.): Home Owner's Association

Date of Annual Meeting May, 2012

Is the organization incorporated in the State of Colorado? YES X NO        (If YES, please include a copy of the articles of incorporation, and the bylaws)

*Articles of incorporation and bylaws are included under Tab 3 - Articles of Incorporation & Bylaws.*

## CWCB Water Project Loan Application

4. Please provide a brief description of the owner's existing water supply facilities and describe any existing operational or maintenance problems. Attach a map of the service area

*Big Elk Meadows has 5 water reservoirs, containing 112 acre feet of water or less. We utilize surface water to process for our drinking water, through a micro treatment facility. We currently are encountering three areas of concern.*

1. *Meadow Lake Dam Outlet piping is failing, not allowing required releases to be made. A new system has been designed and is the primary focus of this loan.*
2. *Colorado Division of Water Resources is requiring additional water rights management, and new monitoring facilities, including flow measuring devices at the inlet and outlet of our property. Ongoing engineering costs must also be met.*
3. *Water rights which we own in a reservoir (ISH) below our lakes requires certain releases to the Little Thompson River. Construction of infrastructure to allow this exchange must be completed prior to Spring. A map is following this page.*

*Big Elk Meadows contains 205 Lots, 460.5 Acres, and services approximately 160 full and part-time residences. The raw water lake system is utilized for recreational and as a water source for our processed water system. We deplete approximately 44 acre feet total, and augment 32 acre feet.*

*Maps are included under Tab 4 - Maps.*

### Part B. - Description of the Project

1. Name of the Project Big Elk Meadows Raw Water Projects

2. Purpose of this loan application. Check one.

<input type="checkbox"/>	New project
<input checked="" type="checkbox"/>	Rehabilitation or replacement of existing facility
<input type="checkbox"/>	Enlargement of existing facility
<input type="checkbox"/>	Emergency Repair
<input checked="" type="checkbox"/>	Other (describe) <u>Water Release Facility</u>

3. If the project is for rehabilitation of an existing reservoir, is the reservoir currently under a storage restriction order from the State Engineer? YES ☐ NO ☒

4. General location of the project. (Please include county, and approximate distance and direction from nearest town, as well as legal description, if known.)

*Big Elk Meadows Association is located approximately 10 miles west of Lyons, Colorado. A map is included under Tab 4 - Maps.*

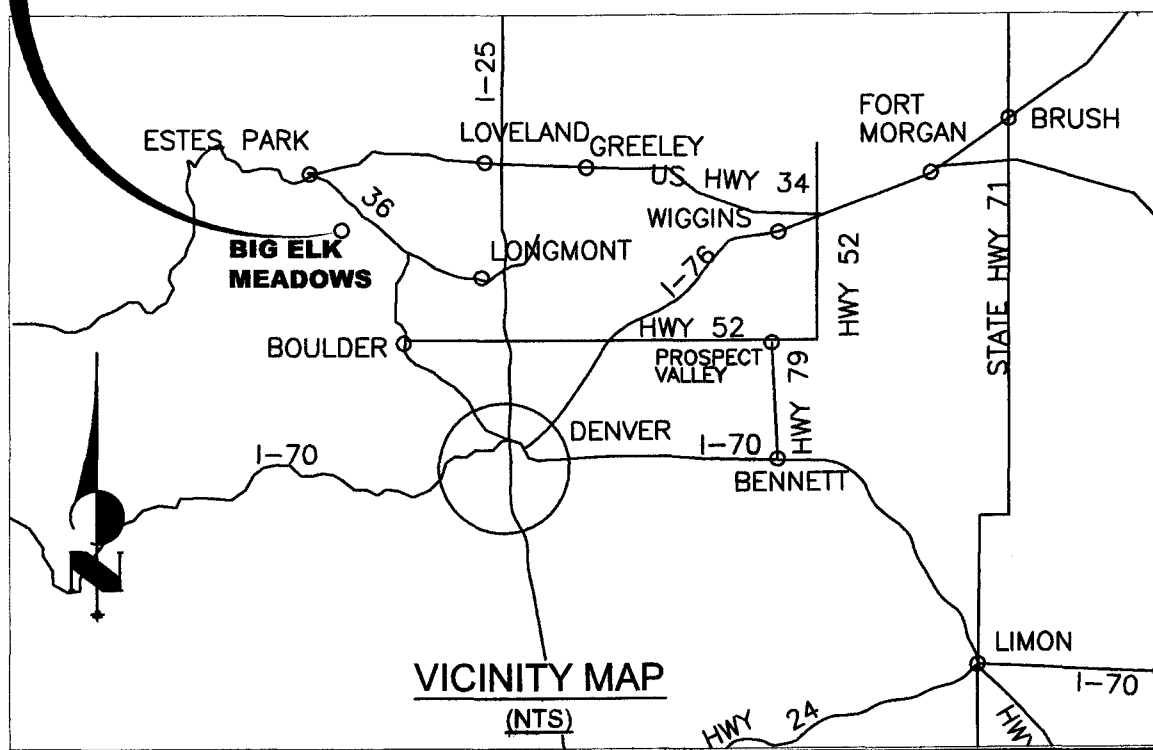
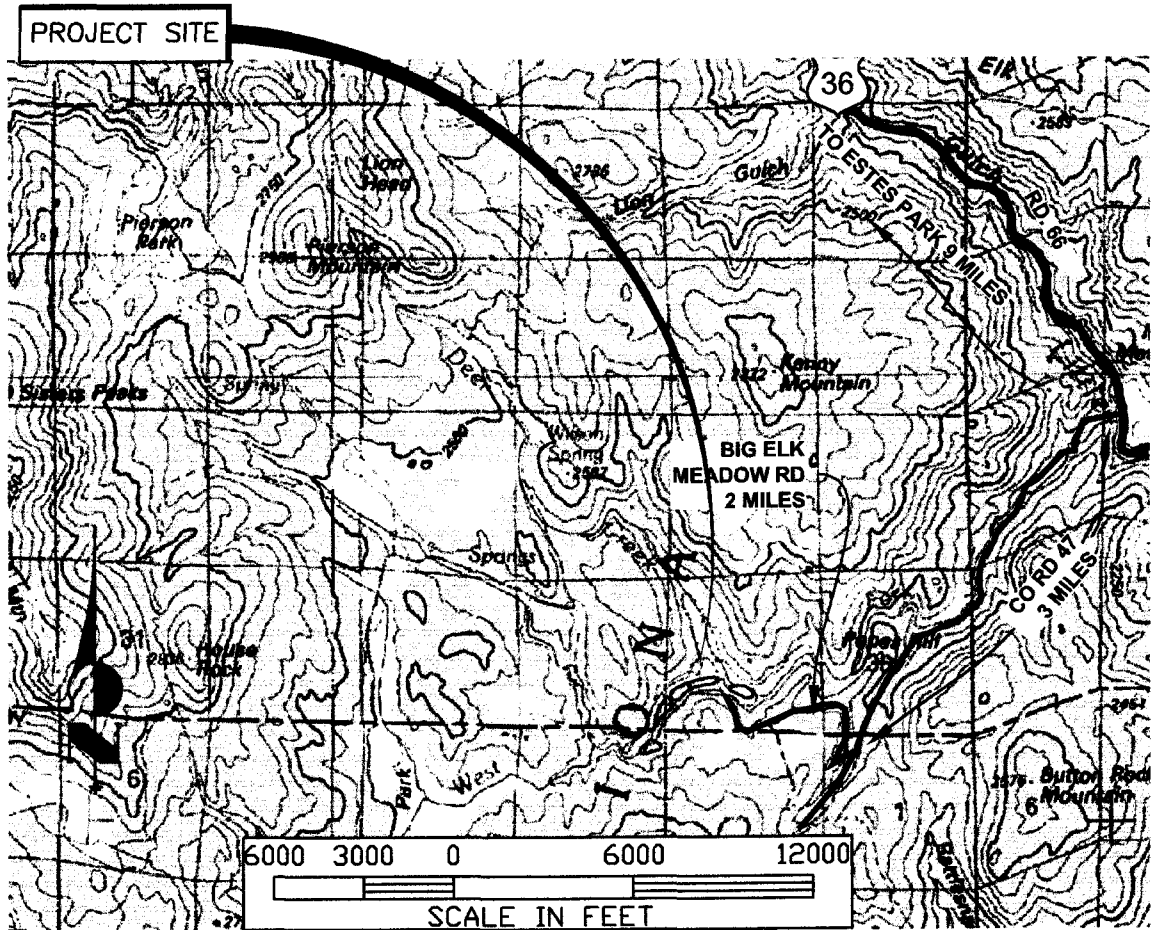
*Our property is located in two counties.*

- *Boulder County: Approximately 33%*
- *Larimer County: Approximately 67%*

*Big Elk Meadows is comprised of the following:*

- *Total Acreage: 658 Acres*
- *Individual Lots: 197.5 Acres*
- *Association Owned: 460.5 Acres*





GAUTHIER ENGINEERING, INC.

2157 Buena Vista Drive  
Greeley, Colorado 80634  
Phone: (970) 330-0855  
E-mail: john@gauthiere-engineering.com  
FAX: (970) 330-0855

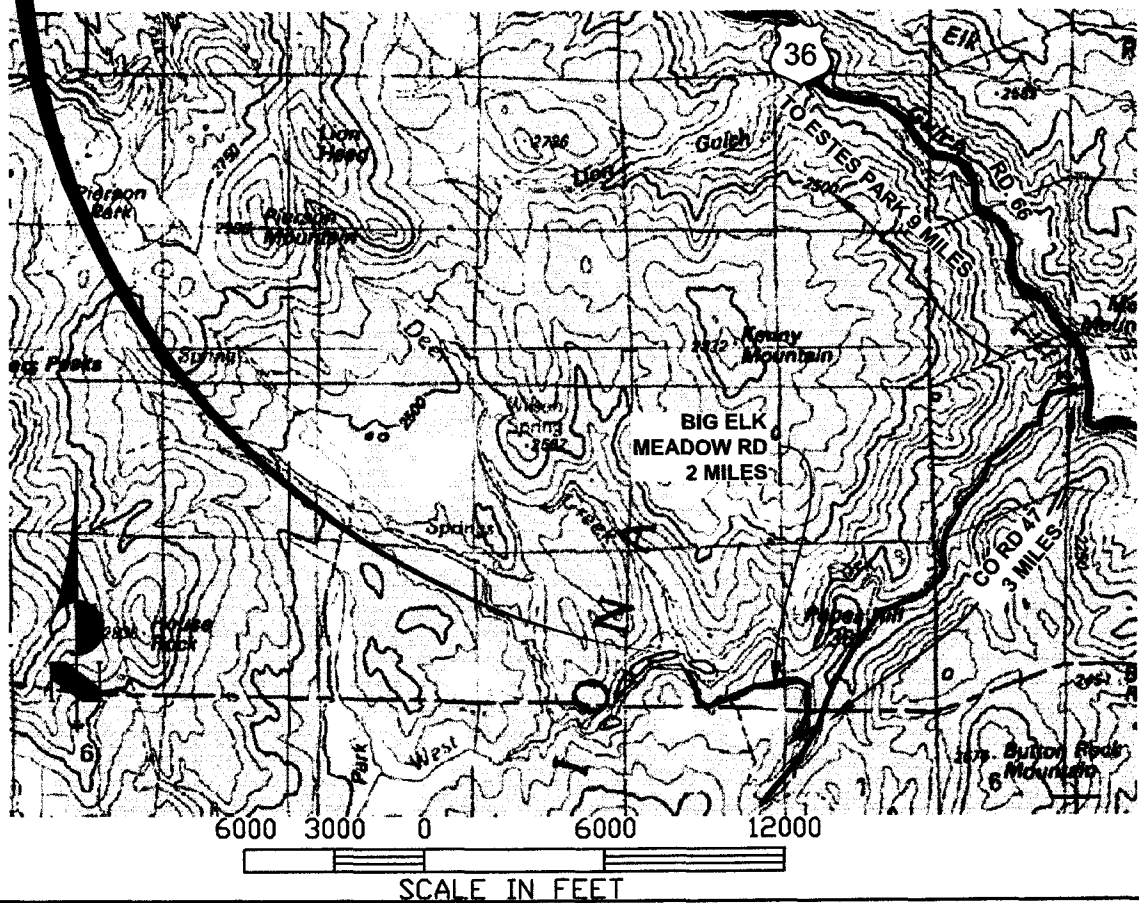
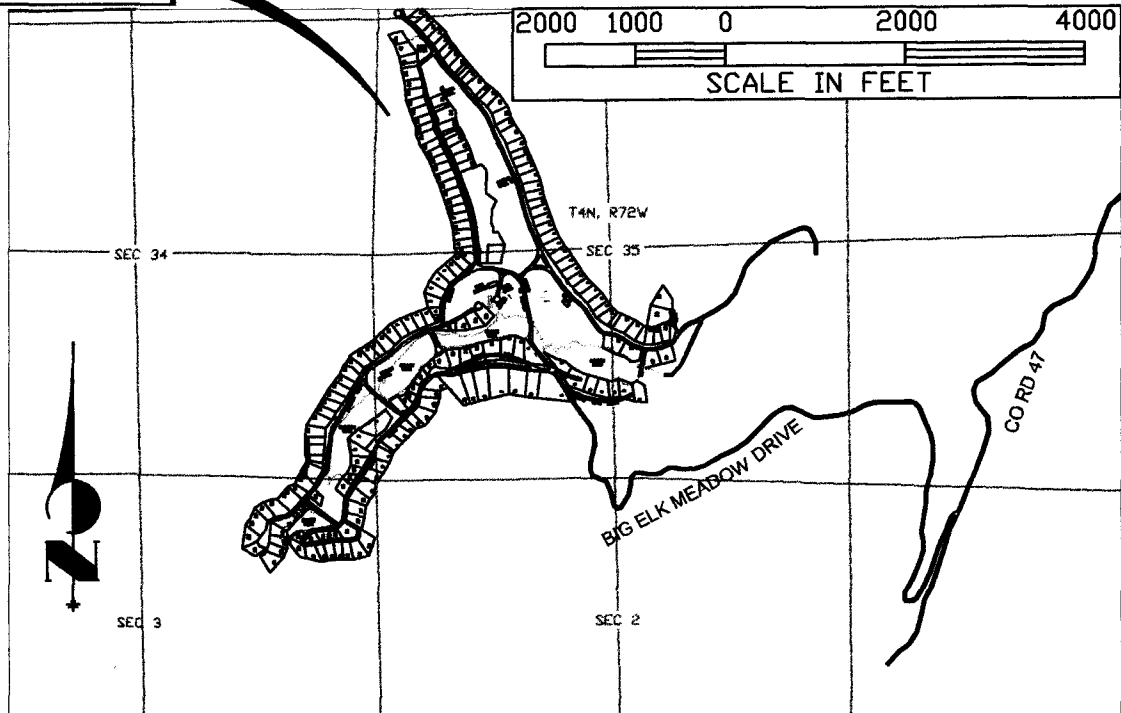
August, 28, 2010

VICINITY MAP  
BIG ELK MEADOWS, COLORADO

FIGURE 1

Page 7

PROJECT SITE



GAUTHIER ENGINEERING, INC.

2157 Buena Vista Drive  
Greeley, Colorado 80634  
Phone: (970) 330-0855  
E-mail: john@gauthier-engineering.com  
FAX: (970) 330-0855

August, 28, 2010

LOCAL MAP  
BIG ELK MEADOWS, COLORADO

FIGURE 2

Page 8

## SECTIONS 34

## COMMON LAND:

\*

LARIMER COUNTY  
BOLDER COUNTY

PRIVATE LOTS:

197.5 ACRES

\*

TOTAL LAND:

658 ACRES

LARIMER: 480 ACRES  
- 5 HAYS  
- 33 CROSS  
442 ACRE

FOREST SERVICE

## SECTION 3

BOULDER: 220 ACRES  
+ 4 CROSS  
216

## Section 2

JOINTNY PARK

## SECTION 1

R.A.H. 2002-

FOREST SERVICE

## SECTION 35

FOREST SERVICE

POPPIE  
DOME

RIFLE  
RANGE

22

WANKEN

PFLOW  
HILL

PRUEZ  
24354

HORSE PASTURE

PARCEL 58516

PARCEL  
90399

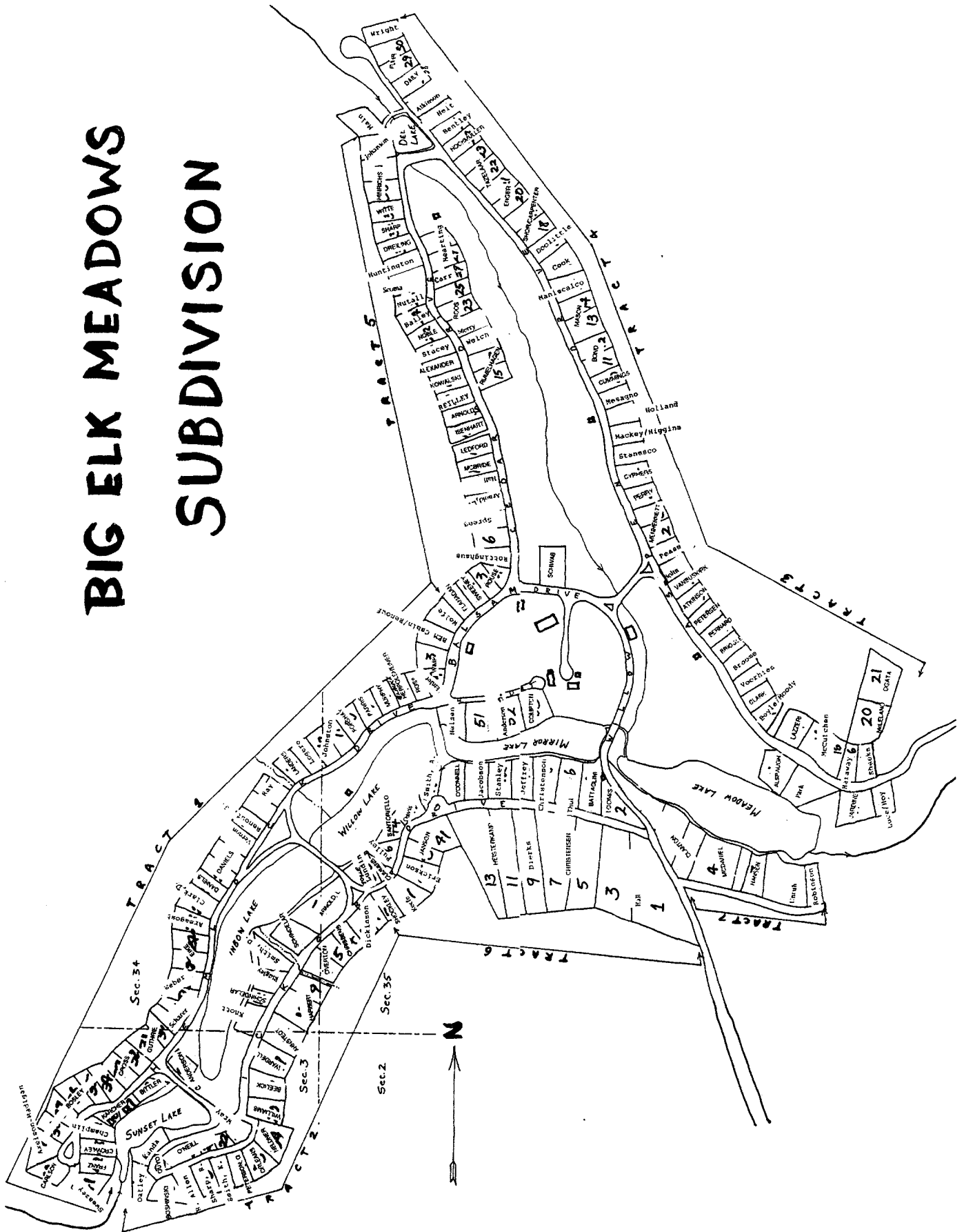
5763

KWARDILL

14AYS  
(5 ACRES)

To 66 11

# BIG ELK MEADOWS SUBDIVISION



## ATTACHMENT "A"

### Larimer County:

That part of the E1/2 of SE ¼, Sec. 34, T.4 N., R. 72 W., which lies to the South and East of the westerly property lines of subdivided lots in Big Elk Meadows Subdivision and W ½ of NW ¼ and SE ¼ of NW ¼ and W ½ of NE ¼ of NW ¼ and SW ¼ and W ½ of SE ¼ and SE ¼ of SE ¼, Sec. 35, T.4 N., R. 72 W.;

### Boulder County:

That part of the NE ¼ of NE ¼, Sec. 3, T.3 N., R. 72 W., which lies to the South East of the westerly property lines of subdivided lots in Big Elk Meadows Subdivision, and E ½ of NW ¼ of NE ¼, Sec. 3, T.3 N., R. 72 W.; and N ½ of N ½, Sec. 2, T.3 N., R.72 W.;

### Larimer and/or Boulder Counties:

The Big Elk Meadows Subdivision, the plat(s) of which are recorded as herein above described, inter alia; and

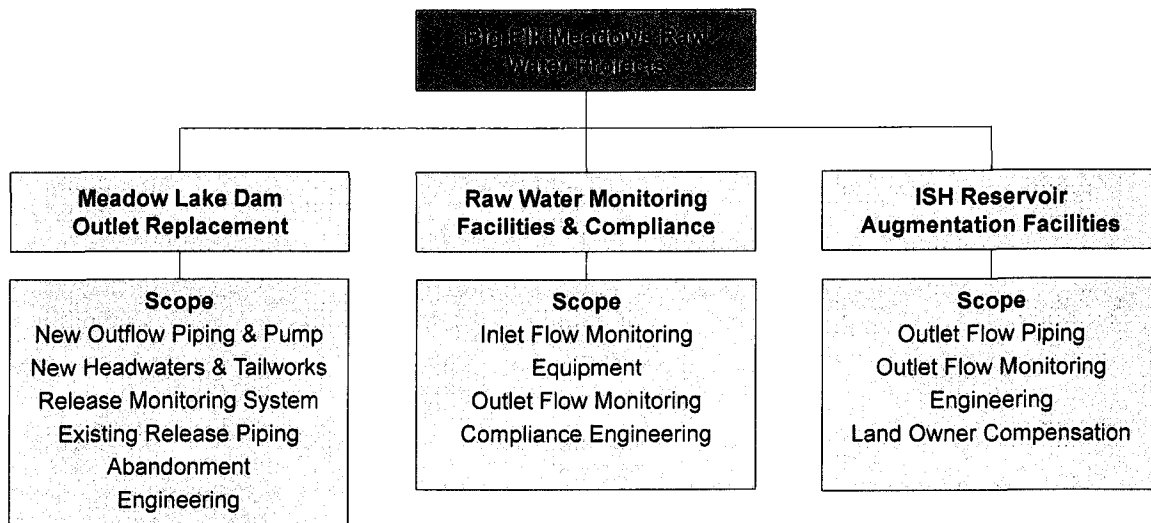
(A) LESS all currently platted lots and blocks, otherwise situated within the area known as Big Elk Meadows Subdivision, which belong to owners other than said BIG ELK MEADOWS ASSOCIATION;

(B) AND LESS a five acre parcel, more or less which lies in the NW corner of the NW ¼ of Sec. 35, T.4 N., R.72 W. to be surveyed and platted as part of the Big Elk Meadows Subdivision to wit:

That portion of the NW ¼ of NW ¼ of Sec.35, T.4 N., R. 72 W., of the 6<sup>th</sup> Principal Meridian, Larimer County, Colorado as described as follows: Beginning at the Northwest corner of said Sec. 35, thence along the North line of said NW ¼ of Sec.35, South 84°42'50" East 130.70 feet to the approximate center of Deer Creek, thence along said approximate center line the following six courses and distances: (1) South 28°44'42" West 32.06 feet, (2) South 29°22'17" East 89.78 feet, (3) North 83°07'21" East 85.59 feet, (4) South 01°23'44" West 37.40 feet, (5) South 86°38'05" East 50.15 feet, (6) South 18°44'22" East 55.91 feet; thence leaving said approximate center line North 83°18'44" East 53.31 feet; thence South 71°20'35" East 11.60 feet to the westerly right of way of Aspen drive, Big Elk Meadows; thence along said right of way South 42°03'10" East 69.64 feet; thence North 71°20'35" West 32.11 feet; thence South 51°02'36" West 83.01 feet; thence South 21°22'18" East 72.62 feet; thence South 33°48'18" East 70.92 feet to the North line of Lot 41, Tract 5, Big Elk Meadows; thence along said North line South 78°28'10" West 198.5 feet to the Westerly line of said Tract 5, thence along said westerly line South 11°31'50" East 343.44 feet; thence South 78°28'10" West 276.95 feet to the West line of said NW ¼ of said Sec. 35; thence along said West line North 0°11'46" East 850.47 feet to the point of beginning containing five acres more or less.

5. Please provide a brief narrative description of the proposed project including purpose, need, facilities, type of water uses to be served and service area. Attach separate sheet, if needed.

*This loan application is for a combination of three raw water project.*



*The following is a brief description of the projects. More detail is included under Tab 5 - Project Information.*

## **MEADOW LAKE DAM OUTLET REPLACEMENT**

Meadow Lake Dam is BEMA's only jurisdictional dam, with a depth of 11'-0" at its deepest, and holding approximately 27 acre feet.

The current outlet piping is 6" corrugated metal pipe, which is slowly collapsing. This portion of the loan will be used to install a new siphon piping system, augmented with a pump to allow us to conduct controlled releases to meet our water rights requirements, and to drain the lake if dam repairs are required.

**Loan Amount: \$202,510**

*Estimated costs for this project are contained in Tab 6 - Cost Estimate.*

## **RAW WATER MONITORING FACILITIES & COMPLIANCE REPORTING**

Due to increased vigilance at Colorado Division of Water Resources, our water rights compliance requirements have increased. Since our old monitoring devices for inflow and outflow are also antiquated, we are undertaking the following:

- Install a new inlet (creek) monitoring station
- Install a new outlet (creek) monitoring station
- Engineer support in improving our compliance reporting

**Loan Amount: \$68,498**

*Estimated costs for this project are contained in Tab 6 - Cost Estimate.*

## **ISH RESERVOIR AUGMENTATION FACILITY**

Big Elk Meadows currently owns 12 shares of Boulder Larimer County Irrigation and Manufacturing Ditch Co, which can be used to exchange water stored in the ISH Reservoir to meet flow obligations. This project includes the following:

- 450 feet of 8" diameter pipe to Little Thompson River
- Gate valves, flow monitoring system
- Land owner compensation for piping across their property

**Loan Amount: \$25,025**

*Estimated costs for this project are contained in Tab 6 - Cost Estimate.*

# Loan Application

For existing facilities indicate:

Number of shareholders 205 or Number of customers served See Below

Current Assessment per share \$ See Below Number of shares See Below

Number of acres irrigated None Water Right: See Below CFS.

Average water diverted per year: See Below acre-feet.

*Big Elk Meadows Raw Water Facilities are described below.*

*Lakes: 5 Each*

*Surface Acreage: 23.34 Acres*

*Acreage: 117 Acre Feet*

*Depletion: 12 AF - Drinking Water; 32 AF - Evaporation*

*Big Elk Meadows utilizes our facilities for recreation and drinking water, processed through our processing facility. Water is processed by Big Elk Water Association (BEWA), a separate entity with a joint board of directors and management. BEWA serves 160 homes (number of customers served) and 1 fire department. BEWA processes 1,500,000 gallons of water per year (billed).*

*Big Elk Meadows Fire Department provides forest fire coverage for a larger area. During the 2001 Big Elk Meadows fire, raw water was used by the US Forest Service to fight the 4,000 acre fire, and on other fire requirements. Quantity use by the Fire Department is under 10,000 gallons unless a large fire is fought.*

*Ownership of water rights is held equally by all members:*

**Total Shareholders:** 205

**Current BEWA Membership Dues:** \$760 annually

**Cost of Processed Water Per Gallon, Separate of Membership:** 2.5 cents/gallon (increases with usage)

6. Will the acquisition of additional water rights be necessary? YES \_\_\_\_\_ NO X

If YES, please explain. \_\_\_\_\_

7. Please list the names, addresses and phone numbers of the Applicants' engineer(s) and attorney(s).

**Meadow Lake Dam Outlet Project**

John Gauthiere

Gauthiere Engineering, Inc.

2157 Buena Vista Drive

Greeley, Colorado 80634

970.330.0855

**Raw Water Monitoring Facilities & Compliance & ISH Reservoir Augmentation Facilities**

Chuck Haines

Wright Water Engineers, Inc.

2490 West 26th Avenue, Suite 100A

Denver, Colorado 80211

303.480.1700

www.wrightwater.com

8. List any feasibility studies or other investigations that have been completed or are now in progress for the proposed project. If so, submit one copy of the study with this application

**Meadow Lake Dam Outlet Project**

- Design Report - A copy is attached under Tab 5 - Project Information.
- Plans - A copy is attached under Tab 5 - Project Information
- Contract Documents & Specifications - A copy is attached under Tab 5 - Project Information

**Raw Water Monitoring Facilities & Compliance**

- See Tab 5 - Project Information

**ISH Reservoir Augmentation Facilities**

- See Tab 5 - Project Information

9. Estimated cost of the project. Please include estimated engineering costs, and estimated construction costs, if known.

Estimated Engineering Costs:\$	\$ 90,200	
Estimated Construction Costs:	\$ 168,833	
Estimated Other Costs:	\$ 37,000	(land, water rights purchase,etc.)
Estimated Total Costs:	\$ 296,033	

\* For additional information, see Tab 6 - Cost Estimate.

10. Loan amount and terms you are requesting.

Requested Loan Amount:	\$ 300,000	(Usually 90 % of est. Total Costs)
Term (length) of loan:	30 years	(Usually 10, 20, or 30 years)
Interest Rate:	4.5 %	(Please call for our current rates)

## Part C. - Project Sponsor Financial Information

Because the CWCB's Fund is a revolving fund, it is important that the project sponsor have the financial capacity to repay any loans made by the CWCB. The following information is needed to assist the CWCB in a preliminary assessment of the applicant's financial capacity. The project sponsor will submit the three most recent annual financial statements.

1. List any existing long-term liability (multi-year) or indebtedness that exceeds one thousand dollars. For example, bank loans, government agency loans, bond issues, accounts payable, etc. Include names and addresses of lenders, amounts, due dates and maturity dates.

*Big Elk Meadows Association (BEMA) will be the loan sponsor, and will provide for loan repayment funds. Big Elk Water Association (BEWA) is a separate entity, created due to certain water processing rules and regulations. Revenue streams from both associations are available, since the raw water facilities owned by Big Elk Meadows are utilized by BEWA to create their processed water supply.*

*Financial statements are attached under Tab 7 - Financials. Revenue streams and outstanding loans are listed on the following page.*



## **BIG ELK MEADOWS ASSOCIATION (BEMA) REVENUE STREAM**

*BEMA charges annual assessments to each of its 163 members, and that is our primary source of income. Amounts collected were:*

May 2008	\$200,915.35
May 2009	\$201,720.00
May 2010	\$210,829.53
May 2011	\$209,958.77

*BEMA receives a fairshare payment from the Big Elk Water Association each year to cover shared expenses. Amounts collected were:*

May 2008	\$93,918.16
May 2009	\$86,156.78
May 2010	\$98,388.37
May 2011	\$113,125.83

*\*Other revenue streams are interest, renter's fees, real estate transaction fees, and fishing permits.*

## **BIG ELK WATER ASSOCIATION (BEWA) REVENUE STREAM**

*BEWA charges annual assessments to each of its 157 members, and that is our primary source of income. Amounts collected were:*

May 2008	\$100,570.00
May 2009	\$99,200.00
May 2010	\$103,053.93
May 2011	113,926.05

*BEWA received water use charges reflecting the amount of water each member consumes. Currently, the amount charged is \$0.025 per gallon for the first 12,000 gallons per quarter, and \$0.035 per gallon of water consumed over 12,000 gallons in that quarter. Amounts collected were:*

May 2008	\$41,434.85
May 2009	\$62,087.78
May 2010	\$43,984.93
May 2011	\$46,616.00

## **BIG ELK MEADOWS ASSOCIATION (BEMA) OUTSTANDING LOANS**

*Grader loan (\$50,000 principal)*

*Duration: 2007 - 2014*

*Monthly payment: \$680.00*

*Lender: Bank of the West*

*Address: Main Street Lyons*

*Remaining balance: (8/31/2011) \$20,272*

*Purpose: to buy a road grader.*

*Weedcutter boat loan (\$12,000 principal)*

*Duration: 2008 - 2012*

*Monthly payment: \$329.18*

*Lender: Heisterkamp*

*Address: 766 Milwaukee Street, Denver, CO 80206*

*Remaining balance (8/31/2011) \$3212*

*Purpose: to buy a weedcutter boat*

## **BIG ELK WATER ASSOCIATION (BEWA) OUTSTANDING LOANS**

*Water Projects loan (\$90,000 principal)*

*Duration: 2010 - 2019*

*Monthly payment: \$1004.30*

*Lender: Loomis*

*Address: 2514 Lake Meadow Drive, Lafayette, CO 80026*

*Remaining balance (8/31/2011) \$82,324*

*Purpose: to pay for Hickory water main and water discharge treatment facility*

2. Are any of the above liabilities now in default, or been in default at any time in the past?

YES \_\_\_\_ NO   x   . If YES, please give detailed explanation.

3. Please provide a brief narrative description of sources of funding, in addition to the CWCB, which have been explored for this project (Examples would be Banks, USDA Rural Development, NRCS, Colorado Water Resources and Power Development Authority, Colorado Division of Local Government, etc.).

*BEMA has contacted our bank to enquire about funding for this project. This loan is not typical to their lending portfolio.*

*- Bank of the West, Lyons, Colorado*

*BEMA applied to the Colorado Rural Water Association for a loan through the American Recovery & Reinvestment Act (ARRA), but were unable to complete the application as funds were expended.*

*- CRWA, Leory Cruz, Pueblo West, Colorado*

*These applications were for both raw water and finIShed water (distribution line replacement) and we have now focused our loan needs on the raw water projects. We are currently seeking a grant for water distribution repairs/ replacement.*

4. What collateral will you be offering for this loan? Possibilities include a pledge of revenues, the project itself, real estate, water rights.

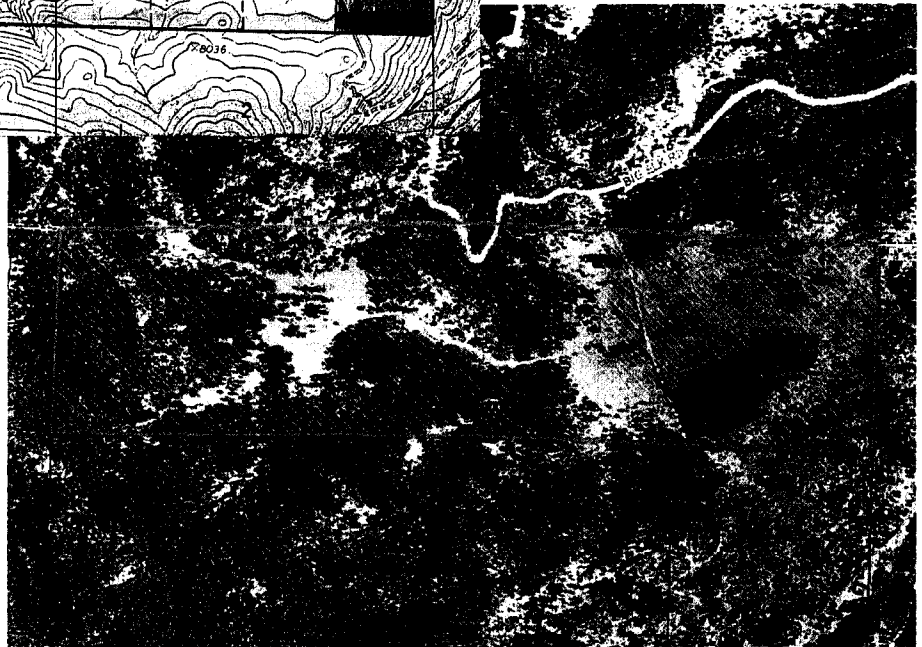
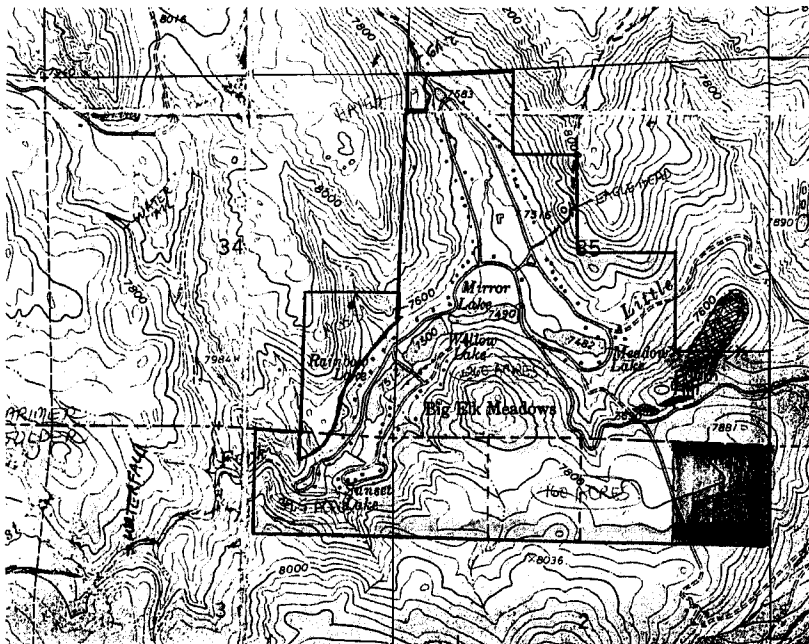
*BEMA and BEWA are willing to provide one or more of the following collateral items to secure this loan:*

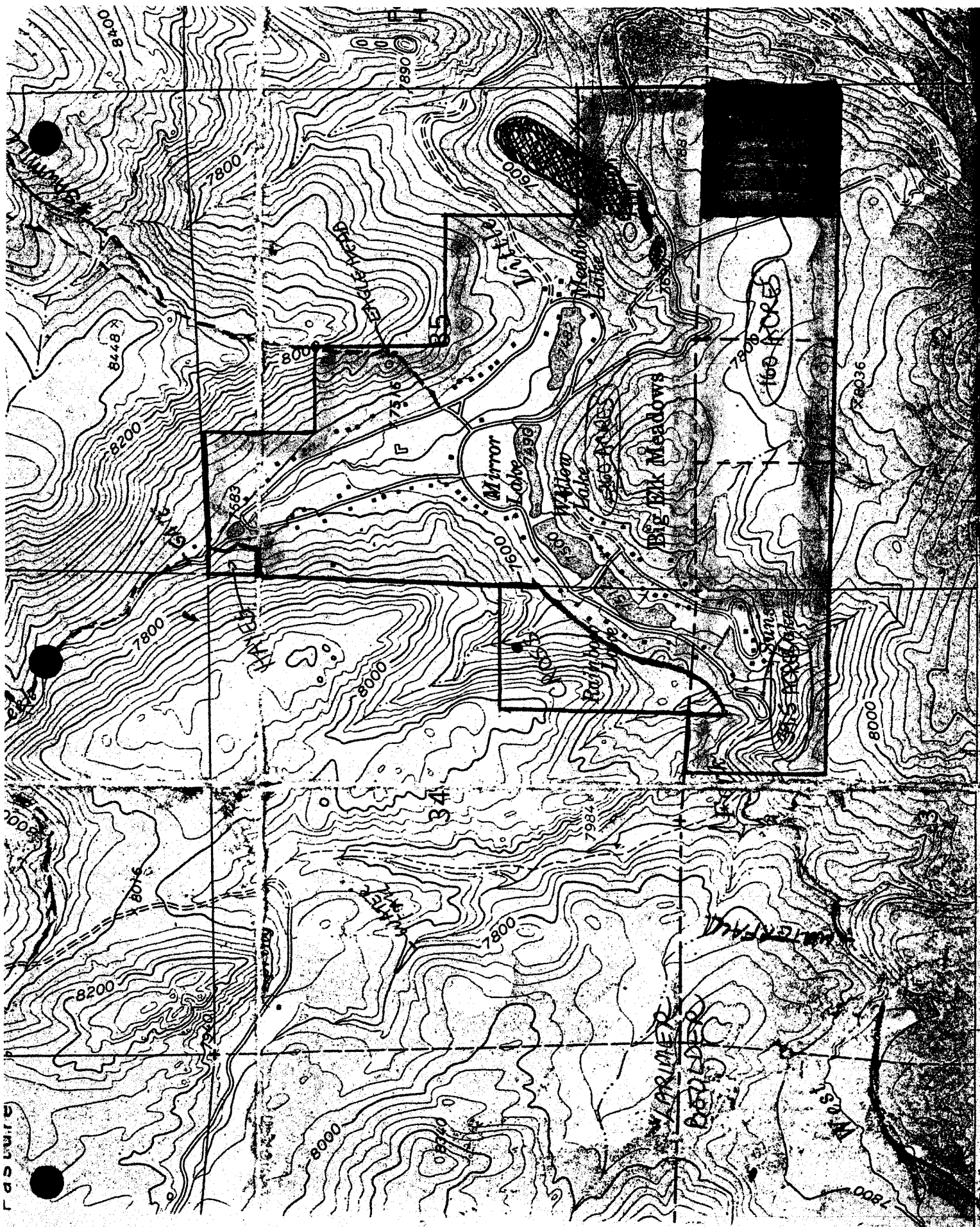
*Revenue Pledge*

*BEMA/BEWA have revenues outlined on page 9 of this loan application which are sufficient to meet the projected debt service. We are willing to enter into a pledge agreement which must not be restricted to our revenue needs. The boards of these two entities are aware of the debt service requirements of this loan.*

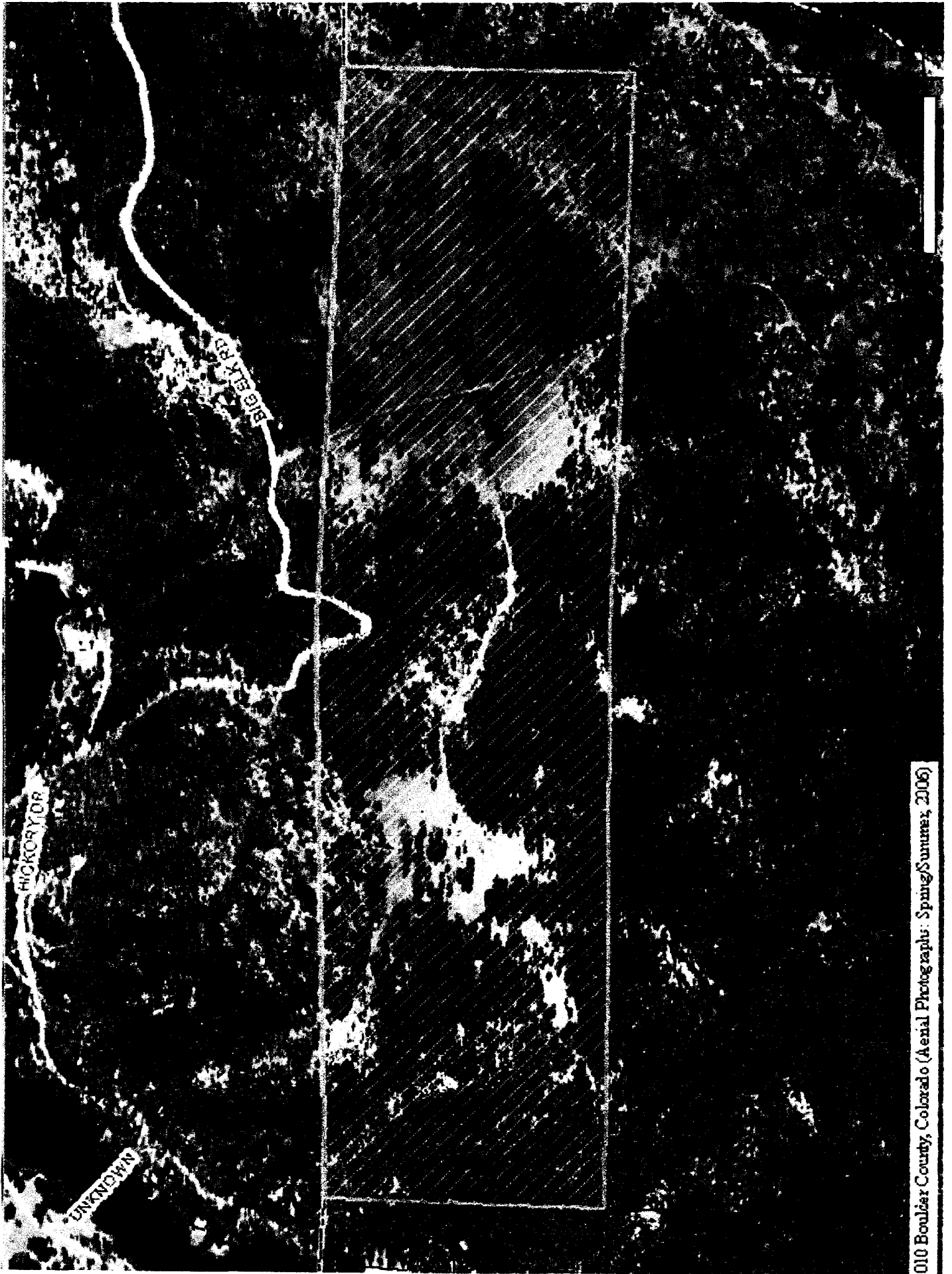
*Real Estate Pledge*

*A portion of BEMA which is referred to as the 'Horse Pasture' contains 160 acres of undeveloped property. This property is of high value, having direct views of the twin peaks, adjoinment to Forest Service property, separate access and has active springs as water source. BEMA is willing to pledge a portion of this property (approximately 40 acres) which could be appraised and set aside as security for the loan. A map of this area is shown below, along with an aerial photo.*





TW SHIP - 4 N. SECTION 35 260 + 39.5 + 160 + .5 = 460 ACRES



010 Boulder County, Colorado (Aerial Photograph: Spring/Summer, 2006)

## Loan Application

The above statements are true, to the best of my knowledge:

Signature of Applicant \_\_\_\_\_

Printed Name Leonard Arnold

Title 2nd Vice President, Big Elk Meadows Association & Big Elk Water Association

Date September 27, 2011

# Articles of Incorporation & Bylaws

## **ARTICLES OF INCORPORATION INTRODUCTION**

*Big Elk Meadows Association (BEMA) and Big Elk Water Association (BEWA) are separate corporations.*

*BEMA conducts the business of operating the Association, with a staff of three and numerous volunteers. BEMA controls the following:*

- 460 Acres of Common Land
- 5 Bay Fire Station
- Maintenance Building
- Sand Storage Building
- Office Building
- Miscellaneous Smaller Structures
- Maintenance Equipment, Including Grader & Backhoe
- Roads
- Raw Water Retention Dams

*BEWA controls the following:*

- Water Inlet Piping (From Mirror Lake)
- Water Treatment Plant
- Water Treatment Storage Tanks
- Water Treatment Distribution Lines
- Usage Metering System
- Unprocessed Water Discharge Filtering System
- Wells, Pumps, etc.

