

Rubin & Hays

ATTORNEYS AT LAW

Kentucky Home Trust Building, 450 South Third Street, Louisville, Kentucky 40202-1410
Telephone (502) 569-7525 Telefax (502) 569-7555 www.rubinhays.com

CHARLES S. MUSSON
W. RANDALL JONES
CHRISTIAN L. JUCKETT

November 6, 2009

Mr. Jeff Derouen
Executive Director
Public Service Commission
P.O. Box 615
Frankfort, Kentucky 40602

2009-00436

RECEIVED

NOV 09 2009

PUBLIC SERVICE
COMMISSION

Re: Oldham County Water District - KRS 278.023 Application

Dear Mr. Derouen:

Enclosed please find the original and ten (10) copies of the Application of the Oldham County Water District for a Certificate of Public Convenience and Necessity to construct, finance and increase rates pursuant to KRS 278.023.

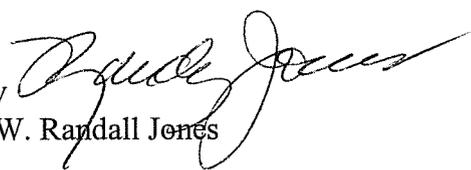
Also enclosed are eleven (11) copies of the exhibits required pursuant to 807 KAR 5.069, **with the exception of the Preliminary and Final Engineering Reports, of which two copies are enclosed.**

If you need any additional information or documentation, please let us know.

Sincerely,

Rubin & Hays

By


W. Randall Jones

WRJ:jlm
Enclosures
cc: Distribution List

DISTRIBUTION LIST

Re: Oldham County Water District Waterworks Revenue Bonds, Series 2010, in the principal amount of \$13,243,100

Mr. Vernon Brown
Acting State Director
USDA, Rural Development
771 Corporate Drive, Suite 200
Lexington, Kentucky 40503-5477
email: vernon.brown@ky.usda.gov

Telephone: (859) 224-7336
Fax: (859) 224-7425

Mr. John Johnson
USDA, Rural Development
90 Howard Drive, Suite 3
Shelbyville, Kentucky 40065-9113
email: john.johnson@ky.usda.gov

Telephone: (502) 633-3294
Fax: (502) 633-0552

Mr. Phillip Ward, Superintendent
Mr. Russ Rose
Oldham County Water District
3707 West Highway 146
Buckner, Kentucky 40031
email: phillipward@insightbb.com
russrose@insightbb.com

Telephone: (502) 222-1690
Fax: (502) 222-5701

Ms. Shanna Stone
GRW Engineers, Inc.
11909 Shelbyville Road, Suite 100
Louisville, Kentucky 40243
email: sstone@grwinc.com

Telephone: (502) 489-8484
Fax: (502) 489-8485

Frank Chuppe, Esq.
Wyatt, Tarrant & Combs
500 West Jefferson Street, Suite 2800
Louisville, Kentucky 40202
email: fchuppe@wyattfirm.com

Telephone: (502) 562-7336
Fax: (502) 589-0309

W. Randall Jones, Esq.
Rubin & Hays
Kentucky Home Trust Building
450 South Third Street
Louisville, Kentucky 40202
email: wrjones@rubinhays.com

Telephone: (502) 569-7534
Fax: (502) 569-7555

COMMONWEALTH OF KENTUCKY
BEFORE THE PUBLIC SERVICE COMMISSION

RECEIVED
NOV 09 2009
PUBLIC SERVICE
COMMISSION

In the Matter of:

**THE APPLICATION OF OLDHAM)
COUNTY WATER DISTRICT)
FOR A CERTIFICATE OF PUBLIC)
CONVENIENCE AND NECESSITY TO)
CONSTRUCT, FINANCE AND INCREASE)
RATES PURSUANT TO KRS 278.023.)**

NO. 2009 - 00436

A P P L I C A T I O N

This Application of the Oldham County Water District ("Applicant") of Oldham County, Kentucky, respectfully shows:

1. That Applicant is a water district of Oldham County, Kentucky, created and existing under and by virtue of Chapter 74 of the Kentucky Revised Statutes.

2. That the post office address of Applicant is:

Oldham County Water District
c/o Mr. Mel Milburn, Chairman
3707 West Highway 146
Buckner, Kentucky 40031

3. That Applicant, pursuant to the provisions of KRS 278.023, seeks (i) a Certificate of Public Convenience and Necessity, permitting Applicant to construct a waterworks construction project, consisting of extensions, additions, and improvements (the "Project") to the existing waterworks system of Applicant; (ii) an Order approving increased rates; and (iii) approval of the proposed plan of financing said Project.

4. That the project consists of the construction and installation of (i) an expansion of the water treatment plant from 7 MGD to 13 MGD; (ii) a new chemical building, high service pump station, membrane clear well baffling, renovation of the control building, piping, valves, controls, stand-by generators, static var compensators and electrical modifications; (iii) 4,790 linear feet of 24-inch water main, 2,700 linear feet of 30-inch water main and 14,700 linear feet of 36-inch water main and appurtenances; and (iv) two new raw water wells.

5. That Applicant proposes to finance the construction of the Project through (i) the issuance of \$13,243,100 of its Waterworks Revenue Bonds, and (ii) a Kentucky Tobacco Settlement grant in the amount of \$2,180,408. Applicant has a commitment from USDA, Rural Development ("RD") to purchase said \$13,243,100 of bonds maturing over a 40-year period, at an interest rate of not exceeding 4.625% per annum, as set out in the RD Letter of Conditions filed herewith as an Exhibit.

6. That Applicant does not contemplate having the Project constructed with any deviation from minimum construction standards of this Public Service Commission.

7. That Applicant files herewith the following Exhibits pursuant to 807 KAR 5:069 in support of this Application:

EXHIBIT A. Copy of RD Letter of Conditions.

EXHIBIT B. Copy of RD Letter of Concurrence in Bid Award.

EXHIBIT C. Certified statement from the Chairman of Applicant, based upon statements of the Engineers for Applicant, concerning the following:

- (1) The proposed plans and specifications for the Project have been designed to meet the minimum construction and operating requirements set out in 807 KAR 5:066, Section 4 (3) and (4); Section 5 (1); Sections 6 and 7; Section 8 (1) through (3); Section 9 (1) and Section 10;
- (2) All other state approvals or permits have already been obtained;
- (3) The proposed rates of Applicant shall produce the total revenue requirements set out in the engineering reports; and
- (4) Setting out the dates when it is anticipated that construction will begin and end.

Applicant also files herewith two (2) copies of Preliminary and Final Engineering Reports.

8. That Applicant has arranged for the publication, prior to or at the same time this Application is filed, of a Notice of Proposed Rate Change pursuant to Section 2 of 807 KAR 5:069, in the *Oldham Era*, which is the newspaper of general circulation in Applicant's service area and in Oldham County, Kentucky. Said Notice sets out the current rates and the proposed rates of Applicant and a short description of the Project. A copy of said Notice is filed herewith as **EXHIBIT D.**

9. That the foregoing constitutes the documents necessary to obtain the approval of the Kentucky Public Service Commission in accordance with Section 278.023 of the Kentucky Revised Statutes and in accordance with the "Filing Requirements" specified in 807 KAR 5:069, Section 1.

WHEREFORE, Applicant, the Oldham County Water District asks that the Public Service Commission of the Commonwealth of Kentucky grant to Applicant the following:

- a. A Certificate of Public Convenience and Necessity permitting Applicant to construct a waterworks project consisting of extensions, additions, and improvements to the existing waterworks system of Applicant.
- b. An Order approving the financing arrangements made by Applicant, viz., the issuance of (i) \$13,243,100 of Oldham County Water District Waterworks Revenue Bonds, at an interest rate of not exceeding 4.625% per annum, and (ii) a Kentucky Tobacco Settlement grant in the amount of \$2,180,408.
- c. An Order approving the proposed increased rates as set out in Section 25 of the RD Letter of Conditions filed herewith as an Exhibit.

Oldham County Water District

By: 
Chairman
Board of Water Commissioners


W. Randall Jones, Esq.
Rubin & Hays
Counsel for Applicant
Kentucky Home Trust Building
450 South Third Street
Louisville, Kentucky 40202
(502) 569-7525



United States Department of Agriculture
Rural Development
Kentucky State Office

April 1, 2009

Mel Milburn, Chairman
Oldham Co. Water District
3707 West Highway 146
Buckner, Kentucky 40031

Dear Chairman Milburn:

This letter establishes conditions which must be understood and agreed to by you before further consideration may be given to the application. The loan will be administered on behalf of the Rural Utilities Service (RUS) by the State and Area office staff of USDA Rural Development. Any changes in project cost, source of funds, scope of services or any other significant changes in the project or applicant must be reported to and approved by USDA Rural Development, by written amendment to this letter. Any changes not approved by Rural Development shall be cause for discontinuing processing of the application. It should also be understood that Rural Development is under no obligation to provide additional funds to meet an overrun in construction costs.

This letter is not to be considered as loan approval or as a representation as to the availability of funds. The docket may be completed on the basis of a RUS loan not to exceed \$13,243,100 and a Kentucky Tobacco Settlement Grant in the amount of \$2,180,408. No applicant cash contribution will be required.

If Rural Development makes the loan, the interest rate will be the lower of the rate in effect at the time of loan approval or the rate in effect at the time of loan closing, unless the applicant otherwise chooses. The loan will be considered approved on the date a signed copy of Form RD 1940-1, "Request for Obligation of Funds," is mailed to you.

Please complete and return the attached Form RD 1942-46, "Letter of Intent to Meet Conditions," if you desire that further consideration be given to your application.

The "Letter of Intent to Meet Conditions" must be executed within three weeks from the date of this letter or it becomes invalid unless a time extension is granted by Rural Development.

