

Albuquerque Bernalillo County Water Utility Authority

Albuquerque/Bernalillo
County
Government Center
One Civic Plaza
Albuquerque, NM 87102

Agenda

Councilor Klarissa Peña, Chair
Commissioner Debbie O'Malley, Vice Chair
Mayor Richard J. Berry
Councilor Pat Davis
Commissioner Maggie Hart Stebbins
Commissioner Wayne Johnson
Councilor Trudy E. Jones
Trustee Pablo Rael

Thursday, November 16, 2017

5:00 PM

Vincent E. Griego Chambers

- 1. CALL TO ORDER
- 2. INVOCATION/PLEDGE OF ALLEGIANCE
- 3. APPROVAL OF MINUTES October 18, 2017
- 4. PROCLAMATIONS AND AWARDS
- 5. PUBLIC COMMENT
- 6. ANNOUNCEMENTS/COMMUNICATIONS
- A. Next Scheduled Meeting December 22, 2017 at 5:00 PM
- 7. INTRODUCTION (FIRST READING) OF LEGISLATION
- A. R-17-22 Authorizing an Agreement for Water Service to the Valle De Oro National Wildlife Refuge Headquarters/Visitor Center

*Immediate Action Requested

- 8. CONSENT AGENDA
- 9. APPROVALS
- A. R-17-20 Authorizing and Approving Submission of a Completed Application for Financial Assistance and Project Approval to the New Mexico Finance Authority for the Carnuel Wastewater System Improvements Project
- B. R-17-21 Supporting an Inventory of Known and Potential Groundwater Contamination Sites Within and Near the Albuquerque Bernalillo County Water Utility Authority Service Area Including Potential Threats to the

		Regional Aquifer
C.	R-17-22	Authorizing an Agreement for Water Service to the Valle De Oro National Wildlife Refuge Headquarters/Visitor Center
D.	<u>C-17-34</u>	Approving Recommendation of Award, P2018000003 Vulnerability Assessment

10. OTHER BUSINESS

A. OB-17-12 Water Report - Status Update for the Kirtland Air Force Base Bulk Fuels Facility Fuel Leak Corrective Action Activities

11. ADJOURNMENT

Visit Our Website at www.abcwua.org

NOTICE TO PERSONS WITH DISABILITIES: If you have a disability and require special assistance to participate in this meeting, please contact the Authority Office as soon as possible before the meeting date at 289-3100 or by the TTY at 1-800-659-8331.



Meeting Date: November 16, 2017 Staff Contact: Frank Roth, Senior Policy Manager

TITLE: R-17-20 – Authorizing and Approving Submission of a Completed

Application for Financial Assistance and Project Approval to the New

Mexico Finance Authority for the Carnuel Wastewater System

Improvements Project

ACTION: Recommend Approval

SUMMARY:

This resolution authorizes the Albuquerque Bernalillo County Water Utility Authority (Water Authority) to submit an application for funding from the New Mexico Finance Authority Local Government Planning Fund. The purpose of this application is to obtain financial assistance in the amount of \$50,000 to plan and design a gravity sanitary sewer system for the high priority area in the Carnuel community.

The community of Carnuel mostly obtains their water from private wells and disposal through septic systems and is in urgent need of public water and wastewater systems. In addition, the Carnuel community's private wells are shallow and often co-exist in the same areas with poorly functioning, aging septic systems which have led to nitrate contamination in many of the wells. This project will assist in improving water quality in the Carnuel community and the Tijeras watershed.

In November 2008, the Water Authority and the Carnuel Mutual Domestic Water Consumer Association entered into an agreement for the Water Authority to act as fiscal agent and extend water and wastewater infrastructure using federal and state grants and loans. The extension of the water system to the Carnuel community started in 2009 and three of the eight phases have been completed. However, to date, no wastewater system extension has been designed. The only wastewater infrastructure is a sewer force main that is located in NM 333 which will become the backbone of the Carnuel wastewater system. There have been several community meetings regarding the proposed wastewater system in Carnuel. At the June 20, 2017 public meeting, the community requested that the Water Authority proceed with obtaining funding to start the planning and design of the sanitary sewer system for the high priority area.