*The attached incorporation documents are divided by entity. BEMA will serve as the sponsor of this loan.*

**Big Elk Meadows Association  
Articles of Incorporation**



**Certificate of Incorporation of Big Elk Meadows Association  
(Non-Profit)**

As amended on April 30, 1976

---

**FIRST**

The corporate name and style of said corporation shall be BIG ELK MEADOWS ASSOCIATION.

**SECOND**

The objects for which this corporation is formed are:

1. To buy, sell lease, let and sublet, hold, deal in and with and subdivide real property wherever situate and all character of interests, rights and estates in or to real property.
2. To purchase and otherwise to acquire personal property of every class and description, tangible and intangible, and to hold, own, sell, bail and otherwise dispose of, care for, repair, trade deal in and deal with them.
3. To buy, sell, pledge, encumber, trade, exchange, hold, deal in and deal with interest and dividend bearing securities of all kinds, including bonds, mortgages, and all varieties of commercial paper, secured or unsecured, and also with any other or right of possible or probable value.
4. To lend money and take real or personal or no security for the repayment of the same.
5. To construct or remove improvements on real property; to equip such improvements with fixtures, furniture and personal property, and to manage, use, operate and work all real property owned or otherwise held or controlled by the corporation, whether improved or unimproved.
6. To own real and personal property, both within and without the State of Colorado, and to conduct business in any and all parts of the world.
7. To borrow money and obtain credit; to issue bonds or other obligations in payment for property purchased or acquired by the corporation, or for any other object in or about its business; to mortgage or pledge any stocks, bonds or other obligations, or any property which may be acquired by it, to secure any bonds or other obligations by it issued or incurred.

8. To buy , sell, pledge, encumber, trade, exchange, hold, deal in and deal with shares of the capital stock of any and all corporations for whatever purpose and under whatever laws such corporations may be organized, and whether such shares of stock be preferred or common or with or without voting power, and to exercise all voting rights and other privileges incident to the same.
9. To aid and assist other persons, firms and corporations by advancement of money, guaranty of obligations or contracts, loans of property, or otherwise.
10. To conduct any operation within the scope of its objects and powers, either in its own behalf or its agent, and to act as agent in any one or more phases of any business or operations within the scope of its objects and powers.
11. The foregoing clauses shall be constructed both as objects and as powers, and the statements contained in each clause, except where otherwise expressed, shall be in no way limited or restricted by reference to or inference from the terms of any other clause, but shall be regarded as independent purposes and powers, and it is expressly declared that all other lawful powers not inconsistent therewith hereby included.

### **THIRD**

Said corporation is to have perpetual existence.

### **FOURTH**

This corporation is not for profit and has no capital stock.

### **FIFTH**

The corporation shall have no less than six (6) nor more than twelve (12) directors who shall manage the affairs of the corporation.

The number of directors may be increased or decreased within the limits herein under provide at any annual meeting of the members.

### **SIXTH**

The principal office of the corporation shall be in Big Elk Meadows, Larimer County, State of Colorado, but the corporation may establish and maintain offices elsewhere as its By-Laws may provide and as the Board of Directors may deem advisable. The Principal activities and operations of the corporation may be extended to any other counties within the state of Colorado or to any other states or territories of the United States.

## **SEVENTH**

The members by the majority vote shall have the power to make and amend, modify, repeal or revoke such By-Laws as they may deem proper for the management of the affairs of the corporation not inconsistent with the laws of the state of Colorado.

## **EIGHTH**

The Certificate of Incorporation may be amended upon two-thirds (2/3) vote of the members of the incorporation.

## **NINTH**

No director of this corporation shall receive any salary, remuneration, gift or other thing of value for services connected with the administration of the affairs of the corporation. Personal expenses incurred in carrying out the duties of an officer or director may be refunded when authorized by the directors.

## **TENTH**

No dividend or distribution of the property of the corporation shall be made until all debts are fully paid, and then only upon its final dissolution and surrender of organization and name; nor shall the corporation be dissolved or distribution be made upon two-thirds (2/3) vote of the entire membership.

## **ELEVENTH**

The only members of the Big Elk Meadows Association shall be: (1) all those persons who own a cabin site(s) at Big Elk Meadows, in the Counties of Boulder and Larimer, State of Colorado, as known on the recorded plat of Big Elk Meadows; (2) all those persons who lease cabin sites at Big Elk Meadows from the manner provided by the By-Laws; and (3) such other persons as may from time to time hereafter elect to become members in the manner provided by the By-Laws of the Association.

Membership shall be nontransferable without the consent of the corporation except as appurtenant to a transfer of ownership of, or a transfer of the leasehold rights in a cabin site at Big Elk Meadows made in accordance with the Declaration and Agreement of Protective Covenants dated August 2, 1966; the owner's agreement, or the terms of the lease from Big Elk Meadows, Inc.; and the By-Laws of this Association.

## TWELFTH

The operation of the corporation shall be financed by assessments against the members as provided for in the Declaration and Agreement of Protective Covenants executed by; the Big Elk Meadows, Inc., dated August 2, 1966 and recorded in Boulder County in film 577, Reception No. 822910, and Larimer County book 1336, page 533, and by the By-Laws of the corporation. Such assessments shall become a lien against the real estate owned by the members in Big Elk Meadows and may be foreclosed or collected by corporation in accordance with the provisions of said Declaration and Agreement of Protective Covenants, the By-Laws of the Association and the laws of the state of Colorado.

/s/ Robert M. Swope  
Its President

/s/Rita Roos  
Its Secretary

**Big Elk Meadows Association  
Bylaws & Declaration of Protective Covenants**

# **By Laws of the Big Elk Meadows Association**

Adopted: January 19, 1967  
Revised: March 31, 1975 and March 28, 1983

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## **I. OFFICERS**

The officers of this Association shall consist of a President, a First Vice President, a Second Vice President, a Secretary and Treasurer, who shall be chosen by the directors at their first meeting following the annual meeting of the members each year. They shall be elected for a term of one year or until their respective successors are elected and qualified. The Board of Directors may appoint such additional officers as shall be deemed advisable, who shall be members of the Association, and who may, but need not, be members of the Board of Directors. Vacancies among the officers may be filled at any meeting of the Board of Directors.

## **II. DUTIES OF PRESIDENT**

It shall be the duty of the President to preside at all meetings of the Board; to direct the general course of the business, subject only to the control of the Board of Directors; to sign and execute, on behalf of the Association, all deeds, agreements, contracts, notes, bills of exchange, checks and all other written documents which may require such endorsement, to receipt and give full acquittance for all moneys due the Association and to compromise all claims due the Association; and to do and perform all acts incident to the duties expressly conferred upon him; and to have general charge and control of the property and business of the Association; and to do all other acts incident to his office and usually done or proper to be done by the President of such Association.

## **III. DUTIES OF VICE PRESIDENT**

It shall be the duty of the first Vice President to perform all such functions as belong to the office of the President in the absence of the President, and it shall be the duty of the second Vice President to perform all such functions as belong to the office of President in the absence of both the President and the First Vice President.

## **IV. DUTIES OF SECRETARY**

The Secretary shall give due notice of all meetings of members and of the Board of Directors; he shall prepare and keep proper books of record for the business of the Association, and such other books as the directors may prescribe; he shall countersign and register all certificates of membership, and attest and attach the corporate seal of

the Association to all instruments requiring seal, and perform all such other duties as are incident to his office. He shall be the custodian of the corporate seal.

## V. DUTIES OF TREASURER

The treasurer shall be custodian of the funds of the Association until the same are disposed of by the Board of Directors, and shall keep proper books of account for the business of the Association.

## VI. DUTIES OF BOARD OF DIRECTORS

The Board of Directors shall consist of twelve directors, which shall exercise all the powers of the Association. The number of directors may be decreased from time to time by amendment of the By-Laws, but no decrease shall have the effect of shortening the term of any incumbent directors.

The term of office for directors is three years; each year at the annual meeting four directors shall be elected to fill the vacancies of four directors whose three-year terms have expired.

In any case in which a director has been appointed to fill a vacancy, such director shall serve only until the next annual meeting of the members of the Association, at which time, if the term to which the directors he replaced was elected shall not have expired, a director shall be elected to serve for the remainder of the term.

A director who has served continuously for five or more years shall not be eligible for re-election or appointment as a director until one year after the expiration of said term.

Reasonable opportunity shall be given each member to nominate either himself or any other member for election to the Board of Directors, and if in the judgment of the Board of Directors additional candidates are necessary or desirable it shall act as a nominating committee, so that at least one person will be nominated for each vacancy.

## VII. DIRECTORS' MEETINGS

The annual meeting of the directors shall be held as soon as conveniently practicable following the adjournment of the annual meeting of the members. No special notice of the annual meeting shall be necessary.

Other meetings of the directors shall be held at such times as may be necessary or convenient. Such meetings may be called by the president or by any three members of the Board of Directors by causing notice to be served upon the directors at least two days before the date of the proposed meetings. Directors' meetings shall be held at Big Elk Meadows, Boulder and Larimer Counties, Colorado, or at such other place within the State of Colorado as the person or persons calling the meeting shall

determine. A majority of the directors shall constitute a quorum for the transaction of business.

## VIII. MEMBERS' MEETINGS

Annual meetings of the members of the Association shall be held in the month of March of each year. If the annual meeting be delayed or omitted, the directors of the association shall hold over until their successors are appointed or elected. Special meetings of the members may be called by the Board of Directors or by ten percent of all the members then in good standing.

Notice of meetings shall be given in the writing to each member, and a reasonable opportunity shall be given each member to request the submission of any question to a vote of the membership at annual meetings.

Members may be represented by proxies, which must be exhibited for inspection at each meeting. A majority of the members then in good standing, in person or by proxy, shall constitute a quorum for the transaction of business.

A form of proxy will be given each member which will allow each member to vote separately on each question which it can be anticipated will be submitted to the membership, including the election of directors; and a proxy statement of the membership, and the Board of Directors' recommendation with respect thereto.

At the regular meetings of the members, the following shall be the order of business:

- (1) Inspection of proxies. (2) Election of directors. (3) Reports of officers.
- (4) Unfinished business. (5) New business.

Items listed on an agenda and proxy statement, and on which the form of proxy for the meeting requests a vote, shall be considered as unfinished business; and items not on the agenda of the meeting shall be considered as new business.

## IX. REMOVAL OF AN OFFICER

Any officer of the Association may be removed from office at any time, notwithstanding that his term is not expired, by a majority vote of the Board of Directors. Any director or directors of the Association may be removed at any time by a majority vote of the members represented in person or by proxy at a special meeting called for the purpose of such removal, or by written notice signed by a majority number of the members then in good standing.

## X. INDEMNIFICATION OF DIRECTORS AND OFFICERS



Each director and officer of the Association shall be indemnified by the Association against expenses reasonably incurred by him in connection with any action, suit or proceeding to which he may be made a party by reason of his being or having been a director or officer of the Association (whether or not he continues to be a director or officer at the time of incurring such expenses), except in relation to the matters as to which he shall finally be adjudged in such by him in violation of his duty and authority as such director or officer. The foregoing right of indemnification shall not be exclusive of any rights to which any director or officer may be entitled as a matter of law.

## **XI. VACANCIES**

Vacancies occurring in the Board of Directors or in the officers of the Association by reason of the death, resignation or refusal of an officer or director to act, or from other cause, may be filled by vote of the remaining number of members of the Board of Directors.

## **XII. NOTICES**

The purpose of any special meeting of the directors or of the members shall be contained in a notice to such directors or members. Notice of members' meetings shall be made pursuant to statute. Notice of directors' meetings may be made by telephone, telegram, writing delivered personally, or written notice mailed by depositing in the United States mail addressed to the director at his address as it appears in the records of the Association with postage thereon prepaid. Any member or director may waive in writing any notice required by these By-Laws or by the statutes of the State of Colorado, before, or after any such meetings.

## **XIII. DIVIDENDS**

No dividend or distribution of the property of the Association shall be made until all debts are fully paid and then only upon the final dissolution of the Association.

## **XIV. CONSOLIDATION OR MERGER**

The Association may be merged or consolidated with any other corporation upon compliance by the members and the Board of Directors within the statutes of the State of Colorado regarding mergers and consolidation of corporations.

## **XV. AMENDMENTS**

These By-Laws may be changed or amended by the affirmative vote of a majority of the members represented in person or by proxy at any regular members or any special meeting of the members called for that purpose.

## XVI. MEMBERSHIP

Subject to the following two exceptions, one membership shall be appurtenant to each lot as shown by the recorded plat of Big Elk Meadows Subdivision in accordance with the Declaration and Agreement of Protective Covenants executed by Big Elk Meadows, In., dated August 2, 1966, recorded in Boulder County, Colorado, Film 577, Reception No. 822910 and in Larimer County, Colorado, Book 1366, Page 533, the Certificate of Incorporation, and these By-Laws.

*Exception #1:* If more than one such platted lots are owned in the name of or by a common entity, which had fewer memberships than lots, then in that event, upon the conveyance of an excess lot upon construction of any inhabitable improvement upon assessments, shall be purchased from the Association for and allocated to said lot.

*Exception #2:* If such a platted lot is owned by a corporation, partnership, association, or similar entity, then in addition to the membership appurtenant to such lot, the Board of Directors may levy an additional use charge depending upon the eligible users of such property. Such use charge, if any, shall be determined annually the Board of Directors after having received a list of all owners/ stockholders/ officers/ partners/ employees/ directors who are eligible to use such property from owing entity on or before each annual meeting of the members of the Association.

The secretary shall maintain a list of those memberships in good standing, shall be entitled to one vote at any annual or special meeting of the members. If any membership shall fail to timely pay the annual or any special assessment levied against it by the Association, or shall fail to timely provide the list of those who are eligible to use such property (see Exception #2) within thirty days after having been notified in writing by the Board of Directors of said delinquency, it shall not be considered to be in good standing and it shall not be entitled to use or benefit of the common facilities maintained or operated by this Association for the use of the members until delinquency is remedied.

## XVII. MEMBERSHIP ASSESMENTS

This Association is responsible for the operation and maintenance of the roads and streets, the lakes, including the stocking of fish, and dams and spillways, the horse corrals and fences, the recreational area and picnic facilities including the swimming pool and any other operations in conjunction with the maintenance of Big Elk Meadows with the exceptions of the maintenance and of the water system in Big Elk Meadows, which is being operated by Big Elk Meadows Water Association.

In order to provide for the necessary expenses of the operation of the Association, the Board of Directors shall levy assessments, which assessments shall be fixed by the

membership each year, either at the annual meeting or a special meeting called for that purpose. In the event the members do not or are not able for any reason to fix an assessment for any particular year pursuant to these By-Laws, the assessment for such year shall be the same amount as for the previous year.

This Association may purchase or otherwise acquire various capital improvements as specifically approved by the membership.

In order to provide for such expenditures, the membership may levy a special assessment either at an annual meeting or a special meeting called for that purpose.

Such assessments, whether for expense or capital expenditures or both, when not timely paid, shall be lien upon the lot or lots and the improvement(s) thereon owned by such association member who failed to timely pay such delinquent assessments, and such lien may be foreclosed upon pursuant to article VII of the Declaration and Agreement of Protective Covenants executed by Big Elk Meadows, Inc., dated August 2, 1966, and recorded in Boulder County on Film 577, as Reception No. 822910 and in Larimer County in book 1336 on page 533, and pursuant to Article Twelfth of the Articles of Amendment to Articles of Incorporation filed April 30, 1976, with the Secretary of State's office of the State of Colorado.

## **XVIII. RULES AND REGULATIONS**

The Board of Directors shall have the power to promulgate, publish and enforce such rules and regulations as are reasonably necessary to implement the powers granted to and carry out the duties imposed upon them by the Declaration and Agreement of Protective Covenants, the terms of the Owner's Agreement, the Articles of Incorporation, and these By-Laws, including rules and regulations governing the use of those facilities provided in Big Elk Meadows for the use of the members and their guests, which under the care and control of the Association.

In the event of any breach of the terms or provisions of the Declaration and Agreement of Protective Covenants, the Articles of Incorporation, the Owner's Agreement, or there By-Laws, or any ruled and regulations that may from time to time be in force, the Board of Directors shall have the right to pursue such legal remedies as may be available to the Association, or in lieu thereof, at its election, may levy such user fees as the Board of Directors, in its opinion, may deem just according to the nature of the use. The rules and regulations apply to all members and to the family, guest, or approve tenant of any such members for all of whom the member shall be deemed responsible, and such user fee may be levied against the responsible member.

When a user fee has been levied against any person by final action of the Board of Directors, until the said user fee is paid said person shall be considered as no longer in good standing and he and all persons who would otherwise be entitled thereto shall be

denied the privileges and the use of the recreational area and other common facilities maintained and operated by the Association for the use of the members.

#### **XIX. PURCHASE OF MEMBER'S SITE**

In the event any member desired to sell or otherwise dispose of his site, and the Association elects to purchase said site in accordance with terms and conditions of the agreement previously entered into between the Association and the members, which election so to purchase shall require the affirmative vote of eighty percent (80%) of the entire membership, the purchase price of the property shall be assessed pro-ratably among the members.

Assessments under this Article XIX shall become a lien against the real estate owned by the members in Big Elk Meadows as provided I the Declaration and agreement of Protective Covenants and may be collected by the Association in accordance with appropriate legal procedures.

**Big Elk Meadows Association  
Bylaws & Declaration of Protective Covenants**

## **Declaration and Agreement of Protective Covenants**

Approved: August 1988

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KNOW ALL MEN BY THESE PRESENTS That

WHEREAS the undersigned BIG ELK MEADOWS ASSOCIATION, a Colorado non-profit Corporation, is the owner of the following described real estate, located in Boulder and Larimer Counties, Colorado, to -wit:

See Attachment "A"

WHEREAS pursuant to and in compliance with ARTICLE VI of the DECLARATION AND AGREEMENT OF PROTECTIVE COVENANTS filed August 2, 1966, the attached documentation confirms the legal sufficiency and effectiveness hereof with respect to all real estate included within BIG ELK MEADOWS or otherwise belonging to BIG ELK MEADOWS ASSOCIATION to-wit:

See Attachment "B"

WHEREAS said BIG ELK MEADOWS ASSOCIATION and other owners desire to place certain restrictions on all of the lots and Common Land described above for the use and benefit of said Association and their grantees on order to establish and maintain BIG ELK MEADOWS as a carefully protected residential sub division and community.

WHEREAS the BIG ELK MEADOWS ASSOCIATION, provides for all lot owners in BIG ELK MEADOWS various community services not available otherwise to the individual lot owners and it is required that all such lot owners shall be members of the BIG ELK MEADOWS ASSOCIATION.

WHEREAS the BIG ELK MEADOWS ASSOCIATION, a Colorado non-profit corporation, is the owner of the entire water system and provides domestic water to residents so desiring such water, it is required that all lot owners requiring domestic water shall be members of the BIG ELK MEADOWS WATER ASSOCIATION.

NOW THEREFORE, in consideration of the premises, the BIG ELK MEADOWS ASSOCIATION and other owners for themselves and for their and other grantees, successors and assigns, do hereby impose, establish, publish, acknowledge, declare and agree with, to, and for the benefit of all entities that may hereafter purchase and from time to time hold or own any of the lots in said BIG ELK MEADOWS; that said Association and other owners hold all of the lots and Common Land of said BIG ELK MEADOWS subject to the following restrictions, covenants, and conditions, all of which shall be deemed to run with the land and to inure to the benefit of and be binding upon the owner at any time of any such and all of said lots, their heirs, personal representatives, successors and assigns to-wit:

## ARTICLE I – Definitions

1. “BEMA” as used herein shall mean Big Elk Meadows Association, a Colorado non-profit corporation, and its successors and assigns.
2. “BEWA” as used herein shall mean Big Elk Water Association, a Colorado non-profit corporation, and its successors and assigns.
3. “Big Elk Meadows” as use herein shall mean all real estate and property included within the Big Elk Meadows Subdivision or otherwise belonging to BEMA or BEWA.
4. “Board” as use herein shall mean the Board of Directors of BEMA or BEWA as indicated.
5. “Commercial Use” as use herein shall mean and refer to retail, manufacturing, commercial or wholesale merchandising whereby goods are sold, delivered or provided to a clientele as a business activity.
6. “Common Land” as use herein shall mean all land owned by BEMA and BEWA. It does not include the platted lot that are privately owned or lots owned by BEMA or BEWA.
7. “Guest” as use herein shall mean any person who is not a member of the BEMA, and who is invited by a member to use their residence and /or community facilities at Big Elk Meadows.
8. “Lessee” as use herein shall mean any person or entity that pays a yearly fee for the use of any lot owned by BEMA or BEWA.
9. “Lot” as use herein shall mean a numerically designated building site and tract as shown and described on the recorded subdivision plats of Big Elk Meadows. Said plat(s) and all subsequent amended plat(s) are hereby made a part hereof and incorporated herein by reference.
10. “Member” as use herein shall mean a person or entity that holds a membership in the BEMA or both BEMA and BEWA.
11. “Outbuilding” as use herein shall mean an enclosed covered structure not directly attached to the residence that it services.
12. “Owner” as use herein shall mean owner, whether one or more persons or entities recorded with the County Clerk as having title to any lot, including contract buyers, but excluding those interests merely for the performance of an obligation.

13. "Renter" as use herein shall mean any person or entity that pays a rental fee to a member for the use of their residence at Big Elk Meadows for a period of 30 days or more.
14. "Residence" as use herein shall mean a room of rooms connected together for residential occupancy and including bathrooms and kitchen facilities, and may include any attached or unattached garage facilities.
15. "Single Family Use" as use herein refers to the intended use of residences. Residences in Big Elk Meadows shall be occupied by a male and/or female with their respective unmarried children under the age of 25 years. Married children, children over 25 years, and all other relatives of a member's family shall be considered as guests.

## **ARTICLE II – Use of Land**

1. Use of Common Land owned by the BEMA shall be restricted to members and invited guests and shall be subject to the applicable Rules and Regulations and By-Laws currently in effect.
2. None of the privately owned lots may be improved, used or occupied for other than a Single Family Use. No building of any kind whatsoever shall be constructed, erected, used or maintained except as such a private dwelling, house, or cabin must be free standing and be designed for occupancy by a single family only. There shall not be constructed, erected, used or maintained on any one lot, more than one main dwelling, house, or cabin; and a garage either separate or attached; and a storage shed.
3. Parking for a period in excess of 14 days of motor homes, travel trailers, horse trailers, motorboats, or large vehicles on privately owned lots or Common Land shall be permitted only when such equipment is not readily visible from a Big Elk Meadows road or neighboring residence.
4. No livestock of any description shall be kept or maintained on any part of any lot, provided, however that horses may be kept in the pasture land as may from time to time be designated by BEMA and also in the corral, according to the Rules and Regulations of BEMA. Residents may keep dogs, cats, or such other animals that are bona fide household pets so long as such animals are not kept for commercial purposes.
5. Inoperable, unlicensed, or abandoned vehicles are prohibited on privately owned lots and Common Land.
6. None of the buildings, lots, or residences is to be used for commercial purpose that requires public access.



7. The BEMA reserves for itself and for its grantees, successors and assigns, the right at any time hereafter to install and erect necessary utility poles on any lot, and the BEMA reserves the right to install water lines and mains at any time hereafter on or under any lot; said lines, poles and mains to be placed at a minimum of inconvenience to use and occupancy of any lot.
8. A satellite dish or other large equipment may be placed on privately owned lots if it not readily visible from a Big Elk Meadows road or a neighboring residence. If this is not possible, the dish must be painted to blend with the natural surroundings.
9. Camping in tent, trailer, camper, or motor home is prohibited on all Common Land and on privately owned lots except for brief periods of time with prior approval of the Board of BEMA.
10. Owners of lakeshore lots may not erect fences or any barriers that restrict access to any part of the lakeshore.

### **ARTICLE III – Architectural Control**

1. Before anyone shall commence the construction, reconstruction, remodeling, addition to, or alteration of any building, wall, fence, or any structure whatsoever on any lot, there shall be submitted to the Board of BEMA two complete sets of plans and specifications for said improvements, the erection or alteration of which is desired. No such structure or improvement of any kind shall be erected, altered, placed or maintained upon any lot unless and until the final plans, elevations, and specification thereof have received written approval as herein provided. Such plans shall include plot plans, location of structures on plot plans, improvements, floor plans, fence plans, elevations, showing all aspects of dwelling and development of lot as an architectural unit, together with the proposed color scheme and materials for fences, roofs, and exteriors.
2. The Board of BEMA shall have the right to disapprove any such plans or specifications which are not suitable or desirable on the Board's opinion, and in passing upon such plans or specifications, the Board shall have the right to take into consideration the suitability of the proposed building or other structure and of the materials of which it is to be built, the color scheme, the site upon which it is proposed to erect same, the harmony thereof with the surroundings, the topography of the land and the effect of the building or other structure as planned on the outlook from the adjacent or neighboring property, and if in accordance with all the provisions of this DECLARATION. The Board may disapprove if the plans and specifications submitted are incomplete, or in the event the contrary to the spirit or intent of these conditions and restrictions.
3. Approval of the plans by the Board of BEMA constitutes evidence that the plans comply only with these covenants, and the BEMA and its directors shall not be

responsible on any way for any defects in plans or specifications submitted, revised, or approved in accordance with the foregoing, nor for any structural or other defects in any work done according to such plans and specifications, or for any such work done.

4. No building or improvements of any kind constructed or placed upon any of said lots thereafter shall be moved without the prior written approval of the Board.
5. In the event the Board fails to approve or disapprove within thirty (30) days after plans and specifications have been submitted to it, approval will be deemed to have been issued.

#### **ARTICLE IV – Assessments and Use Fees**

1. All owners of any and all lots shall automatically become a Member of BEMA. In addition all members of BEMA who tap onto the water system operated by BEWA shall automatically become a member of BEWA.
2. Once a member of BEMA or BEWA, the member shall maintain such membership for so long as they shall hold title to any lot, and such owners shall be personally liable for the assessments and use fees of BEMA and/or BEWA as may be uniformly applied to all members and that such assessments and use fees, when not paid as required by the By-Laws of BEMA and/or BEWA, shall be a lien upon the property owned by the member in Big Elk Meadows who has failed to timely pay such delinquent assessments or use fees, and that such lien may be foreclosed against said property by a proceeding in any proper court of the nature of a mortgage foreclosure. Furthermore, in the event of failure to timely pay assessments to BEWA, the Board of BEWA reserves the right to discontinue water service.
3. The BEMA and BEWA, in accord with their By-Laws, shall levy annual assessments, which will be established by the membership each year, either at the annual meeting or a special meeting called for that purpose. In the event the members do not or are not able for any reason to fix the annual dues for any particular year, the annual assessments for such year shall be the same amount as for the previous year.
4. The BEMA and BEWA, in accord with their By-Laws, may levy special assessments to purchase or otherwise acquire capital or other property and improvements by the membership either at the annual meeting or a special meeting called for that purpose.
5. The BEMA, in accord with its By-Laws, may levy use fees against members according to the nature of the use of common land or the individual residence by that member. Examples, but not an inclusive list, are rental of member's residence, group use of the picnic area, group use of the swimming pool, etc. In

all cases such use requires approval of the BEMA Board or the resident caretaker if such responsibility is so delegated.

6. (a) The Owner shall not hereinafter sell or transfer the title to a lot unless the Owner shall first offer to sell or transfer the lot to BEMA upon the same terms and conditions offered the Owner by a bona fide prospective purchaser or transferee.
- (b) If the Owner shall hereafter desire to sell or transfer the title to a lot, the Owner shall so notify BEMA. Such notice shall also state the terms and conditions of any bona fide offer received by the Owner from any prospective purchaser or transferee, and shall also state the name and address of such perspective purchaser or transferee.
- (c) If BEMA desires to purchase the property, it shall give notice to the Owner of its election to exercise the option to purchase herewith granted it within twenty-eight (28) days after its receipt of said notice from the owner.
- (d) If the Association does not notify the Owner of its election to exercise said option to purchase the lot within the time provided for such notice, or if BEMA shall fail to purchase the lot within the time provided, the Owner may make a bona fide sale or transfer of the lot to the prospective purchaser or transferee named in said notice from the Owner to the BEMA upon the same terms and conditions specified in said notice. If, however, the Owner shall fail to make such a bona fide sale or transfer within ninety (90) days after expiration of the time granted BEMA to exercise its said option to purchase, the lot shall upon failure by the Owner again become subject to the terms of this DECLARATION.

#### **ARTICLE V – General Provisions**

1. The BEMA and/or the BEWA, or their duly authorized representative, may lawfully prosecute any proceeding in law against such persons or entities who violate the restrictions, covenants, and conditions contained herein, and may restrain such violation by perpetual or temporary injunction and may recover such damages as may ensue because of such violation, including cost of suit and attorney's fees.
2. Any violation of the restrictions, covenants and the conditions contained herein shall warrant any member of BEMA and/or BEWA subject to these covenants to apply to any court of law having jurisdiction thereof for an injunction or proper relief in order to enforce same.

3. Invalidation of any one or any part of these restrictions, covenants and conditions by judgment or court order shall on no way affect any of the other provisions that shall remain in full force and effect.
4. These restrictions, covenants, and conditions shall bind the BEMA, BEWA and their members, their grantees, successors, and assigns until 25 years from the date of filing of this instrument for recording in the office of the Clerk and Recorder of the Counties of Boulder and Larimer, Colorado, provided, however, that two-thirds of the members of BEMA may at any time release any of the lots or Common Land hereby restricted from any one or more or all of said restrictions, covenants, and conditions by executing and acknowledging an appropriate agreement or agreements in writing for such purpose and filing the same for record in the manner than required for recording of land instruments.
5. The Board of the BEMA and BEWA may at their discretion grant a reasonable variance or adjustment of these restrictions, covenants, and conditions in order to overcome practical difficulties and prevent unnecessary hardships arising by reason of the application of the covenant herein. Such variances shall be granted only in case the granting thereof shall not be materially detrimental or injurious to other property or improvements of the neighborhood and shall not defeat the general intent and purpose of these covenants.
6. No Director or Officer of BEMA or BEWA shall receive any salary, remuneration, gift or other thing of value for services connected with the administration of the affairs of BEMA or BEWA. Expenses incurred in carrying out the duties of an Officer or Director may be refunded only when such expenses are specifically authorized by the respective Board.
7. These restrictions, covenants and conditions shall override and take precedence over anything to the contrary on the Rules and Regulations of BEMA and the prior DECLARATION AND AGREEMENT OF PROTECTIVE COVENANTS filed August 2, 1966.

#### **ARTICLE VI – Damage, Destruction and Condemnation of Common Land**

1. **DAMAGE OR DESTRUCTION:** In the event of damage or destruction due to fire or other disaster of improvements on Common Land, the BEMA and/or BEWA shall cause such improvements to be promptly repaired and reconstructed except in the event that two-thirds of the members of BEMA deem such reconstruction undesirable.
2. **CONDEMNATION:** if at any time or times all or any part of the Common Land shall be taken or condemned by any public authority or sold or otherwise disposed of in lieu of or in avoidance thereof, the following provisions of this article shall apply:

- (a) Proceeds: All compensation, damages or other proceeds there from, the sum of which is hereafter called the "Condemnation Award," shall be payable to the BEMA.
  - (b) Complete Taking: In the event that the entire Common Land is taken or condemned, or sold or otherwise disposed of in lieu or in avoidance thereof, the Condemnation Award shall be apportioned equally among the members, less any outstanding assessments and use fees owed to BEMA and BEWA, and distributed accordingly, provided however, that the share of the Condemnation Award payable to any member shall, upon request of the Encumbrancer of the Member's Lot, be paid to said Encumbrancer rather than to such Member.
  - (c) Partial taking: In the event that less than the entire Common Land is taken or condemned, sold or otherwise disposed of in lieu of or in avoidance thereof, the BEMA shall, as soon as is practicable after receipt of the Condemnation Award, call a special meeting of the BEMA for the purpose of determining the proper application of such proceeds. Notice of such meeting shall be given 30 (thirty) days in advance thereof and such notice shall specify the purpose of such meeting. At such meeting the members shall decide upon the application of such proceeds. Then held by the BEMA. In the event the members are unable to agree upon a course of action in which the Condemnation Award shall be used by the BEMA for repairs to remaining Common Land or facilities within the Common Land remaining, the Condemnation Award shall be apportioned equally among the Members less any outstanding assessments and use fees owes BEMA and BEWA, and distributed accordingly, provided, however, that if the Encumbrancer of any Lot so requests, the share of the Condemnation Award payable to the Owner of said Lot shall instead be paid to such Encumbrancer.
  - (d) Notification of Encumbrancers: The BEMA shall notify every Encumbrancer of the commencement of any condemnation proceedings affecting the Common Land, by publishing Public Notice(s) in major newspapers of Boulder and Larimer Counties, Colorado.
3. EXTERIOR MAINTENANCE: In the event an Owner or Lessee of any Lot shall fail to maintain said lot and the improvements situated thereon in a sanitary, clean, orderly and neat manner satisfactory to the Board of BEMA, the BEMA, after approval by a majority vote of the Board shall have the right, through its agents and employees, to enter upon said Lot and to repair, maintain, restore the Lot and the exterior of the buildings and any other improvements thereon. The cost of such exterior maintenance shall be added to and become part of the assessment to which such Owner is subject.

## ATTACHMENT "A"

### Larimer County:

That part of the E1/2 of SE ¼, Sec. 34, T.4 N., R. 72 W., which lies to the South and East of the westerly property lines of subdivided lots in Big Elk Meadows Subdivision and W ½ of NW ¼ and SE ¼ of NW ¼ and W ½ of NE ¼ of NW ¼ and SW ¼ and W ½ of SE ¼ and SE ¼ of SE ¼, Sec. 35, T.4 N., R. 72 W.;

### Boulder County:

That part of the NE ¼ of NE ¼, Sec. 3, T.3 N., R. 72 W., which lies to the South East of the westerly property lines of subdivided lots in Big Elk Meadows Subdivision, and E ½ of NW ¼ of NE ¼, Sec. 3, T.3 N., R. 72 W.; and N ½ of N ½, Sec. 2, T.3 N., R.72 W.;

### Larimer and/or Boulder Counties:

The Big Elk Meadows Subdivision, the plat(s) of which are recorded as herein above described, inter alia; and

(A) LESS all currently platted lots and blocks, otherwise situated within the area known as Big Elk Meadows Subdivision, which belong to owners other than said BIG ELK MEADOWS ASSOCIATION;

(B) AND LESS a five acre parcel, more or less which lies in the NW corner of the NW ¼ of Sec. 35, T.4 N., R.72 W. to be surveyed and platted as part of the Big Elk Meadows Subdivision to wit:

That potion of the NW ¼ of NW ¼ of Sec.35, T.4 N., R. 72 W., of the 6<sup>th</sup> Principal Meridian, Larimer County, Colorado as described as follows: Beginning at the Northwest corner of said Sec. 35, thence along the North line of said NW ¼ of Sec.35, South 84 42'50" East 130.70 feet to the approximate center of Deer Creek, thence along said approximate center line the following six courses and distances: (1) South 28 44'42" West 32.06 feet, (2) South 29 22'17" East 89.78 feet, (3) North 83 07'21" East 85.59 feet, (4) South 01 23'44" West 37.40 feet, (5) South 86 38'05" East 50.15 feet, (6) South 18 44'22" East 55.91 feet; thence leaving said approximate center line North 83 18'44" East 53.31 feet; thence South 71 20'35" East 11.60 feet to the westerly right of way of Aspen drive, Big Elk Meadows; thence along said right of way South 42 03'10" East 69.64 feet; thence North 71 20'35" West 32.11 feet; thence South 51 02'36" West 83.01 feet; thence South 21 22'18" East 72.62 feet; thence South 33 48'18" East 70.92 feet to the North line of Lot 41, Tract 5, Big Elk Meadows; thence along said North line South 78 28'10" West 198.5 feet to the Westerly line of said Tract 5, thence along said westerly line South 11 31'50" East 343.44 feet; thence South 78 28'10" West 276.95 feet to the West line of said NW ¼ of said Sec. 35; thence along said West line North 0 11'46" East 850.47 feet to the point of beginning containing five acres more or less.

**Big Elk Water Association  
Articles of Incorporation**

# **Certificate of Incorporation of Big Elk Meadows Water Association (Non-Profit)**

As amended on April 30, 1976

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## **FIRST**

The corporate name and style of said corporation shall be BIG ELK MEADOWS ASSOCIATION.

## **SECOND**

The objects for which this corporation is formed are:

1. To supply water by mains or pipes to the owners or lessees of residential sites located in Big Elk Meadows, Boulder and Larimer Counties, Colorado, as shown by the recorded plat of Big Elk Meadows.
2. To construct and operate water works, pipe lines, mains and any and all equipment necessary to furnish water for domestic purposes to the members of the Association.
3. To buy, sell, lease, let and sublet, hold, deal in and with and subdivide real property wherever situate and all character of interests, rights and estates in or to real property.
2. To purchase and otherwise to acquire personal property of every class and description, tangible and intangible, and to hold, own, sell, bail and otherwise dispose of, care for, repair, trade deal in and deal with them.
3. To buy, sell, pledge, encumber, trade, exchange, hold, deal in and deal with interest and dividend bearing securities of all kinds, including bonds, mortgages, and all varieties of commercial paper, secured or unsecured, and also with any other or right of possible or probable value.
4. To lend money and take real or personal or no security for the repayment of the same.
5. To construct or remove improvements on real property; to equip such improvements with fixtures, furniture and personal property, and to manage, use, operate and work all real property owned or otherwise held or controlled by the corporation, whether improved or unimproved.
6. To own real and personal property, both within and without the State of Colorado, and to conduct business in any and all parts of the world.
7. To borrow money and obtain credit; to issue bonds or other obligations in payment for property purchased or acquired by the corporation, or for any other object in or about its business; to mortgage or pledge any stocks, bonds or other



obligations, or any property which may be acquired by it, to secure any bonds or other obligations by it issued or incurred.

8. To buy , sell, pledge, encumber, trade, exchange, hold, deal in and deal with shares of the capital stock of any and all corporations for whatever purpose and under whatever laws such corporations may be organized, and whether such shares of stock be preferred or common or with or without voting power, and to exercise all voting rights and other privileges incident to the same.
9. To aid and assist other persons, firms and corporations by advancement of money, guaranty of obligations or contracts, loans of property, or otherwise.
10. To conduct any operation within the scope of its objects and powers, either in its own behalf or its agent, and to act as agent in any one or more phases of any business or operations within the scope of its objects and powers.
11. The foregoing clauses shall be constructed both as objects and as powers, and the statements contained in each clause, except where otherwise expressed, shall be in no way limited or restricted by reference to or inference from the terms of any other clause, but shall be regarded as independent purposes and powers, and it is expressly declared that all other lawful powers not inconsistent therewith hereby included.

### **THIRD**

Said corporation is to have perpetual existence.

### **FOURTH**

This corporation is not for profit and has no capital stock.

### **FIFTH**

The corporation shall have no less than six (6) nor more than twelve (12) directors who shall manage the affairs of the corporation.

The number of directors may be increased or decreased within the limits herein under provide at any annual meeting of the members.

### **SIXTH**

The principal office of the corporation shall be in Big Elk Meadows, Larimer County, State of Colorado, but the corporation may establish and maintain offices elsewhere as its By-Laws may provide and as the Board of Directors may deem advisable. The Principal activities and operations of the corporation may be extended to any other counties within the state of Colorado or to any other states or territories of the United States.