If the conditions set forth in this letter are not met within 210 days from the date hereof, Rural Development reserves the right to discontinue the processing of the application.

In signing Form RD 1942-46, "Letter of Intent to Meet Conditions," you are agreeing to complete the following as expeditiously as possible:

1. Number of Users and Their Contribution:

There shall be 7,854 water users, of which all are existing users. The Area Director will review and authenticate the number of users prior to advertising for construction bids.

2. Repayment Period:

The loan will be scheduled for repayment over a period not to exceed 40 years from the date of the Bond. Principal payment will not be deferred for a period in excess of two years from the date of the Bond. Payments will be in accordance with applicable KRS, which requires interest to be paid semi-annually (January 1st and July 1st) and principal will be due on or before the first of January. Rural Development may require the District to adopt a supplemental payment agreement providing for monthly payments of principal and interest so long as the bond is held or insured by RUS. Monthly payments will be approximate amortized installments.

3. Recommended Repayment Method:

Payments on this loan shall be made using the Preauthorized Debit (PAD) payment method. This procedure eliminates the need for paper checks and ensures timely receipt of RD loan payments. To initiate PAD payments, Form RD 3550-28, "Authorization Agreement for Preauthorized Payments," should be signed by the District to authorize the electronic withdrawal of funds from your designated bank account on the exact installment payment due date. The Area Director will furnish the necessary forms and further guidance on the PAD procedure.

4. Reserve Accounts:

Reserves must be properly budgeted to maintain the financial viability of any operation. Reserves are important to fund unanticipated emergency maintenance, pay for repairs, and assist with debt service should the need arise.

The District will be required to deposit \$6,225 per month into a "Funded Debt Reserve Account" until the account reaches \$747,000. The deposits are to be resumed any time the account falls below the \$747,000.

The required monthly deposits to the Reserve Account and required Reserve Account levels are in addition to the requirements of the District's prior bond resolutions.

The monthly deposits to the Reserve Account are required to commence with the first month of the first full fiscal year after the facility becomes operational.

The District also needs to fund an account for short-lived assets by depositing a sum of \$20,000 monthly into the account. The funds in the short-lived asset account may be used by the District as needed to replace or add short-lived assets in the District's water system. This short-lived asset reserve amount replaces any previous short-lived assets requirements previously set with any prior RUS loan.

5. Security Requirements:

A pledge of gross water revenue will be provided in the Bond Resolution. Bonds shall rank on a parity with existing bonds, if possible.

If this is not possible, the bond will be subordinate and junior to the existing bonds, in which case the District will be required to abrogate its right to issue additional bonds ranking on a parity with the existing bonds, so long as any unpaid indebtedness remains on this bond issue.

6. Land Rights and Real Property:

The District will be required to furnish satisfactory title, easements, etc., necessary to install, maintain and operate the facility to serve the intended users. The pipelines will be on private rights-of-way where feasible. Easements and options are to be secured prior to advertising for construction bids.

7. Organization:

The District will be legally organized under applicable KRS which will permit them to perform this service, borrow and repay.

8. Business Operations:

The District will be required to operate the system under a well-established set of resolutions, rules and regulations. A budget must be established annually and adopted by the District after review by Rural Development. At no later than loan pre-closing, the District will be required to furnish a prior approved management plan to include, as a minimum, provisions for management, maintenance, meter reading, miscellaneous services, billing, collecting, delayed payment penalties, disconnect/reconnect fees, bookkeeping, making and delivering required reports and audits.

9. Accounts, Records and Audits:

The District will be required to maintain adequate records and accounts and submit annual budgets and year-end reports (annual audits)/statistical and financial reports, quarterly and annually, in accordance with subsection 1780.47 of RUS Instruction 1780.

The enclosed audit booklet will be used as a guide for preparation of audits. The District shall be required to submit a copy of its audit agreement for review and concurrence by Rural Development prior to pre-closing the loan.

10. Accomplish Audits for Years in Which Federal Financial Assistance is Received:

The District will accomplish audits in accordance with OMB Circular A-133, during the years in which federal funds are received. The District will provide copies of the audits to the Area Office and the appropriate Federal cognizant agency as designated by OMB Circular A-133.

11. Insurance and Bonding:

The following insurance and bonding will be required:

- A. Adequate Liability and Property Damage Insurance including vehicular coverage, if applicable, must be obtained and maintained by the District. The District should obtain amounts of coverage as recommended by its attorney, consulting engineer and/or insurance provider.
- B. Worker's Compensation - The District will carry worker's compensation insurance for employees in accordance with applicable state laws.

- C. Fidelity Bond - The District will provide Fidelity Bond Coverage for all persons who have access to funds. Coverage may be provided either for all individual positions or persons, or through "blanket" coverage providing protection for all appropriate employees and/or officials. The amount of coverage required for all RUS loans is \$747,000.
- D. Real Property Insurance - The District will obtain and maintain adequate fire and extended coverage on all structures including major items of equipment or machinery located in the structures. The amounts of coverage should be based on recommendations obtained by the District from its attorney, consulting engineer and/or insurance provider. Subsurface lift stations do not have to be covered except for the value of electrical and pumping equipment therein.
- E. Flood Insurance - The District will obtain and maintain adequate coverage on any facilities located in a special flood and mudslide prone areas.

12. Planning and Performing Development:

- A. The engineer should not be authorized to commence work on final plans and specifications until a determination has been made that the project can be planned and constructed within the estimated cost shown in paragraph "21" of this letter. The engineer may then proceed to develop final plans and specifications to be completed no later than 180 days from this date, and prepare bid documents. The Area Director is prepared to furnish the necessary guide to follow so as to keep the project plans and documents within our guidelines and requirements. The project should not be advertised for construction bids until all easements and enforceable options have been obtained, and total funds are committed or available for the project.
- B. The following documents will be submitted to Rural Development for review and must be concurred in by Rural Development prior to advertisement for construction bids:
 - 1. Final plans, specifications and bid documents.
 - 2. Applicant's letter on efforts to encourage small business and minority-owned business participation.
 - 3. Legal Service Agreements.
 - 4. Engineering Agreements.

Revision in these documents will be subject to Rural Development concurrence. Any agreements, contracts, etc. not reviewed and approved by Rural Development will not be eligible for payment from project funds or revenues from facilities financed by this Agency.

Prior to receipt of an authorization to advertise for construction bids, the District will obtain advance clearance from Bond Counsel regarding compliance with KRS 424 pertaining to publishing of the advertisement for construction bids in local newspapers and the period of time the notice is required to be published.

13. Civil Rights & Equal Opportunity:

You should be aware of and will be required to comply with other federal statute requirements including but not limited to:

A. Section 504 of the Rehabilitation Act of 1973:

Under Section 504 of the Rehabilitation Act of 1973, as amended (29 U.S.C. 794), no handicapped individual in the United States shall, solely by reason of their handicap, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving Rural Development financial assistance.

B. Civil Rights Act of 1964:

All borrowers are subject to, and facilities must be operated in accordance with, Title VI of the Civil Rights Act of 1964 (42 U.S.C. 2000d et seq.) and Subpart E of Part 1901 of this Title, particularly as it relates to conducting and reporting of compliance reviews. Instruments of conveyance for loans and/or grants subject to the Act must contain the covenant required by paragraph 1901.202(e) of this Title.

C. The Americans with Disabilities Act (ADA) of 1990:

This Act (42 U.S.C. 12101 et seq.) prohibits discrimination on the basis of disability in employment, state and local government services, public transportation, public accommodations, facilities, and telecommunications. Title II of the Act applies to facilities operated by state and local public entities that provide services, programs, and activities. Title III of the Act applies to facilities owned, leased, or operated by private entities that accommodate the public.

D. Age Discrimination Act of 1975:

This Act (42 U.S.C. 6101 et seq.) provides that no person in the United States shall, on the basis of age, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving federal financial assistance.

Rural Development financial programs must be extended without regard to race, color, religion, sex, national origin, marital status, age, or physical or mental handicap.

14. Closing Instructions:

The Office of General Counsel, our Regional Attorney, will be required to write closing instructions in connection with this loan. Conditions listed therein must be met by the District.

15. Compliance with Special Laws and Regulations:

The District will be required to conform to any and all state and local laws and regulations affecting this type project.

16. Treatment Plant and System Operator:

The District is reminded that the treatment plant and system operator must have an Operator's Certificate issued by the State.

17. Prior to Pre-Closing the Loan, the District Will Be Required to Adopt:

- A. Form RUS Bulletin 1780-27, "Loan Resolution (Public Bodies)."
- B. Form RD 400-1, "Equal Opportunity Agreement."
- C. Form RD 400-4, "Assurance Agreement."
- D. Form AD-1047, "Certification Regarding Debarment, Suspension, and Other Responsibility Matters - Primary Covered Transaction."
- E. Form RD 1910-11, "Applicant Certification Federal Collection Policies for Consumer or Commercial Debts."
- F. RD Instruction 1940-Q, Exhibit A-1, "Certification for Contracts, Grants and Loans."
- G. RUS Bulletin 1780-22, "Eligibility Certification."

18. Refinancing and Graduation Requirements:

The District is reminded that if at any time it shall appear to the Government that the District is able to refinance the amount of the RUS indebtedness then outstanding, in whole or in part, by obtaining a loan from commercial sources at reasonable rates and terms, upon the request of the Government, the District will apply for and accept such loan in sufficient amount to repay the Government.

19. Commercial Interim Financing:

The District will be required to use commercial interim financing for the project during construction for the RUS loan portion of the financing, if available at reasonable rates and terms.