When the wastewater system is constructed, the Water Authority will own and operate the system. Residents who connect to the system will pay Water Authority Ordinance rates and fees. System expansion is guided by the Bernalillo County Tijeras Canyon/Carnuel Plan which identifies priority areas for water and wastewater service.

FISCAL IMPACT:

The Water Authority is requesting \$50,000 in grant funding.

ALBUQUERQUE BERNALILLO COUNTY WATER UTILITY AUTHORITY

BILL NO.

R-17-20

1 RESOLUTION 2 AUTHORIZING AND APPROVING SUBMISSION OF A COMPLETED APPLICATION 3 FOR FINANCIAL ASSISTANCE AND PROJECT APPROVAL TO THE NEW MEXICO 4 FINANCE AUTHORITY FOR THE CARNUEL WASTEWATER SYSTEM 5 IMPROVEMENTS PROJECT 6 WHEREAS, the Albuquerque Bernalillo County Water Utility Authority (the 7 "Governmental Unit") is a duly organized, created and formed pursuant to NMSA 1978, 8 § 72-1-10 and is a qualified entity under the New Mexico Finance Authority Act, 9 Sections 6-21-1 through 6-21-31, NMSA 1978 ("Act"); and 10 WHEREAS, the New Mexico Finance Authority ("Finance Authority") is 11 authorized pursuant to the Act, particularly Section 6-21-6.4 of the Act, to make grants 12 from the local government planning fund (the "Fund") to qualified entities to evaluate 13 and estimate the costs of implementing feasible alternatives for meeting water and 14 wastewater public project needs; and 15 WHEREAS, pursuant to the Act the Finance Authority has developed an 16 application procedure whereby the Governing Body may submit an application 17 ("Application") to the Finance Authority for planning grant financial assistance from the 18 Fund; and 19 WHEREAS, the governing body of the Governmental Unit (the "Governing 20 Body") desires to submit an Application for financial assistance from the Fund for a 21 Planning Document, as defined in the Rules Governing the Local Government Planning 22 Fund currently in effect and as specifically identified below, for the benefit of the 23 Governmental Unit; and 24 WHEREAS, the Governing Body intends to submit a Planning Document to 25 evaluate and estimate the costs of constructing a gravity sanitary sewer system for the 26 high priority area in the Carnuel community ("Project") for the benefit of the 27 Governmental Unit and its ratepayers and the Carnuel community; and

WHEREAS, the application prescribed by the Finance Authority to finance the Planning Document in whole with financial assistance from the Fund has been completed, submitted to, and reviewed by the Governing Body, and this Resolution approving submission of the completed Application to the Finance Authority for its consideration and review is required as part of the Application. BE IT RESOLVED BY THE WATER AUTHORITY: Section 1. That all lawful actions previously taken by the Governing Body and the Governmental Unit and their respective officers and employees in connection with the Application and the Project are hereby ratified, approved and confirmed. Section 2. That the completed Application submitted to the Governing Body is hereby approved and confirmed. Section 3. That the officers and employees of the Governmental Unit are hereby directed and requested to submit the completed Application to the Finance Authority, and are further authorized to take such other action as may be requested by the Finance Authority in connection with the Application and to proceed with arrangements for financing the Project. Section 4. All acts and resolutions in conflict with this Resolution are hereby

rescinded, annulled and repealed.

Section 5. This Resolution shall take effect immediately upon its adoption.



Meeting Date: November 16, 2017

Staff Contact: Rick Shean, Water Quality Hydrologist

TITLE: R-17-21 – Supporting an Inventory of Known and Potential

Groundwater Contamination Sites Within and Near the Albuquerque Bernalillo County Water Utility Authority Service Area Including

Potential Threats to the Regional Aquifer

ACTION: Recommend Approval

SUMMARY:

The Albuquerque Bernalillo County Water Utility Authority (Water Authority) staff requests approval for the Water Authority Governing Board to hire a consultant to prepare an inventory of known and potential groundwater contamination sites within and near the service area to understand the threat these sites pose to the regional groundwater resources and the Water Authority's drinking water supply. This project is being completed at the request of board members Commissioner Maggie Hart Stebbins and Councilor Pat Davis.