## **SEVENTH**

The members by the majority vote shall have the power to make and amend, modify, repeal or revoke such By-Laws as they may deem proper for the management of the affairs of the corporation not inconsistent with the laws of the state of Colorado.

## **EIGHTH**

The Certificate of Incorporation may be amended upon two-thirds (2/3) vote of the members of the incorporation.

## **NINTH**

No director of this corporation shall receive any salary, remuneration, gift or other thing of value for services connected with the administration of the affairs of the corporation. Personal expenses incurred carrying out the duties of an officer or director may be refunded when authorized by the directors.

## **TENTH**

No dividend or distribution of the property of the corporation shall be made until all debts are fully paid, and then only upon its final dissolution and surrender of organization and name; nor shall the corporation be dissolved or distribution be made upon two-thirds (2/3) vote of the entire membership.

## **ELEVENTH**

The only members of the Big Elk Meadows Water Association shall be those persons who own cabin sites at Big Elk Meadow, in the Counties of Boulder and Larimer, State of Colorado, as shown on the recorded plat of Big Elk Meadows, or who lease cabin sites at Big Elk Meadows from Big Elk Meadows, Inc. or its successors or assigns, and who are using for domestic purposes water furnished by this corporation, or hereafter elect to use said water and pay the required tap fee or other charges or assessments as required by the By-Laws.

## **TWELFTH**

The operation of the corporation shall be financed by assessments against the members as provided in the By-Laws of the Association.

/s/ Robert M. Swope  
Its President

/s/Rita Roos  
Its Secretary

**Big Elk Water Association  
Bylaws**

# **By Laws of the Big Elk Water Association**

Adopted: January 19, 1967  
Revised: March 31, 1975 and March 28, 1983

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## **I. OFFICERS**

The officers of this Association shall consist of a President, a First Vice President, a Second Vice President, a Secretary and Treasurer, who shall be chosen by the directors at their first meeting following the annual meeting of the members each year. They shall be elected for a term of one year or until their respective successors are elected and qualified. The Board of Directors may appoint such additional officers as shall be deemed advisable, who shall be members of the Association, and who may, but need not, be members of the Board of Directors. Vacancies among the officers may be filled at any meeting of the Board of Directors.

## **II. DUTIES OF PRESIDENT**

It shall be the duty of the President to preside at all meetings of the Board; to direct the general course of the business, subject only to the control of the Board of Directors; to sign and execute, on behalf of the Association, all deeds, agreements, contracts, notes, bills of exchange, checks and all other written documents which may require such endorsement, to receipt and give full acquittance for all moneys due the Association and to compromise all claims due the Association; and to do and perform all acts incident to the duties expressly conferred upon him; and to have general charge and control of the property and business of the Association; and to do all other acts incident to his office and usually done or proper to be done by the President of such Association.

## **III. DUTIES OF VICE PRESIDENT**

It shall be the duty of the first Vice President to perform all such functions as belong to the office of the President in the absence of the President, and it shall be the duty of the second Vice President to perform all such functions as belong to the office of President in the absence of both the President and the First Vice President.

## **IV. DUTIES OF SECRETARY**

The Secretary shall give due notice of all meetings of members and of the Board of Directors; he shall prepare and keep proper books of record for the business of the Association, and such other books as the directors may prescribe; he shall countersign and register all certificates of membership, and attest and attach the corporate seal of the Association to all instruments requiring seal, and perform all such other duties as are incident to his office. He shall be the custodian of the corporate seal.

## **V. DUTIES OF TREASURER**

The treasurer shall be custodian of the funds of the Association until the same are disposed of by the Board of Directors, and shall keep proper books of account for the business of the Association.

## **VI. DUTIES OF BOARD OF DIRECTORS**

The Board of Directors shall consist of twelve directors, which shall exercise all the powers of the Association. The number of directors may be decreased from time to time by amendment of the By-Laws, but no decrease shall have the effect of shortening the term of any incumbent directors.

The term of office for directors is three years; each year at the annual meeting four directors shall be elected to fill the vacancies of four directors whose three-year terms have expired.

In any case in which a director has been appointed to fill a vacancy, such director shall serve only until the next annual meeting of the members of the Association, at which time, if the term to which the director he replaced was elected shall not have expired, a director shall be elected to serve for the remainder of the term.

A director who has served continuously for five or more years shall not be eligible for re-election or appointment as a director until one year after the expiration of said term.

Reasonable opportunity shall be given each member to nominate either himself or any other member for election to the Board of Directors, and if in the judgment of the Board of Directors additional candidates are necessary or desirable it shall act as a nominating committee, so that at least one person will be nominated for each vacancy.

## **VII. DIRECTORS' MEETINGS**

The annual meeting of the directors shall be held as soon as conveniently practicable following the adjournment of the annual meeting of the members. No special notice of the annual meeting shall be necessary.

Other meetings of the directors shall be held at such times as may be necessary or convenient. Such meetings may be called by the president or by any three members of the Board of Directors by causing notice to be served upon the directors at least two days before the date of the proposed meetings. Directors' meetings shall be held at Big Elk Meadows, Boulder and Larimer Counties, Colorado, or at such other place within the State of Colorado as the person or persons calling the meeting shall determine. A majority of the directors shall constitute a quorum for the transaction of business.

## VIII. MEMBERS' MEETINGS

Annual meetings of the members of the Association shall be held in the month of March of each year. If the annual meeting be delayed or omitted, the directors of the association shall hold over until their successors are appointed or elected. Special meetings of the members may be called by the Board of Directors or by ten percent of all the members then in good standing.

Notice of meetings shall be given in the writing to each member, and a reasonable opportunity shall be given each member to request the submission of any question to a vote of the membership at annual meetings.

Members may be represented by proxies, which must be exhibited for inspection at each meeting. A majority of the members then in good standing, in person or by proxy, shall constitute a quorum for the transaction of business.

A form of proxy will be given each member which will allow each member to vote separately on each question which it can be anticipated will be submitted to the membership, including the election of directors; and a proxy statement of the membership, and the Board of Directors' recommendation with respect thereto.

At the regular meetings of the members, the following shall be the order of business:

- (1) Inspection of proxies. (2) Election of directors. (3) Reports of officers.
- (4) Unfinished business. (5) New business.

Items listed on an agenda and proxy statement, and on which the form of proxy for the meeting requests a vote, shall be considered as unfinished business; and items not on the agenda of the meeting shall be considered as new business.

## IX. REMOVAL OF AN OFFICER

Any officer of the Association may be removed from office at any time, notwithstanding that his term is not expired, by a majority vote of the Board of Directors. Any director or directors of the Association may be removed at any time by a majority vote of the members represented in person or by proxy at a special meeting called for the purpose of such removal, or by written notice signed by a majority I number of the members then in good standing.

## X. IDEMNIFICATION OF DIRECTORS AND OFFICERS

Each director and officer of the Association shall be indemnified by the Association against expenses reasonably incurred by him in connection with any action, suit or proceeding to which he may be made a party by reason of his being or having been a director or officer of the Association (whether or not he continues to be a director or

officer at the time of incurring such expenses), except in relation to the matters as to which he shall finally be adjudged in such by him in violation of his duty and authority as such director or officer. The foregoing right of indemnification shall not be exclusive of any rights to which any director or officer may be entitled as a matter of law.

#### **XI. VACANCIES**

Vacancies occurring in the Board of Directors or in the officers of the Association by reason of the death, resignation or refusal of an officer or director to act, or from other cause, may be filled by vote of the remaining number of members of the Board of Directors.

#### **XII. NOTICES**

The purpose of any special meeting of the directors or of the members shall be contained in a notice to such directors or members. Notice of members' meetings shall be made pursuant to statute. Notice of directors' meetings may be made by telephone, telegram, writing delivered personally, or written notice mailed by depositing in the United States mail addressed to the director at his address as it appears in the records of the Association with postage thereon prepaid. Any member or director may waive in writing any notice required by these By-Laws or by the statutes of the State of Colorado, before, or after any such meetings.

#### **XIII. DIVIDENDS**

No dividend or distribution of the property of the Association shall be made until all debts are fully paid and then only upon the final dissolution of the Association.

#### **XIV. CONSOLIDATION OR MERGER**

The Association may be merged or consolidated with any other corporation upon compliance by the members and the Board of Directors within the statutes of the State of Colorado regarding mergers and consolidation of corporations.

#### **XV. AMENDMENTS**

These By-Laws may be changed or amended by the affirmative vote of a majority of the members represented in person or by proxy at any regular meeting or any special meeting of the members called for that purpose.

#### **XVI. MEMBERSHIP**

The only members of Big Elk Water Association shall be those persons who own cabin sites at Big Elk Meadows in the Counties of Boulder and Larimer, State of

Colorado, as shown on the recorded plat of Big Elk Meadows or, who lease cabin sites at Big Elk Meadows from Big Elk Meadows, Inc. or its successors and assigns and who are using for domestic purposes water furnished by this corporation, or hereafter elect to use said water and pay the required tap fee or other charges or assessments as required by the By-Laws.

## XVII. ASSESSMENTS

The members at the annual meeting or at any special meeting shall fix the amount or special assessments to be paid by each member during the next fiscal year which assessments shall be sufficient to cover estimated costs of the operation of the Association during the following fiscal year, including secretarial and bookkeeping expenses, maintenance, repairs and operating costs, retirement of debt, if any, depreciation if applicable and all other expenses necessary for the operation of the Association.

If the members shall fail or refuse to fix the amount of an assessment for any year, pursuant to these By-Laws, for any reason, the amount of the assessment for such year shall be the same as for the previous year.

In the event a member fails to pay the annual or special assessment within 60 days from the date of mailing of notice of assessment by the secretary, such assessment(s) shall be lien upon the lot or lots owned by such Association member, and such lien may be foreclosed upon pursuant to article VII of the Declaration and Agreement of Protective Covenants executed by Big Elk Meadows, Inc., dated August 2, 1966, and recorded in Boulder County on Film 577, as Reception No. 822910 and in Larimer County in book 1336 on page 533, and pursuant to Article Twelfth of the Articles of Amendment to Articles of Incorporation filed April 30, 1976, with the Secretary of State's office of the State of Colorado.

## XVIII. RULES AND REGULATIONS

The Board of Directors shall have the power to promulgate, publish and enforce such rules and regulations as are reasonably necessary to implement the powers granted to and carry out the duties imposed upon them by the Articles of Incorporation, The User's Agreement, or these By-Laws, including rules and regulations governing the use of the water, or other services furnished by the Association.

In the event of any breach of rules and regulations that may from time to time be in force, the Board of Directors shall have the right to pursue such legal remedies as may be available to the Association, or in lieu thereof, at its election, to levy such penalties as the Board of Directors, in its opinion, may deem just according to the nature of the offense, or to terminate water service to the member, or both, and if services are terminate, to require an appropriate tap fee or other charge before re-establishment of service.



*The Big Elk Meadows Raw Water Project loan will provide capital for three raw water projects.*

- *Meadow Lake Dam Outlet Replacement*
- *Raw Water Monitoring Facilities & Compliance*
- *ISH Reservoir Augmentation Facility*

*Below is a recap of each project.*

### **MEADOW LAKE DAM OUTLET REPLACEMENT**

*On November 7, 2008, an inspection of Meadow Lake Dam by the Colorado Division of Water Resources revealed that the outlet conduit from the dam to the river was failing. BEMA received notice that we must begin the engineering for rehabilitation of the Meadow Lake Dam outlet conduit.*

*BEMA retained an engineer to study alternates to correct this deficiency. Several methods were considered:*

- *Open Cut Plan - This would require draining the lake, substantial breaching of the dam, removal of the existing 6" CMP pipe, and installation of a new 12" concrete outlet pipe and structures.*
- *Over Dam Siphon - An over dam siphon system was developed, which allows pumping of water to create a siphon and release of water downstream through this 12" piping system.*

*The over dam siphon system was selected, and Gauthiere Engineering was retained to prepare working drawings for construction. Working drawings are complete and have been submitted to John Batka at the Colorado Division of Water Resources for approval. Approval is expected in November 2011.*

*The following drawings are attached for your review:*

- *Meadow Lake Dam Siphon Review*
- *Meadow Lake Dam Siphon Profile*
- *Lake Profile*

*Estimated costs for this project are contained in Tab 6 - Cost Estimate.*

# MEADOW LAKE DAM OUTLET REPLACEMENT PROJECT

BIG ELK MEADOWS WATER ASSOCIATION  
WATER DIVISION 1 WATER DISTRICT 4 DAMID 040229  
LARIMER COUNTY, COLORADO

VERTICAL DATUM:  
BENCHMARK OF-DAL SET #4 REBAR WITH "F" ALUMINUM CAP  
ELEVATION 7497.78 (NAVD 83) PER NGS OPUS-RS SOLUTION REPORT DATED  
SEPTEMBER 14, 2009

HORIZONTAL DATUM:  
NAD 83 STATE PLANE COORDINATE AND ASSOCIATED DATUM  
HORIZONTAL CONTROL BASED UPON NGS DESIGNATION ZEBARTH, FOUND  
3 1/2" BRASS CAP IN RED GRANITE ROCK STAMPED "ZEBARTH 1995"  
NAD 83 1338650.51 E=3224812.72

NOTE: DRAWING IS AT UNIFORM STATE PLANE TO REFLECT TO STATE  
PLANE COORDINATES, SCALE AT 0.99999203 (1:1000000) ABOUT THE  
ORIGIN 0,0.

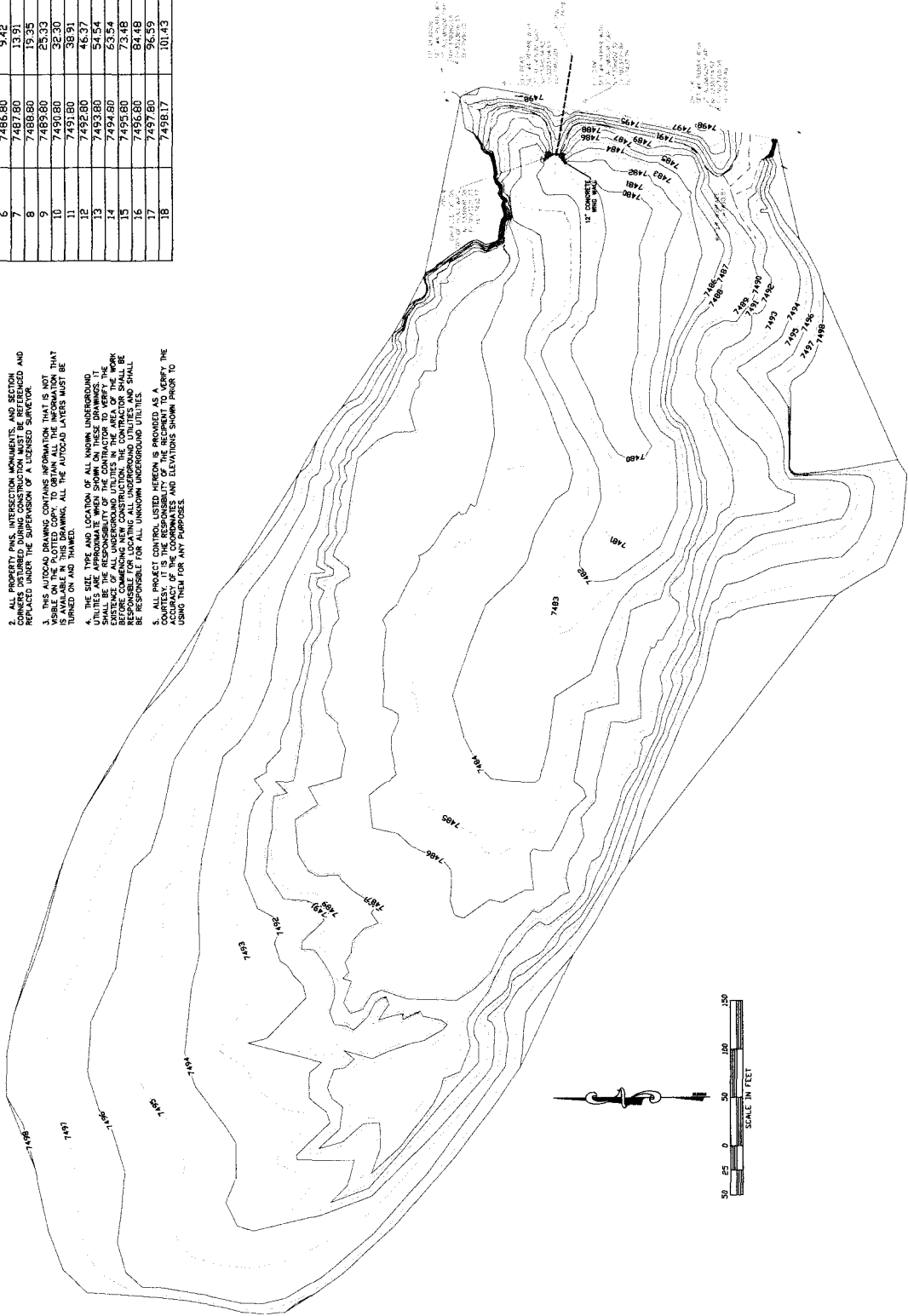
2. ALL PROPERTY PINS, INTERSECTION MONUMENTS, AND SECTION  
CORNERS SHOWN ON THIS DRAWING ARE TO BE RECORDED AND  
RECORDED UNDER THE COLORADO RECORDED ACT, SECTION 38-1-101, C.R.S.

3. THIS AUTOCAD DRAWING ORIGINATES INFORMATION THAT IS NOT  
VISIBLE ON THE PLOTTED COPY. TO OBTAIN ALL THE INFORMATION THAT  
IS AVAILABLE IN THIS DRAWING, ALL THE AUTOCAD LAYERS MUST BE  
TURNED ON AND PRINTED.

















THE LOCATION OF ALL KNOWN UNDERGROUND  
UTILITIES ARE APPROXIMATELY SHOWN ON THESE DRAWINGS. IT  
SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE  
LOCATION OF ALL KNOWN UNDERGROUND UTILITIES PRIOR TO ANY  
WORK BEING COMMENCED. THE CONTRACTOR SHALL BE  
RESPONSIBLE FOR LOCATING ALL UNDERGROUND UTILITIES AND SHALL  
BE RESPONSIBLE FOR ALL UNDERGROUND UTILITIES.

ALL DISTANCES, BEARING, AND ELEVATIONS SHOWN PRIOR TO THE  
COURTESY OF THE COORDINATES AND ELEVATIONS SHOWN PRIOR TO  
USING THEM FOR ANY PURPOSES.

GAGE HEIGHT (FEET)	ELEVATION (FEET)	CAPACITY (ACRE FEET)	NOTE
0	7497.80	0	
1	7498.80	1.41	
2	7499.80	3.15	
3	7500.80	5.72	
4	7501.80	8.12	
5	7502.80	13.91	
6	7503.80	19.35	
7	7504.80	25.33	
8	7505.80	30.91	
9	7506.80	46.37	
10	7507.80	54.54	
11	7508.80	63.54	
12	7509.80	73.48	
13	7510.80	84.48	
14	7511.80	96.59	
15	7512.80	107.43	
16	7513.80		
17	7514.80		
18	7515.80		



# LEGEND

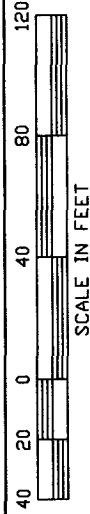
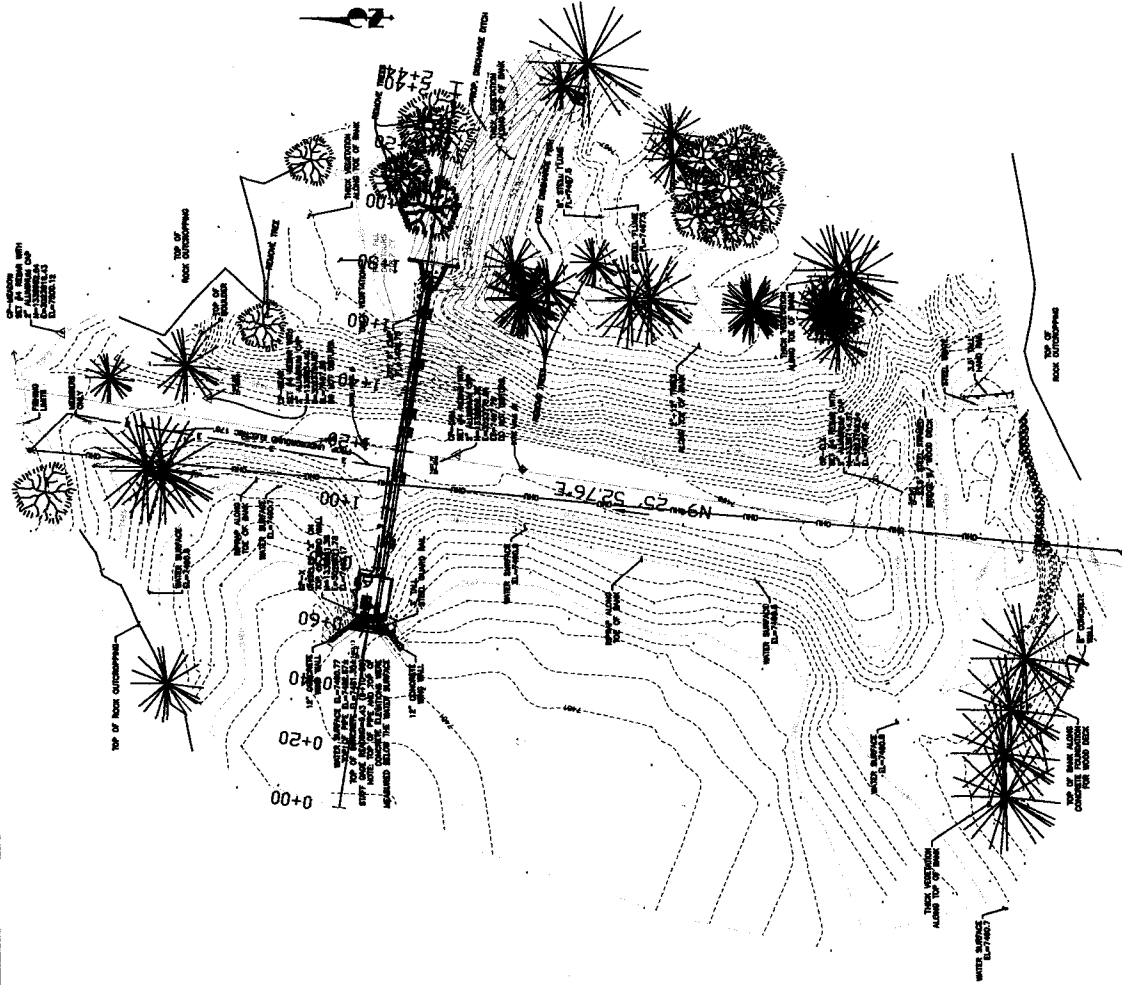
	PINE TREE		EDGE OF ASPHALT
	DECIDUOUS TREE		EDGE OF LANDSCAPING
	SIGN		FENCE LINE
	ROCK		GUARD RAIL
	POWER POLE		PIPE
	GUY WIRE		UNDERGROUND POWER LINE
	CONTROL POINT		ONE FOOT CONTOUR
	NGS CONTROL		FIVE FOOT CONTOUR

**VERTICAL DATUM:**  
BENCHMARK: CP-DAM, SET #4 REBAR WITH 2" ALUMINUM CAP, EL=7497.79 (NAVD 88) PER NGS OPUS-RS SOLUTION REPORT DATED SEPTEMBER 14, 2009

**HORIZONTAL DATUM:**  
COLORADO STATE PLANE COORDINATES NAD 83(2007) DATUM. HORIZONTAL CONTROL BASED UPON NGS DESIGNATION ZIEBARTH, FOUND 3 1/2" BRASS CAP IN RED GRANITE ROCK STAMPED "ZIEBARTH 1999".  
N=1333850.51 E=3024812.72

## NOTE:

1. THIS DRAWING IS AT MODIFIED STATE PLANE. TO REDUCE TO STATE PLANE COORDINATES, SCALE AT 0.99959305 (1.000407116) ABOUT THE ORIGIN 0,0.
2. ALL PROPERTY PINS, INTERSECTION MONUMENTS, AND SECTION CORNERS DISTURBED DURING CONSTRUCTION MUST BE REFERENCED AND REPLACED UNDER THE SUPERVISION OF A LICENSED SURVEYOR.
3. THIS AUTOCAD DRAWING CONTAINS INFORMATION THAT IS NOT VISIBLE ON THE PLOTTED COPY. TO OBTAIN ALL THE INFORMATION THAT IS AVAILABLE IN THIS DRAWING, ALL THE AUTOCAD LAYERS MUST BE TURNED ON AND THAWED.
4. THE SIZE, TYPE AND LOCATION OF ALL KNOWN UNDERGROUND UTILITIES ARE APPROXIMATE WHEN SHOWN ON THESE DRAWINGS. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE EXISTENCE OF ALL UNDERGROUND UTILITIES IN THE AREA OF THE WORK BEFORE COMMENCING NEW CONSTRUCTION. THE CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING ALL UNDERGROUND UTILITIES AND SHALL BE RESPONSIBLE FOR ALL UNKNOWN UNDERGROUND UTILITIES.
5. ALL PROJECT CONTROL LISTED HEREON IS PROVIDED AS A COURTESY. IT IS THE RESPONSIBILITY OF THE RECIPIENT TO VERIFY THE ACCURACY OF THE COORDINATES AND ELEVATIONS SHOWN PRIOR TO USING THEM FOR ANY PURPOSES.



**BIG ELK MEADOWS ASSOCIATION**  
**MEADOW LAKE DAM PROP. SIPHON PLAN VIEW**

Figure No. 5 Page 21

Date: JUNE 20, 2011

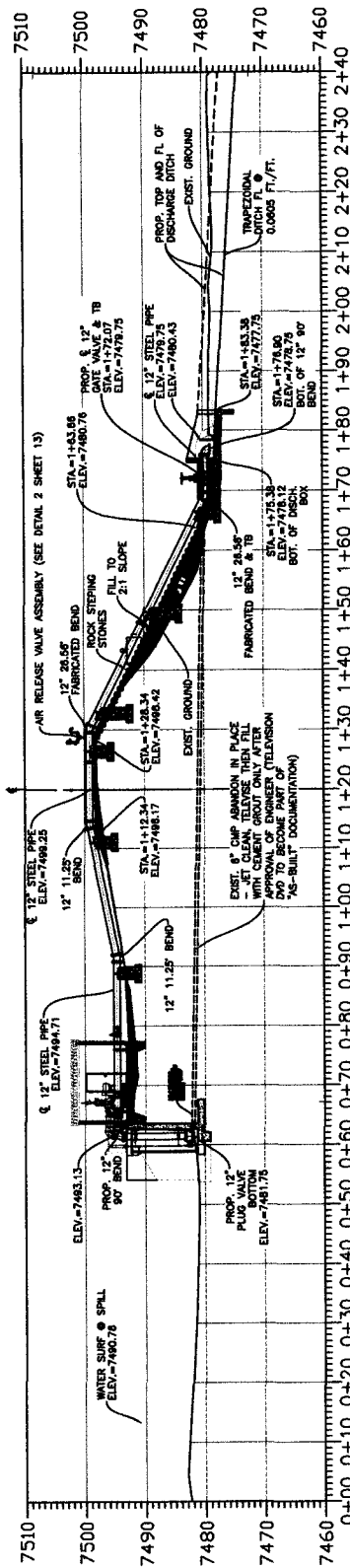
Scale: 1"=40'

Drawn By: JGG

File:

GAUTHIER ENGINEERING, INC.

2157 Buena Vista Drive  
Greeley, Colorado 80634  
Phone: (970) 330-0855  
E-mail: jgauthier-engineering.com  
Fax: (970) 330-0855



1 PROPOSED SIPHON PROFILE VIEW

GAUTHIER ENGINEERING, INC.	Date: JUNE 20, 2011	BIG ELK MEADOWS ASSOCIATION
2157 Buena Vista Drive Greeley, Colorado 80634 Phone: (970) 330-0855 E-mail: jguth@gauthier-engineering.com Fax: (970) 330-0855	Scale: 1"=20'	MEADOW LAKE DAM PROP. SIPHON PROFILE
Drawn By: JGG	File:	Figure No. 6 Page 22



### **RAW WATER MONITORING FACILITIES & COMPLIANCE**

*In 2010, the State Engineer's Office Department of Water Resources initiated a review of Big Elk Meadows water accounting and management practices. The review is ongoing and has to date, resulted in the following:*

- *Big Elk Meadows has retained the services of Wright Water Engineers to perform exhaustive review of our water rights and management practices in order to bring compliance with current Colorado protocol and to assure compliance with our various decrees.*
- *Installation of electronic recording devices in addition to our existing inflow and outflow flumes.*
- *A review of our 60 year old jurisdictional dam and release structure, leading to a determination that the current release structure is old, deteriorating, and does not allow for sufficient release volumes. An engineered solution approved by the State Engineer's office is pending funding.*
- *A requirement that Big Elk Meadows comply with the terms of its 1995 decree pertaining to return flows of 13.15 acre feet annually. It has been determined that this can be accomplished by entering into a cooperative agreement with Riverglen subdivision which operates an underground irrigation system drawing water from ISH Reservoir. Big Elk Meadows would extend from the exit (drain out point) pipe of Riverglen's irrigation system for approximately 450 feet, connecting to the Little Thompson River above the Osborn Caywood ditch, which is just above the Rockwell headgate. (Riverglen project)*

*Estimated costs for this project are contained in Tab 6 - Cost Estimate.*

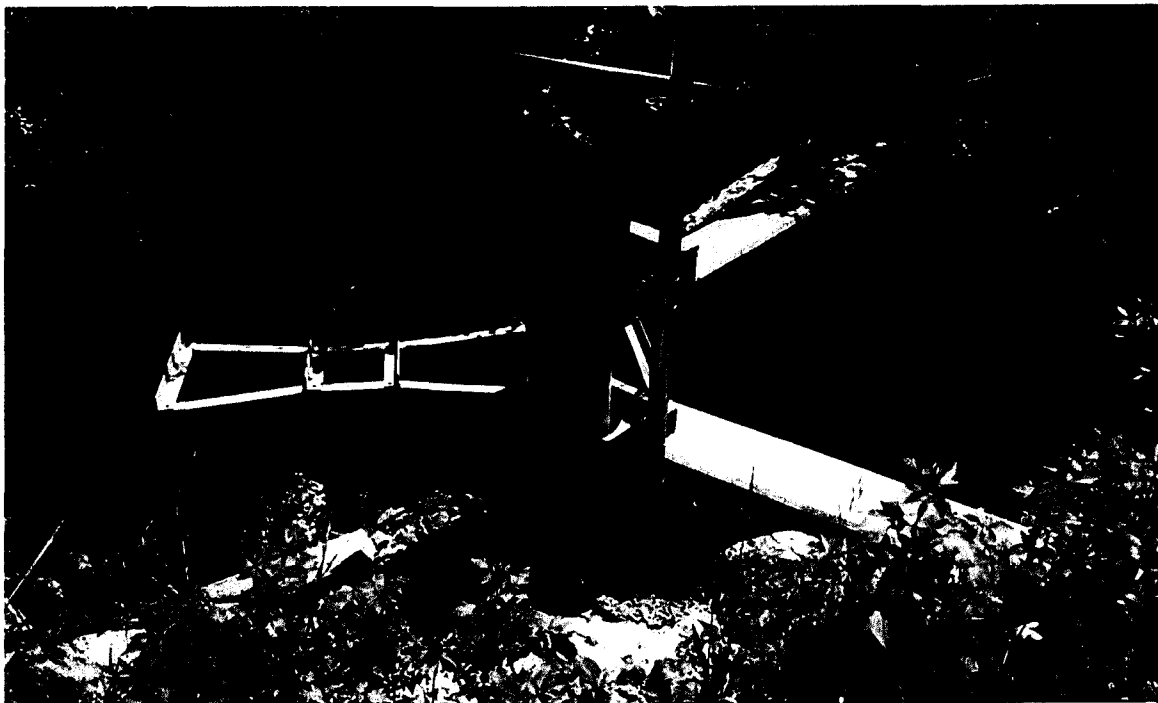
*Accomplishment of the above items will serve to preserve the established aquatic environment of the Big Elk Meadows area, enhance the equitable delivery of water to downstream users on the Little Thompson River, upgrade raw water infrastructures, and preserve Big Elk Meadow's existing water rights.*

*To meet these monitoring and review requirements, BEMA has undertaken the following:*

- *Monitoring installation (In-House)*
- *Legal/Engineering Review - Wright Water Engineers*



*Inlet Monitoring*



*Outlet Monitoring*





### **ISH RESERVOIR AUGMENTATION FACILITIES**

Big Elk Meadows maintains within the area of its community, five small lakes located in Boulder and Larimer counties near the headwaters of the West Fork of the Little Thompson River, along with the accompanying streams, wetlands, and wildlife habitat. These lakes have an adjudicated storage priority of 1971 (appropriated use date, 1954) for 108.95 acre feet of water and are further managed under a Plan of Augmentation, case #95CW238, dated 1995. This plan of augmentation provides for an exchange of water from ISH reservoir based on 12 shares of Boulder & Larimer Irrigation and Manufacturing Ditch Company owned by Big Elk Meadows. The 1995 Plan of Augmentation also provides for storage in Big Elk Meadows of water for augmentation purposes. Water for augmentation purposes can only be stored under this 1995 storage priority of the 1995 exchange priority.

Big Elk Meadows uses its 1995 exchange and storage water for domestic consumption for approximately 160 homes, stock watering, fire fighting, irrigation, recreation, piscatorial, and augmentation. The 1971 priority water may be used for all of the above except augmentation.

Big Elk Meadows is required under the terms of the 1995 decree to provide return flows to the Little Thompson of 13.15 acre feet annually based on the historic return flows of those 12 shares. The intention of the decree was to deliver this water from the ISH Reservoir. This water must be returned to the Little Thompson River above the Rockwell headgate, which is many miles downriver from Big Elk Meadows, and currently, there is no way to get water from ISH Reservoir to the Little Thompson.

BEMA has undertaken a plan to return flows to the Little Thompson River. A community known as Riverglen lies between ISH Reservoir and the Little Thompson. We have developed a plan to utilize their existing irrigation infrastructure, coupled with a 420 foot, 8" diameter pip and associated valves which will reach to the Little Thompson River. This system will be utilized on an annual basis to comply with our water decree.

Approximately 13 acre feet will be released from our annual ISH ownership (approximately 25 to 30 acre feet annually). This will allow us to adjust additional releases during dry years in Big Elk Meadows.

The following are attached for review:

- Big Elk Meadows Historical Return Flow Obligations
- BEMA Watershed & Selected Diversion Structures Map
- ISH Reservoir Map
- Old ISH Headgate Map
- Proposed BEMA Pipe Routing

Estimated costs for this project are contained in Tab 6 - Cost Estimate.

# **Big Elk Meadows Historical Return-Flow Obligations for 12 Shares of Boulder and Larimer County Irrigation and Manufacturing Ditch Company Stock**

B&L Allocation in Inches/share:

BEM Yield to 12 shares:

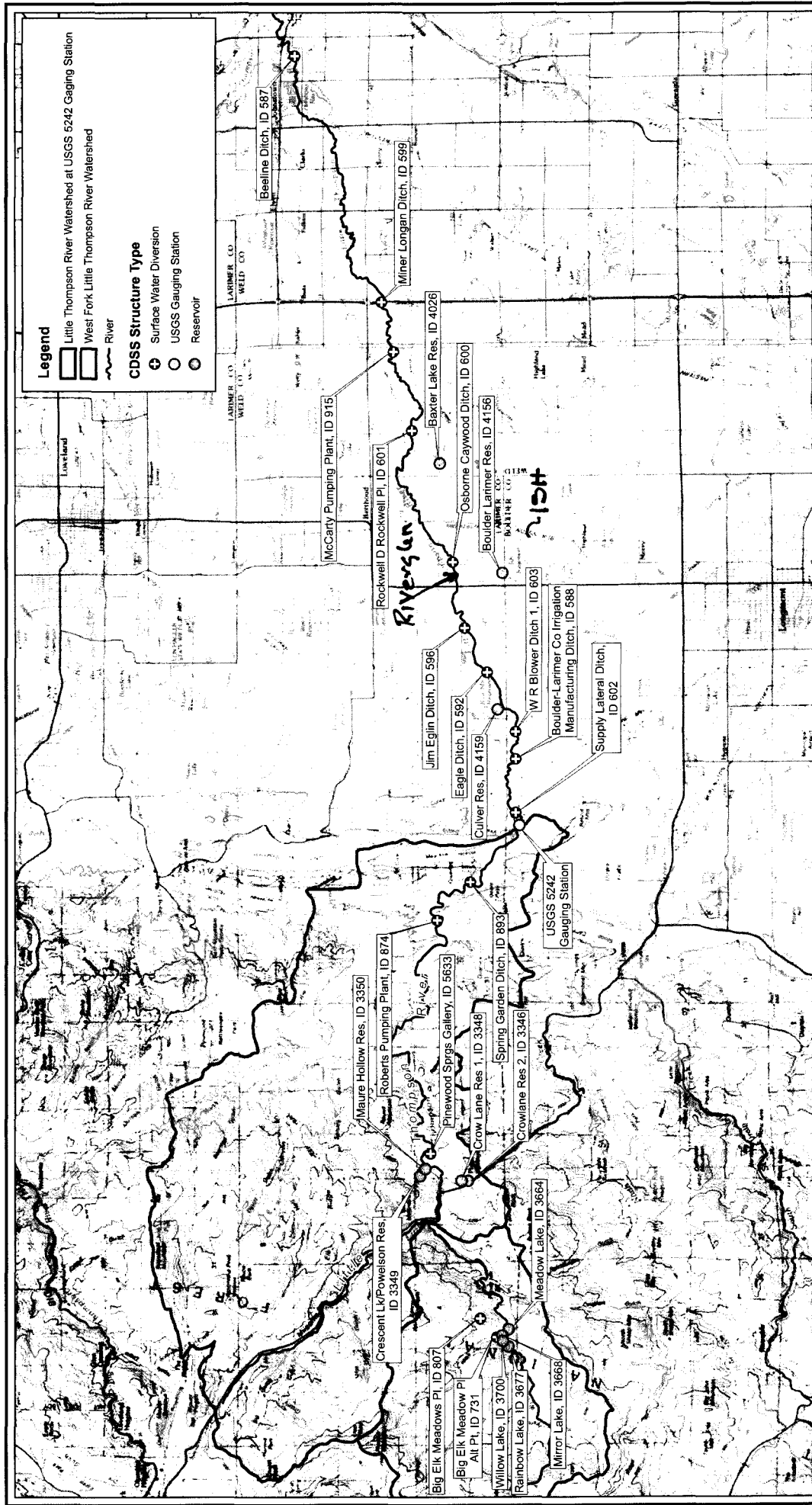
BEM Return Flow Obligation: 30%

B&L Allocation in Inches/share:															
20			30			40			50			60			
Inches	AF	Gallons	Inches	AF	Gallons	Inches	AF	Gallons	Inches	AF	Gallons	Inches	AF	Gallons	
240	12	3,910,212	360	18	5,865,318	480	24	7,820,424	600	30	9,775,530	720	36	11,730,636	
72	3.6	1,173,064	108	5.4	1,759,595	144	7.2	2,346,127	180	9	2,932,659	216	10.8	3,519,191	
0.37	2.0	33,006	3.0	0.2	49,510	4.1	0.2	66,013	5.1	0.3	82,516	6.1	0.3	99,019	
0.37	2.0	33,006	3.0	0.2	49,510	4.1	0.2	66,013	5.1	0.3	82,516	6.1	0.3	99,019	
0.37	2.0	33,006	3.0	0.2	49,510	4.1	0.2	66,013	5.1	0.3	82,516	6.1	0.3	99,019	
0.36	2.0	32,114	3.0	0.1	48,171	3.9	0.2	64,229	4.9	0.2	80,286	5.9	0.3	96,343	
0.37	2.0	33,006	3.0	0.2	49,510	4.1	0.2	66,013	5.1	0.3	82,516	6.1	0.3	99,019	
0.37	2.0	33,006	3.0	0.2	49,510	4.1	0.2	66,013	5.1	0.3	82,516	6.1	0.3	99,019	
0.98	5.4	87,422	8.0	0.4	131,133	10.7	0.5	174,844	13.4	0.7	218,556	16.1	0.8	262,267	
2.51	13.7	223,908	20.6	1.0	335,862	27.5	1.4	447,816	34.4	1.7	559,770	41.2	2.1	671,724	
4.43	24.3	395,184	36.4	1.8	592,776	48.5	2.4	790,368	60.6	3.0	987,960	72.8	3.6	1,185,552	
1.98	10.8	176,629	16.3	0.8	264,943	21.7	1.1	353,257	27.1	1.4	441,571	32.5	1.6	529,886	
0.55	3.0	49,063	4.5	0.2	73,595	6.0	0.3	98,127	7.5	0.4	122,659	9.0	0.5	147,190	
0.49	2.7	43,711	4.0	0.2	65,567	5.4	0.3	87,422	6.7	0.3	109,278	8.0	0.4	131,133	
13.15	72.0	3.6	1,173,064	108.0	5.4	1,759,595	144.0	7.2	2,346,127	180.0	9.0	2,932,659	216.0	10.8	3,519,191

BEM Yield to 12 shares:	30%
M Return Flow Obligation:	

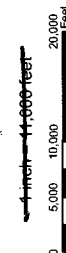
Note: The Boulder and Larimer County Irrigation and Manufacturing Ditch Company, also known as "Old Ish", allocates the annual amount of water per share that shareholders may call to have delivered from storage in Ish Reservoir in units of "inches," where an acre-foot of water is equivalent to 20 inches. So, for instance, at the annual shareholders' meeting in February 2011, the Company announced an allocation of 40 inches of water per share, or 480 inches for the 12 shares owned by Big Elk Meadows. Consistent with the Applicant's engineering analysis in Case No. 95CW238, which found that 30 percent of irrigation water applied to the land historically irrigated by the 12 shares would return to the river, the allocation of storage water would require releases from Ish Reservoir totaling 144 inches or 7.2 acre-feet over the twelve months May 2011 to April 2012, in order to replicate the historical return flows from full use of the 2011 storage allocation.