Before the loan is closed, the District will be required to provide Rural Development with statements from the contractor, engineer and attorneys that they have been paid to date in accordance with their contract or other agreements and, in the case of the contractor, that he has paid his suppliers and sub-contractors.

20. Disbursement of Project Funds:

A construction account for the purpose of disbursement of project funds (RUS) will be established by the District prior to start of construction. The position of officials entrusted with the receipt and disbursement of RUS project funds will be covered by a "Fidelity Bond," with USDA Rural Development as Co-Obligee, in the amount of construction funds on hand at any one time during the construction phase.

For each "construction account" as established, if the amount of RUS loan and grant funds plus any applicant contributions or funds from other sources to be deposited into the account are expected to exceed \$100,000 at any time, the financial institution will secure the amount in excess of \$100,000

by pledging collateral with the Federal Reserve Bank in an amount not less than the excess in accordance with 7 CFR, 1902.7(a).

During construction, the District shall disburse project funds in a manner consistent with subsection 1780.76 (e) of RUS Instruction 1780. Form RD 1924-18, "Partial Payment Estimate," or similar form approved by Rural Development, shall be used for the purpose of documenting periodic construction estimates, and shall be submitted to Rural Development for review and acceptance. Prior to disbursement of funds by the District, the Board of Directors shall review and approve each payment estimate. All bills and vouchers must be approved by Rural Development prior to payment by the District.

Form RD 440-11, "Estimate of Funds Needed for 30-Day Period Commencing _____," will be prepared by the District and submitted to Rural Development in order that a periodic advance of federal cash may be requested.

Borrowers receiving federal loan and/or grant funds by EFT will have funds directly deposited to a specified account at a financial institution with funds being available to the recipient on the date of payment. The borrower should complete Form SF-3881, "Electronic Funds Transfer Payment Enrollment Form," for each account where funds will be electronically received. The completed form(s) must be received by Rural Development at least thirty (30) days prior to the first advance of funds.

Monthly audits of the District's construction account records shall be made by Rural Development.

21. Cost of Facility:

Breakdown of Costs:

Development	\$ 11,920,000
Land and Rights	500,000
Legal and Administrative	60,000
Engineering	1,351,508
Interest	400,000
Contingencies	<u>1,192,000</u>
TOTAL	\$ 15,423,508

Financing:

RUS Loan	\$ 13,243,100
Kentucky Tobacco Settlement Grant	<u>2,180,408</u>
TOTAL	\$ 15,423,508

22. Commitment of Other Project Funds:

This Letter of Conditions is issued contingent upon a firm commitment being in effect prior to advertising for construction bids for the Tobacco Settlement Grant in the amount of \$2,180,408.

23. Use of Remaining Project Funds:

After providing for all authorized costs, any remaining project funds will be refunded in proportion to participation in the project.

24. Proposed Operating Budget:

You will be required to submit to Rural Development a copy of your proposed annual operating budget that supports the proposed loan repayment prior to this agency giving you written authorization to proceed with the bidding phase. The operating budget should be based on a typical year cash flow, subject to completion of this project in the first full year of operation. Form RD 442-7, "Operating Budget," or similar form may be utilized for this purpose.

25. Rates and Charges:

Rates and charges for facilities and services rendered by the District must be at least adequate to meet cost of maintaining, repairing and operating the water system and meeting required principal and interest payments and the required deposits to debt service and/or depreciation reserve.

Water rates will be at least:

5/8" Meter:

Customer Charge		\$	8.84
First	40,000	gallons @ \$	3.70. - per 1,000 gallons.
All Over	40,000	gallons @ \$	3.35. - per 1,000 gallons.

3/4" Meter:

Customer Charge		\$	9.73
First	40,000	gallons @ \$	3.70. - per 1,000 gallons.
All Over	40,000	gallons @ \$	3.35. - per 1,000 gallons.

1" Meter:

Customer Charge		\$	22.11
First	40,000	gallons @ \$	3.70. - per 1,000 gallons.
All Over	40,000	gallons @ \$	3.35. - per 1,000 gallons.

1 1/2" Meter:

Customer Charge		\$	44.22
First	40,000	gallons @ \$	3.70. - per 1,000 gallons.
All Over	40,000	gallons @ \$	3.35. - per 1,000 gallons.

2" Meter:

Customer Charge		\$	88.44
First	40,000	gallons @ \$	3.70. - per 1,000 gallons.
All Over	40,000	gallons @ \$	3.35. - per 1,000 gallons.

3" Meter:

Customer Charge		\$	128.05
First	40,000	gallons @ \$	3.70. - per 1,000 gallons.
All Over	40,000	gallons @ \$	3.35. - per 1,000 gallons.

Industrial/Bulk:

All Usage \$ 3.35. - per 1,000 gallons.

Wholesale sales to Henry Co. Water District and to the City of LaGrange:

All Usage \$ 1.70. - per 1,000 gallons.

26. Compliance with the Bioterrorism Act:

Prior to pre-closing the loan, the District will provide a certification they have completed a Vulnerability Assessment (VA) and prepared an emergency response plan (ERP) as required by the Safe Drinking Water Act (SDWA).

27. Floodplain Construction:

The District will be required to pass and adopt a Resolution or amend its By-Laws whereby the District will deny any water service to any future customer wishing to build on or develop property located within a designated floodplain. If a customer or developer requests service for construction in a designated floodplain, the customer or developer must provide evidence and a justification for approval by the District and Rural Development officials that there are no other alternatives to construction or development within the designated floodplain. The community must be a participant in the National Flood Insurance Program (NFIP) and the customer or developer must obtain the required permits prior to the tap on restrictions being waived.

28. Water Withdrawal Permit:

The District will be required to obtain satisfactory evidence that a revised water withdrawal permit has been secured from the Division of Water. The permit must be obtained prior to the commencement of construction on the water project.

29. Mitigation Measures:

- A. The project shall be in compliance with all requirements noted in the Governor's Office for Local Development letter dated August 11, 2008, from Ms. Lee Nalley.
- B. The line design and construction shall be accomplished in a way that will leave flood plains and farmland without effect after construction is complete. The Army Corps of Engineers Nationwide Permit No. 12 applies to all floodplain and wetland utility line construction.
- C. Any excavation by Contractor that uncovers a historical or archaeological artifact shall be immediately reported to Owner and a representative of Agency. Construction shall be temporarily halted pending the notification process and further directions issued by Agency after consultation with the State Historic Preservation Officer (SHPO).
- D. The design and construction shall be in compliance with all local, state and federal environmental statutes, regulations and executive orders applicable to the project.
- E. Best Management Practices shall be incorporated into the project design,

construction, and maintenance.

30. American Recovery and Reinvestment Act of 2009 ("Recovery Act"):

Recovery Act requirements apply to this financing. In addition to the other conditions contained in this Letter of Conditions, you must understand and agree to these following conditions specific to the Recovery Act:

- (1). Certifications. With respect to Recovery Act funds made available to State or local governments for infrastructure investments, Section 1511 of the Recovery Act requires the Governor, mayor or other chief executive, as appropriate, to certify that the infrastructure investment has been properly approved as required by law and that the chief executive accepts responsibility that the infrastructure investment is an appropriate use of taxpayer dollars. RD Water and Waste personnel will provide specific guidance on the information required in the certification.
- (2). Reports on Use of Funds. Section 1512 of the Recovery Act requires each recipient receiving Recovery Act funding to provide specific information to the government on a periodic basis for inclusion in various internal and publicly-available reports. RD Water and Waste Program personnel will provide specific guidance on the type and frequency of information required to assist Recovery Act recipients in complying with this condition.
- (3). Buy American. Section 1605 of the Recovery Act requires that all projects financed with Recovery Act funds be bid and constructed using only iron, steel and manufactured goods produced in the United States in accordance with Section 1605 of the Recovery Act. Specific guidance, including contract provisions to be included in any construction contracts, is being formulated and drafted as of the date of this Letter of Conditions. RD Water and Waste Program personnel will provide specific guidance related to this condition as soon as it is available.
- (4). Wage Rate Requirements. Section 1606 of the Recovery Act requires that all laborers and mechanics employed by contractors and subcontractors for the project will be paid wages at rates not less than those prevailing on projects of a character similar in the locality where this project will occur. Specific guidance, including contract provisions to be included in any construction or otherwise related contracts, is being formulated and drafted as of the date of this Letter of Conditions. RD Water and Waste Program personnel will provide specific guidance related to this condition as soon as it is available.

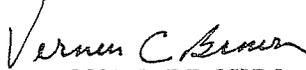
Compliance with the conditions in this section is required for financing under the Recovery Act. However, these conditions are not substitutes for, or in lieu of, the remaining conditions contained in this Letter of Conditions. Each of the conditions in this Letter of Conditions must also be understood and complied with to receive financing for your project.

31. Final Approval Conditions:

Final approval of this assistance will depend on your willingness, with the assistance of all your co-workers, to meet the conditions of this letter in an orderly and systematic manner. Then too, final approval will depend on funds being available.

If you desire to proceed with your application, the Area Director will allot a reasonable portion of time to provide guidance in application processing.

Sincerely,


VERNON C. BROWN
Acting State Director

Enclosures

cc: Area Director - Shelbyville, Kentucky
KIPDA ADD - Louisville, Kentucky
Rubin & Hays - Louisville, Kentucky
Frank Chuppe - Louisville, Kentucky
GRW Engineers - Louisville, Kentucky
PSC - ATTN: Dennis Jones - Frankfort, Kentucky



**United States Department of Agriculture
Rural Development
Kentucky State Office**

November 5, 2009

SUBJECT: Oldham County Water District
Water System Improvements
Contract Award Concurrence

TO: Area Director
Shelbyville, Kentucky

Based on the bids received and the recommendation of the consulting engineer, Rural Development concurs in the award of subject contract to the low bidder on the WTP Expansion Contract, Dugan & Meyers Construction Co., in the amount of \$3,876,000.00, the low bidder on Wells 12 & 13 contract, Reynolds, Inc., in the amount of \$496,832.00, and the low bidder on the Raw Water and Transmission Main Contract, MAC Construction & Excavation, Inc., in the amount on \$3,292,975.00.