Water Authority staff will work with the Water Protection Advisory Board to create a scope of work and to prioritize sites to be considered by the chosen contractor for this inventory and threat analysis. Proposed activities to be performed will be description of the nature and extent of the contamination from the known or potential source of contamination, characterization of the contamination's properties, and potential fate and transport pathways and time of travel to nearby Water Authority production wells.

Information gathered from this project will be used to support the Water Authority's groundwater management plan, the water quality protection policy and action plan, and the groundwater operations planning.

The project will be performed and reported by June.

FISCAL IMPACT:

\$75,000 budgeted in FY-18 Operating Budget.

ALBUQUERQUE BERNALILLO COUNTY WATER UTILITY AUTHORITY

BILL NO. <u>R-17-21</u>

1	RESOLUTION
2	SUPPORTING AN INVENTORY OF KNOWN AND POTENTIAL GROUNDWATER
3	CONTAMINATION SITES WITHIN AND NEAR THE ALBUQUERQUE BERNALILLO
4	COUNTY WATER UTILITY AUTHORITY SERVICE AREA INCLUDING POTENTIAL
5	THREATS TO THE REGIONAL AQUIFER
6	WHEREAS, the Albuquerque Bernalillo County Water Utility Authority (Water
7	Authority) has prepared for its ratepayers a 100-year water resources management
8	strategy entitled, "Water 2120: Securing Our Water Future", which was authorized by
9	the Governing Board through the approval of R-16-12, directing staff to continue
10	implementing the Water Quality Protection Policy and Action Plan through Policy H of
11	Water 2120;
12	WHEREAS, the Water Authority has adopted the Water Quality Protection Policy
13	and Action Plan with the mission of ensuring the quality of our surface and groundwater
14	resources so that public health, quality of life, and economic vitality of this and future
15	generations are not diminished; and
16	WHEREAS, Policy H also directs the Water Authority to consider the occurrence,
17	fate and potential treatment of emerging contaminants in current and future water
18	supplies; and
19	WHEREAS, the Water Authority is committed to the proactive surveillance and
20	monitoring of known and potential sources of contamination threatening the drinking
21	water supply; and
22	WHEREAS, there are at least twenty known groundwater contamination sites in
23	the service area, including, superfund and state-lead cleanup sites, and several actively
24	monitored hazardous material and waste impoundments and groundwater
25	contamination sites on Kirtland Air Force Base related to historical activities, including
26	the Bulk Fuels Facility leak, and Sandia National Laboratory operations; and
27	WHEREAS, the Sandoval County Commission is considering an oil and gas
28	ordinance that has the potential to attract these activities closer to the Water Authority's

1	service area and introduce potential contamination to currently high-quality
2	groundwater; and
3	WHEREAS, the Water Authority continues to support the mission of the joint
4	City/County/Water Authority work on the Water Quality Protection Policy and Action
5	Plan (WQPPAP) to ensure the quality of surface and groundwater resources; and
6	WHEREAS, the City of Albuquerque, Bernalillo County and Water Authority
7	jointly cooperate through the Water Protection Advisory Board in protecting surface and
8	groundwater in the region.
9	BE IT RESOLVED BY THE WATER AUTHORITY:
10	Section 1. That an inventory of known groundwater contamination sites within
11	and adjacent to the Water Authority's service area be prepared.
12	Section 2. That potential groundwater contamination threats within and adjacent
13	to the Water Authority's service area be identified.
14	Section 3. That existing information of known and potential groundwater
15	contamination threats be utilized and a report and recommendations which may be
16	used in support of the groundwater management plan and/or update to the WQPPAP
17	be prepared.
18	Section 4. That the findings of this process be presented to the Water Authority
19	Board by June 2018.
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Meeting Date: November 16, 2017

Staff Contact: Kristopher Cadena, Principal Engineer, Utility Development

TITLE: R-17-22 – Authorizing an Agreement for Water Service to the Valle De

Oro National Wildlife Refuge Headquarters/Visitor Center

ACTION: Approval - Immediate Action is Required to Approve on November 16th

SUMMARY:

The development is located along the west side of 2nd St., just south of the Barr Spur Drain, in an unincorporated area of Bernalillo County. The property is currently undeveloped land owned by the US Fish and Wildlife Service. The development is for headquarters and a visitors' center.