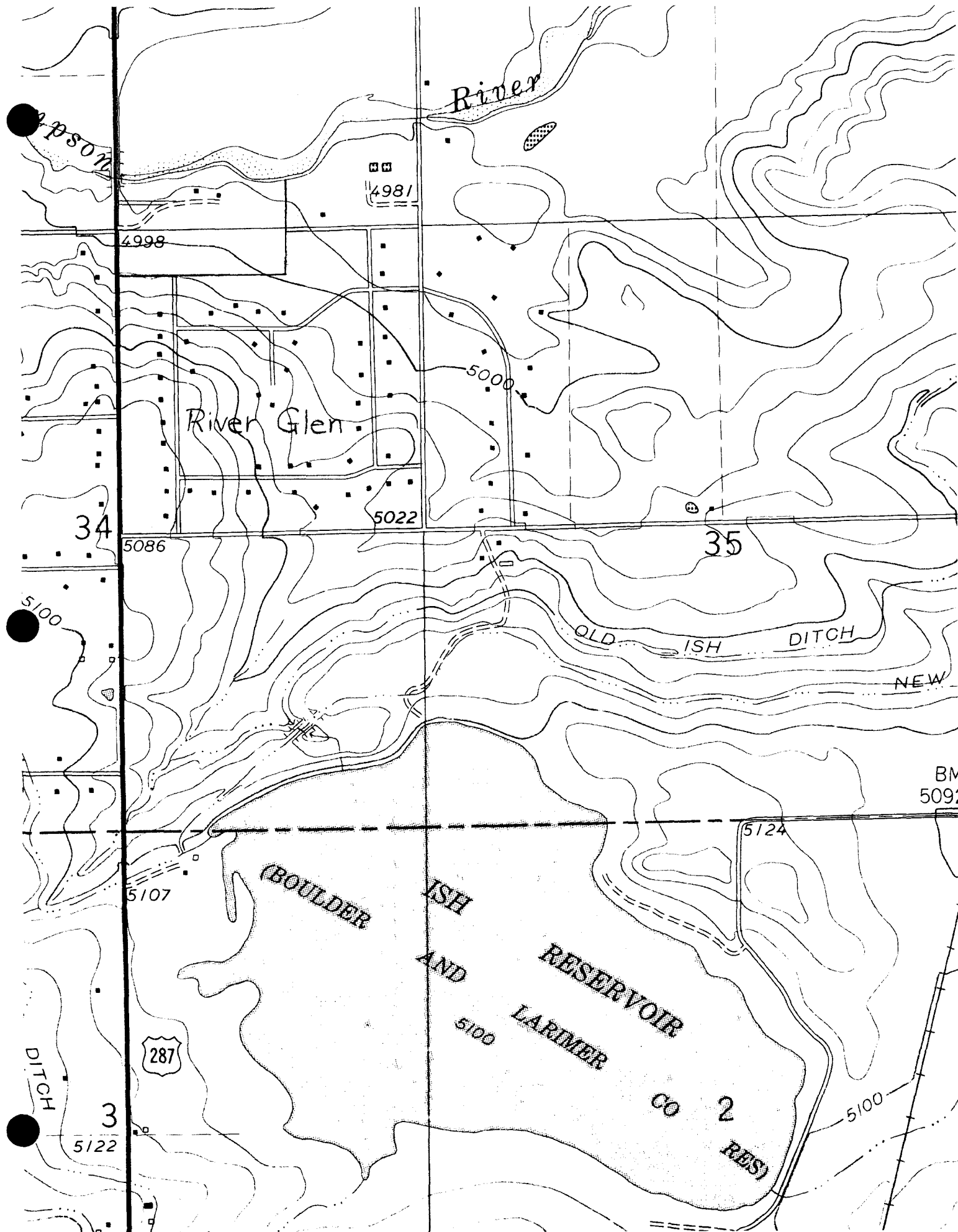
The return-flow obligation might be increased by the occurrence of in-priority diversions during the 2011 irrigation season under the Company's direct-flow water rights. In that case, BEM's prorata 1.2% share of such diversions, less 10 percent for ditch losses, could be left in the river to replace concurrent return-flow obligations, exchanged from the ditch headgate upstream to storage in BEM's lakes, applied to augment concurrent out-of-priority depletions at BEM, or stored to BEM's credit in Ish Reservoir for later releases to meet return-flow obligations or to augment BEM's out-of-priority depletions, when the call is downstream from the point of release from Ish Reservoir.



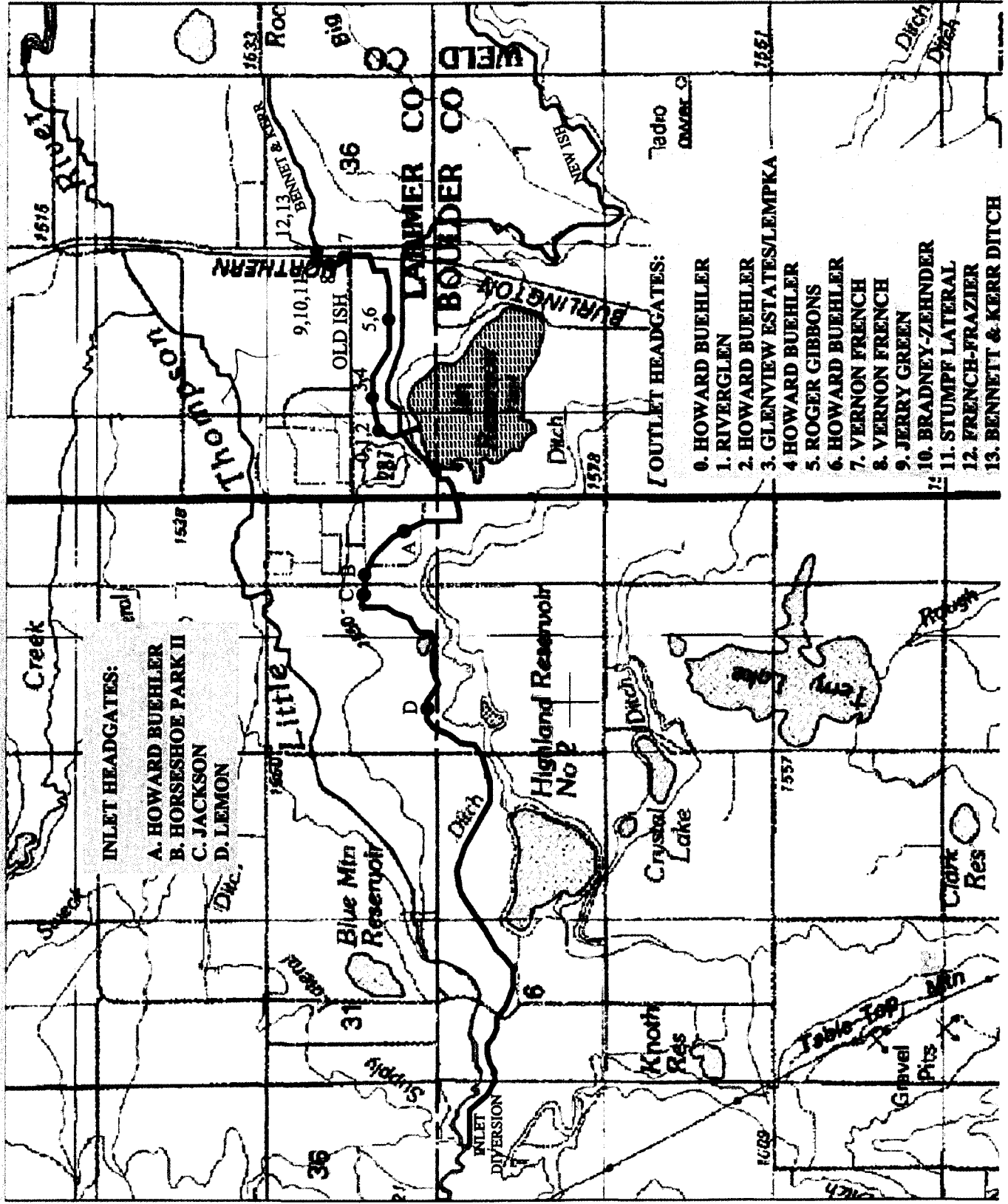
Z:\Project Files\111111-015111-015.000\CAD-GIS\BigElkMeadows-CDSSstructures.mxd Base Map: USGS Topographic Map

<p><b>WWE</b>  <b>WRIGHT WATER ENGINEERS, INC.</b>          2490 W 26TH AVE 100A          DENVER, CO 80211          (303) 480-1700</p>	<p><b>PRELIMINARY DRAFT</b></p>	<p><b>PRELIMINARY DRAFT</b></p>	<p><b>FIGURE 1</b></p>
<p><b>Boulder County &amp; Larimer County, CO</b></p>	<p><b>Big Elk Meadows</b></p>	<p><b>Watersheds and Selected Diversion Structures and Reservoirs</b></p>	<p><b>PROJECT NO. 111-015.000</b></p>





# OLD ISH HEADGATE SYSTEM





5. Schematic layout of northern portion of River Glen's piped irrigation water distribution system (solid yellow arrow), terminating on River Glen property at lowest point in piped system in a stormwater runoff drainage swale approximately 350 feet south of south bank of Little Thompson River. Dashed orange arrow indicates segment of proposed path for Big Elk Meadows' return-flow obligation Ish Reservoir releases from measuring point at end of pipe via drainage swale to Little Thompson River.



6. Drainage pipe from River Glen's pressurized irrigation water distribution system (solid yellow arrow) terminates on east side of stormwater drainage swale just south of a culvert beneath an embankment on fence line. Drainage swale continues from north end of culvert to south bank of Little Thompson River (dashed orange arrow). River Glen Subdivision reportedly owns all of the land traversed by the irrigation water distribution system and return-flow pathway from County Road 2E's right-of-way to the Little Thompson River.

## Cost Estimate

### **ESTIMATE SUMMARY**

<b>Project</b>	<b>Cost</b>
Meadow Lake Dam Outlet Replacement	\$202,510
Raw Water Monitoring Facilities & Compliance Review	\$68,948
ISH Reservoir Augmentation	\$25,025
<b>Total</b>	<b>\$296,033</b>

### **MEADOW LAKE DAM OUTLET REPLACEMENT COSTS**

<b>Item</b>	<b>Cost</b>
Engineers Construction Cost Estimate (see attached) (2)	\$139,310
Design Costs (1)	\$83,000
Design Reimbursables (1)	\$3,000
Construction Observation (Engineer) (1)	\$10,200
As-Built Record Drawings (1)	\$3,400
Electrical Service Construction (2)	\$16,000
Testing (3)	\$5,000
Approval, Permitting, ETC-AUDW (3)	\$10,000
Contingency (3)	\$10,000
<b>Total</b>	<b>\$202,510</b>

### **BREAKOUT**

<b>Item</b>	<b>Cost</b>
Engineering (1)	\$22,200
Construction (2)	\$155,310
Other (3)	\$25,000

*Backup information for Meadow Lake Dam Outlet Replacement is attached following this page.*



**FIGURE 8 - ENGINEER'S OPINION OF CONSTRUCTION COST (Siphon Alternate)**  
**BIG ELK MEADOWS ASSOCIATION - MEADOW LAKE DAM OUTLET REPLACEMENT PROJECT**  
 June 20, 2011

ITEM	DESCRIPTION	UNIT	QTY.	UNIT COST	TOTAL
1	Mobilization and Demobilization	LS	1.0	5,000.00	\$ 5,000.00
2	Clean and Televis Existing 6" CMP Outlet, Fill with Cement Grout and Abandon	LS	1.0	3,000.00	3,000.00
3	Site Demolition and Tree Removal (17 Trees)	Ea	17.0	250.00	4,250.00
4	Clearing and Grubbing	Ac	0.5	2,500.00	1,250.00
5	Control of Water During Construction - Diversions and Dewatering	LS	1.0	7,500.00	7,500.00
6	Reclamation of Disturbed Areas	Ac	0.2	2,000.00	400.00
7	Sediment and Erosion Control	LS	1.0	2,500.00	2,500.00
8	Unclassified Soil Excavation	CY	50.0	3.00	150.00
9	Furnish and Place Compacted Backfill/Embankment Fill	CY	30.0	7.00	210.00
10	Furnish and Place Misc. Fill to Establish 3:1 Upstream and 2:1 Downstream	CY	250.0	7.00	1,750.00
11	Furnish and Place Rock Walk Steps on Downstream Slope of Dam	LS	1.0	2,000.00	2,000.00
12	Furnish and Place Gravel Surfacing - Dam Crest Road	CY	25.0	25.00	625.00
13	Furnish and Place 12" Steel Pipe Siphon (0.25" Wall Thickness) and 12" and	LF	134.0	50.00	6,700.00
14	Furnish and Place 8" Steel Pipe (0.25" Wall Thickness) Pump Suction and 8"	LF	20.0	45.00	900.00
15	Furnish and Place 6" Steel Pipe (0.25" Wall Thickness) Pump Discharge and 6"	LS	5.0	45.00	225.00
16	Furnish and Place Concrete Pump Building Base and Slab	CY	10.2	550.00	5,610.00
17	Furnish and Place Skid Mounted 10HP 500 GPM (1.1 CFS) Pump and Electrical	LS	1.0	18,600.00	18,600.00
18	Furnish and Place New Operating Platform with Grating and Guard Rail	LS	1.0	4,500.00	4,500.00
19	Furnish and Place Trash Rack	LS	1.0	3,500.00	3,500.00
20	Furnish and Place 12" Plug Valve, Oil Filled Stem and Floor Stand Operator	LS	1.0	5,500.00	5,500.00
21	Furnish and Place 12" Butterfly Valve and Operator	Ea	1.0	1,800.00	1,800.00
22	Furnish and Place 12" Resilient Seat Gate Valve and Operator	Ea	1.0	2,500.00	2,500.00
23	Furnish and Place 8" Resilient Seat Gate Valve and Operator	Ea	1.0	1,550.00	1,550.00
24	Furnish and Place 6" Butterfly Valve and Operator	Ea	1.0	1,250.00	1,250.00
25	Furnish and Place 1" Air Release Valve w/ball valve	Ea	1.0	2,350.00	2,350.00
26	Furnish and Place 2" Air Release Valve w/ball valve and Manual 2" Air Release	Ea	1.0	2,900.00	2,900.00
27	Furnish and Place Pressure Relief Valve with Isolation Valve and Discharge Pipe.	LS	1.0	350.00	350.00
28	Furnishing and Place Conc. Pipe Support Gravity Block Piers	CY	9.0	550.00	4,950.00
29	Furnish and Place Dam Outlet Discharge Structure	LS	1.0	5,000.00	5,000.00
30	Grading & Shaping Dam Outlet Discharge Ditch Away From Toe of Dam	CY	180.0	7.00	1,260.00
31	Furnish and Place Bedding and RipRap for Outlet Discharge Ditch	CY	100.0	60.00	6,000.00
32	Furnish and Place 12" Model M0300SW McCrometer Flow Meter	LS	1.0	2,500.00	2,500.00

33	Furnish and Place 170 LF of Underground Electric Service in Duct for 10 HP	LS	1.0	7,500.00	7,500.00
34	Furnish and Place 1/3 HP Compressor, Piping and Valves For Intake Pipe Ice	LS	1.0	850.00	850.00
35	Furnish and Place Electric Heat Tape And Underwater Insulation On Siphon and	LS	1.0	1,500.00	1,500.00
36	Remove and Replace RipRap	CY	200.0	40.00	8,000.00
37	Furnish and Place Additional Rein. Conc. On Top of Wingwalls to Level Wall	CY	1.6	550.00	880.00
38	Furnish and Place 10'x13' Wood Framed Insulated Building Complete with	LS	1	12,000.00	12,000.00
39	Final Cleanup and Revegetation	LS	1	2,000.00	2,000.00
	<b>ESTIMATED CONSTRUCTION COST</b>				<b>\$ 139,310.00</b>
	Note: Engineering Contingency & Legal Cost Not Included				

# Gauthiere Engineering, Inc.

**John G. Gauthiere, P.E.**  
2157 Buena Vista Drive  
Greeley, Colorado 80634

Phone (970) 330-0855  
Cell (970) 302-0039  
Fax (970) 330-0855  
E-Mail john@gauthiere-engineering.com

## INVOICE

### Client

Glenn Christensen  
Big Elk Meadows Association  
P O Box 440  
Lyons, CO 80540

Date: June 30, 2011  
Invoice # BigElk 004-2011

### Big Elk Meadows

Project: Meadow Lake Dam Outlet Replacement

### Work Order #2

	Contract Estimate	Amount Paid	Amount Due
Final Design: (100% Complete)	\$3,500.00	\$ (875.00)	\$2,625.00
Construction Drawings & Specifications: (100% Complete)	\$4,500.00	\$(1,125.00)	\$3,375.00
Engineer's Cost Estimate (100% Complete)	\$ 200.00		\$ 200.00
Final Design Report (100% Complete)	\$ 100.00		\$ 100.00
Printing (1 set Plans & Specs) (18 pages @ \$2/sheet)			\$ 36.00
Mileage (120 mi @ \$0.60/mi) (Meeting on May 20 @ BEM)			\$ 72.00
<b>Total Billing</b>			<b>\$ 6,408.00</b>

Note: Interest charges have been removed.

cc: Leonard Arnold

TERMS: 30 DAY NET 18% APR (1.5% PER MONTH)

Thank You For The Opportunity To Serve

## ADDENDUM 1 TO WORK ORDER NO. 2

In accordance with the Agreement for Professional Services between **Big Elk Meadows Water Association** ("Client"), and Gauthiere Engineering, Inc., a Colorado Corporation, dated June 15, 2009, this Addendum 1 to Work Order No. 2, dated June 12, 2010 establishes the schedule of submittal of design documents to the State Engineer's office and Construction Observation Phase Services and estimated costs on the Project known as:

### **Meadow Lake Dam Outlet Rehabilitation (Siphon Alternative)**

**Client Authorized Representative:** Glenn M. Christensen, President  
**Address:** Big Elk Meadows Water Association  
P.O. Box 440  
Lyons, Colorado 80540  
**Phone No.:** 303-823-6365  
**E-mail:** glenn.christensen@att.net

**Gauthiere Engineering**  
**Authorized Representative:** John G. Gauthiere, P.E.  
**Address:** Gauthiere Engineering, Inc.  
2157 Buena Vista Drive,  
Greeley, Colorado 80634  
**Phone No.:** 970-330-0855 office, 970-302-0039 cell  
**E-mail:** [john@gauthiere-engineering.com](mailto:john@gauthiere-engineering.com)

### **SUBMITTAL DATE**

Plans, specifications and a design report will be submitted to the Office of the Colorado State Engineer's Dam Safety Division **within 30-days** of the Clients approval of this addendum.

### **CONSTRUCTION OBSERVATION PHASE SERVICES**

Typical construction observation services may include the following tasks:

1. Conduct Pre-Construction Meeting.
2. Evaluate Contractor's Submittals
3. Conduct Construction Observation
4. Conduct Meetings With Contractor
5. Verify Procedures as Required by Contract
6. Issue Owner's Instructions
7. Judge Acceptability of Work
8. Maintain Project Files and Log Books
9. Review and Recommend Construction Payments
10. Assure Required Testing is Accomplished
11. Conduct Final Inspection
12. Finalize "As-Built" Drawings – Submit to Owner and SEO
13. Final Construction Report and Documentation
14. Conduct 11<sup>th</sup> Month Warranty Inspection

## **CONSTRUCTION OBSERVATION PHASE ESTIMATED FEES**

The estimated engineering cost for the Construction Observation Phase is based on 10 days of on site construction observation at \$85 per hour or \$6,800 plus mileage and direct costs. A minimum 4-hour call out charge will be made for site visits lasting less than 4 hours. This figure should be adjusted if the SEO requires full time or some other level of construction observation of the work, or if the construction time is extended. Typically, observation will occur during television inspection of the existing outlet, during abandonment of the existing outlet, placing of fill to establish required slopes, during rebar installation, and during concrete pours. Observation of non-buried appurtenances such as above ground pipe, pumps, valves, metering equipment will be made after installation. Shop drawing and submittal reviews, preparation and certification of "as-built" record drawings and an SEO required final construction report is estimated to cost \$3,400.

**The total estimated engineering fee during the Construction Observation Phase is \$10,200 plus direct costs.**

The cost associated with the Scope of Engineering Services is based on the Engineering Fee Rate Schedule listed below. Costs for work items that are authorized beyond, or in addition to, the scope of services, would be charged on an hourly basis for the number of hours authorized, plus incidental costs, on any given day.

### **Engineering Fee Rate Schedule**

Hourly rates and unit costs are as follows:

#### Hourly Rates

Engineer	\$110/hour
Resident Inspection	\$ 85/hour
Engineering Survey Team	\$100/hour
Clerical	\$ 50/hour

#### Mileage

\$0.60/mile

#### Printing and Binding

Cost plus 10%

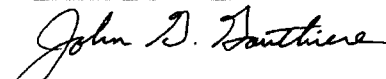
#### **Big Elk Meadows Water Association**

\_\_\_\_\_  
Signature

\_\_\_\_\_  
Typed or Printed Name/Title

\_\_\_\_\_  
Date of Signature

#### **Gauthiere Engineering, Inc.**



\_\_\_\_\_  
Signature

John G. Gauthiere, P.E., President  
\_\_\_\_\_  
Typed or Printed Name/Title

May 24, 2011  
\_\_\_\_\_  
Date of Signature



## Cost Estimate

### **RAW WATER MONITORING FACILITIES & COMPLIANCE REVIEW COSTS**

*In order to meet the additional monitoring requirements, review the existing water rights, and comply with State regulations, BEMA wISHes to borrow the following:*

<b>Item</b>	<b>Cost</b>
Monitoring System (Head & Outlet)	
Sutron Recording Devices (1)	\$3,115
Installation (1)	\$383
Wright Water Engineers (2)	\$60,000
Contingency (3)	\$5,000
<b>Total</b>	<b>\$68,498</b>

### **BREAKOUT - WRIGHT WATER ENGINEERS**

<b>Item</b>	<b>Cost</b>
Invoice 38286 - March 17, 2011	\$6,327.23
Invoice 39620 - May 27, 2011	\$24,047.02
Invoice 39696 - June 16, 2011	\$7,420.41
Invoice 39696 - July 19, 2011	\$13,325.88
July 1, 2011 - July 23, 2011	\$3,510.75
Anticipated Additional Charges to Complete	\$6,000
<b>Total</b>	<b>\$60,631.29</b>

### **BREAKOUT**

<b>Item</b>	<b>Cost</b>
Engineering (1)	\$60,000
Construction (2)	\$3,498
Other (3)	\$5,000

*Backup information for the Raw Water Monitoring Facilities & Compliance Review is attached following this page.*

FROM :

FAX NO. : 3036235122

Jun. 13 2011 02:50PM P1

**Wright Water Engineers Inc.**

2490 WEST 26th AVENUE  
SUITE 100A  
DENVER, CO 80211  
Telephone (303) 480-1700

11700

Invoice No. 39620  
Invoice Date: May 27, 2011

**Invoice**

To: BIG ELK MEADOWS ASSOCIATION  
P.O. BOX 440  
LYONS, CO 80540  
Attention: ROY M. McCUTCHEN, SECRETARY

Project: 111015000 -BIG ELK MEADOWS AUGMENTATION PLAN COMPLIANCE

Manager: JONATHAN E. JONES

3/1/11

Professional Services for the Period: 4/1/2011 to 4/30/2011

**Billing Group: 001**

Contract #: -W 02/2011

Regarding services during March and April 2011 to prepare a submittal to assistant Division Engineer, Michael Hein due on May 01, 2011. This invoice is submitted in accordance with a letter dated April 15, 2011 to Mr. Roy McCutchen, regarding agreement regarding Wright Water Engineers, Inc. fees to date and near-term projected charges.

**Professional Services**

	Rate	Hours	Charge
SR PROJECT ENGINEER/CONSULTANT	\$161.00	139.75	22,499.75
ENGINEERING SPECIALIST/CONSULTANT	\$122.00	4.00	488.00
ENGINEER DESIGN/PROF III	\$96.00	21.00	2,016.00
ENGINEERING TECHNICIAN II	\$78.00	8.25	643.50
ENGINEERING TECHNICIAN III	\$74.00	5.50	407.00
	Subtotal:		\$26,054.25

**Fees:**

Professional Services Discount

- \$2,700.00

**Professional Services Totals**

**\$23,354.25**

**Reimbursables**

	Charge
AUTO MILEAGE	\$119.40
PICK-UP MILEAGE	\$99.40
MEALS	\$7.14



**Wright Water Engineers Inc.**

Invoice: 39620

May 27, 2011

Page 2 of 2

Project: 111015000 Bill Group: 001

REPRODUCTION & PRINTING	\$256.94
PLOTS	\$24.00
TELEPHONE	\$27.12
POSTAGE	\$0.44
GIS/ARC INFO	\$110.00
<b>Fees:</b>	
Administration Fee	\$48.33
<b>Reimbursables Totals</b>	<b>\$692.77</b>

**Project Totals:**

Project Subtotal:	\$26,698.69
Fees:	-\$2,651.67
Billing Total:	\$24,047.02

**Total Project Invoice Amount:**


**\$24,047.02**

**Aged Receivables:**

<u>current</u>	<u>31-60 days</u>	<u>61-90 days</u>	<u>91-120 days</u>	<u>+120 days</u>
\$24,047.02	\$0.00	\$0.00	\$0.00	\$0.00

*All invoices are due upon receipt. A late charge of 1.5% will be added to any unpaid balance after 30 days.*

Approved by

  
JONATHAN E. JONES, P. E.

**Wright Water Engineers Inc.**

2490 WEST 26th AVENUE  
SUITE 100A  
DENVER, CO 80211  
Telephone (303) 480-1700

Invoice No. 39696  
Invoice Date: June 16, 2011

**Invoice**

To: BIG ELK MEADOWS ASSOCIATION  
P.O. BOX 440  
LYONS, CO 80540  
Attention: ROY M. McCUTCHEN, SECRETARY

**Project: 111015000 -BIG ELK MEADOWS AUGMENTATION PLAN COMPLIANCE**  
**Manager: JONATHAN E. JONES**

Professional Services for the Period: 5/1/2011 to 5/31/2011

**Billing Group: 001**

Contract #: ~W 02/2011

*Services during May 2011 concentrated on preparing the automated accounting spreadsheet to implement the terms and conditions of BEM's decree together with the necessary details of the patterns of other water users on the Little Thompson River and the specific requirements of the administrative officials.*

<b>Professional Services</b>	<u>Rate</u>	<u>Hours</u>	<u>Charge</u>
SR PRINCIPAL/CONSULTANT	\$184.00	0.25	46.00
SR PROJECT ENGINEER/CONSULTANT	\$161.00	44.75	7,204.75
SR ENGINEER/SCIENCE CONSULTANT	\$143.00	0.25	35.75
ENGINEERING SPECIALIST/CONSULTANT	\$122.00	0.50	61.00
ENGINEERING TECHNICIAN II	\$78.00	0.25	19.50
<b>Professional Services Totals</b>			<b>\$7,367.00</b>

**Reimbursables**

	<u>Charge</u>
REPRODUCTION & PRINTING	\$48.00
POSTAGE	\$1.68

<b>Fees:</b>	
Administration Fee	\$3.73
<b>Reimbursables Totals</b>	<b>\$53.41</b>

**Wright Water Engineers Inc.**

Invoice: 39696

June 16, 2011

Page 2 of 2

Project: 111015000 Bill Group: 001

**Project Totals:**

Project Subtotal:	\$7,416.68
Fees:	\$3.73
Billing Total:	\$7,420.41

**Total Project Invoice Amount:****\$7,420.41****Accounts Receivable**


<u>Invoice</u>	<u>Date</u>	<u>Bill Grp</u>	<u>Description</u>	<u>Amount</u>	<u>Reference</u>	<u>Balance Due</u>
39620	5/27/2011	001	Invoice	\$24,047.02		\$24,047.02
Total AR:						\$24,047.02

**Balance Due:****\$31,467.43****Aged Receivables:**

<u>current</u>	<u>31-60 days</u>	<u>61-90 days</u>	<u>91-120 days</u>	<u>+120 days</u>
\$31,467.43	\$0.00	\$0.00	\$0.00	\$0.00

*All invoices are due upon receipt. A late charge of 1.5% will be added to any unpaid balance after 30 days.*

Approved by

  
 JONATHAN E. JONES, P. E.

Through 7/3 + 14,622.30 = 46089.73 / 22 = 2094.99

**Wright Water Engineers Inc.**

2490 WEST 26th AVENUE  
SUITE 100A  
DENVER, CO 80211  
Telephone (303) 480-1700

Invoice No. 39846  
Invoice Date: July 19 2011

# Invoice

To: BIG ELK MEADOWS ASSOCIATION  
P.O. BOX 440  
LYONS, CO 80540  
Attention: ROY M. McCUTCHEN, SECRETARY

**Project:** 111015000      **~BIG ELK MEADOWS AUGMENTATION PLAN COMPLIANCE**  
**Manager:** JONATHAN E. JONES

Professional Services for the Period: 6/1/2011 to 6/30/2011

---

**Billing Group: 001**

Contract #: ~W 02/2011

*Services during June 2011 concentrated on preparing the automated accounting spreadsheet to implement the terms and conditions of BEM's decree together with the necessary details of the patterns of other water users on the Little Thompson River and the specific requirements of the administrative officials.*

<b>Professional Services</b>	<u>Rate</u>	<u>Hours</u>	<u>Charge</u>
SR PRINCIPAL/CONSULTANT	\$184.00	5.00	920.00
SR PROJECT ENGINEER/CONSULTANT	\$161.00	75.00	12,075.00
ENGINEERING TECHNICIAN I	\$85.00	1.75	148.75
ENGINEERING TECHNICIAN III	\$74.00	0.25	18.50
<b>Professional Services Totals</b>			<b>\$13,162.25</b>

<b>Reimbursables</b>	<u>Charge</u>
AUTO MILEAGE	\$109.80
REPRODUCTION & PRINTING	\$20.00
TELEPHONE	\$22.41
<b>Fees:</b>	
Administration Fee	\$11.42
<b>Reimbursables Totals</b>	<b>\$163.63</b>

**Wright Water Engineers Inc.**

Invoice: 39846

July 19, 2011

Page 2 of 2

Project: 111015000 Bill Group: 001

**Project Totals:**

Project Subtotal:	\$13,314.46
Fees:	\$11.42
Billing Total:	\$13,325.88

**Total Project Invoice Amount:****\$13,325.88****Accounts Receivable**

<u>Invoice</u>	<u>Date</u>	<u>Bill Grp</u>	<u>Description</u>	<u>Amount</u>	<u>Reference</u>	<u>Balance Due</u>
39620	5/27/2011	001	Invoice	\$24,047.02		\$18,047.02
39696	6/16/2011	001	Invoice	\$7,420.41		\$7,420.41
Total AR:						\$25,467.43

**Balance Due:****\$38,793.31****Aged Receivables:**

<u>current</u>	<u>31-60 days</u>	<u>61-90 days</u>	<u>91-120 days</u>	<u>+120 days</u>
\$13,325.88	\$25,467.43	\$0.00	\$0.00	\$0.00

*All invoices are due upon receipt. A late charge of 1.5% will be added to any unpaid balance after 30 days.*

Approved by

JONATHAN E. JONES, P. E.

SUTRON CORPORATION  
22400 Davis Drive  
Sterling, VA 20164  
(703) 406-2800 (703) 406-2801 fax  
www.sutron.com

INVOICE

Original

MR. KEVIN SWEENEY  
1809 CHESAPEAKE CIRCLE  
JOHNSTOWN, CO 80534  
CO

Delivery Address  
MR. KEVIN SWEENEY  
1809 CHESAPEAKE CIRCLE  
JOHNSTOWN, CO 80534  
CO

Customer: KEVSWE

Invoice : ACR/10012662

Date: 02-16-2011

Pos.	Item/Description	Quantity	Unit	Price	Tax	Amount
Sales Order : 107080						
Order Date : 02-08-2011						
Customer PO : CCD-KEVIN SWEENEY						
Packing Slip : 12443						
10	SDR-0001-1SD	2.00	ea	1216.00		2432.00
	STAGE DISCHARGE RECORDER					
	S/N 1101818	1.00	ea			
	S/N 1101815	1.00				
20	5100-0118	2.00	ea	147.00		294.00
	BEADED PULLEY, 375mm, 5/16" SHAFT					
30	5100-0581	5.00	m	15.00		75.00
	BEADED CHAIN, 12.5CM CENTERS					
40	5100-0530-2	2.00	ea	93.00		186.00
	FLOAT, 5" PVC					
50	5100-0550	2.00	ea	29.00		58.00
	COUNTERWEIGHT, 8 OZ.					
60	5100-0620-1	2.00	ea	26.00		52.00
	END HOOK SET (PAIR)					
950	FREIGHT	1.00	ea	18.54		18.54
	Freight Costs					



Goods	Costs	Total USD
3097.00	18.54	3115.54

Delivery : FOB ORIGIN FRGT PREPAID & ADD Payment : Credit Card

Lockbox Payments: Sutron Corporation

Wire Transfers: BB4T

Account No.: 5139227699

P.O. Box 23864

20921 Davenport Dr., Suite 105

ABAF: 051404260

Baltimore, 21203-5864

Sterling, VA 20165-6137

Print No.: P1000001

**SWPS.com - Southwest Public Safety****Sales Invoice**

9905 Perrin Beitel Rd.  
San Antonio, TX 78217-3101  
210-590-9363  
210-590-9482 Fax

SALES REP	INVOICE #	CUST. ID	DATE SHIPPED	WEB ORDER #
md	576189	192014	3/15/2011	74723

PO #	Terms

**Sold To**

Kevin Sweeney 970-215-3643  
1809 Chesapeake Circle  
Johnstown CO 80534  
US United States

**SHIP TO**

Kevin Sweeney 970-215-3643  
1809 Chesapeake Circle  
Johnstown CO 80534  
US United States

Shipped via: 3 Day Select Residential	Payment Method: Visa	CC# Last 4: 2895
---------------------------------------	----------------------	------------------

SKU	DESCRIPTION	ORDERED	SHIPPED	NOT SHIPPED	UNIT PRICE	TOTAL
iM2100-Green	Pelican iM2100 Storm Case - Green	2	2	0	\$40.25	\$80.50
	Shipping charge	1	1	0	\$31.66	\$31.66

**INVOICE TOTAL** **\$112.16**

5-Mar-2011 Yahoo Capture \$112.16

**BALANCE DUE** **\$0.00**

**Thanks for your order !**

Return Policy: All items must be returned in resellable condition within 10 days of receipt. Some items may be subject to a restocking fee. Please E-mail [returns@swps.net](mailto:returns@swps.net) or call (210) 590-9363 for a return authorization number to ensure that your package is accepted.

**576189**

Customer Name	Kevin Sweeney
Ship via	3 Day Select Residential

3/15/2011 4:50:22 PM

Batteries Plus #433  
1439 N Denver Ave  
Loveland, CO 80538  
Phone: 9707761515

Ticket: 203749 User: 22  
Date: 2/21/2011 5:23p Sta: 433-01

Item	Description	Qty	Price	Line type	Total
00R0015	4	6.99			27.96
PROCELL 6V ALK LAM SCREW					

Item Subtotal 27.96  
Tax 1.87

Total 29.83

Tender:

Visa or MasterCard 29.83  
XXXXXX2895

Number of items purchased: 4

Sold To:  
LOVELAND, CO WALK-IN  
LOVELAND, CO 80538

WE VALUE YOUR FEEDBACK!  
GO TO SURVEY.BATTERIESPLUS.COM



①

More saving.  
More doing.™

1100 NICKEL DR LOVELAND CO 80537  
STORE MGR ERIC CAMPBELL (970)461-9406  
1529 00008 04930 03/25/11 02:45 PM  
CASHIER CATHERINE - COM1682

030699021703	1/4X21/2CBLT <A>	29.76
2014.88		
764666108806	GOLD SCREW <A>	11.88
205.94		
764666109469	3/8LDSRW1LB <A>	11.88
205.94		
030699225811	PLASTBAGGDS <A>	1.96
200.98		
092097112773	25PK ANCHOR <A>	8.38
092097112575	TAPCON BIT <A>	8.00
204.00		
030699084203	HEX NUTS <A>	10.74
205.37		
032076070274	MOUNT BASE <A>	1.88
048243000104	WIRE <A>	4.69
032076075163	SPADE TERM <A>	1.99
032076056155	SPK TAPE <A>	3.98
032076070182	4IN NAT TIE <A>	1.91
030699080342	COMBO PACK <A>	19.68
802.46		
AEA	CRBLT1/4X1/2 <A>	3.20
2000.16		
AJA	CARGBLT1/4X3 <A>	1.60
800.20		
ADA	CARGBLT1/4X1 <A>	0.96
800.12		
099713030831	POST CAP <A>	3.30
201.65		
707392163701	PIPE TIE <A>	47.52
1602.97		
044315435607	GUSSET ANGLE <A>	22.56
2400.94		
044315044809	FRAME ANCHOR <A>	19.44
802.43		

SUBTOTAL 215.31  
SALES TAX 14.43  
TOTAL \$229.74  
XXXXXXX2895 VISA  
AUTH CODE 01079C/1085815



②

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More doing.™

1100 NICKEL DR LOVELAND CO 80537  
STORE MGR ERIC CAMPBELL (970)461-9406  
1529 00008 04930 03/25/11 03:10 PM  
CASHIER CATHERINE - COM1682

090133	PT <A>	20.94
600		
0901	PT <A>	5.97
6590	ST, <A>	
201		
090133	C <A>	26.54
600		
SUB TOTAL		60.40
SALES TAX		4.05
TOTAL		\$64.45
XXXXXX2895		64.45
AUTH CODE 01079C/1085815		TA



25/2011 4614  
REFUND POLICY EXPIRES ON 06/28/2011



Clark's Hardware  
4100 Ute Hwy.  
Lyons, Co. 823-6531  
10,000 + Items  
THANK YOU  
20 83.19  
HARDWARE 1 6.38  
ITEM CT 2  
TAX 0.50  
CASH 6-88  
07:20AM 03-26-2011  
6310 CLERK01

LOWER PRICES STOREWIDE



3

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1100 NICKEL DR LOVELAND CO 80537  
STORE MGR ERIC CAMPBELL (970)461-9406  
CASHIER MATTHEW - MEW1994  
1529 00001 28223 03/28/11 08:03 PM  
\* ORIG REC: 1529 008 04930 03/25/11 TA \*

090489125271 23/32 PT CDX <A> 33.97  
030699190218 PLASTBAGGDS <A> 0.98  
030699190317 PLASTBAGGDS <A> 0.98  
SUBTOTAL 35.93  
SALES TAX 2.41  
TOTAL \$38.34  
XXXXXXX2895 VISA 38.34  
AUTH CODE 00066C/8014606 TA



1529 01 28223 03/28/2011 1314

RETURN POLICY DEFINITIONS  
POLICY ID DAYS POLICY EXPIRES ON  
A 1 90 06/26/2011

THE HOME DEPOT RESERVES THE RIGHT TO



Returns

More saving.  
More doing.

1100 NICKEL DR LOVELAND CO 80537  
STORE MGR ERIC CAMPBELL (970)461-9406  
1529 00032 89618 04/04/11 07:11 PM  
CASHIER STEPHANIE - SED538  
\* ORIG REC: 1529 008 04930 03/25/11 TA \*

044315435607 GUSSET ANGLE -7.52  
80-0.94  
707392163701 PIPE TIE -17.82  
69-2.97 -14.88  
030699021703 1/4X21/2CBLT -3.98  
032076056155 5PK TAPE -8.00  
092097112575 TAPCON BIT -17.22  
20-4.00  
030699080342 COMBO PACK -1.96  
70-2.46  
030699225811 PLASTBAGGDS -5.37  
20-0.98  
030699084203 HEX NUTS -1.99  
032076075163 SPADE TERM -1.88  
032076070274 MOUNT BASE -1.91  
032076070182 4IN NAT TIE -11.88  
764666108806 GOLD SCREW -5.94  
20-5.94  
764666109469 3GLDSCRWLB  
ADA CARGBLT1/4X1  
80-0.12 -0.96  
AEA CRBLT1/4X1/2 -1.92  
120-0.16

SUBTOTAL -103.23  
SALES TAX -6.92  
TOTAL -110.15  
XXXXXXX2895 VISA -110.15  
INVOICE 1322537 TA

REFUND-CUSTOMER COPY

GUARANTEED LOW PRICES  
LOOK FOR HUNDREDS OF  
LOWER PRICES STOREWIDE



Locks  
More saving.  
More doing.

1100 NICKEL DR LOVELAND CO 80537  
STORE MGR ERIC CAMPBELL (970)461-9406  
1529 00059 91906 04/04/11 07:19 PM  
CASHIER SELF CHECK OUT - SCOT59  
071649005565 BRSTBOMBLCK <A>  
285.57 11.14

SUBTOTAL 11.14  
SALES TAX 0.75  
TOTAL \$11.89  
XXXXXXX2895 VISA 11.89  
AUTH CODE 01306C/1593530 TA



1529 59 91906 04/04/2011 0922

RETURN POLICY DEFINITIONS  
POLICY ID DAYS POLICY EXPIRES ON  
A 1 90 07/03/2011

THE HOME DEPOT RESERVES THE RIGHT TO  
LIMIT / DENY RETURNS. PLEASE SEE THE  
RETURN POLICY SIGN IN STORES FOR  
DETAILS.

GUARANTEED LOW PRICES  
LOOK FOR HUNDREDS OF  
LOWER PRICES STOREWIDE

\*\*\*\*\*

\*\*\*\*\*



**ISH RESERVOIR AUGMENTATION COSTS**

<b>Item</b>	<b>Cost</b>
Legal Fees - Jeff Kahn, Riverglen Attornery (3)	\$3,000
Install Piping - Ray's Backhoe (2)	\$7,525
Riverglen Reimbursement* (3)	\$2,000
Wright Water Engineers (1)	\$8,000
Flow Meter - Micrometer (2)	\$2,500
Contongency (3)	\$2,000
<b>Total</b>	<b>\$25,025</b>

*\* Annual Charge After 1st Installment Paid by BEMA*

**BREAKOUT**

<b>Item</b>	<b>Cost</b>
Engineering (1)	\$8,000
Construction (2)	\$10,025
Other (3)	\$7,000

*Backup information for the ISH Reservoir Augmentation costs is attached following this page.*

# Riverglan Project

6698 McCall Drive  
Longmont, CO 80503  
303-776-6190 303-589-0117 Cell  
303-682-0731 Fax  
Ray@Raysbackhoeservice.com

June 14, 2011

Russ Stacey

Big Elk Meadows

RE: Little Thompson Water augmentation

## Scope:

### Stumps

Remove load & haul 40 Russian Olive stumps to landfill. Cost is based on one 20yd end dump load to landfill.

Stump cost: \$960 •

### Pipe & bedding

420' of 8" SDR35 gasketed sewer pipe in 14' lengths. Transition to 20' of 8" C-900 pvc water main pipe for drive crossing. Three transition couplings. Deliver 50tons of bedding.

Pipe& bedding cost: \$3,140.00 •

### Machine Time & Labor

Expose existing 8" and transition to SDR35. Dig 440' @ 3' deep. Install pipe. Bed & backfill pipe. Fill in stump cavities. Dig for 2 tanks onsite.

Machine time & labor: \$3,425.00 •

Hauling of excess spoils is not included, but can be priced as necessary.

Let me know if we may be of service,

Ray Lamb

Owner/operator

TOTAL \$ 7525.00

# 967 + shipping Low Great Plains Meter, Inc



## CONFIGURATION SHEET

### MODEL M0300

### BOLT-ON SADDLE FLOWMETER

#### DESCRIPTION

The M0300 Bolt-On Saddle Flowmeter features a fabricated stainless steel saddle with McCrometer's unique drive and register design. The stainless steel saddle eliminates the fatigue-related breakage common to cast iron and aluminum saddles and provides unsurpassed corrosion protection. Fabricated stainless steel construction offers the additional advantage of being flexible enough to conform to out-of-true pipe. The Model M0300 is manufactured to comply with applicable provisions of American Water Works Association Standard No. C704-02 for propeller-type flowmeters. As with all McCrometer propeller flowmeters, standard features include a magnetically coupled drive, instantaneous flowrate indicator and straight reading, six-digit totalizer.