If you have any questions, please contact Julie Anderson, State Engineer, at (859) 224-7348.


FOR VERNON BROWN
Acting State Director
Rural Development

cc: GRW Engineers, Inc.
Louisville, Kentucky

✓ Rubin and Hays
Louisville, Kentucky

771 Corporate Drive • Suite 200 • Lexington, KY 40503
Phone: (859) 224-7300 • Fax: (859) 224-7425 • TDD: (859) 224-7422 • Web: <http://www.rurdev.usda.gov/ky>

Committed to the future of rural communities.

"USDA is an equal opportunity provider, employer and lender."
To file a complaint of discrimination write USDA, Director, Office of Civil Rights, Room 326-W, Whitten Building, 14th and Independence Avenue, SW, Washington, DC 20250-9410 or call (202) 720-5964 (voice or TDD).

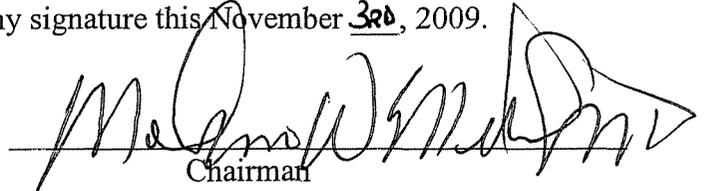
**CERTIFICATE OF CHAIRMAN OF OLDHAM COUNTY WATER
DISTRICT, AS TO STATEMENT REQUIRED
BY SECTION 1(5) OF 807 KAR 5:069**

I, Mel Milburn, hereby certify that I am the duly qualified and acting Chairman of the Oldham County Water District, and that said District is in the process of arranging to finance the construction of extensions, additions and improvements to the existing waterworks system of the District (the "Project"), in cooperation with GRW Engineers, Inc., Louisville, Kentucky, the Engineers for the District (the "Engineers").

Based on information furnished to me by said Engineers for the District, I hereby certify as follows:

1. That the proposed plans and specifications for the Project have been designed to meet the minimum construction and operating requirements set out in 807 KAR 5:066 Section 4(3) and (4); Section 5(1); Sections 6 and 7; Section 8(1) through (3); Section 9(1) and Section 10.
2. That all other state approvals and/or permits have already been obtained.
3. That the rates proposed by the District in its current Application filed with the Public Service Commission of Kentucky are contemplated to produce total revenue requirements set out in the Engineering Reports prepared by such Engineers and filed with the Public Service Commission.
4. That it is now contemplated that construction of the Project will begin on or about January 1, 2010, and will end on or about March 1, 2011.

IN TESTIMONY WHEREOF, witness my signature this November 3rd, 2009.

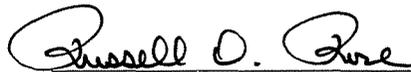


Chairman

Oldham County Water District

STATE OF KENTUCKY)
) SS
COUNTY OF OLDHAM)

Subscribed and sworn to before me by Mel Milburn, Chairman of the Board of Commissioners of the Oldham County Water District, on this November 3rd, 2009.



Notary Public

In and For Said State and County

NOTICE OF PROPOSED RATE CHANGE

In accordance with the requirements of the Public Service Commission of the Commonwealth of Kentucky as set out in 807 KAR 5:069, Section 2, notice is hereby given to the customers of the Oldham County Water District of a change to the District's rate schedule as set forth herein. The proposed rate change is required by USDA, Rural Development in connection with a loan by RD to the District in the amount of \$13,243,100 to be evidenced by the issuance by the District of its Waterworks Revenue Bonds in such amount, which RD has agreed to purchase provided the District meets certain conditions of RD, including revising its water rates as set forth below:

Current Monthly Rates

5/8" Meter:

Customer Charge	\$7.69
First 40,000 gallons	2.75 per 1,000 gallons
All over 40,000 gallons	1.48 per 1,000 gallons

3/4" Meter:

Customer Charge	\$8.46
First 40,000 gallons	2.75 per 1,000 gallons
All over 40,000 gallons	1.48 per 1,000 gallons

1" Meter:

Customer Charge	\$19.23
First 40,000 gallons	2.75 per 1,000 gallons
All over 40,000 gallons	1.48 per 1,000 gallons

1-1/2" Meter:

Customer Charge	\$38.45
First 40,000 gallons	2.75 per 1,000 gallons
All over 40,000 gallons	1.48 per 1,000 gallons

2" Meter:

Customer Charge	\$76.90
First 40,000 gallons	2.75 per 1,000 gallons
All over 40,000 gallons	1.48 per 1,000 gallons

3" Meter:

Customer Charge	\$115.35
First 40,000 gallons	2.75 per 1,000 gallons
All over 40,000 gallons	1.48 per 1,000 gallons
Industrial Rate	\$1.48 per 1,000 gallons
Wholesale Rate	\$1.22 per 1,000 gallons

Proposed Monthly Rates

5/8" Meter:

Customer Charge	\$8.84
First 40,000 gallons	3.70 per 1,000 gallons
All over 40,000 gallons	3.35 per 1,000 gallons

3/4" Meter:

Customer Charge	\$9.73
First 40,000 gallons	3.70 per 1,000 gallons
All over 40,000 gallons	3.35 per 1,000 gallons

1" Meter:

Customer Charge	\$22.11
First 40,000 gallons	3.70 per 1,000 gallons
All over 40,000 gallons	3.35 per 1,000 gallons

1-1/2" Meter:

Customer Charge	\$44.22
First 40,000 gallons	3.70 per 1,000 gallons
All over 40,000 gallons	3.35 per 1,000 gallons

2" Meter:

Customer Charge	\$88.44
First 40,000 gallons	3.70 per 1,000 gallons
All over 40,000 gallons	3.35 per 1,000 gallons

3" Meter:

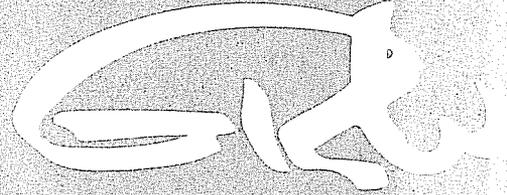
Customer Charge	\$128.05
First 40,000 gallons	3.70 per 1,000 gallons
All over 40,000 gallons	3.35 per 1,000 gallons
Industrial Rate	\$3.35 per 1,000 gallons
Wholesale Rate	\$1.70 per 1,000 gallons

The RD loan proceeds will be used in conjunction with a Kentucky Tobacco Settlement grant in the amount of \$2,180,408 to finance the construction and installation of (i) an expansion of the water treatment plant from 7 MGD to 13 MGD; (ii) a new chemical building, high service pump station, membrane clear well baffling, renovation of the control building, piping, valves, controls, stand-by generators, static var compensators and electrical modifications; (iii) 4,790 linear feet of 24-inch water main, 2,700 linear feet of 30-inch water main and 14,700 linear feet of 36-inch water main and appurtenances; and (iv) two new raw water wells. Signed: Mel Milburn, Chairman, Oldham County Water District.

Engineering
Architecture
Planning
GIS
Aviation Consulting

Arlington, VA
Chattanooga, TN
Indianapolis, IN
Louisville, KY
Nashville, TN

2009-00436



**Water System Preliminary
Engineering Report**

Oldham County Water District

GRW Project No. 3257-09

October 2007

RECEIVED
NOV 09 2009
PUBLIC SERVICE
COMMISSION



**Water System Preliminary
Engineering Report**

Oldham County Water District

GRW Project No. 3257-09

October 2007

Table of Contents

I.	Introduction.....	1
II.	Planning Area.....	1
III.	Background Considerations.....	1
IV.	Population and Water Use Projections	3
V.	Existing Facilities	5
VI.	Recommended Improvements	15
VII.	Opinion of Probable Cost for Recommended Project.....	18
VIII.	Conclusions and Recommendations.....	19

Exhibits

Exhibit II-1 – Water Service Areas Oldham County	2
Exhibit V-1 – Existing Well and Treatment Plant Area	6
Exhibit V-2 – Site Plan WTP Expansion.....	8
Exhibit V-3 – Water Treatment Plant and Greenhaven Pump Station and Tank Site	14
Exhibit VI-1 – Recommended Water Mains	16

Tables

Table IV -1 – Existing and Projected Average Water Demands	4
Table V-1 – Existing Wells.....	5
Table V-2– Process Adequacy Matrix	9-10
Table VII-1 – Opinion of Probable Cost for Recommended Project.....	17

WATER SYSTEM PRELIMINARY ENGINEERING REPORT

OLDHAM COUNTY WATER DISTRICT

UPDATED OCTOBER 2007

I. Introduction

The Oldham County Water District (OCWD) provides potable water service to the eastern two thirds of Oldham County. The area has experienced rapid growth for the last 15 to 20 years that is primarily the result of residential development. The rapid growth has stressed the existing drinking water infrastructure. Of immediate concern is the ability to provide reliable water supply and adequate pressures to OCWD's existing customers while accommodating additional growth.

OCWD selected GRW Engineers, Inc. to evaluate alternatives for increasing the available capacity to meet the future needs of the OCWD service area.

A planning period through the year 2025 has been selected for this study.