The property lies within Pressure Zone 1E in the Hubbell Trunk.

Water service is contingent on the developer extending the waterline from existing infrastructure to cover the frontage of the subject property.

The developer will also be required to connect to the non-potable waterline that is to be installed by the Albuquerque Bernalillo County Water Utility Authority.

Due to the distance and elevation difference to the existing sanitary sewer collection system, sanitary sewer service is not available. An onsite septic system shall be provided independently by the developer in full conformance with New Mexico State Law including Title 20 Chapter 7 Part 3 Environmental Protection, Waste Water and Water Supply Facilities, Liquid Waste Disposal and Treatment.

All services provided within the development will be subject to current Utility Expansion and Water Supply Charges.

FISCAL IMPACT:

None.

ALBUQUERQUE BERNALILLO COUNTY WATER UTILITY AUTHORITY

BILL NO. R-17-22 1 RESOLUTION 2 **AUTHORIZING AN AGREEMENT FOR WATER SERVICE TO THE VALLE DE ORO** 3 NATIONAL WILDLIFE REFUGE HEADQUARTERS/VISITOR CENTER 4 WHEREAS, the U.S. Fish and Wildlife Service owns undeveloped land located 5 along the west side of 2nd St., just south of the Barr Spur Drain and desires to construct 6 its headquarters and visitor center for the Valle De Oro National Wildlife Refuge; and 7 WHEREAS, the property which is located outside the service area of the 8 Albuquerque Bernalillo County Water Utility Authority (Water Authority) will require a 9 development agreement for the extension and/or connection of water and sewer lines to 10 the Water Authority's water and sewer system; and 11 WHEREAS, the Water Authority's Water and Wastewater System Expansion 12 Ordinance requires that new service developed outside the Water Authority's service 13 area will incur no net expense to the Water Authority and be subject to provisions of 14 relevant updated planning documents as approved by the City of Albuquerque and/or 15 Bernalillo County; and BE IT RESOLVED BY THE WATER AUTHORITY: 16 17 Section 1. The U.S. Fish and Wildlife Service (USFWS) will obtain all permits, 18 assurances, and approvals from the Water Authority and the Bernalillo County 19 development/design review process. Construction of water and/or sewer lines shall be 20 in conformance with the plans approved by the Water Authority and all applicable plans, 21 specifications, requirements, and standards of the Water Authority. 22 Section 2. The expansion of the System shall incur no net expense to the Water 23 Authority and be subject to current Utility Expansion and Water Supply Charges. 24 Section 3. USFWS will be responsible for close coordination of the project with 25 the Water Authority during the design and construction phases, including the review of

the design details during the design process, and the approval of specifications and

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27

contract documents.

Section 4. The Executive Director is authorized to enter into the agreement with USFWS for the provision of water and sewer service.

DEVELOPMENT AGREEMENT VALLE DE ORO NATIONAL WILDLIFE REFUGE HEADQUARTERS/VISITOR CENTER

Albuquerque Bernalillo County Water Utility Authority, a New Mexico political subdivision, ("Water Authority") and US Fish and Wildlife Service (USFWS), a Federal agency (together, "Parties"), agree as follows:

1. Recitals

- **A.** USFWS is the "Developer" and owner of certain real property located between 2nd St. and the Barr Interior Drain just south of the Barr Spur Drain in an unincorporated area of Bernalillo County. The property is comprised of Tract 2-A and Tract 3-A (Plat of Tracts 2-A and 3-A Lands of VG Farms) and consists of approximately 84 acres that is currently zoned A-1 for residential/agricultural use (collectively, the "Property"). The Property is more particularly described and shown on **Exhibit A** attached hereto and incorporated herein by reference.
- **B.** The legal description of the Property is as follows: Tract 2-A and Tract 3-A (Plat of Tracts 2-A and 3-A Lands of VG Farms)
- **C.** The Property is located in Pressure Zone 1E of the Hubbell Trunk.
- **D.** The Parties desire to agree upon terms and conditions pursuant to which the Water Authority will provide only potable and non-potable water service, and not sanitary sewer service to the Property.
- **E.** The Developer desires to construct, or cause to be constructed, extensions of existing public potable water lines and appurtenant infrastructure (collectively, "Line Extensions") under all applicable plans, specifications, requirements, and standards of the Water Authority.
- **F.** The Developer will also be required to connect to the non-potable waterline that is to be installed by the Water Authority.
- **G.** Due to distance and elevation difference to the existing sanitary sewer collection system, a routine sanitary sewer line extension from the north to serve the Property is not possible due to the relative site elevations. An onsite septic system shall be provided independently by the Developer in full conformance with New Mexico State Law including Title 20 Chapter 7 Part 3 Environmental Protection, Waste Water and Water Supply Facilities, Liquid Waste Disposal and Treatment.
- **H.** Serviceability Statement #160517 for the Property reflecting the Line Extensions and other matters referred to in this Agreement is attached hereto

- as **Exhibit B** and incorporated herein by reference and made a term of this agreement.
- **I.** The Developer, via the design build contract, will extend the waterline as shown as the water line extension on the Serviceability Statement.
- **J.** The Line Extensions referenced in this Agreement are <u>not</u> considered a Master Plan lines by the Water Authority. As such, reimbursement of construction costs associated with the Line Extensions will not be available through water and sewer UEC (defined below in Section 3.B) reimbursements.

2. Design and Construction of the Waterlines

- A. The Developer will provide the Water Authority with definitive designs and plans of the Line Extensions which will include estimates of all costs and expenses. The Developer will not connect the Line Extensions to the existing water lines within the Bernalillo County ("County") public rightof-way or within public easements until the Water Authority has approved the Line Extensions. The Water Authority shall provide approval within a reasonable time after the submissions of the Developer's Line Extension designs and plans. The Developer will convey, at no expense to the Water Authority, all Line Extensions that have been approved and accepted by the Water Authority, free and clear of all liens, claims, and encumbrances for the construction, operation, and maintenance of the Line Extension. The Water Authority's approval and acceptance of the Line Extensions shall not be unreasonably withheld. The Developer shall provide all necessary licenses for the Line Extensions at locations reasonably acceptable to the Developer.. The Developer will obtain all necessary permits, assurances, and approvals from the Water Authority and County, and the Developer will deliver a copy of such permits, assurances, and approvals to the Water Authority prior to the start of construction. Construction will be handled through the Water Authority work order process. The Developer and the Water Authority will execute an Agreement for the Construction of Water **Improvements**
- **B.** The Developer will complete, or cause to be completed, construction of the Line Extensions as approved by the County and the Water Authority, and in conformance with all applicable plans, specifications, and standards of the City, County and the Water Authority.
- C. The Developer will be responsible for close coordination of the project with the Water Authority during the design and construction phases, including review of design details, during the design process, and the approval of specifications and contract documents. The Water Authority will review and approve in a timely manner the design plans for construction and estimated cost, to ensure the designs meet Water Authority standards and

- follow the guidance provided in the City's Development Process Manual ("DPM") and/or applicable Water Authority Design Manuals.
- **D.** To the extent relevant and applicable and to the extent there is no conflict with the terms of this Agreement, the usual procedures and documentation, including the Procedure "B", as defined in the Subdivision Ordinance and the DPM of the City, will be followed and used for the Line Extensions.