Impellers are manufactured of high-impact plastic, capable of retaining their shape and accuracy over the life of the meter. Each impeller is individually calibrated at the factory to accommodate the use of any standard McCrometer register, and since no change gears are used, the M0300 can be field-serviced without the need for factory recalibration. Factory lubricated, stainless steel bearings are used to support the

impeller shaft. The shielded bearing design limits the entry of materials and fluids into the bearing chamber providing maximum bearing protection.

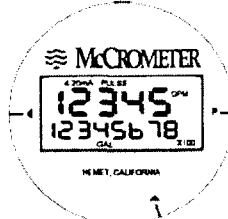
The instantaneous flowrate indicator is standard and available in gallons per minute, cubic feet per second, liters per second and other units. The register is driven by a flexible steel cable encased within a protective vinyl liner. The register housing protects both the register and cable drive system from moisture while allowing clear reading of the flowrate indicator and totalizer.

#### INSTALLATION

Standard installation is horizontal mount. If the meter is to be mounted in the vertical position, please advise the factory. A straight run of full pipe the length of ten pipe diameters upstream and two diameters downstream of the meter is recommended for meters without straightening vanes. Meters with optional straightening vanes require at least five pipe diameters upstream and two diameters downstream of the meter.

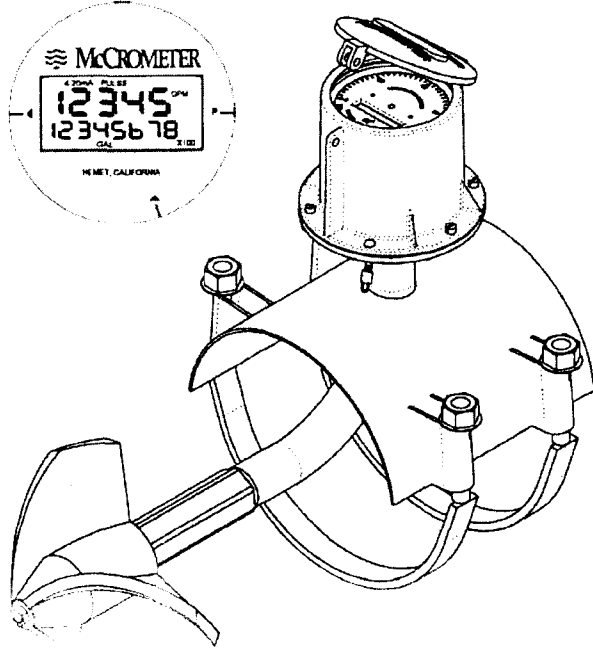


The McCrometer Propeller flowmeter comes with a standard instantaneous flowrate indicator and straight-reading totalizer. An optional electronic register is also available. Typical face plates.



#### APPLICATIONS

- Center pivot systems
- Sprinkler irrigation systems
- Drip irrigation systems
- Golf course and park water management
- Gravity turnouts from underground pipelines
- Commercial nurseries
- Water and waste water management



## BOLT-ON SADDLE METER M0300

### SPECIFICATIONS

#### PERFORMANCE

**ACCURACY/REPEATABILITY:**  $\pm 2\%$  of reading  
guaranteed throughout full range;  $\pm 1\%$  over reduced  
range; Repeatability 0.25% or better

**MAXIMUM TEMPERATURE:** (Standard Construction)  
160°F constant

**PRESSURE RATING:** 150 psi

#### MATERIALS

**BEARING ASSEMBLY:** Impeller shaft is 316 stainless steel.  
Ball bearings are 440C stainless steel.

**MAGNETS:** (Permanent type) Cast or sintered Alnico

**BEARING HOUSING:** Brass; Stainless Steel optional

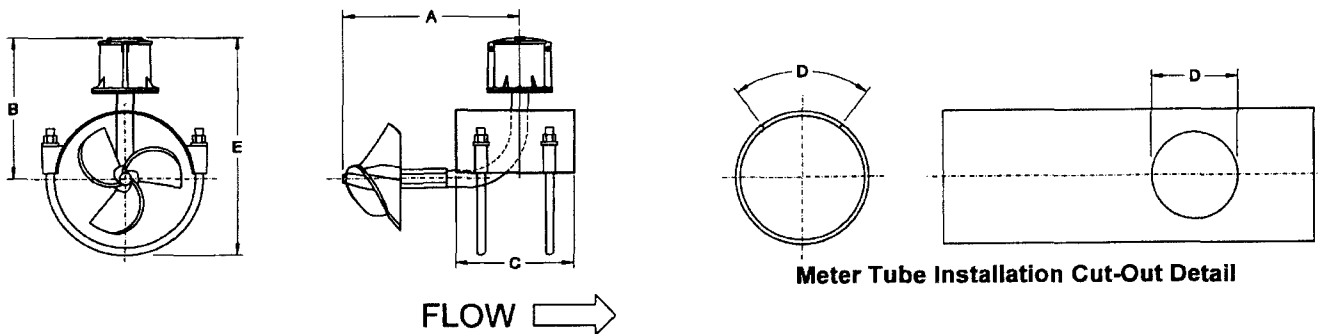
**SADDLE:** 304 stainless steel construction

**REGISTER:** An instantaneous flowrate indicator and  
six-digit straight-reading totalizer are standard. The  
register is hermetically sealed within a die cast  
aluminum case. This protective housing includes a  
domed acrylic lens and hinged lens cover with locking  
hasp.

**IMPELLER:** Impellers are manufactured of high-impact  
plastic, retaining their shape and accuracy over the  
life of the meter. High temperature impeller is optional.

#### OPTIONS

- Saddle can be constructed to fit any outside diameter  
pipe dimensions, including metric sizes
- Can be used on a variety of pipe materials such as  
steel, plastic, cast iron, cement or asbestos cement
- Register extensions
- All stainless steel bearing assembly
- High temperature construction
- "Over-Run" bearing assembly for higher than normal  
flowrates
- Electronic propeller meter available in all sizes of this  
model
- A complete line of flow recording / control  
instrumentation
- Blank repair saddle



M0300	DIMENSIONS						
Meter and Nominal Pipe Size	4"	6"	8"	10"	12"	14"	16"
Maximum Flow U.S. GPM	600	1200	1500	1800	2500	3000	4000
Minimum Flow U.S. GPM	50	90	100	125	150	250	275
Approx. Head Loss in Inches at Max. Flow	23.00	17.00	6.75	3.75	2.75	2.00	1.75
Approx. Shipping Weight-lbs.	18	22	26	30	34	38	44
A (inches)	7 5/8	15	15	15	15	15	15
B (inches)	8 1/4	10 3/4	10 3/4	10 3/4	11 3/4	13 3/4	13 3/4
C (inches)	7	8	8	9 1/2	9 1/2	9 1/2	9 1/2
D (inches)	4*	5 1/8*	6*	7*	7 1/4	7 1/4	7 1/4
E (inches)	10 3/4	14	15	17	19	20 5/8	21 5/8

For larger sizes see Model M1400.

McCrometer reserves the right to change design or specification without notice.

\*Standard pipe only. For other than standard pipe, consult factory for cutout dimensions.

Please specify the inside diameter of the pipe when ordering.

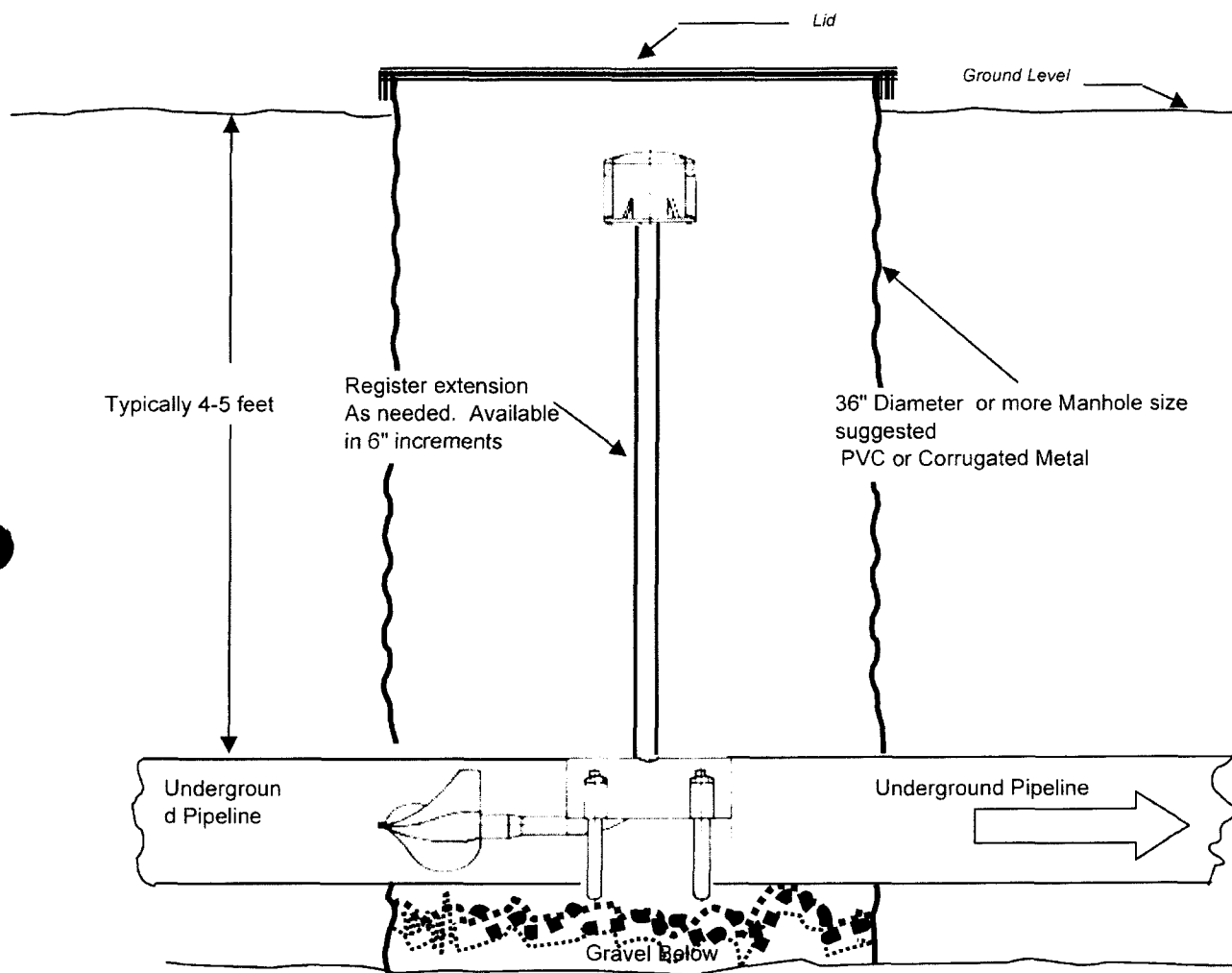
FOR MORE INFORMATION CONTACT:

INSTALLATION DRAWING	METER ON UNDERGROUND LINE WITH REGISTER EXTENSION	GREAT PLAINS METER, INC.	
WGx Forward Meter Underground Manhole.xls		MHN	2/11/2003
Name/Location of Drawing	Title of Drawing	Compiled by	Date



Great Plains Meter, Inc.

*Drawing not to scale*



**GREAT PLAINS METER, INC.**  
**115 S. 16th STREET**  
**AURORA, NE 68818**  
**402-694-4114**

**Subject:** Re: Big Elk Meadows and Riverglen HOA agreement  
**From:** "jbstapp" <jbstapp@comcast.net>  
**Date:** Fri, 22 Jul 2011 18:31:11 +0000  
**To:** "Roy McCutchen" <roy@pcraft.com>

\$3,000 to  
Riverglen

Thanks Roy, I'll everyone here know and I'll request that Jeff keep us apprised of the cost.  
Julie  
Sent via BlackBerry by AT&T

---

**From:** Roy McCutchen <roy@pcraft.com>  
**Date:** Fri, 22 Jul 2011 12:01:52 -0600  
**To:** <jbstapp@comcast.net>  
**Cc:** Daryl Musser<dvmusser@hotmail.com>; Russ Stacey<nrshygiene@msn.com>; Kevin Sweeney<ksweeney@hach.com>; Bobbie Heisterkamp<BDHEISTKMP@aol.com>  
**Subject:** Re: Big Elk Meadows and Riverglen HOA agreement

Julie,  
Got your message and I have contacted our treasurer to cut a check made out to Riverglen HOA. It may take a couple of days as she will need two signatures, but as I said I obtained a prepayment authorized at the last BOD meeting. I am taking from your email that Jeff is not expecting it to cost more than the \$3,000 and will tell us before exceeding \$3,000 if it looks like it is going to do so.  
Thanks,  
Roy

On 7/22/2011 12:48 AM, [jbstapp@comcast.net](mailto:jbstapp@comcast.net) wrote:

Hi Roy,

Jeff Kahn probably began preparation of a draft of the agreement today and he should be finished with that Monday afternoon. Please e-mail any information you receive from Jason's office directly to Jeff at [jkahn@lqkhlaw.com](mailto:jkahn@lqkhlaw.com). I will probably contact you later today (Friday 7/22) to ask you to send us a check as soon as possible in the amount of \$3,000, Jeff's estimate of the cost of the agreement. I am awaiting comment from other board members but I think this is a fair way to handle this. Jeff will invoice us, we will send a copy to you and notify you if the final bill is larger than \$3,000 so that you can pay that amount; if the bill is less than \$3,000 we can discuss application of the remaining funds to the fees required in the agreement. Jeff will be out of his office from the 28th to Aug. 8th, we will have that time to review and complete the agreement so it can be finalized when he returns.

Julie Stapp  
303-478-6904

---

**From:** "Roy McCutchen" <[roy@pcraft.com](mailto:roy@pcraft.com)>  
**To:** [jbstapp@comcast.net](mailto:jbstapp@comcast.net)  
**Cc:** "Daryl Musser" <[dvmusser@hotmail.com](mailto:dvmusser@hotmail.com)>, "Russ Stacey" <[nrshygiene@msn.com](mailto:nrshygiene@msn.com)>, "Kevin Sweeney" <[ksweeney@hach.com](mailto:ksweeney@hach.com)>



**Sent:** Wednesday, July 20, 2011 2:24:16 PM

**Subject:** Re: Big Elk Meadows and Riverglen HOA agreement

Hi Julie,

I will contact Jason and see what he can give us in writing that blesses this project. Verbally, he and Michael Hine at the State Engineers Office have said it should work as long as I can release water when; 1) Osborne Caywood is not diverting or 2) get cooperation from the folks at Osborne Caywood to stop diverting during the periods that we are releasing. Osborne Caywood is just east of Riverglen and is the only structure between you folks and where we need to get the water (Rockwell Ditch).

As I told Daryl, I have authorization to spend money on up front costs like your legal fees for reviewing the proposal. I suggested to him that we just write Riverglen a check for \$3,000 and you could keep whatever was left over. I'm sure I can up that if it costs more, but I am always a little concerned about signing on to blank checks with attorneys and consultants. (I'm in the middle of one of those right now, with no end in sight.)

Can we get any sort of estimate from the attorney? At least we should get a "not to exceed X\$" clause.

Thanks for helping with this. It's going to mean a lot to us to be able to make this project work.

Roy

On 7/19/2011 7:51 PM, [jbstapp@comcast.net](mailto:jbstapp@comcast.net) wrote:

Roy,

I am a member of the Riverglen HOA and am working with Daryl Musser on your request. I have chatted with Russ Stacy about this as well. I have sent your e-mail and have talked with Jeff Kahn of Lyons Gaddis Kahn and Hall, attorneys in Longmont to whom we were referred by our attorney. I have an appointment with Jeff on Thursday morning to get the agreement going but Jeff asks if Jason Smith, water commissioner for the Thompson, reviewed and commented on this proposal? He believes that if they have not indicated approval we should wait to draft the agreement. If you can let me know about this, I'll pass along the information to Jeff.

I have another question as well and do not know to whom to ask. Our HOA needs to sign a retention agreement with the attorneys but we need agreement in writing from Big Elk Meadows that you will be responsible for payment of the legal fees. Can you also let me know about this?

You are welcome to respond by e-mail, if you would like to talk with me, my cell phone is 303-478-6904.

Thank you,

Julie Stapp

--

Roy M. McCutchen, CEO  
The GrafXGroup / Photo Craft Imaging  
2901 55th St.  
Boulder, CO 80301  
303-633-5410 (direct)  
303-442-6410 / 800-441-3873 x101  
303-250-1619 (cell)  
[www.pciGrafX.com](http://www.pciGrafX.com)

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--

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The GrafX experience.....

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.....are you ready?

# Wright Water Engineers Inc.

2490 WEST 26th AVENUE  
SUITE 100A  
DENVER, CO 80211  
Telephone (303) 480-1700

3-579-7369



Invoice No. 39236  
Invoice Date March 17, 2011

## Invoice

To: BIG ELK MEADOWS ASSOCIATION  
P.O. BOX 440  
LYONS, CO 80540  
Attention: ROY M. McCUTCHEN, SECRETARY

Project: 111015000 -BIG ELK MEADOWS AUGMENTATION PLAN COMPLIANCE  
Manager: JONATHAN E. JONES

Professional Services for the Period: 2/1/2011 to 2/28/2011

### Billing Group: 001

Contract #: -W 02/2011

Regarding achieving compliance with DWR Division 1 Notice of Accounting Review for Big Elk Meadows Association Plan Augmentation, Case No 95CW238. Due to the shortness of time for responding to the notices from the Division Engineer's office and the potential that interim reports without legal review might create problems later on, WVE has proceeded to gather data and analyze the potential operations under BEMA's augmentation plan for a representative study period. WVE has initiated its investigations in close coordination with BEMA's augmentation plan administrator Roy McCutchen, legal counsel, Dan Platt and state administrative officials.

Professional Services	Rate	Hours	Charge
SR PROJECT ENGINEER/CONSULTANT	\$161.00	30.50	4,910.50
ENGINEER DESIGN/PROF III	\$96.00	6.50	624.00
ENGINEERING TECHNICIAN III	\$74.00	8.75	647.50
<b>Professional Services Totals</b>			<b>\$6,182.00</b>

Reimbursables	Charge
REPRODUCTION & PRINTING	\$111.56
TELEPHONE	\$3.54
GIS/ARC INFO	\$20.00
<b>Fees:</b>	
Administration Fee	\$10.13
<b>Reimbursables Totals</b>	<b>\$145.23</b>

Project: 111015000 Bill Group: 001

**Project Totals:**

Project Subtotal: \$6,317.10  
Fees: \$10.13  
Billing Total: \$6,327.23

**Total Project Invoice Amount:**

**\$6,327.23**

**Aged Receivables:**

<u>current</u>	<u>21-60 days</u>	<u>61-90 days</u>	<u>91-120 days</u>	<u>&gt;120 days</u>
\$6,327.23	\$0.00	\$0.00	\$0.00	\$0.00

*All invoices are due upon receipt. A late charge of 1.5% will be added to any unpaid balance after 30 days.*

Approved by

  
JONATHAN E. JONES, P. E.

**BIG ELK MEADOWS ASSOCIATION**  
**ANNUAL FINANCIAL REPORTS**

**2011**

**BIG ELK MEADOWS ASSOCIATION**

P.O. Box 440  
Lyons, Colorado 80540

July 26, 2011

Dear Member or Lessee,

Each year the treasurer looks at the end-of-year figures for both associations and reports to the general membership. Enclosed is the **End of the Year Report** for May 31, 2011. It gives a line item breakdown for the **Big Elk Meadows Association** operating income and expenses. This association ended the year with a profit of: \$336,481.71 (Income) -\$317,969.08 (Expense) = \$18,512.63

We have also included the new budget which was approved by the Board in June for June 1, 2011 to May 31, 2012.

The Big Elk Meadows Association Reserve Fund has been decreased by \$12,137.50:

\$23,229.93      May 31, 2010 Reserve Fund

\$18,512.63	Income - Expense
-11,254.04	Water rights lawyer
-3,097.00	Sutron flow recorders
-7,827.23	Water Engineer
-715.04	Water rights expenses
-6,240.32	Sander for Dodge truck
<u>-1,516.50</u>	Misc. float

\$11,092.43      May 31, 2011 Reserve Fund

This was the year we had to go back to water court and get our Augmentation plan approved (every six years), and we are also under a strict order to change our ways of reporting water usage and flow to the state. Thus the high expense relating to water rights. Our current reserve fund is quite low for an association this size. We hope to build it back up this year.

Sincerely,

*Roberta A. Heisterkamp*

Roberta A. Heisterkamp  
Treasurer

## BIG ELK MEADOWS ASSOCIATION

05/31/11

ACCT	DESCRIPTION	BUDGET 2010-11	YTD AMOUNTS	DIFFERENCE	% DIFF.
<b>INCOME</b>					
4001	Membership Fees	\$208,314	\$205,304.27	\$3,009.73	-1.4%
4011	Lessee Payment	\$150	\$150.00	\$0.00	0.0%
4021	Users Fees	\$5,000	\$3,976.90	\$1,023.10	-20.5%
4031	Services	\$6,000	\$4,179.25	\$1,820.75	-30.3%
4041	Interest	\$4,000	\$3,925.47	\$74.53	-1.9%
4061	Misc. Revenue	\$500	\$329.99	\$170.01	-34.0%
4071	BEW Fairshare	\$100,900	\$113,125.83	-\$12,225.83	12.1%
4081	RE Transaction Fee	\$600	\$300.00	\$300.00	-50.0%
4091	Fishong Permits	\$8,000	\$5,190.00	\$2,810.00	-35.1%
4101	Special Assessment	\$0	\$0.00	\$0.00	0.0%
	CO Healthy Rivers Grant	\$11,720		\$11,720.00	-100.0%
<b>INCOME TOTALS</b>		<b>\$345,184</b>	<b>\$336,481.71</b>	<b>\$8,702.29</b>	<b>-2.5%</b>

**EXPENSES**

	Grader Loan Interest	\$2,090	\$1,447.14	\$642.86	30.8%
	Boat/Weedcutter Loan	\$432	\$602.86	-\$170.86	-39.6%
6111	Salary Operations Admin.	\$50,000	\$46,990.51	\$3,009.49	6.0%
6121	Salary Office Accountant	\$16,000	\$15,819.43	\$180.57	1.1%
6131	Salary Oper. Admin (B)	\$36,000	\$38,581.51	-\$2,581.51	-7.2%
6141	Outside Labor	\$3,000	\$108.00	\$2,892.00	96.4%
6161	Salary Oper & Off Admin	\$27,000	\$26,878.97	\$121.03	0.4%
6211	Payroll Taxes	\$12,900	\$10,937.59	\$1,962.41	15.2%
6221	Real Estate Taxes	\$20		\$20.00	100.0%
6241	Fire, Casualty Insurance	\$19,000	\$15,992.75	\$3,007.25	15.8%
6251	Taxes & Licenses	\$500	\$2,023.19	-\$1,523.19	-304.6%
6261	Workmen's Comp.	\$4,000	\$3,198.00	\$802.00	20.1%
6271	Health Benefits	\$29,000	\$34,490.16	-\$5,490.16	-18.9%
6311	Office Maintenance	\$500	\$138.16	\$361.84	72.4%
6321	Garage Maintenance	\$1,000	\$1,294.62	-\$294.62	-29.5%
6322	Maintenance Bldg. Impr.	\$0	\$350.00	-\$350.00	-100.0%
6331	Cabin Maintenance	\$2,500	\$213.19	\$2,286.81	91.5%
6340	Facilities Infrastructure	\$13,478		\$13,478.00	100.0%
7021	2003 Dodge Truck Maint.	\$3,000	\$2,747.86	\$252.14	8.4%
7031	2001 Dodge Truck Maint.	\$4,000	\$5,170.08	-\$1,170.08	-29.3%
7041	Grader Maintenance		\$1,859.96	-\$1,859.96	-100.0%
7051	Fuel (Gas & Diesel)	\$8,000	\$8,050.28	-\$50.28	-0.6%
7061	Oil, Lube etc.	\$250		\$250.00	100.0%
7121	Roads & Bridges	\$12,000	\$8,369.41	\$3,630.59	30.3%

7131 Sand Purchase	\$1,200		\$1,200.00	100.0%
7141 Tractor & Mower Maint.	\$200	\$807.64	-\$607.64	-303.8%
7211 Fish Stocking	\$8,000	\$7,942.15	\$57.85	0.7%
7221 Weed Control Lakes	\$17,220	\$14,759.05	\$2,460.95	14.3%
7231 Dams & Spillways	\$6,000	\$10,691.25	-\$4,691.25	-78.2%
7311 Lifeguard	\$7,500	\$7,200.00	\$300.00	4.0%
7321 Pool Supplies	\$3,000	\$2,818.65	\$181.35	6.0%
7331 Pool Maintennace	\$5,000		\$5,000.00	100.0%
7341 Pool Propane	\$4,000	\$7,405.15	-\$3,405.15	-85.1%
7411 Tennis Courts	\$500		\$500.00	100.0%
7421 Other Common Areas	\$1,000	\$51.72	\$948.28	94.8%
7611 Telephone/ HS Internet	\$4,000	\$4,952.52	-\$952.52	-23.8%
7621 Electricity	\$4,000	\$4,529.89	-\$529.89	-13.2%
7631 Propane Garage	\$3,000	\$1,440.05	\$1,559.95	52.0%
7641 Trash Service	\$12,000	\$7,574.86	\$4,425.14	36.9%
7711 Legal Service	\$1,000	\$75.95	\$924.05	92.4%
7721 Office Supplies	\$4,000	\$4,412.55	-\$412.55	-10.3%
7731 Postage	\$2,000	\$1,637.81	\$362.19	18.1%
7741 Tax Return Preparation	\$500	\$475.00	\$25.00	5.0%
7751 Special Projects	\$600	\$601.48	-\$1.48	-0.2%
7810 Shop Supplies	\$3,500	\$2,366.03	\$1,133.97	32.4%
7811 Conferences & Education	\$500	\$515.26	-\$15.26	-3.1%
7821 Gate Maintenance	\$1,700	\$1,433.28	\$266.72	15.7%
7831 Misc. Expense	\$500	\$116.26	\$383.74	76.7%
7822 Employee Mileage		\$308.81	-\$308.81	-100.0%
2750 Grader Loan Principal	\$6,076	\$7,072.05	-\$996.05	-16.4%
7833 Weed Cutter Loan Principi	\$3,518	\$3,518.00	\$0.00	0.0%
	<b>\$345,184</b>	<b>\$317,969.08</b>	<b>\$27,214.92</b>	<b>7.9%</b>
Income - Expense	\$0	\$18,512.63	-\$18,512.63	100.0%



# Big Elk Meadows Association

P.O. Box 440  
Lyons, Colorado 80540

## Balance Sheet

As of May 2011

6/1/2011  
4:07:28 PM

### Assets

Cash in Bank	\$9,014.19
Investments	\$2,078.24
Accounts Receivable	\$16,077.45
Buildings	\$162,493.21
Recreational Facilities	\$121,348.06
Pool	\$52,668.03
Lake Improvements	\$62,697.00
Dam Improvements	\$174,833.68
Road Improvements	\$62,482.91
Machinery	\$186,751.04
Vehicles	\$90,013.55
Land	\$190,727.81
Water Augmentation	\$321,834.65
Prepaid Water Augmentation Exp	\$10,866.32
Accumulated Depreciation	<u>(\$705,647.21)</u>
Total Assets	<u>\$758,238.93</u>

### Liabilities

FICA Payable	\$3,384.13
Federal Withholding	\$147.21
Colorado Withholding	\$1,069.60
Accounts Payable BEWA	(\$254.80)
Grader Loan - 2007 - 2014	\$22,312.25
Weed Cutter Loan-6/1/08-5/1/12	\$4,155.53
Memorial Tree Fund	(\$81.88)
Pool Restoration Fund	\$600.00
Adopt-a-Tree Fund	\$1,761.58
Pool Slide Donations	\$355.00
Unemployment Taxes	<u>(\$45.24)</u>
Total Liabilities	<u>\$33,403.38</u>

### Equity

Retained Earnings	\$693,573.78
Retained Earnings	(\$24,461.50)
Current Earnings	\$33,772.38
Historical Balancing Account	<u>\$21,950.89</u>
Total Equity	<u>\$724,835.55</u>
Total Liability & Equity	<u>\$758,238.93</u>

# Big Elk Meadows Association

P.O. Box 440  
Lyons, Colorado 80540

## Profit & Loss [With Year to Date]

May 2011

6/1/2011  
4:07:42 PM

	Selected Period	% of Sales	Year to Date	% of YTD Sales
<b>Income</b>				
Membership Dues	(\$319.50)	(2.1%)	\$209,958.77	61.5%
Lessee Payments	\$0.00	0.0%	\$150.00	0.0%
Users /Renter's Fees	\$0.00	0.0%	\$3,976.90	1.2%
Services	\$0.00	0.0%	\$4,179.25	1.2%
Interest	\$335.64	2.3%	\$3,925.47	1.2%
Misc. Revenue	\$0.00	0.0%	\$329.99	0.1%
BEW Fairshare	\$14,765.46	99.2%	\$113,125.83	33.2%
Real Estate Transaction Fee	\$100.00	0.7%	\$300.00	0.1%
Fishing Permits	\$0.00	0.0%	\$5,190.00	1.5%
<b>Total Income</b>	<b>\$14,881.60</b>	<b>100.0%</b>	<b>\$341,136.21</b>	<b>100.0%</b>
<b>Expenses</b>				
Grader Loan Expense - Interest	\$92.39	0.6%	\$1,447.14	0.4%
Boat/Weed Cutter Exp.-Interest	\$17.32	0.1%	\$602.66	0.2%
Salary Operations Admin.	\$3,232.00	21.7%	\$46,990.51	13.8%
Salary Office Accountant	\$1,215.22	8.2%	\$15,819.43	4.6%
Salary Oper. Admin. (B)	\$2,904.45	19.5%	\$38,581.51	11.3%
Outside Labor	\$0.00	0.0%	\$108.00	0.0%
Salary Oper. & Ofc. Admin. (A)	\$1,905.60	12.8%	\$26,878.97	7.9%
Payroll Taxes	\$728.38	4.9%	\$10,937.59	3.2%
Fire, Casualty Insurance	\$0.00	0.0%	\$15,992.75	4.7%
Taxes & Licenses	\$0.00	0.0%	\$2,023.19	0.6%
Workmens Comp.	(\$58.00)	(0.4%)	\$3,198.00	0.9%
Health Benefits	\$3,097.57	20.8%	\$34,490.16	10.1%
Office Maintenance	\$8.16	0.1%	\$138.16	0.0%
Garage/Shop Maintenance Bldg.	\$0.00	0.0%	\$1,294.62	0.4%
Maintenance Building Improve	\$0.00	0.0%	\$350.00	0.1%
Cabin Maintenance	\$0.00	0.0%	\$213.19	0.1%
2003 Dodge Truck Maint.	\$0.00	0.0%	\$2,747.86	0.8%
2001 Dodge Truck Maint.	\$0.00	0.0%	\$5,170.08	1.5%
Grader Maint.	\$216.46	1.5%	\$1,859.96	0.5%
Fuel (Gas & Diesel)	\$151.00	1.0%	\$8,050.28	2.4%
Roads, Bridges & Equipment	\$71.18	0.5%	\$8,369.41	2.5%
Tractor & Mower Maint.	\$0.00	0.0%	\$807.64	0.2%
Fish Stocking	\$434.90	2.9%	\$7,942.15	2.3%
Weed Control - Lakes	\$0.00	0.0%	\$14,759.05	4.3%
Dams & Spillways	\$9.98	0.1%	\$10,691.25	3.1%
Lifeguard	\$0.00	0.0%	\$7,200.00	2.1%
Pool Supplies	\$0.00	0.0%	\$2,818.65	0.8%
Pool Propane	\$0.00	0.0%	\$7,405.15	2.2%
Other Recreational Areas	\$28.12	0.2%	\$51.72	0.0%
Telephone	\$712.35	4.8%	\$4,952.52	1.5%
Electricity	\$349.44	2.3%	\$4,529.89	1.3%
Propane Garage/BEMA Cabin	\$0.00	0.0%	\$1,440.05	0.4%
Trash Service	\$805.00	5.4%	\$7,574.86	2.2%
Legal Service	\$8.95	0.1%	\$75.95	0.0%
Office Supplies	\$208.33	1.4%	\$4,412.55	1.3%
Postage	\$462.56	3.1%	\$1,637.81	0.5%
Tax Return Preparation	\$0.00	0.0%	\$475.00	0.1%
Special Projects	\$0.00	0.0%	\$601.48	0.2%
Shop Supplies	\$172.64	1.2%	\$2,366.03	0.7%
Conferences & Education	\$0.00	0.0%	\$515.26	0.2%
Gate Maintenance	\$100.00	0.7%	\$1,433.28	0.4%

# Big Elk Meadows Association

## Profit & Loss [With Year to Date]

May 2011

6/1/2011  
4:07:42 PM

	Selected Period	% of Sales	Year to Date	% of YTD Sales
Employee Mileage	\$94.35	0.6%	\$308.81	0.1%
Misc. Expense	\$122.43	0.8%	\$116.26	0.0%
Bad Debt Expense	(\$15.00)	(0.1%)	(\$15.00)	0.0%
Total Expenses	<u>\$17,075.78</u>	<u>114.7%</u>	<u>\$307,363.83</u>	<u>90.1%</u>
Operating Profit	<u>(\$2,194.18)</u>	<u>(14.7%)</u>	<u>\$33,772.38</u>	<u>9.9%</u>
Other Expenses				
Net Profit/(Loss)	<u>(\$2,194.18)</u>	<u>(14.7%)</u>	<u>\$33,772.38</u>	<u>9.9%</u>

**BIG ELK MEADOWS ASSOCIATION**

**ANNUAL FINANCIAL REPORTS**

**2010**

**BIG ELK MEADOWS ASSOCIATION**

P.O. Box 440  
Lyons, Colorado 80540

July 21, 2010

Dear Member or Interested Party,

Each year the treasurer looks at the end-of-year figures for both associations and reports to the general membership. Enclosed is the **End of the Year Report** for May 31, 2010. It gives a line item breakdown for the **Big Elk Meadows Association** operating income and expenses. This association ended the year with a loss of: \$327,436.13 (Income) -\$328,453.24 (Expense) = -\$1,017.11

We have also included the new budget which was approved by the Board in July for June 1, 2010 to May 31, 2011.

The **Big Elk Meadows Association Reserve Fund** has been decreased by \$28,591.77:

\$51,821.70	May 31, 2009 Reserve Fund
-1,017.11	Income - Expense
-913.20	Water rights lawyer
-21,693.12	Garage Improvements
-807.00	Water Engineer
-168.00	Old Ish Assessment
-1,633.22	Adopt-a-Tree Expenses
<u>-2,360.12</u>	Misc. float
 \$23,229.93	 May 31, 2010 Reserve Fund

We have improved the garage so that it may last for another decade to serve the association. We are working on the outlet works for the Meadow Lake dam to bring them up to standards for water releases from downstream calls. These two expense items account for most of the decrease in the reserve fund.

Sincerely,

  
Roberta A. Heisterkamp  
Treasurer

# Big Elk Meadows Association

P.O. Box 440  
Lyons, Colorado 80540

## Balance Sheet

As of May 2010

6/2/2010

10:00:31 AM

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### Assets

Cash in Bank	\$22,164.96
Investments	\$1,064.97
Accounts Receivable	\$10,814.18
Buildings	\$162,493.21
Recreational Facilities	\$121,348.06
Pool	\$52,668.03
Lake Improvements	\$62,697.00
Dam Improvements	\$157,538.68
Road Improvements	\$62,482.91
Machinery	\$180,510.72
Vehicles	\$90,013.55
Land	\$190,727.81
Water Augmentation	\$298,941.32
Prepaid Water Augmentation Exp	\$10,866.32
Accumulated Depreciation	<u>(\$673,522.21)</u>
Total Assets	<u>\$750,809.51</u>

### Liabilities

FICA Payable	\$3,851.34
Federal Withholding	\$327.15
Colorado Withholding	\$1,054.60
Accounts Payable BEWA	(\$51.80)
2003 Dodge Truck Loan	(\$583.58)
Grader Loan - 2007 - 2014	\$30,064.30
Weed Cutter Loan-6/1/08-5/1/12	\$8,086.61
Memorial Tree Fund	(\$81.88)
Adopt-a-Tree Fund	\$1,532.58
Pool Slide Donations	\$355.00
Unemployment Taxes	<u>\$362.02</u>
Total Liabilities	<u>\$44,916.34</u>

### Equity

Retained Earnings	\$693,573.78
Retained Earnings	(\$20,149.88)
Current Earnings	\$10,518.38
Historical Balancing Account	<u>\$21,950.89</u>
Total Equity	<u>\$705,893.17</u>
Total Liability & Equity	<u>\$750,809.51</u>

# Big Elk Meadows Association

P.O. Box 440  
Lyons, Colorado 80540

## Profit & Loss [With Year to Date]

May 2010

6/7/2010  
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	Selected Period	% of Sales	Year to Date	% of YTD Sales
<b>Income</b>				
Membership Dues	\$0.00	0.0%	\$210,829.53	63.8%
Lessee Payments	\$0.00	0.0%	\$300.00	0.1%
Users Fees	(\$232.50)	(1.5%)	\$4,236.54	1.3%
Services	\$0.00	0.0%	\$4,335.50	1.3%
Interest	\$305.26	2.0%	\$4,274.38	1.3%
Misc. Revenue	\$289.80	1.9%	\$725.64	0.2%
BEW Fairshare	\$14,691.83	97.6%	\$98,388.37	29.8%
Real Estate Transaction Fee	\$0.00	0.0%	\$800.00	0.2%
Fishing Permits	\$0.00	0.0%	\$6,435.00	1.9%
<b>Total Income</b>	<b>\$15,054.39</b>	<b>100.0%</b>	<b>\$330,324.96</b>	<b>100.0%</b>
<b>Expenses</b>				
Grader Loan Expense - Interest	\$194.59	1.3%	\$2,324.48	0.7%
Boat/Weed Cutter Exp.-Interest	\$32.50	0.2%	\$695.26	0.2%
Salary Operations Admin.	\$4,821.30	32.0%	\$46,393.27	14.0%
Salary Office Accountant	\$1,598.86	10.6%	\$16,101.54	4.9%
Salary Oper. Admin. (B)	\$4,080.00	27.1%	\$37,305.42	11.3%
Outside Labor	\$0.00	0.0%	\$2,014.00	0.6%
Salary Oper. & Ofc. Admin. (A)	\$1,775.36	11.8%	\$25,273.82	7.7%
Payroll Taxes	\$961.14	6.4%	\$10,648.13	3.2%
Real Estate Tax	\$0.00	0.0%	\$14.98	0.0%
Fire, Casualty Insurance	\$0.00	0.0%	\$20,321.65	6.2%
Taxes & Licenses	\$0.00	0.0%	\$457.64	0.1%
Workmens Comp.	\$0.00	0.0%	\$3,545.00	1.1%
Health Benefits	\$1,944.79	12.9%	\$29,112.56	8.8%
Garage/Shop Maintenance Bldg.	\$0.00	0.0%	\$837.93	0.3%
Maintenance Building Improve	\$0.00	0.0%	\$4,638.00	1.4%
Cabin Maintenance	\$0.00	0.0%	\$1,230.54	0.4%
Facilities Infrastructure	\$0.00	0.0%	\$10,050.00	3.0%
2003 Dodge Truck Maint.	\$0.00	0.0%	\$1,751.10	0.5%
2001 Dodge Truck Maint.	\$135.00	0.9%	\$4,553.93	1.4%
Fuel (Gas & Diesel)	(\$80.89)	(0.5%)	\$7,495.40	2.3%
Oil & Lube	\$0.00	0.0%	\$13.58	0.0%
Roads, Bridges & Equipment	\$146.85	1.0%	\$9,508.74	2.9%
Tractor & Mower Maint.	\$0.00	0.0%	\$11.88	0.0%
Fish Stocking	\$0.00	0.0%	\$7,850.82	2.4%
Weed Control - Lakes	\$27.12	0.2%	\$3,090.44	0.9%
Dams & Spillways	\$0.00	0.0%	\$17,295.00	5.2%
Lifeguard	\$0.00	0.0%	\$6,034.25	1.8%
Pool Supplies	\$0.00	0.0%	\$1,627.18	0.5%
Pool Maintenance	\$28.93	0.2%	\$11,049.70	3.3%
Pool Propane	\$2,176.19	14.5%	\$3,523.06	1.1%
Other Recreational Areas	\$0.00	0.0%	\$292.90	0.1%
Telephone	\$357.31	2.4%	\$4,646.52	1.4%
Electricity	\$338.20	2.2%	\$4,636.69	1.4%
Propane Garage/BEMA Cabin	(\$2,055.44)	(13.7%)	\$2,048.68	0.6%
Trash Service	\$1,287.42	8.6%	\$9,127.40	2.8%
Legal Service	\$6.00	0.0%	\$2,330.00	0.7%
Office Supplies	\$328.69	2.2%	\$6,465.78	2.0%
Postage	\$353.39	2.3%	\$1,595.97	0.5%
Tax Return Preparation	\$0.00	0.0%	\$475.00	0.1%
Special Projects	\$0.00	0.0%	\$786.38	0.2%
Shop Supplies	\$0.00	0.0%	\$2,185.46	0.7%

# Big Elk Meadows Association

## Profit & Loss [With Year to Date]

May 2010

6/7/2010  
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	Selected Period	% of Sales	Year to Date	% of YTD Sales
Conferences & Education	\$23.00	0.2%	\$197.83	0.1%
Gate Maintenance	\$0.00	0.0%	\$48.59	0.0%
Misc. Expense	\$84.82	0.6%	\$200.08	0.1%
Total Expenses	<u>\$18,565.13</u>	<u>123.3%</u>	<u>\$319,806.58</u>	<u>96.8%</u>
Operating Profit	<u>(\$3,510.74)</u>	<u>(23.3%)</u>	<u>\$10,518.38</u>	<u>3.2%</u>
Other Expenses				
Net Profit/(Loss)	<u>(\$3,510.74)</u>	<u>(23.3%)</u>	<u>\$10,518.38</u>	<u>3.2%</u>



**BIG ELK MEADOWS ASSOCIATION**

**ANNUAL FINANCIAL REPORTS**

**2009**

# Big Elk Meadows Association

P.O. Box 440  
Lyons, Colorado 80540

## Balance Sheet

As of May 2009

6/2/2009  
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### Assets

Cash in Bank	\$1,801.37
Investments	\$50,020.33
Accounts Receivable	\$8,509.60
Buildings	\$140,800.09
Recreational Facilities	\$121,348.06
Pool	\$52,668.03
Lake Improvements	\$62,697.00
Dam Improvements	\$157,538.68
Road Improvements	\$62,482.91
Machinery	\$180,510.72
Vehicles	\$90,013.55
Land	\$190,727.81
Water Augmentation	\$297,221.12
Prepaid Water Augmentation Exp	\$10,866.32
Accumulated Depreciation	<u>(\$639,398.21)</u>
Total Assets	<u>\$787,807.38</u>

### Liabilities

FICA Payable	\$3,779.93
Federal Withholding	\$2,030.09
Colorado Withholding	\$1,248.10
Grader Loan - 2007 - 2014	\$36,680.41
Weed Cutter Loan-6/1/08-5/1/12	\$10,983.06
Memorial Tree Fund	(\$151.88)
Adopt-a-Tree Fund	\$2,987.00
Pool Slide Donations	\$355.00
Unemployment Taxes	<u>\$396.88</u>
Total Liabilities	<u>\$58,308.59</u>