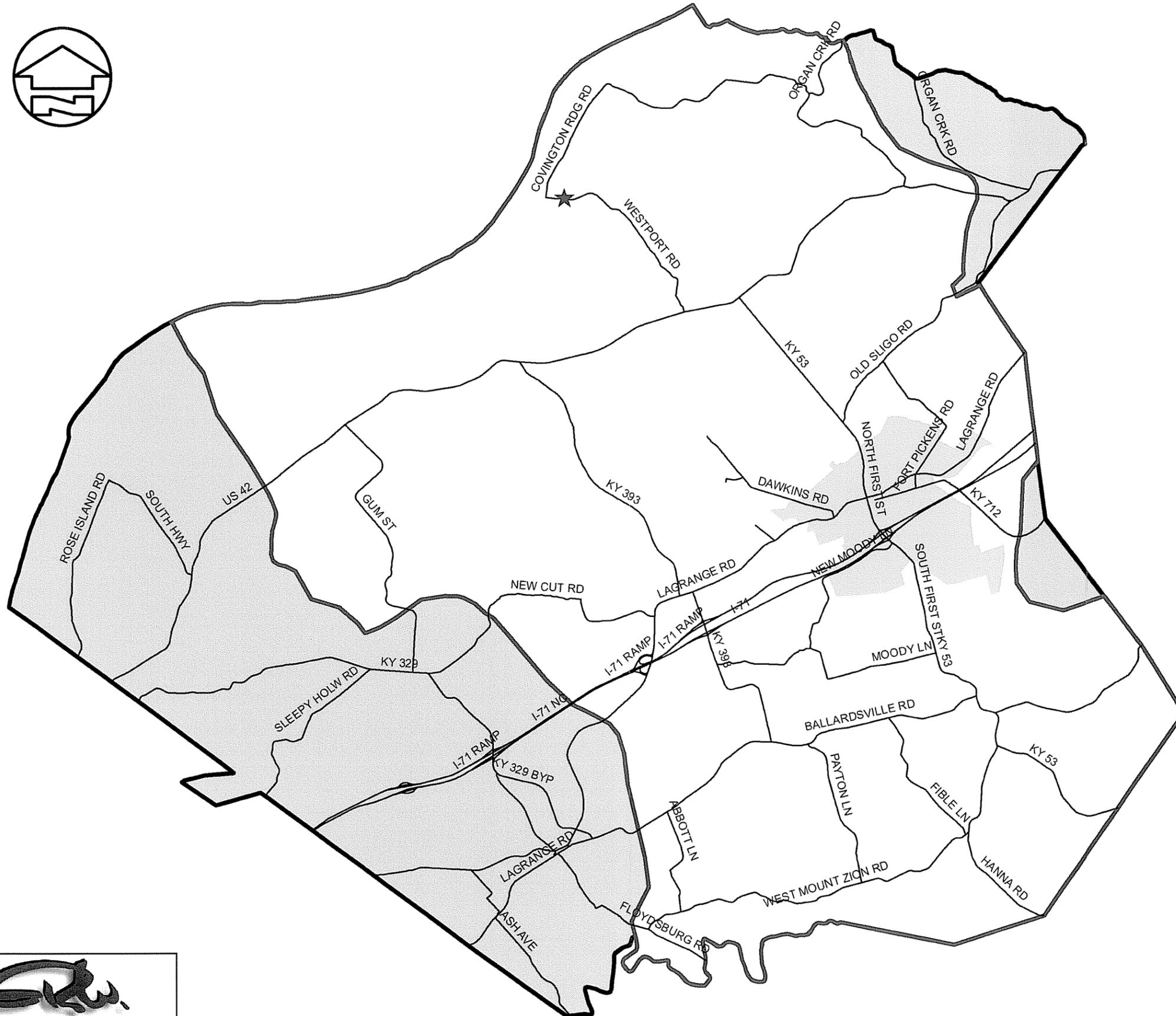
II. Planning Area

The planning area includes the existing OCWD service area as presented in Exhibit II-1.

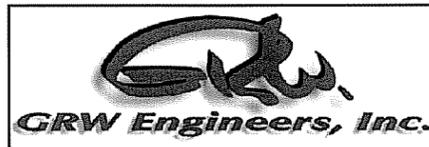
III. Background Considerations

The OCWD well field includes 8 wells installed between 1981 and 2007. Additional capacity will be needed to accommodate continued growth in water demand.

The OCWD water treatment plant, constructed in 1981, has a capacity of 6.5 million gallons per day (MGD). Current peak demands exceed 6 MGD and could reach 7.5 MGD if a significant drought occurs. Additional treatment capacity is required to meet the growing demand for water.



Map Document: (1:13257-OCWD Wells, RW, WTP)3257-01 Master Plan\Report\Prelim\Map Eng Report for PSC\exhibit_ii-1.mxd) 10/24/2007 -- 4:24:16 PM



Explanation

- ★ OCWD Treatment Plant
- OCWD Service Area
- ▨ LaGrange Utilities Service Area
- ▩ Areas of Oldham County not Serviced by OCWD
- Roads

0 4,500 9,000
Feet

Oldham County Water District
Service Area

October 2007

EXHIBIT II-1

IV. Population and Water Use Projections

A. Population Projection

The population of Oldham County is projected to increase from 50,517 in 2003 to 84,432 in 2025. This is based on projections prepared by the Kentucky State Data Center.

B. Existing and Projected Water Demands

The existing and projected water demands are presented in Table IV-1.

The population of the OCWD service area is projected to increase in proportion to the overall increase expected for Oldham County. The projected increase from 2003 to 2025 is 67 percent.

The commercial, educational, farm, and government usages are projected to increase in proportion to the projected population increase. The commercial projection includes growth of water demand from existing industries.

The Oldham County Economic Development Authority (OCEDA) is developing the 1,194 acre Oldham County Economic Development Campus located just southwest of the I-71 interchange at La Grange. This new development, for which master planning is currently underway, is expected to be comprised of 592 acres commercial, 314 acres residential, 17 acres educational, 25 acres parks, 56 acres roads, and 190 acres greenway. The future water demand for the residential and educational portions of this development are included in the overall projections for residential and educational water use. The future water demand for the commercial portion of this development is 590,000 gallons per day based on a water use of 1,000 gallons per acre per day.

The Kentucky Department of Corrections was contacted and it was determined they have no specific plans to increase the size of the Kentucky State Reformatory. However, they recommended planning for a 20 percent increase in water demand over the planning period. A 20 percent increase in the number of inmates would be about 380 persons.

The OCEDA web site indicates there are 291 acres of available developed industrial sites in the Oldham County Business Park and Westbrook. It also indicates there are three available previously occupied sites totaling 88 acres that have existing buildings. There are also about 200 undeveloped acres located near the intersection of Old La Grange Road and New Cut Road that are zoned industrial, but there is significant uncertainty that this property will actually be developed for industrial use. The industrial water demand increase is projected to be 380,000 gallons per day based on 379 developed acres at 1,000 gallons per acre per day.

The City of La Grange water use is projected to increase in proportion to the overall population increase projected for Oldham County (67 percent).

Oldham County Water District
Water System Preliminary Engineering Report

The Henry County Water District (HCWD) service area served by OCWD water is limited and isolated from the rest of the HCWD system because it is in a different pressure zone. The size of the service area is not expected to increase in the future. Due to the close proximity of this area to Oldham County and La Grange, the water demand is projected to increase at the same rate as the population of Oldham County.

Peak demands in excess of 1.5 times the annual average demand occurred two times in June-July 2004 when rainfall patterns were normal and temperatures were below normal. High peaks are reported to be common for OCWD in the summer, apparently due to the increased use of lawn sprinkling systems in new home construction. A peak demand of 1.8 times average demand will be used for projection of peak demands during dry summers.

**TABLE IV-1
EXISTING AND PROJECTED AVERAGE WATER DEMANDS
OLDHAM COUNTY WATER DISTRICT**

	2003 WATER USE, GALLONS PER DAY	2025 PROJECTED WATER USE, GALLONS PER DAY
Retail		
Residential	1,560,000	2,610,000 ¹
Commercial	280,000	470,000 ¹
Educational	28,000	50,000 ¹
Farm	23,000	40,000 ¹
Government	28,000	50,000 ¹
Industrial	0 ²	380,000 ³
Commercial	0	590,000 ⁴
Kentucky State Reformatory	628,000	760,000 ⁵
Wholesale		
La Grange	837,000	1,400,000 ¹
Henry County Water District	20,000	30,000 ¹
Subtotal – Water Sold	3,404,000	6,380,000
Other ⁶	426,000	800,000
Total – Water Pumped	3,830,000	7,180,000
Projected Peak Day Demand @ 1.8 Peak Factor		12,930,000
Projected Peak Day Demand, Rounded		13,000,000

¹Projected to increase at the same rate as the population of Oldham County (67 percent), rounded to the nearest 10,000 gallons per day.

²The existing industrial water use is included in the existing commercial water use.

³Based on 379 acres at 1,000 gallons per acre per day, rounded.

⁴Based on 592 acres at 1,000 gallons per acre per day, rounded.

⁵Based on a 20 percent increase in water demand as recommended by the Kentucky Department of Corrections.

⁶Flushing, fire protection, main breaks, leaks, etc.

V. Existing Facilities

A. Well Field

The well field is the area of land containing OCWD's existing wells. It is located along the southeast shore of the Ohio River near Westport, Kentucky. The wells draw water from the Ohio River alluvium, which is found in a relatively narrow band along portions of both sides of the river.

B. Wells

There are eight existing wells with capacities as listed in Table V-1. Exhibit V-1 presents a map showing the locations of the existing wells.