3. Service

- **A.** The Developer shall comply with the Water Authority's Water and Sewer System Expansion Ordinance, as amended from time to time.
- **B.** The Developer or its successor shall pay Utility Expansion Charges (UEC) and the Water Supply Charges (WSCs) at the rates that are imposed at the time of a service connection, as provided in the Water Authority's Water and Sewer Rate Ordinance, as amended from time to time.
- **C.** Pursuant to Water Authority Resolution No. R-05-13, the Developer agrees that it will incorporate water conservation guidelines that will seek to achieve water usage of no more than 180 gallons per household which is equivalent to seventy-five (75) gallons per capita per day.
- **4. Termination.** If construction of the Line Extensions by the Developer has not been completed and accepted by the Water Authority within seven years of the effective date of this Agreement, this Agreement shall automatically terminate, and the Water Authority and the Developer shall have no further rights, obligations, or liabilities with respect to this Agreement, unless otherwise agreed in writing.
- **5. Water for Construction.** During the construction of the Line Extensions, the Developer agrees to utilize alternative methods as approved by the City of Albuquerque's Air Quality Division for dust abatement and control including compost from the Water Authority, if economically feasible. The Developers may purchase water for construction from the Water Authority from the nearest approved fire hydrant in accordance with the Water Authority's Water and Sewer Rate Ordinance. Water purchased from the Water Authority shall be used only for construction.
- **6. Liability**. To the extent provided by law, the Parties hereto shall each be responsible and liable for their own acts, omissions, and negligence; and the acts, omissions and negligence of their respective employees, agents and contractors; provided, however, that nothing in this Agreement shall be construed to be an admission of fault or liability, and nothing herein shall limit the defenses and immunities legally available to each party as against each other party or others. The Developer's liability under this Agreement is subject to the limitations of the Federal Tort Claims Act, 28 U.S.C. §§ 2671, et seq., or other applicable law. No party hereto shall be considered to be the agent, representative, or partner of any other party.

- **7. Representations and Warranties of Developer.** The Developer represents and warrants that:
 - **A.** Developer is a US Federal Government Agency.
 - **B.** Developer has all the requisite power and authority to enter into this Agreement and bind the Developer under the terms of the Agreement; and
 - **C.** The undersigned officer of the Developer is fully authorized to execute this Agreement on behalf of the Developer.
- **8. Notices.** Any notice to be given under this Agreement will be in writing and will be deemed to have been given when deposited with the United States Postal Service, postage prepaid and addressed as follows:

If to the Water Authority:

Mark S. Sanchez Executive Director Albuquerque Bernalillo County Water Utility Authority One Civic Plaza, Room 5012 Albuquerque, New Mexico 87102

If to Developer:

US Fish & Wildlife Service

Attn: Jennifer Owen-White, Manager, Valle de Oro National Wildlife Refuge Address: U.S. Fish and Wildlife Service - Southwest Region P.O. Box 1306
Albuquerque, New Mexico 87103-1306

- **9. Assignment.** This Agreement will not be assigned without the prior written consent of both the Water Authority and the Developer.
- **10. Disputes and Venue**. The parties agree that if a dispute arises, the Developer and the Water Authority will promptly use their best efforts to resolve the dispute in an informal fashion through communication and consultation, or other forms of non-binding alternative dispute resolution that are mutually acceptable to the parties. The parties agree that the venue to begin litigation of any disputes stemming from this Agreement is a Federal court with appropriate jurisdiction.
- **11. Headings.** The headings used in this Agreement are for convenience only and shall be disregarded in interpreting the substantive provisions of the Agreement.
- **12. Binding Effect.** This Agreement binds and benefits the Water Authority and their successors, assigns, and transferees and the Developer and their successors, assigns and transferees.