### Equity

Retained Earnings	\$693,573.78
Retained Earnings	(\$15,139.45)
Current Earnings	\$29,113.57
Historical Balancing Account	<u>\$21,950.89</u>
Total Equity	<u>\$729,498.79</u>

Total Liability & Equity	<u>\$787,807.38</u>
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# Big Elk Meadows Association

P.O. Box 440  
Lyons, Colorado 80540

## Profit & Loss [With Year to Date]

May 2009

6/2/2009  
3:03:06 PM

	Selected Period	% of Sales	Year to Date	% of YTD Sales
<b>Income</b>				
Membership Dues	\$0.00	0.0%	\$201,720.00	63.9%
Lessee Payments	\$0.00	0.0%	\$0.00	0.0%
Users Fees	\$0.00	0.0%	\$3,410.00	1.1%
Services	\$37.50	0.5%	\$4,123.00	1.3%
Interest	\$338.93	4.4%	\$5,772.54	1.8%
Rent	\$0.00	0.0%	\$0.00	0.0%
Misc. Revenue	\$102.76	1.3%	\$1,868.11	0.6%
BEW Fairshare	\$7,186.86	92.7%	\$86,156.78	27.3%
Real Estate Transaction Fee	\$0.00	0.0%	\$600.00	0.2%
Fishing Permits	\$85.00	1.1%	\$6,886.00	2.2%
Special Assessment	\$0.00	0.0%	\$5,306.00	1.7%
<b>Total Income</b>	<b>\$7,751.05</b>	<b>100.0%</b>	<b>\$315,842.43</b>	<b>100.0%</b>
<b>Expenses</b>				
Wages & Salaries	\$0.00	0.0%	\$0.00	0.0%
Payroll Expenses	\$0.00	0.0%	\$0.00	0.0%
Ionization Loan Interest	\$0.00	0.0%	\$0.00	0.0%
Interest Exp. (Water Rights)	\$0.00	0.0%	\$0.00	0.0%
2001 Truck Loan Expense	\$0.00	0.0%	\$0.00	0.0%
2003 Truck Loan Expense	\$0.00	0.0%	\$0.00	0.0%
Grader Loan Expense - Interest	\$234.94	3.0%	\$2,996.94	0.9%
Boat/Weed Cutter Exp.-Interest	\$46.94	0.6%	\$639.22	0.2%
Salary Operations Admin.	\$7,990.27	103.1%	\$45,741.52	14.5%
Salary Office Accountant	\$2,196.59	28.3%	\$16,104.27	5.1%
Salary Oper. Admin. (B)	\$5,465.36	70.5%	\$32,021.56	10.1%
Outside Labor	\$520.00	6.7%	\$5,164.50	1.6%
Salary Oper. & Ofc. Admin. (A)	\$3,989.16	51.5%	\$25,643.54	8.1%
Payroll Taxes	\$1,543.12	19.9%	\$10,486.48	3.3%
Real Estate Tax	\$0.00	0.0%	\$0.00	0.0%
Fire, Casualty Insurance	\$0.00	0.0%	\$18,498.00	5.9%
Taxes & Licenses	\$0.00	0.0%	\$441.09	0.1%
Workmens Comp.	(\$521.00)	(6.7%)	\$2,629.00	0.8%
Health Benefits	\$1,744.97	22.5%	\$23,771.51	7.5%
Office Maintenance	\$16.14	0.2%	\$16.14	0.0%
Garage/Shop Maintenance Bldg.	\$4,377.83	56.5%	\$8,450.51	2.7%
Maintenance Building Improve	\$0.00	0.0%	\$0.00	0.0%
Cabin Maintenance	\$0.00	0.0%	\$54.57	0.0%
Facilities Infrastructure	\$0.00	0.0%	\$5,540.00	1.8%
Backhoe Maintenance	\$0.00	0.0%	\$0.00	0.0%
2003 Dodge Truck Maint..	\$0.00	0.0%	\$1,003.06	0.3%
2001 Dodge Truck Maint.	\$0.00	0.0%	\$3,070.34	1.0%
Grader Maint.	\$0.00	0.0%	\$0.00	0.0%
Fuel (Gas & Diesel)	\$21.00	0.3%	\$6,972.62	2.2%
Oil & Lube	\$0.00	0.0%	\$0.00	0.0%
Roads, Bridges & Equipment	\$264.00	3.4%	\$9,962.31	3.2%
Sand Purchase	\$0.00	0.0%	\$0.00	0.0%
Tractor & Mower Maint.	\$151.94	2.0%	\$190.72	0.1%
Fish Stocking	\$0.00	0.0%	\$8,489.50	2.7%
Weed Control - Lakes	\$0.00	0.0%	\$792.98	0.3%
Dams & Spillways	\$0.00	0.0%	\$156.36	0.0%
Water Augmentation Expense	\$0.00	0.0%	\$0.00	0.0%
Lifeguard	\$0.00	0.0%	\$6,528.75	2.1%
Pool Supplies	\$745.05	9.6%	\$4,071.39	1.3%

# Big Elk Meadows Association

## Profit & Loss [With Year to Date]

May 2009

6/2/2009  
3:03:06 PM

	Selected Period	% of Sales	Year to Date	% of YTD Sales
Pool Maintenance	\$0.00	0.0%	\$2,546.23	0.8%
Pool Propane	\$0.00	0.0%	\$4,344.32	1.4%
Tennis Courts	\$0.00	0.0%	\$27.25	0.0%
Other Recreational Areas	\$67.86	0.9%	\$538.32	0.2%
Telephone	\$382.61	4.9%	\$4,633.99	1.5%
Electricity	\$302.96	3.9%	\$4,631.43	1.5%
Propane Garage/BEMA Cabin	\$0.00	0.0%	\$4,016.52	1.3%
Trash Service	\$1,231.27	15.9%	\$11,211.58	3.5%
Legal Service	\$6.00	0.1%	\$1,864.50	0.6%
Office Supplies	\$551.51	7.1%	\$4,820.89	1.5%
Postage	\$239.68	3.1%	\$1,998.49	0.6%
Tax Return Preparation	\$0.00	0.0%	\$475.00	0.2%
Special Projects	\$0.00	0.0%	\$309.16	0.1%
Corporation Tax	\$0.00	0.0%	\$0.00	0.0%
Shop Supplies	\$120.99	1.6%	\$2,699.01	0.9%
Conferences & Education	\$0.00	0.0%	\$199.83	0.1%
Gate Maintenance	\$32.09	0.4%	\$1,408.04	0.4%
Misc. Expense	\$141.97	1.8%	\$1,567.42	0.5%
Grader Loan Pay't - Principal	\$0.00	0.0%	\$0.00	0.0%
Weed Cutter Loan 6/08-5/11	\$0.00	0.0%	\$0.00	0.0%
Bad Debt Expense	\$0.00	0.0%	\$0.00	0.0%
Gain/Loss on Sale of Asset	\$0.00	0.0%	\$0.00	0.0%
Depreciation Expense	\$0.00	0.0%	\$0.00	0.0%
<b>Total Expenses</b>	<b>\$31,863.25</b>	<b>411.1%</b>	<b>\$286,728.86</b>	<b>90.8%</b>
<b>Operating Profit</b>	<b>(\$24,112.20)</b>	<b>(311.1%)</b>	<b>\$29,113.57</b>	<b>9.2%</b>
<b>Other Expenses</b>				
Income Transfer	\$0.00	0.0%	\$0.00	0.0%
<b>Total Other Expenses</b>	<b>\$0.00</b>	<b>0.0%</b>	<b>\$0.00</b>	<b>0.0%</b>
<b>Net Profit/(Loss)</b>	<b>(\$24,112.20)</b>	<b>(311.1%)</b>	<b>\$29,113.57</b>	<b>9.2%</b>

	A	B	C	D	E
118	BIG ELK WATER ASSOCIATION				5/31/2009
119	BUDGET 2009-2010				
120					
121	ACCT. DESCRIPTION		ACTUAL	YTD	PROPOSED
122	INCOME		BUDGET 2008-09	AMOUNTS	BUDGET 2009-10
123	4005 MEMBERSHIP FEES (156 X \$665)		\$100,480	\$98,293.16	\$103,740
124	4015 TAP FEES				\$0
125	4025 SERVICES (EMPLOYEES' HELP)		\$500	\$75.00	\$500
126	4035 INTEREST (DWS SCUDDER MM 1.7% currently) + Q/M payers		\$7,000	\$3,623.05	\$3,500
127	4045 MISCELLANEOUS INCOME (Late fees)		\$1,000	\$1,389.29	\$1,000
128	4055 WATER CHARGES (1,800,000 GAL X .025/GAL + 200,000 X .035/GAL)		\$48,300	\$62,087.78	\$52,000
129	4085 PROPERTY TRANSFER FEES (6 X \$100)		\$600	\$500.00	\$600
130	4065 SPECIAL ASSESSMENT		\$17,150	\$13,397.01	\$0
131	INCOME TOTALS		\$175,030	\$179,365.29	\$161,340
132					
133	EXPENSES				
134	TEMPLE CONSTRUCTION INTEREST		\$265	\$199.09	\$0
135	IONIZATION LOAN INTEREST		\$830	\$796.97	\$0
136	6035 CABIN USE FEE (\$100/MONTH WHEN CARETAKER OCCUPIES)*		\$1,200	\$1,100.00	\$1,200
137	6115 SALARY OPERATIONS ADMIN. (F/S 40% OF BEM ACC 6111)*		\$19,200	\$16,889.98	\$19,200
138	6125 SALARY OFFICE ACCOUNTANT (F/S 40% OF BEM ACC 6121)*		\$6,000	\$5,974.04	\$6,400
139	6135 SALARY OPERATIONS & MAINT. (B)(F/S 40% OF BEM ACC 6131)		\$12,400	\$16,038.94	\$12,400
140	6145 OUTSIDE LABOR (F/S 40% OF BEM ACC 6141)*		\$2,720	\$1,047.80	\$2,720
141	6165 SALARY OPER. & MAINT. (A) (F/S 40% OF BEM ACC 6161)*		\$10,800	\$9,416.66	\$10,800
142	6215 PAYROLL TAXES (F/S 40% OF BEM ACC 6211)*		\$4,400	\$3,819.04	\$5,160
143	6245 FIRE, CASUALTY INSUR (F/S 40% OF BEM ACC 6241)*		\$8,800	\$4,860.77	\$7,600
144	6255 TAXES & LICENSES (50% OF BEM ACC 6251)*		\$325	\$1,035.55	\$200
145	6265 WORKMENS COMP (F/S 40% OF BEM ACC 6261)*		\$2,160	\$1,141.60	\$2,160
146	6275 HEALTH BENEFITS (F/S 40% OF BEM ACC 6271)*		\$8,000	\$8,697.94	\$11,200
147	6315 OFFICE MAINTENANCE (F/S 40% OF BEM ACC 6311)*		\$200	\$6.95	\$200
148	6325 GARAGE MAINTENANCE (F/S 40% OF BEM ACC 6321)*		\$800	\$3,380.20	\$400
149	6335 CABIN MAINTENANCE (F/S 40% OF BEM ACC 6331)*		\$2,000	\$21.83	\$2,000
150	FACILITIES INFRASTRUCTURE		\$1,100	\$0.00	\$11,200
151	7015 BACKHOE MAINTENANCE		\$2,000	\$1,368.40	\$2,000
152	7025 2003 DODGE TRUCK (F/S 40% OF BEM ACC 7021)*		\$800	\$401.22	\$1,200
153	7035 2001 DODGE TRUCK MAINTENANCE (F/S 40% OF BEM ACC 7031)*		\$1,200	\$1,228.14	\$1,600
154	7055 FUEL (GAS & DEISEL) (F/S 40% OF BEM ACC 7051)*		\$4,000	\$2,083.22	\$3,200
155	7065 OIL, LUBE ETC. (F/S 40% OF BEM ACC 7061)*		\$100	\$38.60	\$100
156	7515 WATER TREAT. SUPPLIES/TESTING.		\$10,000	\$8,936.95	\$11,000

	A	B	C	D	E
157	7525	PUMP HOUSE MAINT.	\$1,000	\$0.00	\$500
158	7535	MICROFILTRATION SYSTEM and MIEX MAINTENANCE	\$14,000	\$18,047.26	\$15,000
159	7545	MAINS MAINTENANCE	\$3,000	\$3,687.71	\$3,000
160	7555	WELL MAINTENANCE	\$1,000	\$3,936.31	\$1,000
161	7615	TELEPHONE (F/S 40% OF BEM ACC 7611)*	\$1,600	\$1,823.43	\$1,600
162	7625	ELECTRICITY (F/S 25% OF BEM ACC 7621)*	\$875	\$1,157.86	\$1,600
163	7625	ELECTRICITY (DIRECT BILLS FOR PUMPHOUSES)	\$8,125	\$9,533.99	\$8,000
164	7635	PROPANE OFFICE & GARAGE (F/S 40% OF BEM ACC 7631)*	\$800	\$1,606.61	\$1,000
165	7715	LEGAL SERVICE (F/S 40% OF BEM ACC 7711)*	\$400	\$1,454.20	\$400
166	7725	OFFICE SUPPLIES (F/S 40% OF BEM ACC 7721)*	\$1,400	\$1,803.72	\$1,600
167	7735	POSTAGE (F/S 40% OF BEM ACC 7731)*	\$600	\$725.98	\$800
168	7745	ACC. & BOOKKEEPING	\$500	\$475.00	\$500
169	7805	SHOP SUPPLIES (F/S 40% OF BEM ACC 7801)*	\$1,400	\$1,309.72	\$1,400
170	7815	WATER METER EXPENSE	\$7,800	\$3,159.68	\$7,800
171	7825	CONFERENCES & EDUCATION	\$1,000	\$1,540.00	\$2,000
172	7835	MISCELLANEOUS EXP.	\$0	\$75.18	\$0
173		HICKORY MAIN / DISCHARGE LOAN (5.25% INT on \$60,000)			\$2,200
174		USED SMALL VEHICLE PURCHASE 1/2 BEM / 1/2 BEW			\$1,000
175		TEMPLE CONSTR'N LOAN (Hemlock Dr replace) \$1,363.67/mo	\$7,982	\$7,982.94	\$0
176		IONIZATION LOAN PRINCIPAL	\$24,248	\$24,248.00	\$0
177		EXPENSE TOTALS	\$175,030	\$171,051.48	\$161,340
178					
179		<b>INCOME - EXPENSE</b>	\$0	\$8,313.81	\$0
180					
181		Note: the budget was built with the COL increase in annual assessments of \$25			
182		If that fails, we would need to decrease expenses by \$3,900			

**BIG ELK WATER ASSOCIATION  
ANNUAL FINANCIAL REPORTS**

**2011**

**BIG ELK WATER ASSOCIATION**

P.O. Box 440

Lyons, Colorado 80540

July 26, 2011

Dear Member or Lessee,

Each year the treasurer looks at the end-of-year figures for both associations and reports to the general membership. Enclosed is the **End of the Year Report** for May 31, 2011. It gives a line item breakdown for the **Big Elk Water Association** operating income and expenses. This association ended the year with a profit of: \$180,972.04 (Income) -\$173,757.82 (Expense) = \$7,214.22

We have also included the new budget which was approved by the Board in June for June 1, 2011 to May 31, 2012.

The **Big Elk Water Association Reserve Fund** has been increased by \$17,125.65:

\$4,016.26	May 31, 2010 Reserve Fund
7,214.22	Income - Expense
10,000.00	Hickory Main/Discharge loan
<u>-88.57</u>	Misc. float
 \$21,141.91	 May 31, 2011 Reserve Fund

We borrowed \$90,000 from a member and paid off the bank principal with a small amount left over for continuing work on the water system. The bank interest rate was variable, and we were concerned about its going up and our inability to budget for the future. The member's loan is at a fixed 4.25% giving us an exact amount to expect to pay each year (\$12,050).

Sincerely,



Roberta A. Heisterkamp  
Treasurer



## BIG ELK WATER ASSOCIATION

05/31/11

ACCT.	DESCRIPTION	BUDGET 2010-11	YTD AMOUNTS	DIFFERENCE	% DIFF.
<b>INCOME</b>					
4005	Membership Fees	\$116,965	\$115,340.47	\$1,624.53	-1.4%
4015	Tap Fees		\$16,000.00	-\$16,000.00	100.0%
4025	Services	\$500		\$500.00	-100.0%
4035	Interest	\$2,000	\$2,222.36	-\$222.36	11.1%
4045	Misc. Revenue	\$500	\$493.21	\$6.79	-1.4%
4055	Water Charges	\$52,000	\$46,616.00	\$5,384.00	-10.4%
4085	RE Transaction Fees	\$600	\$300.00	\$300.00	-50.0%
4065	Special Assessment			\$0.00	100.0%
<b>INCOME TOTALS</b>		<b>\$172,565</b>	<b>\$180,972.04</b>	<b>-\$8,407.04</b>	<b>4.9%</b>
<b>EXPENSES</b>					
6005	Water Projects BOW int.		\$1,647.42	-\$1,647.42	100.0%
6035	Cabin Use Fee	\$1,200	\$1,300.00	-\$100.00	108.3%
6115	Salary Operations Admin.	\$20,000	\$20,545.14	-\$545.14	102.7%
6125	Salary Office Accountant	\$6,400	\$6,948.16	-\$548.16	108.6%
6135	Salary Oper. Admin. (B)	\$19,440	\$22,651.27	-\$3,211.27	116.5%
6145	Outside Labor	\$1,200	\$43.20	\$1,156.80	3.6%
6165	Salary Oper. Admin (A)	\$10,800	\$11,019.63	-\$219.63	102.0%
6215	Payroll Taxes	\$5,160	\$4,670.04	\$489.96	90.5%
6245	Fire, Casualty Insurance	\$7,600	\$7,029.50	\$570.50	92.5%
6255	Taxes & Licenses	\$200	\$2,467.49	-\$2,267.49	1233.7%
6265	Workmen's Comp.	\$1,600	\$1,379.60	\$220.40	86.2%
6275	Health Benefits	\$11,600	\$14,395.31	-\$2,795.31	124.1%
6315	Office Maintenance	\$200	\$59.50	\$140.50	29.8%
6325	Garage Maintenance	\$400	\$517.85	-\$117.85	129.5%
6335	Cabin Maintenance	\$1,000	\$98.75	\$901.25	9.9%
6340	Facilities Infrastructure	\$9,915	\$7,915.00	\$2,000.00	79.8%
7015	Backhoe Maintenance	\$2,000	\$3,689.56	-\$1,689.56	184.5%
7025	2003 Dodge Truck Maint.	\$1,200	\$1,081.92	\$118.08	90.2%
7035	2001 Dodge Truck Maint.	\$1,600	\$1,269.34	\$330.66	79.3%
7055	Fuel (Gas & Diesel)	\$3,200	\$3,126.25	\$73.75	97.7%
7065	Oil & Lube	\$100	\$17.23	\$82.77	17.2%
7515	Water Treatment Supplies	\$10,000	\$13,717.94	-\$3,717.94	137.2%
7535	Micro System & MIEX Maint.	\$16,750	\$12,666.37	\$4,083.63	75.6%
7545	Mains Maintenance	\$10,000	\$4,624.09	\$5,375.91	46.2%
7555	Well Maintenance	\$1,000		\$1,000.00	0.0%
7615	Telephone / Internet	\$1,600	\$2,021.50	-\$421.50	126.3%
7625	Electricity	\$8,500	\$10,120.95	-\$1,620.95	119.1%

7635 Propane Garage	<b>\$1,200</b>	\$532.45	\$667.55	44.4%
7715 Legal Service	<b>\$400</b>	\$102.18	\$297.82	25.5%
7725 Office Supplies	<b>\$1,600</b>	\$1,707.74	-\$107.74	106.7%
7735 Postage	<b>\$800</b>	\$1,013.23	-\$213.23	126.7%
7745 Tax Return Preparation	<b>\$500</b>	\$475.00	\$25.00	95.0%
7805 Shop Supplies	<b>\$1,400</b>	\$897.01	\$502.99	64.1%
7815 Water Meter Expense		\$510.92	-\$510.92	100.0%
7825 Conferences & Education	<b>\$2,000</b>	\$1,404.90	\$595.10	70.2%
7835 Misc. Expense		\$57.00	-\$57.00	100.0%
Hickory Main / Discharge Loan	<b>\$12,000</b>	\$12,034.38	-\$34.38	100.3%
<b>EXPENSE TOTALS</b>	<b>\$172,565</b>	\$173,757.82	-\$1,192.82	100.7%
 Income - Expense	 <b>\$0</b>	 \$7,214.22	 -\$7,214.22	 100.0%

		B	C	D	E
1	BIG ELK MEADOWS ASSOCIATION				5/31/11
2	BUDGET 2011-2012				
3	ACCT. DESCRIPTION				
4	INCOME	BUDGET 2010-11	ACTUALS YTD		APPROVED
5	4001 MEMBERSHIP DUES (11-12: 163 X \$1303.56)	\$208,314.00	\$205,304.27		\$212,480.28
6	4011 LESSEES PAYMENTS (HANSEN \$150)	\$150.00	\$150.00		\$150.00
7	4021 USERS FEES (4 Members who rent their homes to others)	\$5,000.00	\$3,976.90		\$5,000.00
8	4031 SERVICES (\$3500 LAR. CNTY. + EMPLOYEES HELP)	\$6,000.00	\$4,179.25		\$4,000.00
9	4041 INTEREST (DWS SCUDDER MM .2% currently) + Q/M Payees	\$4,000.00	\$3,925.47		\$4,000.00
10	4051 RENT (on BEM cabin across from garage) No rent now.	\$0.00			\$0.00
11	4061 MISCELLANEOUS INCOME (Late fees, sale of remotes for gate)	\$500.00	\$329.99		\$300.00
12	4071 BEW FAIRSHARE (SUM OF BEW ITEMS WITH "x")	\$100,900.00	\$113,125.83		\$104,760.00
13	4081 PROPERTY TRANSFER FEES	\$600.00	\$300.00		\$600.00
14	4091 FISHING PERMITS (90 X \$85) + \$1,350 in contributions	\$8,000.00	\$5,190.00		\$6,000.00
15	4101 SPECIAL ASSESSMENT	\$0.00			\$0.00
16	CO Healthy Rivers Grant	\$11,720.00			\$0.00
17	INCOME TOTALS	\$345,184.00	\$336,481.71		\$337,290.28
18	EXPENSES				
19	GRADER LOAN EXPENSE (INTEREST)	\$2,090.00	\$1,447.14		\$1,525.00
20	BOAT/WEED CUTTER LOAN EXPENSE (INTEREST)	\$432.00	\$602.86		\$104.94
21	6111 SALARY OPERATIONS ADMINISTRATOR (\$20.20/hr+COL+OT)	\$50,000.00	\$46,990.51		\$52,000.00
22	6121 SALARY OFFICE ACCOUNTANT (\$10,598) +400/mo health	\$16,000.00	\$15,819.43		\$16,400.00
23	6131 SALARY OPERAT. & MAINT.(B) (17.34/hour)	\$36,000.00	\$38,581.51		\$39,000.00
24	6141 OUTSIDE LABOR (ALL HOURLY WORK)	\$3,000.00	\$108.00		\$1,000.00
25	6161 SALARY OPERATIONS & MAINTENANCE (A)/OFFICE (\$11.91/hr)	\$27,000.00	\$26,878.97		\$28,000.00
26	6211 PAYROLL TAXES (FICA, CUTA, FUTA ETC.)	\$12,900.00	\$10,937.59		\$13,500.00
27	6221 REAL ESTATE TAXES (1 LESSEE LOT)	\$20.00			\$20.00
28	6241 FIRE, CASUALTY INSUR.	\$19,000.00	\$15,992.75		\$17,000.00
29	6251 TAXES & LICENSES	\$500.00	\$2,023.19		\$500.00
30	6261 WORKMEN'S COMP	\$4,000.00	\$3,198.00		\$3,600.00
31	6271 HEALTH BENEFITS \$2333/mo + inc.	\$29,000.00	\$34,490.16		\$35,000.00
32	6311 OFFICE MAINTENANCE (New flooring)	\$500.00	\$138.16		\$500.00
33	6321 GARAGE MAINTENANCE (Repair roof)	\$1,000.00	\$1,294.62		\$1,000.00
34	6322 MAINTENANCE BUILDING IMPROVEMENTS	\$0.00	\$350.00		\$0.00
35	6331 CABIN MAINTENANCE (front steps, deck cover)	\$2,500.00	\$213.19		\$1,500.00
36	6340 FACILITIES INFRASTRUCTURE	\$13,478.00			\$9,510.07
37	7021 2003 DODGE TRUCK MAINTENANCE/Sander	\$3,000.00	\$2,747.86		\$3,500.00
38	7031 2001 DODGE TRUCK & PLOW MAINTENANCE	\$4,000.00	\$5,170.08		\$4,000.00

	B	C	D	E
39	7041 GRADER MAINTENANCE (Tires)		\$1,859.96	\$4,000.00
40	7051 FUEL (GAS & DIESEL)	\$8,000.00	\$8,050.28	\$9,000.00
41	7061 OIL, LUBE ETC. (PURCHASED IN BULK ALT. YEARS)	\$250.00		\$250.00
42	7121 ROADS & BRIDGES (Improvements to surface)	\$12,000.00	\$8,369.41	\$8,000.00
43	7131 SAND PURCHASE	\$1,200.00		\$1,200.00
44	7141 TRACTOR & MOWER MAINT.	\$200.00	\$807.64	\$1,000.00
45	7211 FISH STOCKING (depending on lake health)	\$8,000.00	\$7,942.15	\$8,000.00
46	7221 WEED CONTROL-LAKES (LAKE HEALTH) Alum loan	\$17,220.00	\$14,759.05	\$1,000.00
47	7231 DAMS & SPILLWAYS (Meadow Dam and Flume Repair)	\$6,000.00	\$10,691.25	\$10,000.00
48	7311 LIFE GUARD (\$9.00/hr + training)	\$7,500.00	\$7,200.00	\$7,500.00
49	7321 POOL SUPPLIES	\$3,000.00	\$2,818.65	\$3,000.00
50	7331 POOL MAINTENANCE (boiler and concrete decking)	\$5,000.00		\$5,000.00
51	7341 POOL PROPANE	\$4,000.00	\$7,405.15	\$5,000.00
52	7411 TENNIS	\$500.00		\$500.00
53	7421 OTHER COMMON AREAS (Dumpster slab)	\$1,000.00	\$51.72	\$1,000.00
54	7611 TELEPHONE / High speed Internet	\$4,000.00	\$4,952.52	\$5,000.00
55	7621 ELECTRICITY	\$4,000.00	\$4,529.89	\$4,800.00
56	7631 PROPANE GARAGE	\$3,000.00	\$1,440.05	\$1,500.00
57	7641 TRASH SERVICE (MacDonald Farms & WM Contract)	\$12,000.00	\$7,574.86	\$9,000.00
58	7711 LEGAL SERVICE	\$1,000.00	\$75.95	\$1,000.00
59	7721 OFFICE SUPPLIES	\$4,000.00	\$4,412.55	\$4,000.00
60	7731 POSTAGE	\$2,000.00	\$1,637.81	\$1,500.00
61	7741 TAX RETURN PREPARATION	\$500.00	\$475.00	\$500.00
62	7751 SPECIAL PROJECTS (Bar-B-Q, Dir, Volunteer awds)	\$600.00	\$601.48	\$600.00
63	7801 SHOP SUPPLIES	\$3,500.00	\$2,366.03	\$3,500.00
64	7811 CONFERENCES & EDUCATION	\$500.00	\$515.26	\$500.00
65	7821 GATE MAINTENANCE	\$500.00	\$1,433.28	\$500.00
66	7831 MISCELLANEOUS EXP.	\$500.00	\$116.26	\$500.00
67	7824 SAND SHED POWER INSTALL	\$0.00		\$0.00
68	7822 EMPLOYEE MILEAGE		\$308.81	\$1,200.00
69	7823 ATV MAINTENANCE	\$1,200.00		\$600.00
70	7832 GRADER LOAN PRINCIPAL (ends March 2014)	\$6,076.00	\$7,072.05	\$6,635.00
71	7833 WEED CUTTER LOAN PRINCIPAL (ends May 2012)	\$3,518.00	\$3,518.00	\$3,845.27
72	EXPENSE TOTALS	\$345,184.00	\$317,969.08	\$337,290.28
73	LOAN INTEREST			
74	INCOME - EXPENSE	\$0.00	\$18,512.63	\$0.00
75	RESERVE FUND EXPENSE FOR 2011-2012			
76	Replace BEMA radios mandatory FCC			\$5,000.00

	B	C	D	E
77				
78				
79	FAIRSHARE CALCULATION 2011-2012			
80	6035 CABIN USE FEE	\$1,200.00	\$1,300.00	\$1,200.00
81	6115 SALARY OPERATIONS ADMINISTRATOR	\$20,000.00	\$20,545.14	\$20,800.00
82	6125 SALARY OFFICE ACCOUNTANT	\$6,400.00	\$6,948.16	\$6,560.00
83	6135 SALARY OPERATIONS & MAINTENANCE (B)	\$19,440.00	\$22,651.27	\$21,060.00
84	6145 OUTSIDE LABOR	\$1,200.00	\$43.20	\$400.00
85	6165 SALARY OPERATIONS & MAINTENANCE (A)	\$10,800.00	\$11,019.63	\$11,200.00
86	6215 PAYROLL TAXES	\$5,160.00	\$4,670.04	\$5,400.00
87	6245 FIRE, CASUALTY INSURANCE	\$7,600.00	\$7,029.50	\$6,800.00
88	6255 TAXES & LICENSES	\$200.00	\$2,467.49	\$200.00
89	6265 WORKMEN'S COMP	\$1,600.00	\$1,379.60	\$1,440.00
90	6275 HEALTH BENEFITS	\$11,600.00	\$14,395.31	\$14,000.00
91	6315 OFFICE MAINTENANCE	\$200.00	\$59.50	\$200.00
92	6325 GARAGE MAINTENANCE	\$400.00	\$517.85	\$400.00
93	6335 CABIN MAINTENANCE	\$1,000.00	\$98.75	\$600.00
94	7025 2003 DODGE TRUCK MAINTENANCE	\$1,200.00	\$1,081.92	\$1,400.00
95	7035 2001 DODGE TRUCK MAINTENANCE	\$1,600.00	\$1,269.34	\$1,600.00
96	7055 FUEL (GAS & DEISEL)	\$3,200.00	\$3,126.25	\$3,600.00
97	7065 OIL AND LUBE	\$100.00	\$17.23	\$100.00
98	7615 TELEPHONE	\$1,600.00	\$2,021.50	\$2,000.00
99	7625 ELECTRICITY	\$1,000.00	\$1,811.96	\$1,200.00
100	7635 PROPANE GARAGE	\$1,200.00	\$532.45	\$600.00
101	7715 LEGAL SERVICE	\$400.00	\$102.18	\$400.00
102	7725 OFFICE SUPPLIES	\$1,600.00	\$1,707.74	\$1,600.00
103	7735 POSTAGE	\$800.00	\$1,013.23	\$600.00
104	7805 SHOP SUPPLIES	\$1,400.00	\$897.01	\$1,400.00
105	TOTAL FAIRSHARE	\$100,900.00	\$106,706.25	\$104,760.00
106		*		
107	*BEW F/S expense total \$106,706.25			
108	BEMA F/S income total \$113,125.83			
109	because the May 2010 payment was not deposited			
110	in BEMA until the first week in June.			
111				
112				
113				
114				

	B	C	D	E
115	BIG ELK WATER ASSOCIATION			5/31/11
116	BUDGET 2011-2012			
117				
118	ACCT. DESCRIPTION	BUDGET 2010-11	YTD ACTUAL	APPROVED
119	INCOME			
120	4005 MEMBERSHIP FEES (11-12:157 X \$759.90)	\$116,965.00	\$115,340.47	\$119,304.30
121	4015 TAP FEES (Bank foreclosure)	\$0.00	\$16,000.00	\$16,000.00
122	4025 SERVICES (EMPLOYEES' HELP)	\$500.00		\$100.00
123	4035 INTEREST (DWS SCUDDER MM .2% currently) + Q/M payers	\$2,000.00	\$2,222.36	\$2,000.00
124	4045 MISCELLANEOUS INCOME (Late fees)	\$500.00	\$493.21	\$500.00
125	4055 WATER CHARGES (1,800,000 GALX.025/GAL+200,000 X.035/GAL	\$52,000.00	\$46,616.00	\$52,000.00
126	4085 PROPERTY TRANSFER FEES (6 X \$100)	\$600.00	\$300.00	\$600.00
127	4065 SPECIAL ASSESSMENT	\$0.00		
128	INCOME TOTALS	\$172,565.00	\$180,972.04	\$190,504.30
129				
130	EXPENSES			
131	6005 WATER PROJECTS LOAN INTEREST (Bank of the West)		\$1,647.42	\$0.00
132	6035 CABIN USE FEE (\$100/MONTH WHEN CARETAKER OCCUPIES)*	\$1,200.00	\$1,300.00	\$1,200.00
133	6115 SALARY OPERATIONS ADMIN.(F/S 40% OF BEM ACC 6111)*	\$20,000.00	\$20,545.14	\$20,800.00
134	6125 SALARY OFFICE ACCOUNTANT (F/S 40% OF BEM ACC 6121)*	\$6,400.00	\$6,948.16	\$6,560.00
135	6135 SALARY OPERATIONS & MAINT. (B) (F/S 54% OF BEM ACC 6131)*	\$19,440.00	\$22,651.27	\$21,060.00
136	6145 OUTSIDE LABOR (F/S 40% OF BEM ACC 6141)*	\$1,200.00	\$43.20	\$400.00
137	6165 SALARY OPER. & MAINT. (A) (F/S 40% OF BEM ACC 6161)*	\$10,800.00	\$11,019.63	\$11,200.00
138	6215 PAYROLL TAXES (F/S 40% OF BEM ACC 6211)*	\$5,160.00	\$4,670.04	\$5,400.00
139	6245 FIRE, CASUALTY INSUR (F/S 40% OF BEM ACC 6241)*	\$7,600.00	\$7,029.50	\$6,800.00
140	6255 TAXES & LICENSES (50% OF BEM ACC 6251)*	\$200.00	\$2,467.49	\$200.00
141	6265 WORKMENS COMP (F/S 40% OF BEM ACC 6261)*	\$1,600.00	\$1,379.60	\$1,440.00
142	6275 HEALTH BENEFITS (F/S 40% OF BEM ACC 6271)*	\$11,600.00	\$14,395.31	\$14,000.00
143	6315 OFFICE MAINTENANCE (F/S 40% OF BEM ACC 6311)*	\$200.00	\$59.50	\$200.00
144	6325 GARAGE MAINTENANCE (F/S 40% OF BEM ACC 6321)*	\$400.00	\$517.85	\$400.00
145	6335 CABIN MAINTENANCE (F/S 40% OF BEM ACC 6331)*	\$1,000.00	\$98.75	\$600.00
146	6340 FACILITIES INFRASTRUCTURE	\$9,915.00	\$7,915.00	\$19,694.30
147	7015 BACKHOE MAINTENANCE	\$2,000.00	\$3,689.56	\$1,000.00
148	7025 2003 DODGE TRUCK (F/S 40% OF BEM ACC 7021)*	\$1,200.00	\$1,081.92	\$1,400.00
149	7035 2001 DODGE TRUCK MAINTENANCE (F/S 40% OF BEM ACC 7031)*	\$1,600.00	\$1,269.34	\$1,600.00
150	7055 FUEL (GAS & DEISEL) (F/S 40% OF BEM ACC 7051)*	\$3,200.00	\$3,126.25	\$3,600.00
151	7065 OIL, LUBE ETC. (F/S 40% OF BEM ACC 7061)*	\$100.00	\$17.23	\$100.00
152	7515 WATER TREAT. SUPPLIES/TESTING.	\$10,000.00	\$13,717.94	\$15,000.00

	B	C	D	E
153	7325 PUMP & WELL HOUSE MAINT.	\$1,750.00		\$2,000.00
154	7535 MICROFILTRATION SYSTEM and MIEX MAINTENANCE	\$15,000.00	\$12,666.37	\$17,000.00
155	7545 MAINS MAINTENANCE (bleeders, meter protection)	\$10,000.00	\$4,624.09	\$5,000.00
156	7555 WELL MAINTENANCE	\$1,000.00		\$1,000.00
157	7615 TELEPHONE (F/S 40% OF BEM ACC 7611)*	\$1,600.00	\$2,021.50	\$2,000.00
158	7625 ELECTRICITY (F/S 25% OF BEM ACC 7621)*	\$1,000.00	\$1,811.96	\$1,200.00
159	7625 ELECTRICITY (DIRECT BILLS FOR PUMPHOUSES)	\$7,500.00	\$8,308.99	\$8,500.00
160	7635 PROPANE GARAGE (F/S 40% OF BEM ACC 7631)*	\$1,200.00	\$532.45	\$600.00
161	7715 LEGAL SERVICE (F/S 40% OF BEM ACC 7711)*	\$400.00	\$102.18	\$400.00
162	7725 OFFICE SUPPLIES (F/S 40% OF BEM ACC 7721)*	\$1,600.00	\$1,707.74	\$1,600.00
163	7735 POSTAGE (F/S 40% OF BEM ACC 7731)*	\$800.00	\$1,013.23	\$600.00
164	7745 ACC. & BOOKKEEPING	\$500.00	\$475.00	\$500.00
165	7805 SHOP SUPPLIES (F/S 40% OF BEM ACC 7801)*	\$1,400.00	\$897.01	\$1,400.00
166	7815 WATER METER EXPENSE (\$185 per meter)	\$0.00	\$510.92	\$2,000.00
167	7825 CONFERENCES & EDUCATION	\$2,000.00	\$1,404.90	\$2,000.00
168	7835 MISCELLANEOUS EXP.	\$0.00	\$57.00	\$0.00
169	HICKORY MAIN/DISCHARGE LOAN PAYMENTS	\$12,000.00	\$12,034.38	\$12,050.00
170	EXPENSE TOTALS	\$172,565.00	\$173,757.82	\$190,504.30
171				
172	INCOME - EXPENSE	\$0.00	\$7,214.22	\$0.00
173				
174	RESERVE FUND EXPENSES FOR 2011-12			
175				
176	Note: CPI increase for the Denver/Boulder/Greeley area is 2%			
177	If we ask for a raise in annual assessments of 2% and it passes,			
178	the new BEMA annual assessment would be \$1,303.56 (\$25.56)			
179	and 163 X \$1,303.56 = \$212,480.28, an increase of \$4,166.28			
180				
181	Note: CPI increase for the Denver/Boulder/Greeley area is 2%			
182	If we ask for a raise in annual assessments of 2% and it passes,			
183	the new BEWA annual assessment would be \$759.90 (\$14.90)			
184	and 157 X \$759.90 = \$119,304.30, an increase of \$2,339.30			
185				
186				
187				R.A.H.

# Big Elk Water Association

P.O. Box 440  
Lyons, Colorado 80540

## Balance Sheet

As of May 2011

6/1/2011  
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### Assets

Cash in Bank	\$15,501.67
Investments	\$5,640.24
Accounts Receivable Other	\$170.43
Vehicles	\$63,055.06
Accounts Receivable	\$26,072.28
Water Filters	\$21,168.02
Machinery	\$143,875.25
Water Mains	\$254,595.16
Water Treatment Plant	\$205,692.75
Inonization Plant	\$194,000.99
Water Rights	\$10,422.46
Accumulated Depreciation	(\$476,699.34)
Total Assets	<u>\$463,494.97</u>

### Liabilities

Accounts Payable BEMA	(\$8,878.81)
LOOMIS - Water Projects Loan	\$84,447.12
B.O.T.W. - Water Projects Loan	(\$669.60)
Total Liabilities	<u>\$74,898.71</u>

### Equity

Current Year Earnings	\$15,664.09
Retained Earnings	\$372,652.48
Historical Balancing Account	\$279.69
Total Equity	<u>\$388,596.26</u>
Total Liability & Equity	<u>\$463,494.97</u>



# Big Elk Water Association

P.O. Box 440  
Lyons, Colorado 80540

## Profit & Loss [With Year to Date]

May 2011

6/1/2011  
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	Selected Period	% of Sales	Year to Date	% of YTD Sales
<b>Income</b>				
Membership Fees	(\$1,414.42)	(6.5%)	\$113,926.05	63.4%
Tap Fees	\$16,000.00	73.3%	\$16,000.00	8.9%
Interest	\$383.57	1.8%	\$2,222.36	1.2%
Misc. Revenue	\$188.56	0.9%	\$493.21	0.3%
Water Charges	\$6,479.50	29.7%	\$46,616.00	26.0%
Real Estate Transaction Fee	\$200.00	0.9%	\$300.00	0.2%
<b>Total Income</b>	<b>\$21,837.21</b>	<b>100.0%</b>	<b>\$179,557.62</b>	<b>100.0%</b>
<b>Expenses</b>				
Water Projects Loan - Interest	\$301.57	1.4%	\$3,817.51	2.1%
Cabin Use Fee	\$200.00	0.9%	\$1,300.00	0.7%
Salary Operations Admin.	\$3,232.00	14.8%	\$20,545.14	11.4%
Salary Office Accountant	\$1,135.22	5.2%	\$6,948.16	3.9%
Salary Oper Admin (B)	\$3,857.80	17.7%	\$22,651.27	12.6%
Outside Labor	\$0.00	0.0%	\$43.20	0.0%
Salary Op & Ofc. Admin (A)	\$1,524.48	7.0%	\$11,019.63	6.1%
Payroll Taxes	\$712.99	3.3%	\$4,670.04	2.6%
Insurance	\$0.00	0.0%	\$7,029.50	3.9%
Taxes & Licenses & Permits	\$63.76	0.3%	\$2,467.49	1.4%
Workmen's Comp	(\$23.20)	(0.1%)	\$1,379.60	0.8%
Health Benefits	\$2,478.06	11.3%	\$14,395.31	8.0%
Office Maintenance	\$3.51	0.0%	\$59.50	0.0%
Garage Maintenance	\$0.00	0.0%	\$517.85	0.3%
Cabin Maintenance	\$0.00	0.0%	\$98.75	0.1%
Facilities Infrastructure	\$0.00	0.0%	\$7,915.00	4.4%
Backhoe Maintenance	\$0.00	0.0%	\$3,689.56	2.1%
2003 Dodge Truck Maint.	\$0.00	0.0%	\$1,081.92	0.6%
2001 Dodge Truck Maint.	\$0.00	0.0%	\$1,269.34	0.7%
Fuel (Gas & Diesel)	\$556.43	2.5%	\$3,126.25	1.7%
Oil, Lube, etc.	\$0.00	0.0%	\$17.23	0.0%
Water Treatment Supp. & Testing	\$1,202.93	5.5%	\$13,717.94	7.6%
Micro-MIEX-Pumphouse Maint.	\$0.00	0.0%	\$12,666.37	7.1%
Mains Maintenance	\$104.74	0.5%	\$4,624.09	2.6%
Telephone	\$315.11	1.4%	\$2,021.50	1.1%
Electricity	\$808.49	3.7%	\$10,120.95	5.6%
Propane Garage	\$59.76	0.3%	\$532.45	0.3%
Legal Services	\$7.98	0.0%	\$102.18	0.1%
Office Supplies	\$143.66	0.7%	\$1,707.74	1.0%
Postage	\$192.34	0.9%	\$1,013.23	0.6%
Tax Return Preparation	\$0.00	0.0%	\$475.00	0.3%
Shop Supplies	\$96.18	0.4%	\$897.01	0.5%
Water Meter Expense	\$29.11	0.1%	\$510.92	0.3%
Conference Fees & Education	\$0.00	0.0%	\$1,404.90	0.8%
Misc. Expense	\$0.00	0.0%	\$57.00	0.0%
<b>Total Expenses</b>	<b>\$17,002.92</b>	<b>77.9%</b>	<b>\$163,893.53</b>	<b>91.3%</b>
<b>Operating Profit</b>	<b>\$4,834.29</b>	<b>22.1%</b>	<b>\$15,664.09</b>	<b>8.7%</b>
<b>Other Expenses</b>				
<b>Net Profit/(Loss)</b>	<b>\$4,834.29</b>	<b>22.1%</b>	<b>\$15,664.09</b>	<b>8.7%</b>

**BIG ELK WATER ASSOCIATION**  
**ANNUAL FINANCIAL REPORTS**

**2010**

**BIG ELK WATER ASSOCIATION**

P.O. Box 440  
Lyons, Colorado 80540

July 21, 2010

Dear Member or Interested Party,

Each year the treasurer looks at the end-of-year figures for both associations and reports to the general membership. Enclosed is the **End of the Year Report** for May 31, 2010. It gives a line item breakdown for the **Big Elk Water Association** operating income and expenses. This association ended the year with a loss of: \$150,686.92 (Income) -\$162,800.12 (Expense) = -\$12,113.20

We have also included the new budget which was approved by the Board in July for June 1, 2010 to May 31, 2011.