**TABLE V-1
 EXISTING WELLS
 OLDHAM COUNTY WATER DISTRICT**

WELL NO.	YEAR INSTALLED	DESIGN CAPACITY¹ GALLONS PER MINUTE	PRESENT CAPACITY GALLONS PER MINUTE
4	1981	1,200	950 ¹
5	1989	1,400	1,230 ¹
6	1989	1,400	1,310 ¹
7	1997	1,400	1,350 ¹
8	2004	1,200	1,200 ²
9	2004	1,200	1,200 ²
10	2007	1,400	1,400
11	2007	1,400	1,400
Total		10,600	9,940

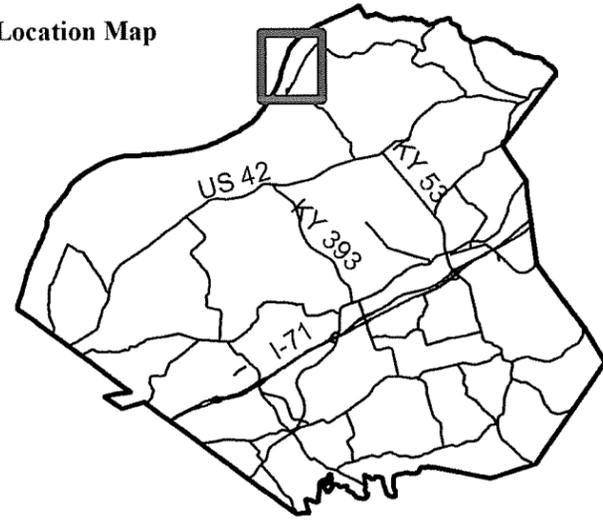
¹From 2003 Well Performance Test Report by Reynolds, Inc.

²From installation reports for Wells No. 8 and 9.

The life expectancy of wells varies with water chemistry, aquifer type, well design, and how hard (frequently) the wells are pumped. It appears that a reasonable life expectancy at OCWD is on the order of 30 years. Based on the low capacity shown in Table V-1, and reported poor water quality, Well 4 is approaching the end of its useful life. The existing wells (excluding Well 4) have a firm capacity (with the largest well out of service) of about 2,640 GPM. Two additional wells will be needed to meet the projected peak demand. OCWD desires to construct those wells now in order to limit the operating time for all wells and thus greatly extend their useful life.

The OCWD staff is concerned about the reliability of the electrical power supply to the wells and requested that additional standby power capabilities be considered. OCWD currently has a portable generator capable of operating one well.

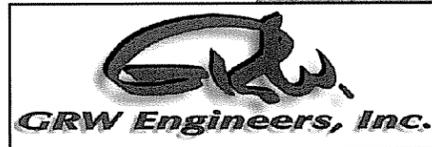
Location Map



OHIO RIVER

City of Westport

OCWD Water Treatment Plant



Explanation

- Existing Numbered Wells
- 24 inch Raw Water Mains
- Other Raw Water Mains
- Water Treatment Plant Discharge
- Well Head Protection Area
- Property Lines
- Roads

0 600 1,200 Feet

Existing Well Field and Treatment Plant Areas

October 2007

EXHIBIT V-1

C. Raw Water Main

Raw water is pumped from the wells to the water plant through about 9,500 feet of 24-inch ductile iron main that was installed in 1981. The friction losses in the existing main are such that a parallel main will be needed to meet the growing demand; otherwise the output of the existing wells would decrease as additional wells are connected to the existing main. The raw water main is shown in Exhibit V-1.

D. Water Treatment Plant

1. General

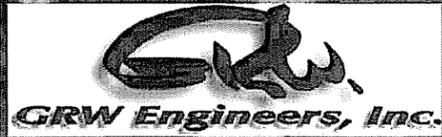
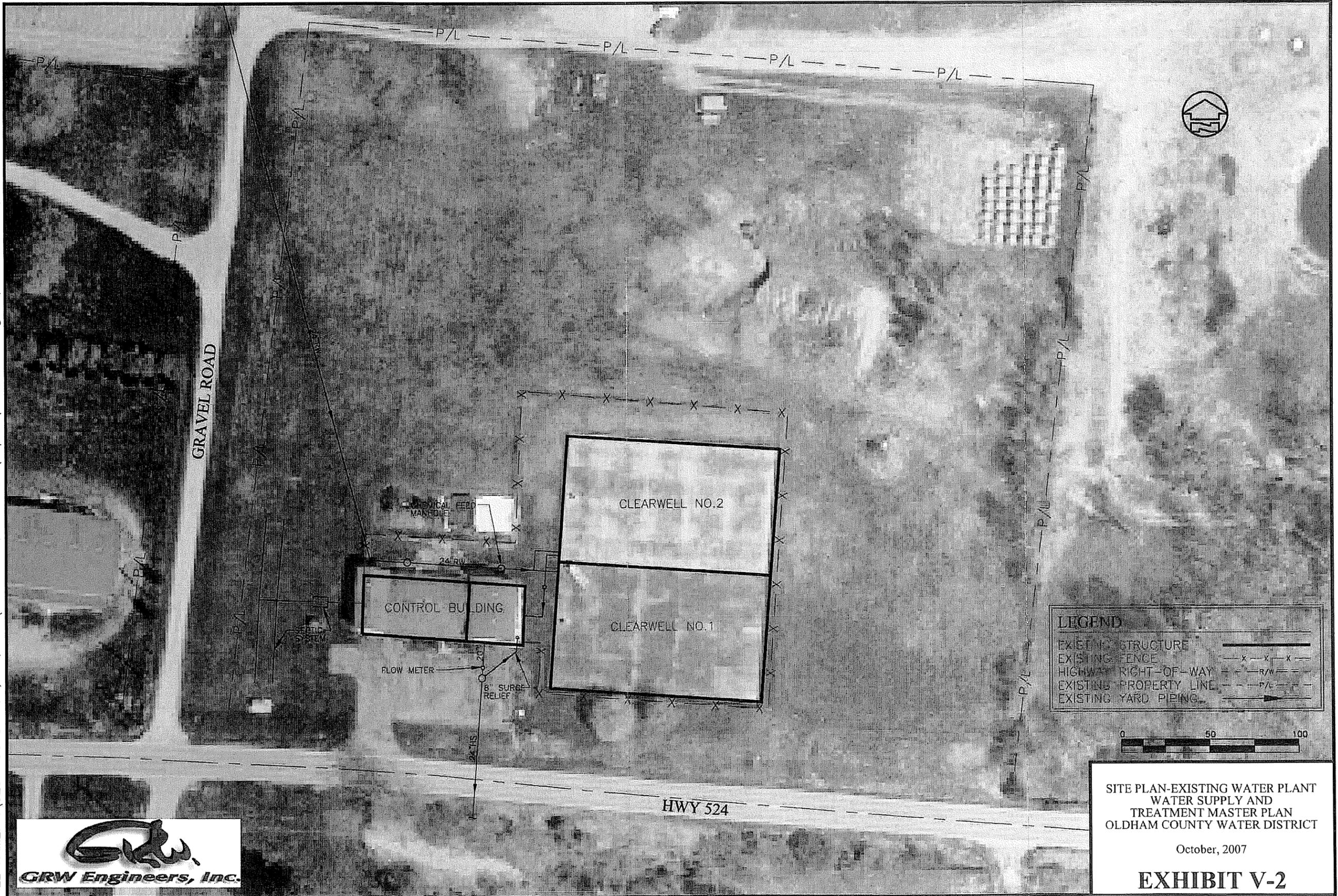
Exhibit V-2 presents a site plan of the existing OCWD water treatment plant. The plant has a capacity of 6.5 million gallons per day (MGD).



Existing Water Plant Building

2. Process Adequacy

A process adequacy matrix is presented in Table V-2. Additional discussion regarding each process follows the matrix.



SITE PLAN-EXISTING WATER PLANT
WATER SUPPLY AND
TREATMENT MASTER PLAN
OLDHAM COUNTY WATER DISTRICT

October, 2007

EXHIBIT V-2

Oldham County Water District
Water System Preliminary Engineering Report

**TABLE V-2
 PROCESS ADEQUACY MATRIX
 OLDHAM COUNTY WATER DISTRICT**

PROCESS/ITEM	ADEQUACY	CAPABLE OF SERVING FUTURE NEED
Raw Water Flow Meter	Meter does not work; meter is too small for expanded plant	No
Finished Water Flow Meter	Meter does not work. Separate new meters will be installed on the existing and new pump station discharges.	No
Chlorine Feed System	<p>The system has adequate chlorine storage capability (30 days required per Ten States Standards) and with modifications it could be upgraded to provide higher feed rates for an expanded plant. However, the system has the following deficiencies:</p> <ul style="list-style-type: none"> • The chlorine feed rate is manually controlled and is not automatically varied with raw water flow. • The chlorine leak detector monitors the chlorine storage room, but not the chlorine feed room. • The chlorine leak detector alarm is not tied into the Computer Based Supervisor Control and Data Acquisition (SCADA) system. • The chlorine storage room and feed room ventilation systems are not automatically shut down during a chlorine leak. • The exterior chlorine storage room doors do not seal. • An OSHA Process Safety Management Plan has not been prepared. • An EPA Risk Management Plan has not been prepared. • The chlorine room does not have a scrubber designed to contain a leak from a chlorine cylinder. <p>A chlorine scrubber and alternative disinfectants should be considered to reduce the risk from a chlorine leak.</p>	Yes
Phosphate Feed System	<p>The purpose of feeding the phosphate is to keep dissolved manganese in solution so it does not precipitate and stain plumbing fixtures and laundry. Average raw water manganese is 0.03 mg/L compared to the maximum contaminant level allowed of 0.05 mg/L. Future wells must have low manganese levels if this treatment approach is to continue to be used. If manganese exceeds 0.05 mg/L, it may become necessary to filter the water. The phosphate feed system has adequate feed capacity for a plant expansion. It has the following deficiencies:</p> <ul style="list-style-type: none"> • Access to the feed room is through the chlorine storage room. A separate exterior door should be provided if hazardous gaseous chlorine continues to be stored in the chlorine storage room. 	Yes

Oldham County Water District
Water System Preliminary Engineering Report

TABLE V-2 Continued)
PROCESS ADEQUACY MATRIX
OLDHAM COUNTY WATER DISTRICT

PROCESS/ITEM	ADEQUACY	CAPABLE OF SERVING FUTURE NEED
Fluoride Feed System	<p>The system has the following deficiencies:</p> <ul style="list-style-type: none"> • The fluoride feed system is not in a room separate from other chemical feed systems as required by Ten States Standards. • Access to the feed room is through the chlorine storage room. Ten States Standards prohibits access to other rooms through chlorine storage for feed rooms. • The fluoride feed pump has a standard electrical outlet, which is prohibited by Ten States Standards. • A working finished water flow meter is not provided for proper fluoride dose control as required by Ten States Standards. 	No
Clearwells	<p>The two clearwells (1,000,000 gallons each) have an adequate volume to meet the Kentucky Division of Water sizing criteria (15 percent of plant capacity) for an expansion up to a plant capacity of 13,300,000 gallons per day. The clearwells are unbaffled, resulting in serious short-circuiting and reductions in disinfection efficiency. The Kentucky Division of Water expects to require all ground water system to baffle their clearwells in the near future.</p>	Yes
High Service Pumping	<p>The high service pump station has a capacity of about 6.5 MGD. The pump station is adequate for its intended design capacity, but additional capacity will be needed.</p>	Yes
High Service Transmission Main	<p>The existing 24 inch high service main is adequate for current needs, but supplemental capacity will be needed.</p>	Yes

3. Raw and Finished Water Metering

The existing plant does not have functioning raw water and finished water meters. Water flows are measured with the meters at the individual wells. It is recommended that a new raw water meter be installed to allow chemical feed rates to be varied with raw water flow. It is also recommended that two new finished water flow meters be installed, one on the existing pump station discharge and one on the new pump station discharge.

4. Chemical Feed Systems

Three chemicals are fed at the water treatment plant: chlorine, phosphate, and fluoride. The phosphate product is fed to keep small amounts of dissolved manganese in solution

so precipitated manganese can not discolor water or settle in water tanks. All three chemicals are fed through diffusers installed in a manhole located over the 24-inch raw water main.

Chlorine is purchased in 1-ton cylinders. Scheduling the delivery of a new cylinder just before the in-service cylinder is empty minimizes the amount of chlorine stored on-site. The chlorinators are installed in a separate room from the chlorine cylinders.

A separate 13'-6" x 15'-6" room is provided for phosphate and fluoride feed.

Phosphate is fed from 55-gallon drums to keep dissolved manganese in solution. The plant currently uses about 3 gallons per day. This feed arrangement meets industry standards and should be adequate for the projected future water demand.

Hydrofluosilicic acid is also fed from 55-gallon drums. The plant currently uses about 12 gallons per day and should use about twice that much at the end of the planning period. A bulk tank (and day tank) should be provided to reduce the need for manual handling of this hazardous chemical. A separate storage and feed room should be provided as required by regulatory design standards.

5. Clearwells

After chemical addition, the water flows to two un baffled 1,000,000-gallon clearwells (each 76'-6" x 125' x 14' deep), which operate in parallel. The inlet pipes connect to the clearwells about 10 feet from the outlet pipes, resulting in short-circuiting.

The Kentucky Division of Water requires the clearwell volume to be at least 15 percent of plant capacity. The volume of the existing clearwells is sufficient for up to 13.3 MGD.

6. High Service Pumping

There are five existing 150 horsepower vertical turbine high service pumps and space for three additional pumps. Each pump has a nominal design capacity of about 1200 GPM, but they deliver 1500 GPM with one pump, 2800 GPM with two pumps, 4300 GPM with three pumps, and 5500 GPM with four pumps. The discharge pressure with two pumps running is 150 PSI.

The operators report that three pumps can be run together without any problem, but they are very concerned about potential power failure related surge pressures when four pumps are operated.

The pumps discharge to a 20-inch header that increases to 24 inches outside the building. The velocity in the discharge header at the projected peak flow of 13 MGD would be nearly 10 feet per second, which exceeds design standards.

Excessive condensation occurs on the pumps and piping in summer when warm humid air is exposed to the pipes containing cool ground water. The operators feel there is a need for dehumidification for the pump room.

The ventilation for the pump room appears to be undersized for the installed pump horsepower and does not create a good cross flow of air over the pump motors.

7. High Service Transmission Main

The high service pumps deliver water through 7,000 feet of 24 inch main to the Greenhaven ground storage tanks and booster pump station.

8. Sanitary Drainage

Sanitary wastewater flows to a septic tank and leachate field. Sanitary sewer service is not available.

9. Electrical and Standby Power

The electrical service to the plant is 480/277 volts, 1600 amps. The main switchboard includes four feeder breakers, which serve the following:

- Automatic transfer switch, which services High Service Pump #1 and an emergency transformer, and panelboard.
- Motor control center, which serves High Service Pumps #2, 3 and 4.
- A variable frequency drive for High Service Pump #5.
- A 45 KVA transformer and low voltage panelboard.

A 200 KW standby power generator and fuel tank are located in the high service pump room and on top of the pump well. The generator is connected only to High Service Pump #1. There is a spill containment curb around the generator and fuel tank.

The 75 KW portable standby generator used for the wells is stored in the pump room, which is the top of the pump well. A separate storage room should be provided for the generators to protect the pump well from a potential oil or diesel spill.

10. Instrumentation, Controls, and Telemetry Systems

The existing SCADA system for the water plant and distribution system is a radio-based, proprietary system supplied and serviced by Microcom, Inc. The system allows for monitoring and control of water treatment plant pumps and clearwells, and remotely monitors well pumps, booster pumps, and tanks. Currently, automatic control of well pumps is provided, with the pumps being controlled based on the clearwell level. High service pumps are controlled automatically based on the level in the Greenhaven tanks. The master includes workstations with human-machine interface (HMI) software.

Currently, both the water treatment plant and district office include computer workstations, which monitor the system.

The instrumentation and telemetry system is adequate for the current system, but it should be expanded as new facilities are added to the system.

11. Regulatory Compliance Status

EPA's new Ground Water Rule requires sanitary surveys and hydrologic sensitivity assessments to determine the potential for fecal contamination of ground water sources. Under the rule, certain high-risk systems may be required to disinfect to achieve a 4-log inactivation of viruses. If that is found to be necessary at OCWD, this would require baffling the existing clearwells.

401 KAR 8:150 requires that all water systems using groundwater chlorinate and provide a contact time of at least 30 minutes. Although short-circuiting occurs in the clearwell, the existing plant complies with this regulation.

The Kentucky Division of Water reports that in the future, it will probably require all ground water systems to disinfect to achieve a 4-log inactivation of viruses. This will require the addition of baffling to the existing clearwells.

EPA proposed a new rule to regulate radon in drinking water in 1999. EPA estimates this rule will become effective in December 2005. The rule will set a maximum contaminant level (MCL) of 300 picoCuries per liter in treated water. The average amount of radon in water from the existing wells is about 234 picoCuries per liter, which is within standards.

12. Security

Current provisions for security at both the well field and water treatment plant are limited to security fencing and locks consistent with past practices in the drinking water industry. There are new concerns about vandalism and terrorism against water systems. The following additional security measures are recommended:

- Installation of an entry alarm system at the existing and proposed water treatment plant buildings.
- Installation of video surveillance equipment at the water treatment plant, which is often unmanned. The purpose of the equipment would be to monitor site areas around the treatment plant buildings.

E. Greenhaven Pump Station

The high service distribution pump station pumps through a 24-inch main to the Greenhaven pump station, which then delivers water to the distribution system (see Exhibit V-3). Two ground storage tanks with a total volume of 995,000 gallons are

OHIO RIVER

City of Westport

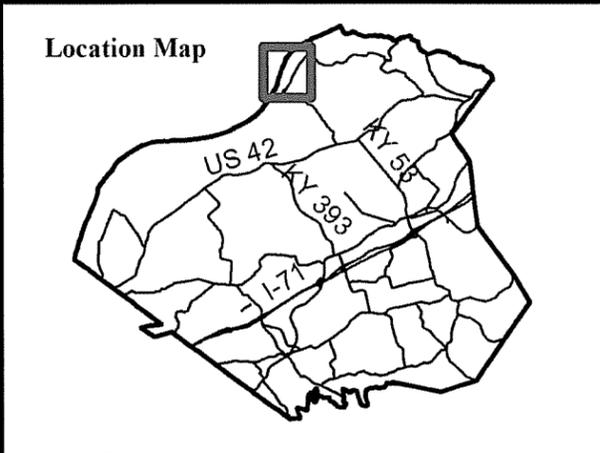
OCWD Water Treatment Plant

EIGHTEENMILE CREEK ROAD

COVINGTON RIDGE ROAD
WESTPORT ROAD
WASHINGTON STREET
JACOB DRIVE
THIRD STREET

FIVE OAKS ROAD

24" Jacob Water Main



Greenhaven Pump Station and Tank Site

Explanation

- 24 inch Water Main
- Property Lines
- Roads

0 600 1,200 Feet

Water Treatment Plant and Greenhaven Pump Station and Tank Site

October 2007

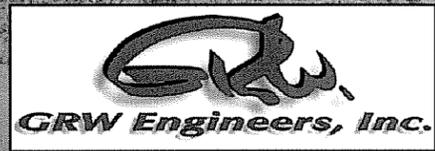


EXHIBIT V-4

located at the site and receive water from the high service transmission main. There are four existing 200-horsepower vertical turbine pumps, which deliver 3,500 GPM (5.0 MGD) with two pumps in service and an estimated 4,000 GPM (5.8 MGD) with three pumps in service.