The **Big Elk Water Association Reserve Fund** has been decreased by \$3,069.83:

\$7,086.09	May 31, 2009 Reserve Fund
-12,113.20	Income - Expense
-39,347.43	Fairbanks Excavating (Hickory main)
39,347.43	Water loan draw
-3,507.27	Pontius Consultants (Discharge treatment)
13,040.69	Water loan draw
<u>-490.05</u>	Misc. float
\$4,016.26	May 31, 2010 Reserve Fund

This winter's extreme cold drove the frost line to 7 feet and caused the Hickory main to freeze. Our expenses exceeded our budget causing a loss of \$12,113 for operating. We also needed to treat the discharge from the water plant before returning it to Mirror Lake (EPA requirements) and we have a new system in place for that.

We have drawn \$74,000 from our \$90,000 line of credit from the Bank of the West and have paid interest only through 6/30/2010. Thanks to the BEW Assessment increase voted at the annual meeting, we will start paying down the principal of this loan at \$12,000/year.

Sincerely,

*Roberta A. Heisterkamp*  
Roberta A. Heisterkamp  
Treasurer

# Big Elk Water Association

P.O. Box 440  
Lyons, Colorado 80540

## Balance Sheet

As of May 2010

6/2/2010  
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### Assets

Cash in Bank	\$1,869.84
Investments	\$2,146.42
Accounts Receivable Other	\$170.43
Vehicles	\$63,055.06
Accounts Receivable	\$26,728.25
Water Filters	\$21,168.02
Machinery	\$143,875.25
Water Mains	\$254,595.16
Water Treatment Plant	\$205,692.75
Inonization Plant	\$194,000.99
Water Rights	\$10,422.46
Accumulated Depreciation	<u>(\$442,016.34)</u>
Total Assets	<u>\$481,708.29</u>

### Liabilities

Water Projects Loan	<u>\$74,093.12</u>
Total Liabilities	\$74,093.12

### Equity

Current Year Earnings	(\$11,899.61)
Retained Earnings	\$419,235.09
Historical Balancing Account	<u>\$279.69</u>
Total Equity	\$407,615.17
Total Liability & Equity	<u>\$481,708.29</u>

# Big Elk Water Association

P.O. Box 440  
Lyons, Colorado 80540

## Profit & Loss [With Year to Date]

May 2010

6/2/2010  
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	Selected Period	% of Sales	Year to Date	% of YTD Sales
<b>Income</b>				
Membership Fees	\$0.00	0.0%	\$103,053.93	68.3%
Interest	\$184.43	3.4%	\$1,740.10	1.2%
Misc. Revenue	\$66.50	1.2%	\$421.55	0.3%
Water Charges	\$5,235.00	95.4%	\$43,984.93	29.1%
Special Assessment	\$0.00	0.0%	\$1,000.00	0.7%
Real Estate Transaction Fee	\$0.00	0.0%	\$700.00	0.5%
<b>Total Income</b>	<b>\$5,485.93</b>	<b>100.0%</b>	<b>\$150,900.51</b>	<b>100.0%</b>
<b>Expenses</b>				
Water Projects Loan - Interest	\$272.69	5.0%	\$2,288.74	1.5%
Cabin Use Fee	\$200.00	3.6%	\$1,000.00	0.7%
Salary Operations Admin.	\$3,110.58	56.7%	\$15,236.85	10.1%
Salary Office Accountant	\$1,107.40	20.2%	\$5,321.40	3.5%
Salary Oper Admin (B)	\$3,095.28	56.4%	\$16,481.57	10.9%
Outside Labor	\$0.00	0.0%	\$805.60	0.5%
Salary Op & Ofc. Admin (A)	\$1,787.04	32.6%	\$8,651.86	5.7%
Payroll Taxes	\$711.08	13.0%	\$3,581.32	2.4%
Insurance	\$0.00	0.0%	\$7,496.26	5.0%
Taxes & Licenses	\$53.00	1.0%	\$1,229.61	0.8%
Workmen's Comp	\$0.00	0.0%	\$1,418.00	0.9%
Health Benefits	\$2,120.64	38.7%	\$9,806.82	6.5%
Garage Maintenance	\$0.00	0.0%	\$1,779.32	1.2%
Cabin Maintenance	\$0.00	0.0%	\$478.74	0.3%
Facilities Infrastructure	\$0.00	0.0%	\$10,443.00	6.9%
2003 Dodge Truck Maint.	\$0.00	0.0%	\$700.44	0.5%
2001 Dodge Truck Maint.	\$71.07	1.3%	\$1,767.57	1.2%
Fuel (Gas & Diesel)	\$979.31	17.9%	\$2,602.19	1.7%
Oil, Lube, etc.	\$0.00	0.0%	\$5.43	0.0%
Water Treatment Supp.	\$2,427.17	44.2%	\$14,979.82	9.9%
Micro System & MIEX Maint.	\$0.00	0.0%	\$17,525.40	11.6%
Mains Maintenance	\$0.00	0.0%	\$9,677.82	6.4%
Telephone	\$315.88	5.8%	\$1,546.50	1.0%
Electricity	\$1,045.65	19.1%	\$11,486.56	7.6%
Propane Garage	\$331.12	6.0%	\$1,641.64	1.1%
Legal Services	\$8.40	0.2%	\$997.20	0.7%
Office Supplies	\$289.25	5.3%	\$2,363.47	1.6%
Postage	\$54.88	1.0%	\$549.62	0.4%
Tax Return Preparation	\$0.00	0.0%	\$475.00	0.3%
Shop Supplies	\$141.20	2.6%	\$909.90	0.6%
Water Meter Expense	\$794.69	14.5%	\$7,016.48	4.6%
Conference Fees & Education	\$17.00	0.3%	\$1,646.63	1.1%
Misc. Expense	\$71.30	1.3%	\$889.36	0.6%
<b>Total Expenses</b>	<b>\$19,004.63</b>	<b>346.4%</b>	<b>\$162,800.12</b>	<b>107.9%</b>
<b>Operating Profit</b>	<b>(\$13,518.70)</b>	<b>(246.4%)</b>	<b>(\$11,899.61)</b>	<b>(7.9%)</b>
<b>Other Expenses</b>				
<b>Net Profit/(Loss)</b>	<b>(\$13,518.70)</b>	<b>(246.4%)</b>	<b>(\$11,899.61)</b>	<b>(7.9%)</b>

**BIG ELK WATER ASSOCIATION**  
**ANNUAL FINANCIAL REPORTS**  
**2009**

# Big Elk Water Association

P.O. Box 440  
Lyons, Colorado 80540

## Balance Sheet

As of May 2009

6/2/2009  
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### Assets

Cash in Bank	\$2,159.94
Investments	\$4,926.15
Accounts Receivable Other	\$117.24
Vehicles	\$63,055.06
Accounts Receivable	\$26,057.80
Water Filters	\$21,168.02
Machinery	\$143,875.25
Water Mains	\$204,247.73
Water Treatment Plant	\$205,692.75
Inonization Plant	\$181,493.72
Water Rights	\$10,422.46
Accumulated Depreciation	<u>(\$408,887.34)</u>
Total Assets	<u>\$454,328.78</u>

### Liabilities

Accounts Payable BEMA	(\$7,363.38)
Water Projects Loan	<u>\$1,685.00</u>
Total Liabilities	<u>(\$5,678.38)</u>

### Equity

Current Year Earnings	\$28,042.82
Retained Earnings	\$431,684.65
Historical Balancing Account	<u>\$279.69</u>
Total Equity	<u>\$460,007.16</u>
Total Liability & Equity	<u>\$454,328.78</u>

# Big Elk Water Association

P.O. Box 440  
Lyons, Colorado 80540

## Profit & Loss [With Year to Date]

May 2009

6/2/2009  
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	Selected Period	% of Sales	Year to Date	% of YTD Sales
<b>Income</b>				
Membership Fees	\$0.00	0.0%	\$99,200.00	59.4%
Tap Fees	\$0.00	0.0%	\$0.00	0.0%
Services	\$0.00	0.0%	\$75.00	0.0%
Interest	\$213.28	2.2%	\$3,623.05	2.2%
Misc. Revenue	\$109.74	1.1%	\$1,389.29	0.8%
Water Charges	\$9,474.47	96.7%	\$62,087.78	37.2%
Special Assessment	\$0.00	0.0%	\$0.00	0.0%
Backhoe Rental	\$0.00	0.0%	\$0.00	0.0%
Real Estate Transaction Fee	\$0.00	0.0%	\$500.00	0.3%
<b>Total Income</b>	<b>\$9,797.49</b>	<b>100.0%</b>	<b>\$166,875.12</b>	<b>100.0%</b>
<b>Expenses</b>				
Wages & Salaries	\$0.00	0.0%	\$0.00	0.0%
Payroll Expenses	\$0.00	0.0%	\$0.00	0.0%
Water Projects Loan - Interest	\$2.76	0.0%	\$2.76	0.0%
Temple Construct. Interest	\$0.00	0.0%	\$199.09	0.1%
Ionization Loan Interest	\$0.00	0.0%	\$796.97	0.5%
Cabin Use Fee	\$200.00	2.0%	\$1,100.00	0.7%
Salary Operations Admin.	\$4,593.99	46.9%	\$16,889.98	10.1%
Salary Office Accountant	\$1,358.34	13.9%	\$5,974.04	3.6%
Salary Oper Admin (B)	\$4,063.93	41.5%	\$16,038.94	9.6%
Outside Labor	\$208.00	2.1%	\$1,047.80	0.6%
Salary Op & Ofc. Admin (A)	\$2,340.84	23.9%	\$9,416.66	5.6%
Payroll Taxes	\$897.87	9.2%	\$3,819.04	2.3%
Real Estate Taxes	\$0.00	0.0%	\$0.00	0.0%
Insurance	\$635.20	6.5%	\$4,860.77	2.9%
Taxes & Licenses	\$66.98	0.7%	\$1,035.55	0.6%
Workmen's Comp	(\$524.80)	(5.4%)	\$1,141.60	0.7%
Health Benefits	\$1,625.58	16.6%	\$8,697.94	5.2%
Office Maintenance	\$6.95	0.1%	\$6.95	0.0%
Garage Maintenance	\$2,333.93	23.8%	\$3,380.20	2.0%
Cabin Maintenance	\$5.29	0.1%	\$21.83	0.0%
Facilities Infrastructure	\$0.00	0.0%	\$0.00	0.0%
Payroll Taxes	\$0.00	0.0%	\$0.00	0.0%
Backhoe Maintenance	\$70.31	0.7%	\$1,368.40	0.8%
2003 Dodge Truck Maint.	\$0.00	0.0%	\$401.22	0.2%
2001 Dodge Truck Maint.	\$0.00	0.0%	\$1,228.14	0.7%
Fuel (Gas & Diesel)	\$291.41	3.0%	\$2,083.22	1.2%
Oil, Lube, etc.	\$0.00	0.0%	\$38.60	0.0%
Water Treatment Supp.	\$1,200.49	12.3%	\$8,936.95	5.4%
Pump House Maint (Building)	\$0.00	0.0%	\$0.00	0.0%
Micro System & MIEX Maint.	\$430.69	4.4%	\$18,047.26	10.8%
Mains Maintenance	\$0.00	0.0%	\$3,687.71	2.2%
Well Maintenance	\$0.00	0.0%	\$3,936.31	2.4%
Telephone	\$321.72	3.3%	\$1,823.43	1.1%
Electricity	\$980.63	10.0%	\$10,691.85	6.4%
Propane Garage	\$364.13	3.7%	\$1,606.61	1.0%
Legal Services	\$92.80	0.9%	\$1,454.20	0.9%
Office Supplies	\$266.41	2.7%	\$1,803.72	1.1%
Postage	\$162.83	1.7%	\$725.98	0.4%
Tax Return Preparation	\$0.00	0.0%	\$475.00	0.3%
Corporation Tax	\$0.00	0.0%	\$0.00	0.0%
Water Rights Loan	\$0.00	0.0%	\$0.00	0.0%



# Big Elk Water Association

## Profit & Loss [With Year to Date]

May 2009

6/2/2009

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	Selected Period	% of Sales	Year to Date	% of YTD Sales
Shop Supplies	\$101.44	1.0%	\$1,309.72	0.8%
Water Meter Expense	\$0.00	0.0%	\$3,159.68	1.9%
Conference Fees & Education	\$0.00	0.0%	\$1,540.00	0.9%
Misc. Expense	\$0.00	0.0%	\$75.18	0.0%
Temple Constr.Loan-Principal	\$0.00	0.0%	\$0.00	0.0%
Ionization Loan - Principal	\$0.00	0.0%	\$0.00	0.0%
Bad Debt Expense	\$0.00	0.0%	\$9.00	0.0%
Gain/Loss on Sale of Asset	\$0.00	0.0%	\$0.00	0.0%
Depreciation Expense	\$0.00	0.0%	\$0.00	0.0%
Total Expenses	<u>\$22,097.72</u>	<u>225.5%</u>	<u>\$138,832.30</u>	<u>83.2%</u>
Operating Profit	<u>(\$12,300.23)</u>	<u>(125.5%)</u>	<u>\$28,042.82</u>	<u>16.8%</u>
Other Expenses				
Income Transfer	\$0.00	0.0%	\$0.00	0.0%
Total Other Expenses	<u>\$0.00</u>	<u>0.0%</u>	<u>\$0.00</u>	<u>0.0%</u>
Net Profit/(Loss)	<u>(\$12,300.23)</u>	<u>(125.5%)</u>	<u>\$28,042.82</u>	<u>16.8%</u>

A	B	C	D	E
1	<b>BIG ELK MEADOWS ASSOCIATION</b>			5/31/2009
2	BUDGET 2009-2010		YTD	PROPOSED
3	ACCT. DESCRIPTION	BUDGET 2008-09	AMOUNTS	BUDGET 2009-10
4	<b>INCOME</b>			
5	4001 MEMBERSHIP DUES (165 X \$1278)	\$200,490	\$199,875.00	<b>\$210,870</b>
6	4011 LESSEES PAYMENTS (HANSEN \$150)	\$150	\$0.00	<b>\$150</b>
7	4021 USERS FEES (Members who rent their homes to others)	\$2,000	\$3,410.00	<b>\$3,390</b>
8	4031 SERVICES (\$3500 LAR. CNTY. + EMPLOYEES HELP)	\$6,000	\$4,123.00	<b>\$6,000</b>
9	4041 INTEREST (DWS SCUDDER MM 1.7% currently) + Q/M Payees	\$6,000	\$5,772.54	<b>\$6,000</b>
10	4051 RENT(on BEM cabin across from firehouse) No rent now.	\$0	\$0.00	<b>\$0</b>
11	4061 MISCELLANEOUS INCOME (Late fees, sale of remotes for gate)	\$1,000	\$1,868.11	<b>\$1,000</b>
12	4071 BEW FAIRSHARE (SUM OF BEW ITEMS WITH "**")	\$91,820	\$86,156.78	<b>\$95,540</b>
13	4081 PROPERTY TRANSFER FEES	\$600	\$600.00	<b>\$600</b>
14	4091 FISHING PERMITS (90 X \$85) + \$1,350 in contributions	\$8,000	\$6,886.00	<b>\$8,000</b>
15	4101 SPECIAL ASSESSMENT	\$0	\$5,306.00	<b>\$5,306</b>
16	<b>INCOME TOTALS</b>	<b>\$316,060</b>	<b>\$313,997.43</b>	<b>\$336,856</b>
17				
18	<b>EXPENSES</b>			
19	GRADER LOAN EXPENSE (INTEREST)	\$2,000	\$2,996.94	<b>\$2,614</b>
20	BOAT/WEED CUTTER LOAN EXPENSE (INTEREST)	\$650	\$639.22	<b>\$600</b>
21	6111 SALARY OPERATIONS ADMINISTRATOR (\$19.80/hr+COL+OT)	\$48,000	\$45,741.52	<b>\$48,000</b>
22	6121 SALARY OFFICE ACCOUNTANT (\$10,400)+ COL +400/mo health	\$15,000	\$16,104.27	<b>\$16,000</b>
23	6131 SALARY OPERAT. & MAINT.(B)	\$31,000	\$32,021.56	<b>\$31,000</b>
24	6141 OUTSIDE LABOR (ALL HOURLY WORK)	\$6,800	\$5,164.50	<b>\$6,800</b>
25	6161 SALARY OPERATIONS & MAINTENANCE (A)/OFFICE (\$11.68/hr)	\$27,000	\$25,643.54	<b>\$27,000</b>
26	6211 PAYROLL TAXES (FICA, CUTA, FUTA ETC.)	\$11,000	\$10,486.48	<b>\$12,900</b>
27	6221 REAL ESTATE TAXES (LESSEE LOT) \$14 + increase	\$100	\$0.00	<b>\$20</b>
28	6241 FIRE, CASUALTY INSUR.	\$22,000	\$18,498.00	<b>\$19,000</b>
29	6251 TAXES & LICENSES	\$650	\$441.09	<b>\$500</b>
30	6261 WORKMEN'S COMP	\$5,400	\$2,629.00	<b>\$5,400</b>
31	6271 HEALTH BENEFITS \$2319/mo + inc.	\$20,000	\$23,771.51	<b>\$28,000</b>
32	6311 OFFICE MAINTENANCE	\$500	\$16.14	<b>\$500</b>
33	6321 GARAGE MAINTENANCE (Paint, lumber)	\$1,000	\$8,450.51	<b>\$1,000</b>
34	MAINTENANCE BUILDING IMPROVEMENTS	\$2,000	\$0.00	<b>\$8,500</b>
35	6331 CABIN MAINTENANCE (stairs, patio)	\$5,000	\$54.57	<b>\$5,000</b>
36	FACILITIES INFRASTRUCTURE	\$19,100	\$5,540.00	<b>\$10,209</b>
37	7021 2003 DODGE TRUCK MAINTENANCE/Sander	\$2,000	\$1,003.06	<b>\$3,000</b>
38	7031 2001 DODGE TRUCK & PLOW MAINTENANCE/SANDER	\$3,000	\$3,070.34	<b>\$4,000</b>
39	7041 GRADER MAINTENANCE (now included in ROADS & BRIDGES)	\$0	\$0.00	<b>\$0</b>

	A	B	C	D	E
40	7051 FUEL (GAS & DIESEL)		\$10,000	\$6,972.62	\$8,000
41	7061 OIL, LUBE ETC. (PURCHASED IN BULK ALT. YEARS)		\$250	\$0.00	\$250
42	7121 ROADS & BRIDGES (Dust control and improvements to surface)		\$12,000	\$9,962.31	\$12,000
43	SAND PURCHASE		\$1,200	\$0.00	\$1,200
44	7141 TRACTOR&MOWER MAINT.		\$200	\$190.72	\$200
45	7211 FISH STOCKING (depending on lake health)		\$8,000	\$8,489.50	\$8,000
46	7221 WEED CONTROL-LAKES (LAKE HEALTH) Alum purchase?		\$3,500	\$792.98	\$3,500
47	7231 DAMS & SPILLWAYS (Willow Dam Repair)		\$2,000	\$156.36	\$6,000
48	7311 LIFE GUARD (\$9.50/hr + training)		\$5,000	\$6,528.75	\$6,500
49	7321 POOL SUPPLIES		\$2,000	\$4,071.39	\$3,000
50	7331 POOL MAINTENANCE (new pump, extend fence)		\$2,000	\$2,546.23	\$3,000
51	7341 POOL PROPANE		\$5,000	\$4,344.32	\$4,000
52	7411 TENNIS		\$500	27.25	\$500
53	7421 OTHER COMMON AREAS (replace fences)		\$1,000	\$538.32	\$2,000
54	7611 TELEPHONE		\$4,000	\$4,663.99	\$4,000
55	7621 ELECTRICITY		\$3,500	\$4,631.43	\$4,000
56	7631 PROPANE GARAGE		\$2,000	\$4,016.52	\$2,500
57	7641 TRASH SERVICE (12 months + 3 ROLL OFFS)		\$9,000	\$11,211.58	\$12,000
58	7711 LEGAL SERVICE		\$1,000	\$1,864.50	\$1,000
59	7721 OFFICE SUPPLIES		\$3,500	\$4,820.89	\$4,000
60	7731 POSTAGE		\$1,500	\$1,998.49	\$2,000
61	7741 TAX RETURN PREPARATION		\$500	\$475.00	\$500
62	7751 SPECIAL PROJECTS (Bar-B-Q, Dir, Manuals, Volunteer awds)		\$400	\$309.16	\$400
63	7801 SHOP SUPPLIES		\$3,500	\$2,699.01	\$3,500
64	7811 CONFERENCES & EDUCATION		\$800	\$199.83	\$500
65	7821 GATE MAINTENANCE		\$500	\$1,408.04	\$500
66	SAND SHED POWER INSTALLATION				\$5,000
67	USED SMALL VEHICLE PURCHASE 1/2 BEM / 1/2 BEW				\$1,000
68	7831 MISCELLANEOUS EXP.		\$450	\$1,567.42	\$1,000
69	GRADER LOAN PRINCIPAL		\$7,241	\$6,168.78	\$6,627
70	WEED CUTTER LOAN PRINCIPAL		\$3,319	\$3,310.94	\$3,350
71	EXPENSE TOTALS		\$316,060	\$296,238.58	\$336,856
72	INCOME - EXPENSE		\$0	\$17,758.85	\$0.00
73					
74	Note: the budget was built with the COL increase in annual assessments of \$48				
75	If that fails, we would need to decrease expenses by \$7,920				
76					
77					
78					

	A	B	C	D	E
79					
80					
81					
82		<b>FAIRSHARE CALCULATION 2009-2010</b>			
83	6035	CABIN USE FEE	\$1,200	\$1,200	\$1,200
84	6115	SALARY OPERATIONS ADMINISTRATOR	\$19,200	\$18,297	\$19,200
85	6125	SALARY OFFICE ACCOUNTANT	\$6,000	\$6,442	\$6,400
86	6135	SALARY OPERATIONS & MAINTENANCE (B)	\$16,740	\$12,809	\$12,400
87	6145	OUTSIDE LABOR	\$2,720	\$2,066	\$2,720
88	6165	SALARY OPERATIONS & MAINTENANCE (A)	\$10,800	\$10,257	\$10,800
89	6215	PAYROLL TAXES	\$4,400	\$4,195	\$5,160
90	6245	FIRE, CASUALTY INSURANCE	\$8,800	\$7,399	\$7,600
91	6255	TAXES & LICENSES	\$325	\$221	\$200
92	6265	WORKMEN'S COMP	\$2,160	\$1,052	\$2,160
93	6275	HEALTH BENEFITS	\$8,000	\$9,509	\$11,200
94	6315	OFFICE MAINTENANCE	\$200	\$6	\$200
95	6325	GARAGE MAINTENANCE	\$400	\$3,380	\$400
96	6335	CABIN MAINTENANCE	\$2,000	\$22	\$2,000
97	7025	2003 DODGE TRUCK MAINTENANCE	\$800	\$401	\$1,200
98	7035	2001 DODGE TRUCK MAINTENANCE	\$1,200	\$1,228	\$1,600
99	7055	FUEL (GAS & DEISEL)	\$4,000	\$2,789	\$3,200
100	7065	OIL AND LUBE	\$100	\$0	\$100
101	7615	TELEPHONE	\$1,600	\$1,866	\$1,600
102	7625	ELECTRICITY	\$875	\$1,158	\$1,000
103	7635	PROPANE OFFICE AND GARAGE	\$800	\$1,607	\$1,000
104	7715	LEGAL SERVICE	\$400	\$746	\$400
105	7725	OFFICE SUPPLIES	\$1,400	\$1,928	\$1,600
106	7735	POSTAGE	\$600	\$799	\$800
107	7805	SHOP SUPPLIES	\$1,400	\$1,080	\$1,400
108		TOTAL FAIRSHARE	\$96,120	\$90,455	\$95,540
109					
110					
111					
112					
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115					
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117					



**Feasibility Study**

**And**

**Design report**

**Meadow Lake Dam Outlet**

**Replacement Project**

**The Big Elk Meadows**

**Association**

**Gauthiere Engineering**

**June 20, 2011**

**DESIGN REPORT  
MEADOW LAKE DAM OUTLET  
REPLACEMENT PROJECT**

**DAMID 040229  
WATER DIVISION I  
WATER DISTRICT NO. 4  
LARIMER COUNTY, COLORADO**

**Prepared For  
The Big Elk Meadows Association  
P. O. Box 440  
Lyons, CO. 80540**

**Prepared By  
Gauthiere Engineering, Inc.  
2157 Buena Vista Drive  
Greeley, Colorado 80634  
(970) 330-0855**

**June 20, 2011**

**CERTIFICATE OF ENGINEER  
FOR  
BIG ELK MEADOWS ASSOCIATION  
MEADOW LAKE DAM OUTLET REPLACEMENT PROJECT  
DESIGN REPORT**

**LARIMER COUNTY, COLORADO  
WATER DIVISION 1  
WATER DISTRICT NO. 4  
DAMID 040229**

I hereby certify that this Design Report for the **BIG ELK MEADOWS ASSOCIATION – MEADOW LAKE DAM OUTLET REPLACEMENT PROJECT** in Larimer County, Colorado was prepared by me, or under my direct supervision, for the Owner thereof.

GAUTHIERE ENGINEERING, INC.



*John G. Gauthiere* June 20, 2011  
John G. Gauthiere, P.E.  
Colorado P.E. No. 22136



**BIG ELK MEADOWS ASSOCIATION – MEADOW LAKE DAM OUTLET  
REPLACEMENT PROJECT  
LARIMER COUNTY CLORADO  
DESIGN REPORT**

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## ACKNOWLEDGEMENTS

*Gauthiere Engineering, Inc.* would like to thank the Big Elk Meadows Association for their valuable assistance during the preparation of this report and the plans and specifications for the project. Special thanks are offered to Mr. Leonard Arnold, Past President of Big Elk Meadows Association, Mr. Glenn Christensen, Past President of the Big Elk Meadows and Mr. John Batka, P.E., State Engineers Office (SEO) for their time and efforts on this project.

## **Introduction**

Big Elk Meadows (BEM) is a community of homeowners located in Larimer County and Boulder County, Colorado at latitude 40.26 and longitude 105.42 at an average elevation of 7,513 feet. This mountain subdivision is composed of 204 developed lots with 160 homes constructed beginning in 1957. Previous studies indicate that approximately 2.3 people occupy each residence and about 50 percent of the residents live at Big Elk Meadows full-time.

The subdivision is served by a 50-year old water system. Water issues facing the residents of Big Elk Meadows Subdivision include the need to repair existing raw water storage reservoirs and dams, the need to replace the existing undersized deteriorated treated water distribution system as well as improve the pumping and treated water storage facilities and its exiting wells.

The work discussed in this design report is focused on the replacement of the outlet works on Big Elk Meadows Association's Meadow Lake Dam. The site location of Meadow Lake Dam is shown on Figure 1 and Figure 2.

Based on a dam inspection performed on November 7, 2008 by the Colorado Division of Water Resources – Dam Safety Branch Engineer, BEM received notice that BEM needed to prepare plans and specifications for rehabilitation of the Meadow Lake Dam outlet conduit.

## **Purpose**

The purpose of this report is to discuss the philosophy and rationale of design for replacement of the Meadow Lake Dam Outlet. This report is intended to compliment the construction drawings and specifications dated June 20, 2011. The construction drawings and specifications are titled "Meadow Lake Dam Outlet Replacement Project – Siphon Alternate".

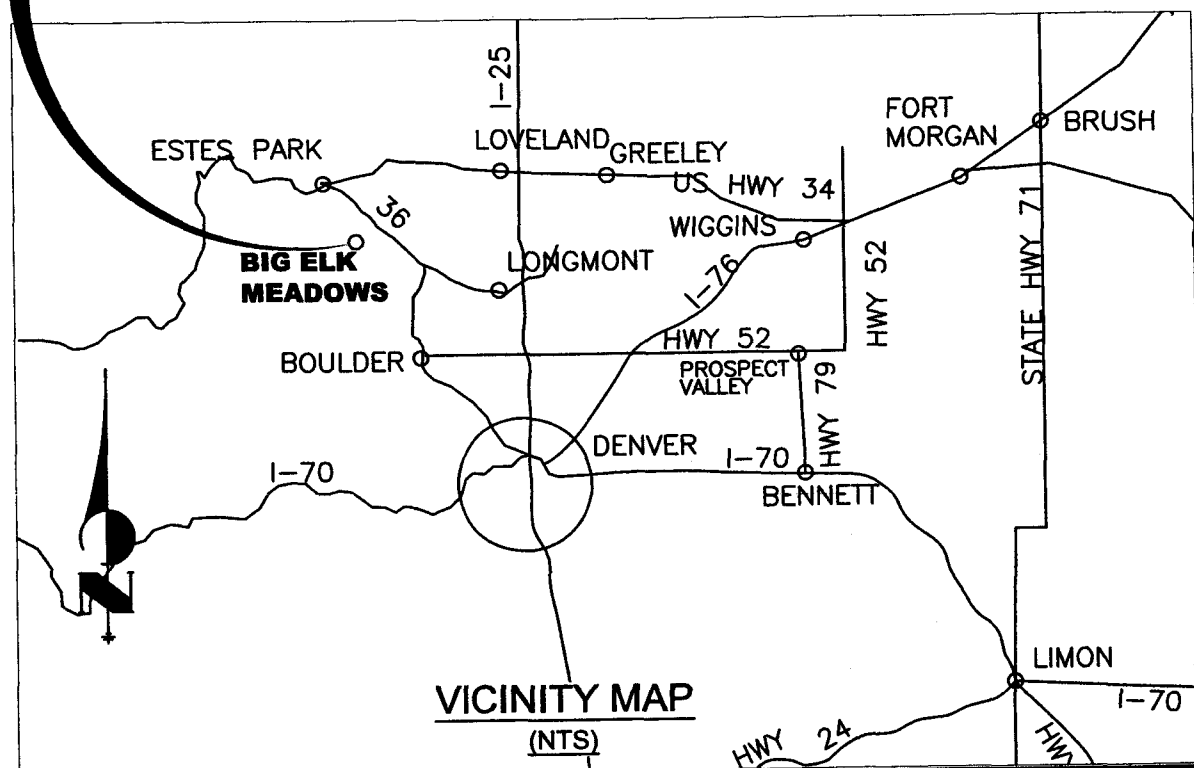
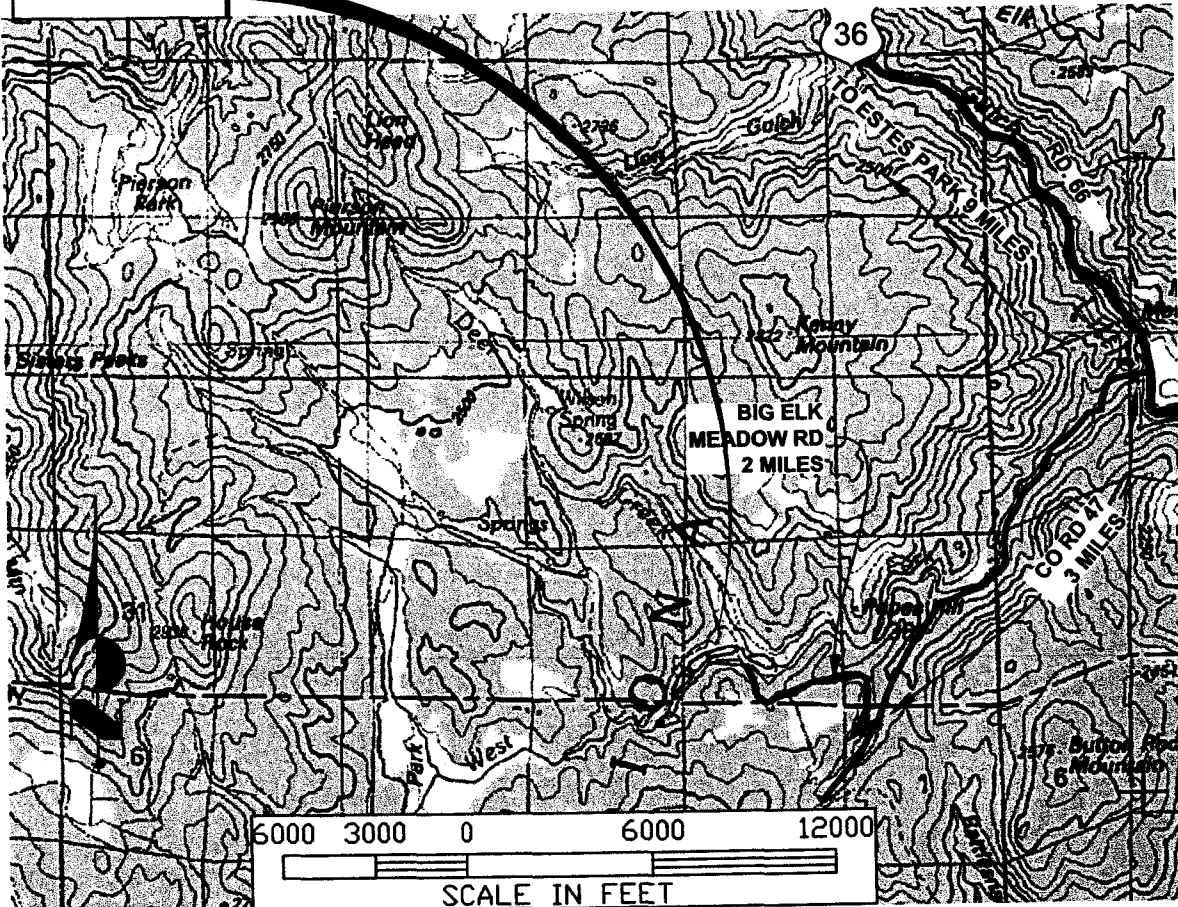
## **Scope of Work**

This project involved the preliminary design layout and preparation of final design for the modification of the Meadow Lake Dam Outlet Pipe and Controls. Construction drawings, technical specification and bidding documents as well as a design report were included in the work.

The two alternatives considered included a traditional "on grade open cut" gravity outlet replacement and an "over the dam" siphon with priming pump system.

**The "Open Cut" Alternate Plan:** The "Open Cut" Alternate Plan would involve temporarily draining the lake, breaching the dam and replacing the existing deteriorated corrugated metal pipe with a new concrete encased 12-inch diameter C900 pvc pipe per the State Engineer's Office requirements. A new heavy-duty control gate would be installed with the gate-operating stem encased in an oil filled

PROJECT SITE



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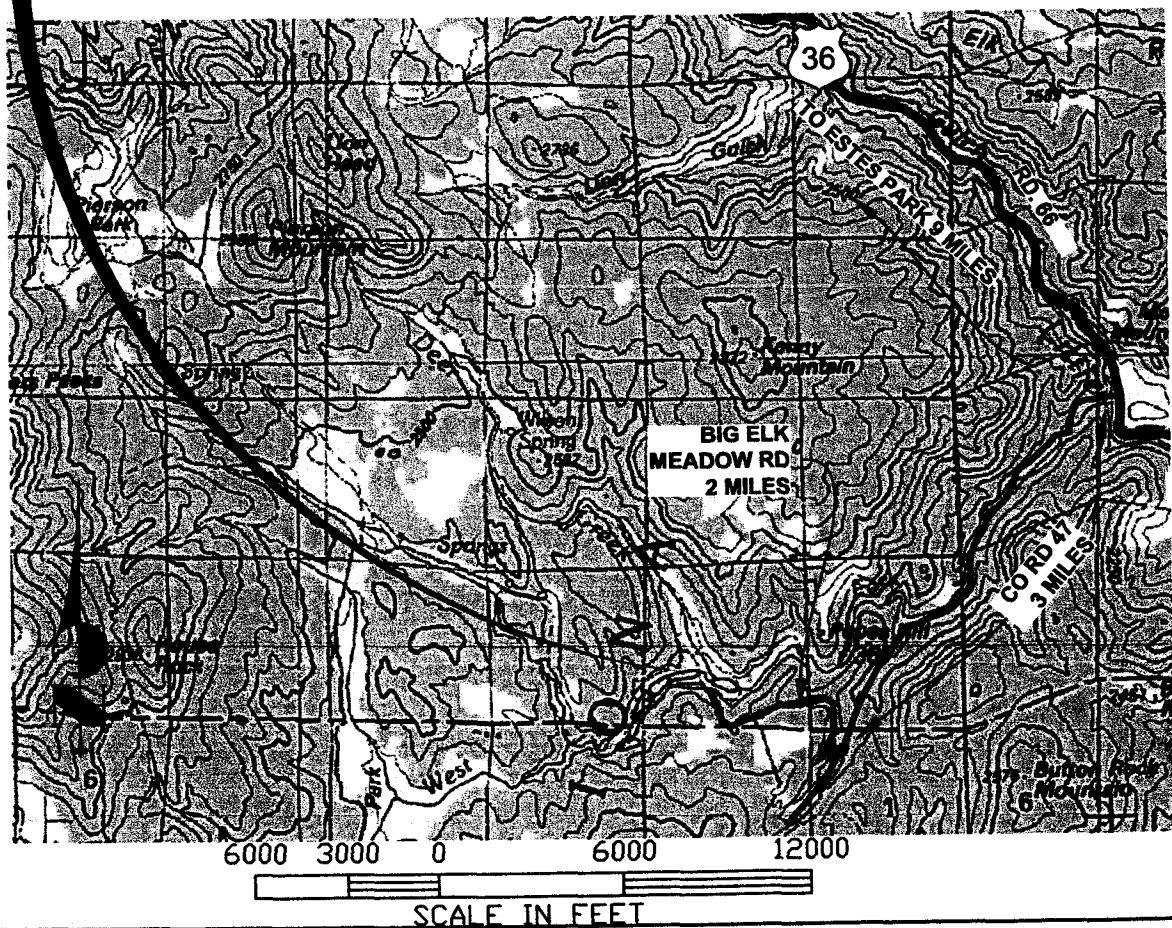
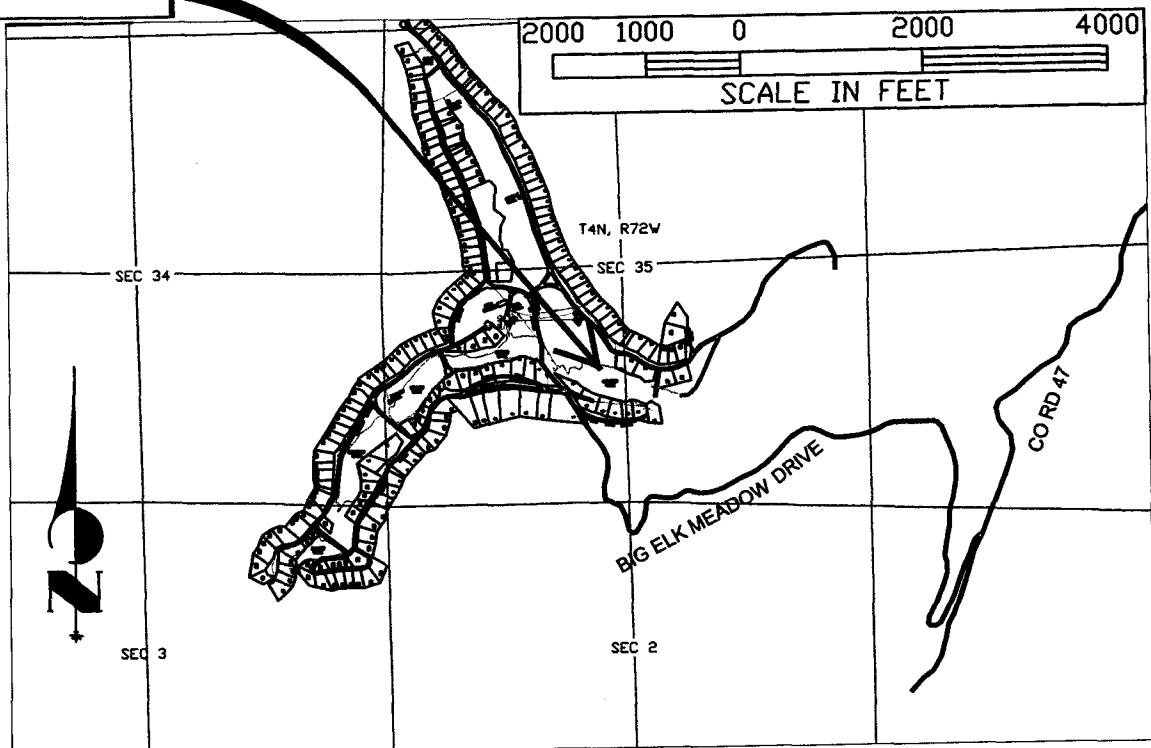
August, 28, 2010

VICINITY MAP  
BIG ELK MEADOWS, COLORADO

FIGURE 1

Page 7

PROJECT SITE



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FAX: (970) 330-0855 August, 28, 2010

LOCAL MAP  
BIG ELK MEADOWS, COLORADO

FIGURE 2

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protective pipe to allow operability during freezing weather and icing conditions. A vent pipe on the outlet just downstream of the existing headwall would be added to improve flow conditions and capacity in the proposed new outlet pipe.

A very wide "open cut" would be required to ensure that the earthen embankment could be adequately re-compacted to avoid a phenomenon known as hydraulic fracturing. Hydraulic fracturing usually occurs during a first filling of a lake where the dam outlet was replaced in a very deep narrow poorly compacted trench. Hydraulic fracturing may cause the dam to fail catastrophically and damages to property and lives may occur downstream. The wide "open cut" as well as the need to add fill to the upstream and downstream faces of the dam improve the stability of the disturbed portions of the dam added significantly to the cost of this alternate. Other features of the "Open Cut" Alternate includes installation of metering equipment, a new discharge structure and re-alignment of the discharge ditch away from the toe of the dam.

This alternate results in a conventional dam and outlet design. The operation of the outlet designed in this manner is simple and reliable in most any weather conditions. The major drawback for this alternate is the initial cost.

**The "Over the Dam" Siphon Alternate Plan:** In an effort to provide some cost savings the Board requested that an "Over the Dam" Siphon Alternate Plan be developed. The "Over the Dam" Siphon Alternate Plan would involve temporarily draining the lake and building an above ground 12-inch diameter steel siphon pipe to serve as the outlet of the dam. Features of the Siphon Alternate include a 1.1 cubic foot per second self-priming pump (10 horsepower) that would serve dual functions to prime the siphon as well as pump water out of the lake when conditions necessitate the use of a pump rather than the siphon. To start the siphon, the upstream valve and downstream valves would be closed and the pump control valves would be opened to allow water to enter the siphon. As the siphon fills, air in the pipe would be vented to the atmosphere at the high point of the siphon through an automatic air release valve or a manual air release valve. Once the siphon is filled, the pump would be shut down and the air release valves would be shut off. To start the flow in the siphon the upstream valve would be opened completely, then the downstream valve would be used as the flow control or throttling valve. The "sealing weir" in the discharge box would provide a water seal at the discharge end of the siphon to prevent air from entering the down leg of the siphon. The "sealing weir" could also be utilized by the operator to get a rough idea of flow while operating the siphon-throttling valve.

Other features of the "Over the Dam" Siphon Alternate Plan includes installation of metering equipment for water accounting purposes, a new discharge structure and re-alignment of the discharge ditch away from the toe of the dam. Since the siphon will be vulnerable to ice and freezing conditions,

suction intake pipes for the siphon and the self-priming pump will be equipped with an air compressor system that will pump air into the pipes that enter the lake and purge the water from inside the pipes to prevent ice from forming in the pipe. The small flow of air down the suction pipes and into the lake will bring warmer lake water from the bottom of the lake to the surface, thus reducing the formation of ice around the intake pipes. To add some additional ice protection, the steel intake pipes would be heat taped and provided with some underwater insulation in a sealed pvc pipe jacket. The heat tape and insulation system would start just above air/water interface and extend down for about 6-feet. Since the dam should not have to be opened up to bury a new outlet pipe, the existing 6-inch CMP would be investigated by televising to determine its suitability to be abandoned in place by pumping it full with cement grout.

The advantages of the "Over the Dam" Siphon Alternate Plan include lower initial cost and it does not necessitate breaching the dam and risking the potential for construction induced hydraulic fracture.

The disadvantages of the "Over the Dam" Siphon Alternate Plan include more difficulties in operation, potential ice and freezing problems and added electrical costs to the residents due to pumping, heating and deicing equipment.

#### **Estimated Costs**

Estimated costs (construction cost only with no contingency, engineering or legal added) for the two alternates are as follows:

Open Cut Conventional On-Grade 12-Inch Diameter Alternate	\$187,630
"Over the Dam" 12-Inch Diameter Siphon with Pump Alternate	\$139,310

After review of the cost estimates, and for financial reasons, the Board of Director's choice was the Siphon Alternate. Detailed cost estimates are shown on Figure 7 and Figure 8.

#### **Siphon Project Description and Background**

Meadow Lake Dam outlet gate valve is damaged and not sealing properly and the six-inch corrugated metal pipe that serves as the outlet of the Dam is failing. The design concept provides for temporarily draining the lake, construction of a 12" diameter siphon with a priming pump, and abandonment of the existing 6" CMP gravity outlet pipe in place by filling with concrete grout. Additionally, an outlet control valve, meter equipment and an outlet discharge structure will be constructed. Fill will be placed to assure that the earthen dam will have a 3:1 upstream slope and 2:1 downstream slope in the areas disturbed by the proposed work. Additionally, some adjustment of the outlet channel and riprap erosion protection would be performed to protect the downstream toe of the dam. The required maintenance identified in the November 7, 2008 Office of the State Engineer – Dam Safety Division Inspection



Report included:

1. Gate and operating mechanism need replacement.
2. Existing 6" CMP outlet pipe must be replaced.
3. Relocate outlet ditch away from toe of dam.
4. Brush and tree removal on dam required.

The principal items of work include:

1. Furnish and install one new 12" diameter outlet siphon (over the top of the dam) with priming pump and operating equipment.
2. Abandon the existing 6" CMP outlet pipe in place by filling with concrete grout.
3. Construct new discharge box structure.
4. Relocate outlet ditch away from toe of dam and line with riprap.
5. Provide and place fill on dam slope to assure 3:1 upstream slope and 2:1 downstream slope in the areas disturbed by the proposed work.
6. Provide rock walkway on the downstream slope of the dam to facilitate operator's use of the siphon discharge control valve.
7. Provide and install metering equipment with rate of flow indicator and totalizer.

**Pertinent Data**

Location:

6<sup>th</sup> P.M., T40N, R72W, Sec. 35,  
Lat. 40.259142 Long. -105.416978  
Larimer County, Colorado

Stream Name: Little Thompson River

Description of Work:

Replace existing 6" CMP outlet pipe with  
12" steel siphon pipe.

Jurisdictional Height:

10.4'

Embankment Height:

17.6'

Structural Height:

17.6'

Crest Elevation:

7498.42

Crest Width:

16'

Max. Impoundment Capacity:

101.43 Acre-feet

Normal Reservoir Capacity:

32 Acre-feet

Reservoir Surface Area:

7.0352 Acres

Upstream Facing:

Riprap

Downstream Facing:

Riprap

Upstream Slope:

2.8V to 1H

**Downstream Slope:**

1.8V to 1H

**Vertical Control:**

Benchmark: cp-dam, set #4 rebar with 2" aluminum cap, el=7497.79 (NAVD 88) per NGS Opus-Rs Solution Report dated September 14, 2009

**Horizontal Control:**

Colorado state plane coordinates NAD 83(2007) datum.  
Horizontal control based upon NGS designation ziebarth, found 3 1/2" brass cap in red granite rock stamped "ziebarth 1999". N=1333850.51 E=3024812.72

**Site Conditions**

Big Elk Meadows is a good example of Larimer County's Wildland-Urban Interface. The dam site is near the boundary of the subdivision lake and greenbelt area and the National Forest. Residential property is adjacent to the dam and will have a view of the construction activities and the finished product. Owner-project manager should assure that proposed above ground improvements are not objectionable to residents. Plan and profile views of the existing dam are shown on Figure 3 and Figure 4. Photo 1 shows the dam crest and outlet gate headwall.

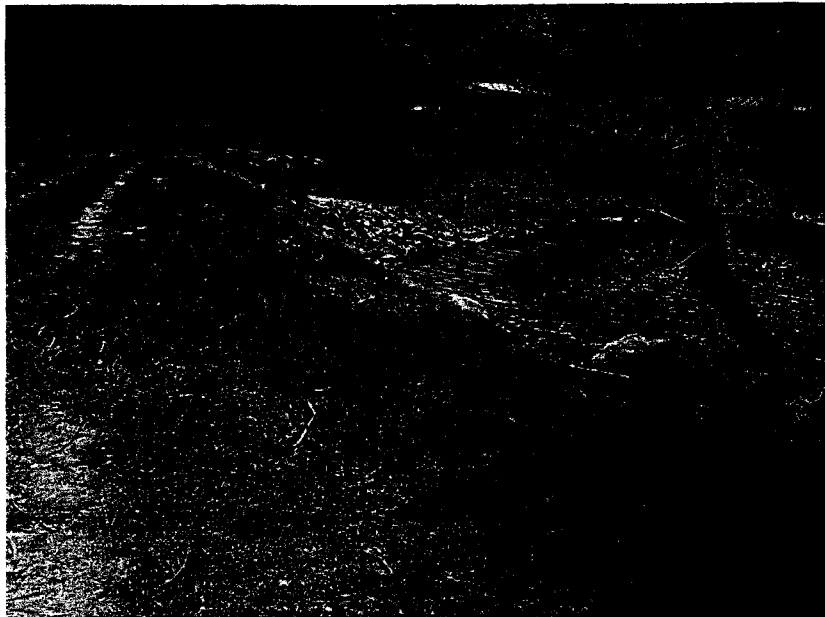
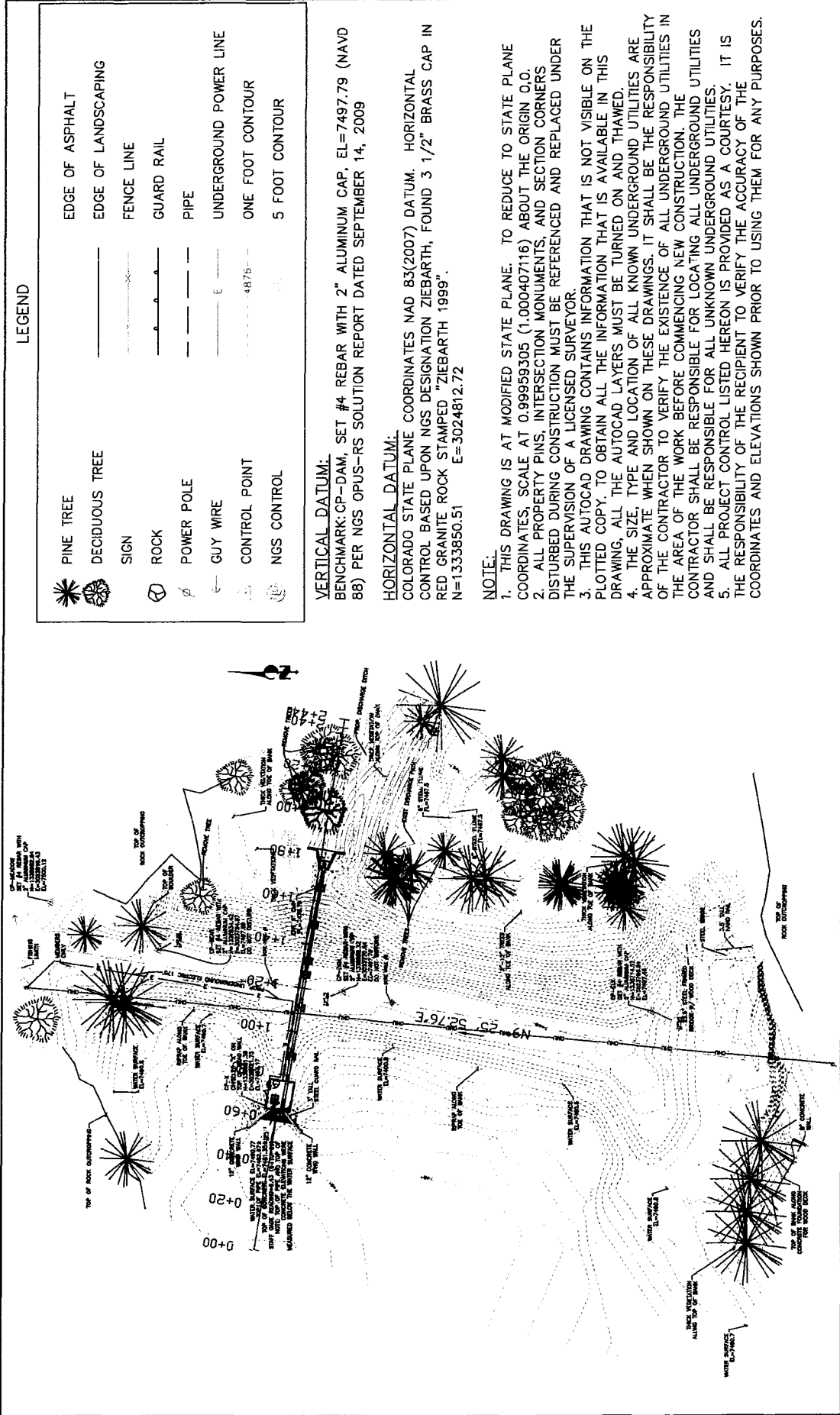


Photo 1 Meadow Lake Dam Site (Looking South)



LEGEND

PINE TREE	EDGE OF ASPHALT
DECIDUOUS TREE	EDGE OF LANDSCAPING
SIGN	FENCE LINE
ROCK	GUARD RAIL
POWER POLE	PIPE
GUY WIRE	UNDERGROUND POWER LINE
CONTROL POINT	ONE FOOT CONTOUR
NGS CONTROL	5 FOOT CONTOUR

VERTICAL DATUM:

BENCHMARK: CP-DAM, SET #4 REBAR WITH 2" ALUMINUM CAP, EL=7497.79 (NAVD 88) PER NGS OPUS-RS SOLUTION REPORT DATED SEPTEMBER 14, 2009

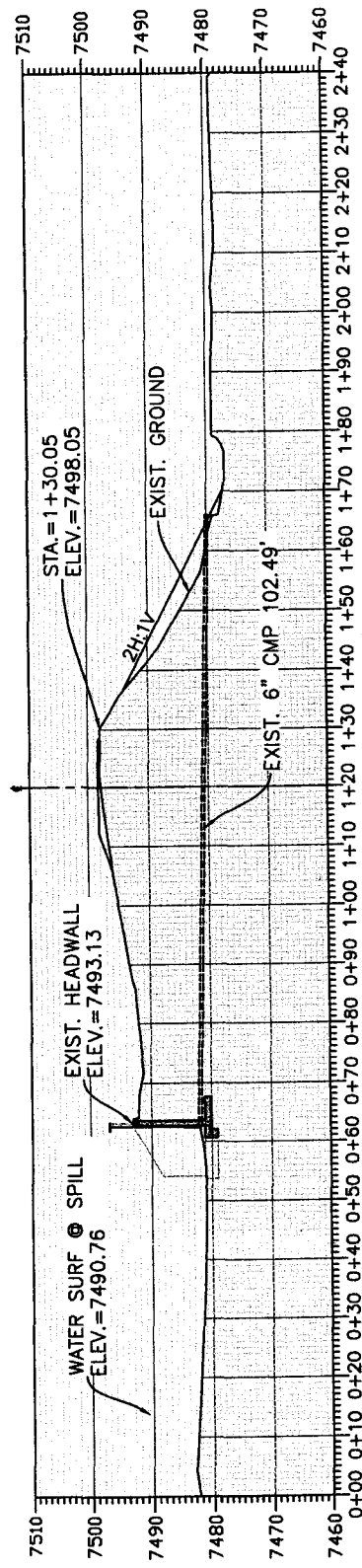
HORIZONTAL DATUM:

COLORADO STATE PLANE COORDINATES NAD 83(2007) DATUM. HORIZONTAL CONTROL BASED UPON NGS DESIGNATION ZIEBARTH, FOUND 3 1/2" BRASS CAP IN RED GRANITE ROCK STAMPED "ZIEBARTH 1999".  
N=1333850.51 E=3024812.72

NOTE:

1. THIS DRAWING IS AT MODIFIED STATE PLANE. TO REDUCE TO STATE PLANE COORDINATES, SCALE AT 0.99959305 (1.000407116) ABOUT THE ORIGIN O.O.
2. ALL PROPERTY PINS, INTERSECTION MONUMENTS, AND SECTION CORNERS DISTURBED DURING CONSTRUCTION MUST BE REFERENCED AND REPLACED UNDER THE SUPERVISION OF A LICENSED SURVEYOR.
3. THIS AUTOCAD DRAWING CONTAINS INFORMATION THAT IS NOT VISIBLE ON THE PLOTTED COPY. TO OBTAIN ALL THE INFORMATION THAT IS AVAILABLE IN THIS DRAWING, ALL THE AUTOCAD LAYERS MUST BE TURNED ON AND THAWED.
4. THE SIZE, TYPE AND LOCATION OF ALL KNOWN UNDERGROUND UTILITIES ARE APPROXIMATE WHEN SHOWN ON THESE DRAWINGS. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE EXISTENCE OF ALL UNDERGROUND UTILITIES IN THE AREA OF THE WORK BEFORE COMMENCING NEW CONSTRUCTION. THE CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING ALL UNDERGROUND UTILITIES AND SHALL BE RESPONSIBLE FOR ALL UNKNOWN UNDERGROUND UTILITIES.
5. ALL PROJECT CONTROL LISTED HEREON IS PROVIDED AS A COURTESY. IT IS THE RESPONSIBILITY OF THE RECIPIENT TO VERIFY THE ACCURACY OF THE COORDINATES AND ELEVATIONS SHOWN PRIOR TO USING THEM FOR ANY PURPOSES.

<b>GAUTHIER ENGINEERING, INC.</b> 2157 Buena Vista Drive Greeley, Colorado 80634 Phone: (970) 330-0855 E-mail: <a href="mailto:info@gauthier-engineering.com">info@gauthier-engineering.com</a> Fax: (970) 330-0855	Date: JUNE 20, 2011 Scale: 1"=40' Drawn By: JGG File:	40 20 0 40 80 120 SCALE IN FEET	<b>BIG ELK MEADOWS ASSOCIATION</b> MEADOW LAKE DAM PROP. SIPHON PLAN VIEW
	<b>Figure No. 5</b> Page 21		



1 EXISTING DAM PROFILE VIEW

GAUTHIER ENGINEERING, INC. 2157 Buena Vista Drive Greeley, Colorado 80634 Phone: (970) 330-0855 E-mail: jgauthier@gauthier-engineering.com FAX: (970) 330-0855	Date: JUNE 20, 2011 Scale: 1"=20' Drawn By: JGG File:	<div data-bbox="1323 609 1388 1123"> </div> <div data-bbox="1388 787 1421 955">SCALE IN FEET</div>	BIG ELK MEADOWS ASSOCIATION MEADOW LAKE DAM Figure No. 4 Page 14
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### Subsurface Conditions

The subsurface soils at the site consisted of silty clayey sand fill material that is underlain by native well-graded sand with gravel and granite bedrock. A Geotechnical Engineering Report is included in Appendix A of this report.

### Steel Pipe Structural Design

The wall thickness design (0.25") of the pipe was checked with *Steel Pipe Design Software 2007-Structural Software Inc. in accordance with AWWA M11 (1989) or AISI Welded Steel Pipe Volume 3 (1996)*. This was done to assure that the selected steel pipe wall thickness would withstand the pressures and potential vacuums that would occur during operation of the siphon.

Results of the analysis are as follows:

INPUT:	
Project description:	Meadow Lake Dam Outlet Siphon
Outside diameter of pipe:	12.75 (in.)
Pipe wall thickness:	0.25 (in.)
Internal pressure in pipe:	50 (psi)
Span length of pipe:	30 (ft)
Yield stress of pipe:	16500 (psi)
Additional uniform load on pipe:	0 (lb/ft)
Beam type:	Simply supported
External pressure on pipe:	The pipe is not under external pressure
Height of water over submerged pipe:	0 (ft)
Internal vacuum pressure:	12.12 (psi)
Manual used in analysis:	M11 manual
Calculations for handling are required:	Yes
Support condition:	Saddle support
Saddle contact angle:	120 (degrees)
Deflection angle of pipe:	26.56 (degrees)
Stress in pipe due to temperature:	0 (psi)

OUTPUT:	
Design Information:	
Maximum support reaction:	1267.19 (lb)
Maximum support reaction (no water in the pipe):	501.10 (lb)
Maximum deflection in span:	0.27 (in.)
Maximum deflection in span (no water in the pipe):	0.11 (in.)
Deflection status:	Deflection is OK
Ring stress due to internal water pressure:	1275 (psi)
Longitudinal stress due to positive moment:	3790.17 (psi)
Longitudinal stress due to negative moment:	0 (psi)
Longitudinal stress due to positive moment:(no water in the pipe)	1498.80 (psi)
Longitudinal stress due to negative moment:(no water in the pipe)	0.00 (psi)

Localized stress in pipe S:	1076.89 (psi)
Maximum stress at unrestrained support due to, beam moment and localized stress:	1076.89 (psi)
Maximum stress at restrained support due to, beam moment, ring stress and localized stress:	1395.64 (psi)
Maximum stress in span for beam with unrestrained support due to beam moment:	3790.17 (psi)
Maximum stress in span for beam with restrained support due to beam moment and ring stress: (psi)	4108.92
Localized stress in pipe S (no water in the pipe):	425.85 (psi)
Maximum stress at unrestrained support due to, beam moment and localized stress (no water):	425.85 (psi)
Maximum stress at restrained support due to, beam moment, ring stress and localized stress (no water):	744.60 (psi)
Maximum stress in span for beam with unrestrained - support due to beam moment (no water):	1498.80 (psi)
Maximum stress in span beam with restrained support due to beam moment and ring stress (no water):	1817.55 (psi)
Minimum required thickness for internal pressure:	0.04 (in.)
Pipe thickness is larger than required for internal, pressure. Pipe thickness:	OK
Minimum required thickness for ring stability:	0.08 (in.)
Pipe thickness is larger than required for vacuum and water pressure. Pipe thickness:	OK
Minimum required handling thickness:	0.04 (in.)
Pipe thickness is larger than required for handling, pipe thickness:	OK
Thrust force at thruster:	673 (lb)
Thrust force at bulkhead:	6383.83 (lb)
Thrust stress in pipe at thruster:	68.62 (psi)
Thrust stress in pipe at bulkhead:	650.25 (psi)
Total longitudinal stress in pipe due to thrust force and temperature stress at thruster:	68.62 (psi)
Total longitudinal stress in pipe due to thrust force and temperature stress at bulkhead:	650.25 (psi)

DETAILED DESIGN CALCULATION INFORMATION:	
Inside diameter:	12.25 (in.)
Outside diameter:	12.75 (in.)
Mean radius:	6.38 (in.)
Steel pipe area:	9.82 (in.^2)
Moment of inertia of pipe:	191.82 (in.^4)
Section modulus of pipe:	30.09 (in.^3)
Pipe Weight per unit length:	33.41 (lb/ft)
Weight of water in pipe per unit length:	51.07 (lb/ft)
Weight of water and pipe per unit length:	84.48 (lb/ft)
Weight of pipe and half water:	58.94 (lb/ft)
Weight of pipe, water and additional load:	84.48 (lb/ft)
Weight of pipe, and additional load:	33.41 (lb/ft)
Maximum positive moment in span:	9503.89 (ft-lb)
Maximum negative moment in span:	0 (ft-lb)

Maximum support reaction:	1267.19 (lb)
Maximum deflection in span:	0.27 (in.)
Maximum allowable deflection in span:	1 (in.)
Deflection status:	Deflection is OK
Maximum positive moment in span(no water):	3758.26 (ft-lb)
Maximum negative moment in span (no water):	0.00 (ft-lb)
Maximum support reaction (no water):	501.10 (lb)
Maximum deflection in span (no water):	0.11 (in.)
Longitudinal stress due to positive moment:	3790.17 (psi)
Longitudinal stress due to negative moment:	0 (psi)
Longitudinal stress positive moment (no water):	1498.80 (psi)
Longitudinal stress negative moment (no water):	0.00 (psi)
Ring stress due to internal water pressure:	1275 (psi)
Factor k in saddle support formula:	0.02
Total saddle reaction:	1267.19 (lb)
Localized stress in pipe S:	1076.89 (psi)
Maximum stress at unrestrained support due to, beam moment and localized stress:	1076.89 (psi)
Maximum stress at restrained support due to, beam moment, ring stress and localized stress:	1395.64 (psi)
Maximum stress in span for beam with unrestrained support due to beam moment:	3790.17 (psi)
Maximum stress in span for beam with restrained support due to beam moment and ring stress:	4108.92 (psi)
Minimum required thickness for internal pressure:	0.04 (in.)
Pipe thickness is larger than required for internal, pressure. Pipe thickness:	OK
External water pressure due to flooding:	0 (psi)
Total flood and vacuum pressure on pipe:	12.12 (psi)
Minimum required thickness for ring stability:	0.08 (in.)
Pipe thickness is larger than required for vacuum and water pressure. Pipe thickness:	OK
Minimum required handling thickness:	0.04 (in.)
Pipe thickness is larger than required for handling, pipe thickness:	OK
Thrust force at thruster:	673.71 (lb)
Thrust force at bulkhead:	6383.83 (lb)
Thrust stress in pipe at thruster:	68.62 (psi)
Thrust stress in pipe at bulkhead:	650.25 (psi)
Total longitudinal stress in pipe due to thrust force and temperature stress at thruster:	68.62 (psi)
Total longitudinal stress in pipe due to thrust force and temperature stress at bulkhead:	650.25 (psi)

### Steel Pipe Hydraulic Design

The existing 6" CMP would produce a flow of up to 0.9 CFS if it were new and in good condition.

Presently it produces less than 0.5 CFS.

The hydraulic design of the proposed 12" diameter siphon was analyzed using the Hazen-Williams

Formula:

$$Q = 0.285 \times C \times D^{2.63} S^{0.54}$$

Where Q is in Gallons per minute,

C is the roughness factor of the pipe (120),

D is the pipe diameter in inches (12") and

S is the slope of the hydraulic grade in ft./ft.

The slope of the hydraulic grade was varied based on the elevation of water in the lake. Table 1 shows the available head expressed as gage height and was varied from a maximum of 10-feet to a minimum of 3-feet to produce the flows shown. While the siphon might run below gage height 3-feet, its performance would likely be unreliable with potential vortexing and air locking issues. Air locking issues would likely stem from pulling the water from the bottom of the lake which may be supersaturated with dissolved gasses into a reduced pressure area of the pipe. These dissolved gases would come out of solution and would collect just above the down leg of the siphon. The priming pump should be used when the lake water surface level falls below gage height 3-feet. The pump would produce a dependable 1.1 cubic foot per second (CFS) at gage height 3 or less. There will only be a couple of acre-feet of water left in the lake when the lake is at gage height 3-feet and at a rate of 1.1 CFS the lake would be drained of its original contents within 24 hours.

Should the pump have to run for an extended period of time to avoid "out of priority storage", some sense of the power budget impact should be understood. Since the priming pump is a 10-horsepower pump and it would be in the neighborhood of 90 percent efficient, then it would use approximately 8.29-kilowatt hours (KWH) for each hour it runs. Assuming tier two service is reached after 60 hours and power is costing approximately \$0.10 per KWH, then the pump would cost \$0.83 per hour or about \$20 per day.

To evaluate the capacity of the 12" diameter siphon, all minor friction losses from fittings, bends, meters etc. were accounted for as additional length of equivalent pipe. While the actual siphon length is 134.39-feet, the equivalent length used for flow calculations was 437.39-feet.



The hydraulic calculations produced the following rating Table 1:

TABLE 1 12" SIPHON DISCHARGE RATING TABLE		
GAGE HEIGHT (FEET)	FLOW (CFS)	FLOW (GPM)
3	3.72	1,670
4	4.30	1,930
5	4.82	2,163
6	5.30	2,377
7	5.74	2,575
8	6.15	2,761
9	6.54	2,937
10	6.92	3,105

### **Siphon Outlet 5-foot Wide Sealing Weir Design**

A weir will need to be installed in the outlet discharge box. The weir will act primarily as a siphon seal weir, keeping the discharge end of the siphon "water sealed" so air does not travel back up the down leg of siphon. The weir should be wide enough so that the flows proposed will not create too much additional head on the discharge end of the pipe. The weir was sized using the following weir formula:

$$Q = C_w L H^{1.5}$$

Where: Q = Discharge in cfs

$C_w = 3.33$  for sharp crest;

L = Crest length in ft

H = Head above weir crest (excludes velocity head)

This formula produced Table 2 below showing the gage height vs. flow capacity of the weir.

TABLE 2 5-FOOT DISCHARGE WEIR RATING TABLE		
GAGE HEIGHT (FEET)	FLOW (CFS)	FLOW (GPM)
0.1	0.527	236
0.2	1.489	668
0.3	2.736	1,228
0.4	4.212	1,890
0.5	5.887	2,642
0.6	7.738	3,473

### **Outlet Discharge Ditch Design**

The existing outlet ditch is routed along the tow the dam. Such a routing causes unnecessary inundation of the toe and foundation of the dam and makes detecting seepage more difficult.

The proposed discharge ditch will be trapezoidal with a 1' wide bottom and 2:1 side slopes and will direct the flow away from the dam.

Erosion protection will include lining with 1.5 thick layer of  $D_{50}=1'$  riprap with bedding. The ditch will be 3' deep. The disturbed areas beyond the limits of the ditch will be revalidated with native seeding to help prevent erosion. The Manning formula was used to design the ditch is as follows:

$$Q = (1.49/n) A(R^{0.6667}) \sqrt{S}$$

Where: Q = Flow rate in cfs

n = Roughness coefficient

A = Cross-sectional area in sq.ft.

R = Hydraulic radius

S = Channel slope in ft./ft.

This formula produced Table 3 below showing the depth vs. flow capacity of the ditch.

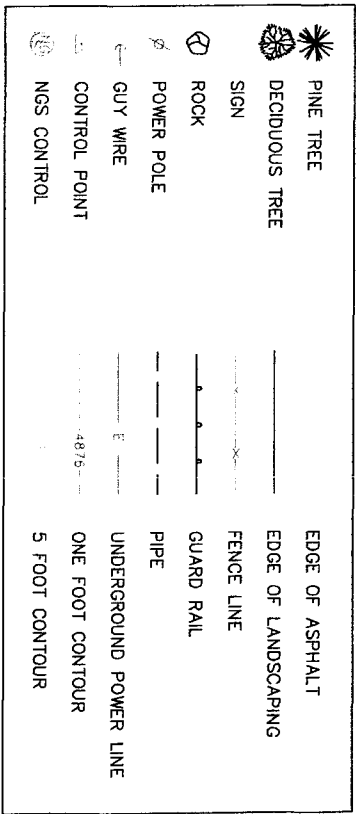
TABLE 3 5-FOOT DISCHARGE WEIR RATING TABLE		
DEPTH (FEET)	FLOW (CFS)	FLOW (GPM)
0.1	0.46	206
0.2	1.51	678
0.3	3.09	1,387
0.4	5.19	2,329
0.5	7.84	3,519

Velocity in the channel will be less than 7.5 feet per second (fps) and will be relatively shallow.

$D_{50} = 12''$  Riprap will withstand 9 fps velocities. Therefore, the riprap used in the ditch lining will be a minimum of  $D_{50} = 12''$ .

### **Concept Drawings**

Figure 5 and Figure 6 show the conceptual design in plan and profile view.



VERTICAL DATUM:  
BENCHMARK: CP-DAM, SET #4 REBAR WITH 2" ALUMINUM CAP, EL=7497.79 (NAVD  
88) PER NOS OPUS-RS SOLUTION REPORT DATED SEPTEMBER 14, 2009

HORIZONTAL DATUM:

COLORADO STATE PLANE COORDINATES NAD 83(2007) DATUM. HORIZONTAL  
CONTROL BASED UPON NGS DESIGNATION ZIEBARTH, FOUND 3 1/2" BRASS CAP IN  
RED GRANITE ROCK STAMPED "ZIEBARTH 1999".  
N=1333850.51 E=3024812.72

NOTE:

1. THIS DRAWING IS AT MODIFIED STATE PLANE, TO REDUCE TO STATE PLANE COORDINATES, SCALE AT 0.99995305 (1.000407716) ABOUT THE ORIGIN O.O.
2. ALL PROPERTY PINS, INTERSECTION MONUMENTS, AND SECTION CORNERS DISTURBED DURING CONSTRUCTION MUST BE REFERENCEED AND REPLACED UNDER THE SUPERVISION OF A LICENSED SURVEYOR.
3. THIS AUTOCAD DRAWING CONTAINS INFORMATION THAT IS NOT VISIBLE ON THE PLOTTED COPY. TO OBTAIN ALL THE INFORMATION THAT IS AVAILABLE IN THIS DRAWING, ALL THE AUTOCAD LAYERS MUST BE TURNED ON AND THAWED.
4. THE SIZE, TYPE AND LOCATION OF ALL KNOWN UNDERGROUND UTILITIES ARE APPROXIMATE WHEN SHOWN ON THESE DRAWINGS. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE EXISTENCE OF ALL UNDERGROUND UTILITIES IN THE AREA OF THE WORK BEFORE COMMENCING NEW CONSTRUCTION. THE CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING ALL UNDERGROUND UTILITIES AND SHALL BE RESPONSIBLE FOR ALL UNKNOWN UNDERGROUND UTILITIES.
5. ALL PROJECT CONTROL LISTED HEREON IS PROVIDED AS A COURTESY. IT IS THE RESPONSIBILITY OF THE RECIPIENT TO VERIFY THE ACCURACY OF THE COORDINATES AND ELEVATIONS SHOWN PRIOR TO USING THEM FOR ANY PURPOSES.

GAUTHIER ENGINEERING, INC.

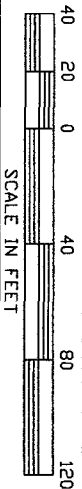
2157 Bueno Vista Drive  
Greeley, Colorado 80634  
Phone: (970) 330-0855  
E-mail: [john@gaulhere-engineering.com](mailto:john@gaulhere-engineering.com)  
Fax: (970) 330-0855

Date: JUNE 20, 2011

**Scale: 1"=40'**

Drawn By: JCG

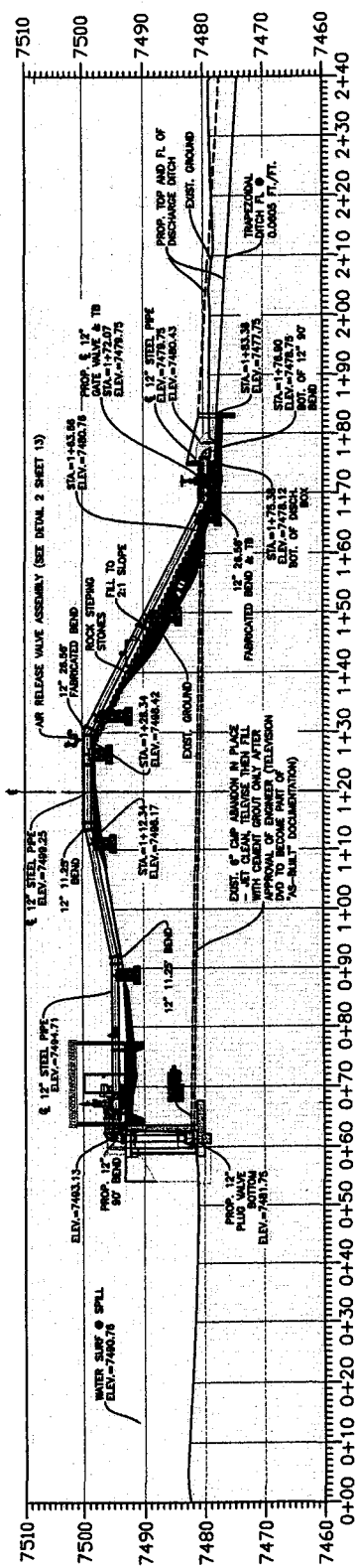
**File:**



SCALE IN FEET

**BIG ELK MEADOWS ASSOCIATION  
MEADOW LAKE DAM PROP. SIPHON PLAN VIEW**

Figure No. 5 Page 21



1 PROPOSED SIPHON PROFILE VIEW  
Scale: 1"=20'

GAUTHIER ENGINEERING, INC. 2137 Burns Main Drive Shawnee, KS 66201 Phone: (913) 339-0825 Fax: (913) 339-0825	Date: JUNE 20, 2011		BIG ELK MEADOWS ASSOCIATION	
	Scale: 1"=20'		MEADOW LAKE DAM PROP. SIPHON PROFILE	
	Drawn By: JGG		Figure No. 6 Page 22	
	File:			

**FIGURE 7 - ENGINEER'S OPINION OF CONSTRUCTION COST (Open Cut On-Grade Outlet Replacement Alternate)**

**PRELIMINARY CONSTRUCTION COST ESTIMATE - MEADOW LAKE DAM OUTLET REPLACEMENT PROJECT**

June 20, 2011

ITEM	DESCRIPTION	UNIT	QTY.	UNIT COST	TOTAL
1	Mobilization and Demobilization	LS	1	18,500.00	\$ 18,500.00
2	Site Demolition and Tree Removal (17 Trees)	Ea	17	300.00	5,100.00
3	Clearing and Grubbing	Ac	1	2,500.00	2,500.00
4	Control of Water During Construction - Diversions and Dewatering	LS	1	20,000.00	20,000.00
5	Reclamation of Disturbed Areas	Ac	2	5,000.00	10,000.00
6	Sediment and Erosion Control	LS	1	5,000.00	5,000.00
7	Unclassified Soil Excavation	CY	1,750	5.00	8,750.00
8	Trimming Earth Foundations for Concrete Outlet Pipe Cradle	LF	172	10.00	1,720.00
9	Compacted Backfill/Embankment Fill	CY	1,750	7.00	12,250.00
10	Misc. Fill to Establish 3:1 Upstream and 2:1 Downstream Slopes	CY	2,000	7.00	14,000.00
11	Furnishing and Placing Gravel Surfacing	CY	50	25.00	1,250.00
12	Furnishing and Placing 12" C900 PVC Pipe	LF	172	30.00	5,160.00
13	Furnishing and Placing Concrete Pipe Cradle	CY	12	400.00	4,800.00
14	Furnishing and Placing 12" Cast Iron MJ Wall Thimble	Ea	1	1,000.00	1,000.00
15	Furnishing and Placing 12" Cast Iron Heavy Duty Sluice Gate, Stem and Op.	Ea	1	2,500.00	2,500.00
16	Furnishing and Placing 2" Outlet Vent	Ea	1	750.00	750.00
17	Furnishing and Placing Geocomposite Drain Behind Headwall	LS	1	1,500.00	1,500.00
18	Furnishing and Placing Outlet Filter Diaphragm	LS	1	8,000.00	8,000.00
19	Furnishing and Placing Foundation Filter and Piping	LS	1	12,000.00	12,000.00
20	Furnishing and Placing Energy Dissipation Structure	LS	1	15,000.00	15,000.00
21	Furnishing and Placing 12" Flow Meter and Meter Inundation Equipment	LS	1	2,500.00	2,500.00
22	Furnishing and Placing Downstream Erosion Control Improvements	LS	1	10,000.00	10,000.00
23	Furnishing and Placing Bedding for RipRap	CY	120	50.00	6,000.00
24	Remove and Replace RipRap	CY	440	40.00	17,600.00
25	Furnishing and Placing Trash Rack	Ea	1	1,500.00	1,500.00
26	Mod. of Handrails to Accommodate Prop. Sluice Gate Operator Mechanism	LS	1	250.00	250.00
	<b>ESTIMATED CONSTRUCTION COST</b>				<b>\$ 187,630.00</b>
	Note: Engineering Contingency & Legal Cost Not Included				

**FIGURE 8 - ENGINEER'S OPINION OF CONSTRUCTION COST (Siphon Alternate)**  
**BIG ELK MEADOWS ASSOCIATION - MEADOW LAKE DAM OUTLET REPLACEMENT PROJECT**  
 June 20, 2011

ITEM	DESCRIPTION	UNIT	QTY.	UNIT COST	TOTAL
1	Mobilization and Demobilization	LS	1.0	5,000.00 \$	5,000.00
2	Clean and Televise Existing 6" CMP Outlet, Fill with Cement Grout and Abandon	LS	1.0	3,000.00	3,000.00
3	Site Demolition and Tree Removal (17 Trees)	Ea	17.0	250.00	4,250.00
4	Clearing and Grubbing	Ac	0.5	2,500.00	1,250.00
5	Control of Water During Construction - Diversions and Dewatering	LS	1.0	7,500.00	7,500.00
6	Reclamation of Disturbed Areas	Ac	0.2	2,000.00	400.00
7	Sediment and Erosion Control	LS	1.0	2,500.00	2,500.00
8	Unclassified Soil Excavation	CY	50.0	3.00	150.00
9	Furnish and Place Compacted Backfill/Embankment Fill	CY	30.0	7.00	210.00
10	Furnish and Place Misc. Fill to Establish 3:1 Upstream and 2:1 Downstream	CY	250.0	7.00	1,750.00
11	Furnish and Place Rock Walk Steps on Downstream Slope of Dam	LS	1.0	2,000.00	2,000.00
12	Furnish and Place Gravel Surfacing - Dam Crest Road	CY	25.0	25.00	625.00
13	Furnish and Place 12" Steel Pipe Siphon (0.25" Wall Thickness) and 12" and	LF	134.0	50.00	6,700.00
14	Furnish and Place 8" Steel Pipe (0.25" Wall Thickness) Pump Suction and 8"	LF	20.0	45.00	900.00
15	Furnish and Place 6" Steel Pipe (0.25" Wall Thickness) Pump Discharge and 6"	LS	5.0	45.00	225.00
16	Furnish and Place Concrete Pump Building Base and Slab	CY	10.2	550.00	5,610.00
17	Furnish and Place Skid Mounted 10HP 500 GPM (1.1 CFS) Pump and Electrical	LS	1.0	18,600.00	18,600.00
18	Furnish and Place New Operating Platform with Grating and Guard Rail	LS	1.0	4,500.00	4,500.00
19	Furnish and Place Trash Rack	LS	1.0	3,500.00	3,500.00
20	Furnish and Place 12" Plug Valve, Oil Filled Stem and Floor Stand Operator	LS	1.0	5,500.00	5,500.00
21	Furnish and Place 12" Butterfly Valve and Operator	Ea	1.0	1,800.00	1,800.00
22	Furnish and Place 12" Resilient Seat Gate Valve and Operator	Ea	1.0	2,500.00	2,500.00
23	Furnish and Place 8" Butterfly Valve and Operator	Ea	1.0	1,550.00	1,550.00
24	Furnish and Place 6" Butterfly Valve and Operator	Ea	1.0	1,250.00	1,250.00
25	Furnish and Place 1" Air Release Valve w/ball valve	Ea	1.0	2,350.00	2,350.00
26	Furnish and Place 2" Air Release Valve w/ball valve and Manual 2" Air Release	Ea	1.0	2,900.00	2,900.00
27	Furnish and Place Pressure Relief Valve with Isolation Valve and Discharge Pipe.	LS	1.0	350.00	350.00
28	Furnishing and Place Conc. Pipe Support Gravity Block Piers	CY	9.0	550.00	4,950.00
29	Furnish and Place Dam Outlet Discharge Structure	LS	1.0	5,000.00	5,000.00
30	Grading & Shaping Dam Outlet Discharge Ditch Away From Toe of Dam	CY	180.0	7.00	1,260.00
31	Furnish and Place Bedding and RipRap for Outlet Discharge Ditch	CY	100.0	60.00	6,000.00
32	Furnish and Place 12" Model M0300SW McCrometer Flow Meter	LS	1.0	2,500.00	2,500.00

33	Furnish and Place 170 LF of Underground Electric Service in Duct for 10 HP	LS	1.0	7,500.00	7,500.00
34	Furnish and Place 1/3 HP Compressor, Piping and Valves For Intake Pipe Ice	LS	1.0	850.00	850.00
35	Furnish and Place Electric Heat Tape And Underwater Insulation On Siphon and	LS	1.0	1,500.00	1,500.00
36	Remove and Replace RipRap	CY	200.0	40.00	8,000.00
37	Furnish and Place Additional Rein. Conc. On Top of Wingwalls to Level Wall	CY	1.6	550.00	880.00
38	Furnish and Place 10'x13' Wood Framed Insulated Building Complete with	LS	1	12,000.00	12,000.00
39	Final Cleanup and Revegetation	LS	1	2,000.00	2,000.00
	<b>ESTIMATED CONSTRUCTION COST</b>				<b>\$ 139,310.00</b>
	<b>Note: Engineering Contingency &amp; Legal Cost Not Included</b>				

**APPENDIX A**  
**GEOTECH REPORT**