There is a standby emergency generator at this station; however, it is not large enough to run even one pump. The generator and transfer switch should be replaced with larger equipment.

VI. Recommended Improvements

A. Wells

It is recommended that two additional wells be constructed on a site OCWD recently purchased immediately southwest of Well 4.

B. Raw Water Transmission Main

It is recommended that a second 24-inch raw water main be constructed from the vicinity of Wells 4, 10 and 11 to the water treatment plant. The length is approximately 4,800 feet. The location of the main is shown in Exhibit VI-1.

C. Raw Water Flow Monitoring

It is recommended that the existing raw water flow meter at the water treatment plant be replaced.

D. Chemical Feed Systems

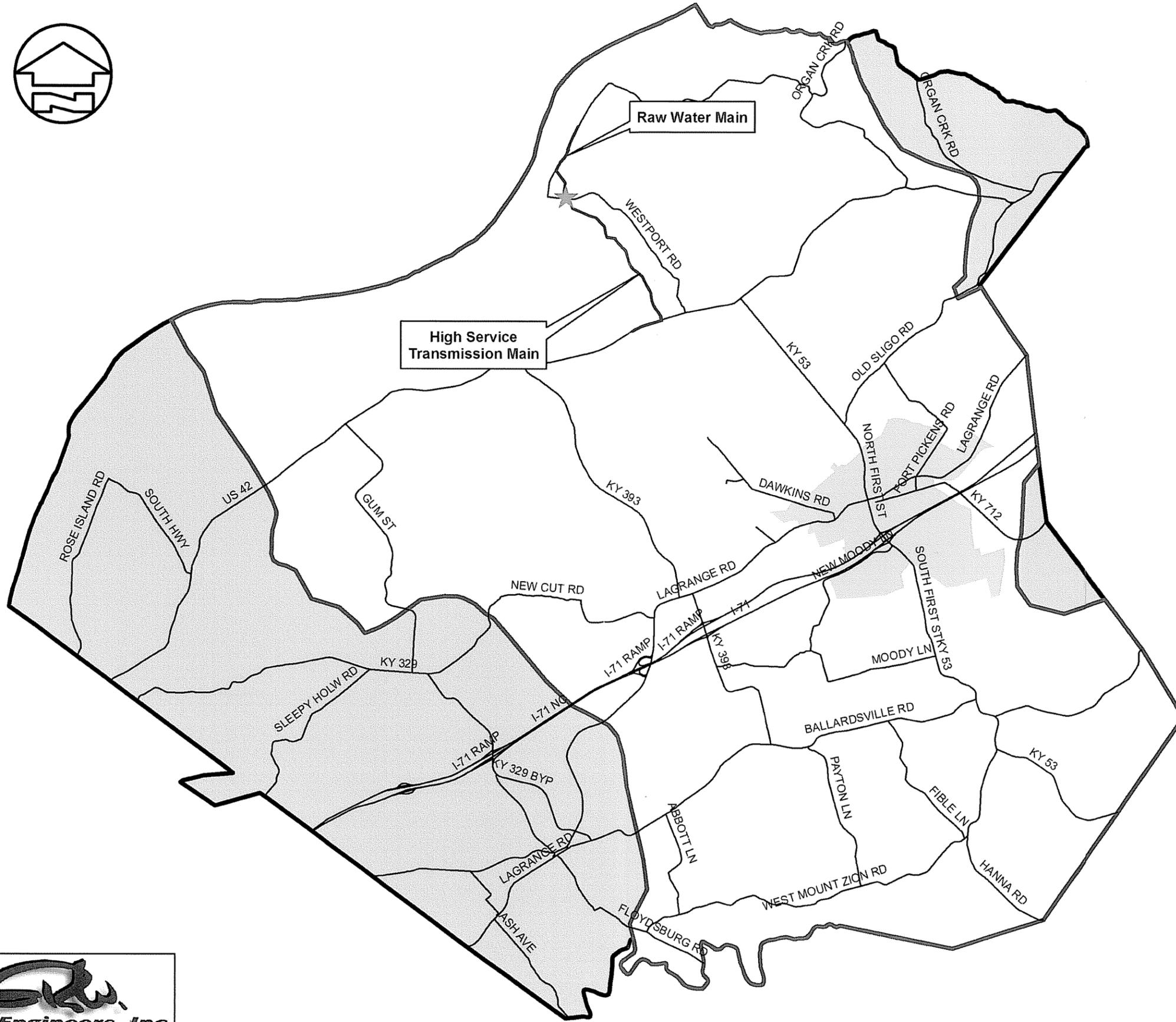
It is recommended that a new chemical feed building be constructed to house all chemicals. This will make the existing chemical feed area available for other uses and allow construction of adequate spill containment facilities.

It is recommended that a new bulk hypochlorite feed system be installed to eliminate the safety hazards associated with gaseous chlorine. A new bulk hydrofluosilicic acid feed system should also be provided in the new building.

The feed rate of all chemicals should be automatically varied with changes in the raw water flow rate.

E. Clearwells

The existing clearwell volume is adequate for the expanded plant. Baffles should be added to the clearwells to eliminate short-circuiting and improve disinfection effectiveness.



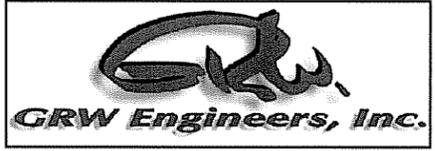
Explanation

- ★ OCWD Treatment Plant
- ▭ OCWD Service Area
- ▨ LaGrange Utilities Service Area
- ▩ Areas of Oldham County not Serviced by OCWD
- Roads

0 4,500 9,000
 Feet

Recommended Water Mains
 October 2007

EXHIBIT V1-1



Map Document: (I:\3257-OCWD Wells, RW, WTP\3257-01 Master Plan\Report\Prelim\at Eng Report for PSC\exhibit_V1-1.mxd) 10/25/2007 -- 9:59:26 AM

F. High Service Pumping

It is recommended that a second high service pump station be constructed. Three higher-pressure vertical turbine pumps should be installed for pumping around the Greenhaven pump station.

G. High Service Flow Metering

The existing high service flow meter that serves the existing pump station should be replaced. A second high service flow meter should be provided to meter flow from the new pump station.

H. High Service Transmission Main

It is recommended that a second high service transmission main be constructed to transmit the larger flow of water to the distribution system. This main will consist of about 14,500 feet of 36-inch pipe running cross-country to U.S. 42 and 2,800 feet of 30-inch pipe along U.S. 42. The location of the main is shown in Exhibit VI-1.

I. Instrumentation, Controls, and Telemetry

The existing radio based SCADA system should be expanded to include the additional well sites and the new high service pump station and clearwell.

J. Electrical and Standby Power

Two additional portable generators should be purchased to provide standby power service to the well field.

A separate electrical service should be provided to the new high service pump station for additional redundancy. A second standby power generator should be provided to operate at least two pumps in the new high service pump station. The existing generator should continue to be used to operate High Service Pump #1 in the existing pump station.

K. Garage for Portable Generators

The existing chlorine rooms should be converted to a garage bay to store two portable generators. The third generator can be stored in existing off-site storage space.

L. Storage

The existing fluoride and phosphorus feed room will be used for storage.

M. Greenhaven Pump Station

It is recommended that the existing standby power generator be replaced to enable one pump to be operated on standby power. The transfer switch should also be replaced.

VII. Opinion of Probable Cost for Recommended Project

The opinion of probable cost for the recommended project is presented in Table VII-1. Estimates of the construction costs for all improvements have been based on recent price quotations from manufacturers and suppliers, on the advice of construction contractors, based on industry-standard cost estimating manuals (i.e. - Means), and on previous prices for comparable construction. The estimated construction cost covers materials and equipment in place, and includes construction contractor's estimated profits and overhead.

Due to fluctuating interest rates and other various economic factors, it is extremely difficult to predict future construction costs. Therefore, all costs are Winter 2007 costs and do not include an inflation allowance.

**TABLE VII-1
 OPINION OF PROBABLE COST FOR RECOMMENDED PROJECT
 OLDHAM COUNTY WATER DISTRICT**

ITEM	COST
Construction Costs:	
Construct Two New Wells	\$490,000
Construct Raw Water Transmission Main	\$660,000
Construct Water Treatment Plant Expansion	\$3,800,000
Replace Greenhaven Pump Station Generator and Transfer Switch	\$200,000
Construct Water Transmission Mains	\$4,100,000
Subtotal – Construction Costs	\$9,250,000
Other Project Costs:	
Administrative and Legal Expenses	
Legal and Financing Related Costs	\$120,000
Easement Acquisition	\$175,000
Land for Well Site	\$325,000
Interest During Construction	\$400,000
Engineering Services	
Preliminary Engineering and Hydraulic Model	\$57,500
Design, Bidding, and Construction Administration	\$655,000
Inspection	\$378,000
Other Engineering Services	\$118,000
Subtotal – Other Project Costs	\$2,228,500
Contingency @ 10% of Construction Cost	\$925,000
Total Estimated Project Costs	\$12,403,500

VIII. Conclusions and Recommendations

It has been concluded, based on detailed evaluations and discussions with key staff members of the Oldham County Water District, that the projected water usage over a 20-year period warrants a water supply and treatment capacity of 13.0 MGD. It has been further concluded that the existing water treatment plant is not sufficient, in its current form, to meet current water usage, let alone the projected increase. Therefore, it is recommended that the Oldham County Water District initiate a program to upgrade and expand its facilities as outlined in Section VI of this report.