- 13. Severability. If any provision of this Agreement is determined by a court of competent jurisdiction to be void, invalid, illegal, or unenforceable, that portion will be severed from this Agreement and the remaining parts will remain in full force as though the invalid, illegal, or unenforceable portion had never been a part of this Agreement.
- **14. Integration; Interpretation.** This Agreement contains or expressly incorporates by reference the entire agreement of the parties with respect to the matters contemplated by this Agreement and supersedes all prior negotiations. This Agreement may only be modified in writing executed by both parties.
- **15. Approval.** This Agreement is subject to the approval of the Board of Directors of the Water Authority and will not become effective until approved by the Water Authority.
- **16. Effective Date.** The effective date of this Agreement is the date last entered below.
- **17. Expenditures Contingent on Availability of Funds**. The expenditure of any funds by the United States or the performance of any work by the United States shall be contingent upon appropriations of money by Congress or adequate allotments of available funds. Liability of the United States under this Agreement shall continue in such cases only as pursuant to the applicable laws and statutes of the United States.
- **18. Officials not to Benefit**. No member of or delegate to Congress or resident commissioner shall be admitted to any share or part of this Agreement or to any benefit that may arise herefrom; but this restriction shall not be construed to extend to this Agreement if made with a corporation or company for its general benefit.
- **19.** <u>No Waiver.</u> No waiver of any provision of this Contract shall be deemed to constitute or shall constitute a waiver of any other provisions hereof, whether or not similar, nor shall any waiver constitute a continuing waiver. No waiver shall be binding unless executed in writing by the party making the waiver.

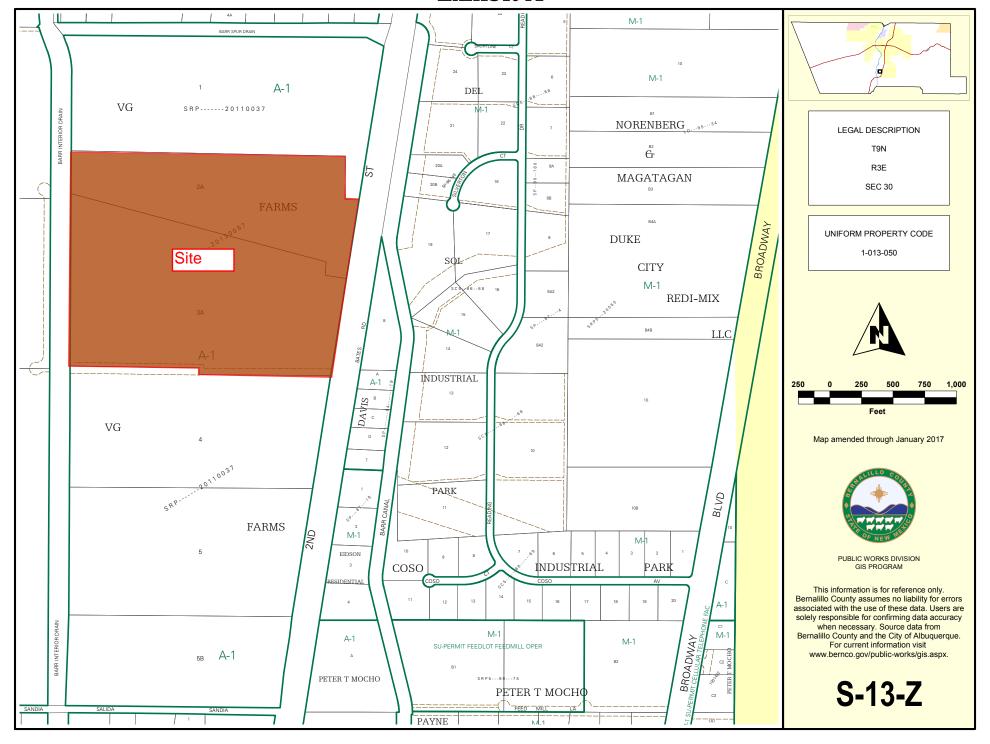
In Witness Whereof, the parties hereto have executed this Agreement on the dates entered below.

Albuquerque Bernalillo County Water Utility Authority		US Fi	Developer US Fish & Wildlife Service a Federal Agency		
By:	Mark S. Sanchez Executive Director	By:	Jennifer Owen-White, Manager Valle de Oro NWR		
Date:		Date:			

ACKNOWLEDGEMENTS

STATE OF NEW MEXICO)) ss	
COUNTY OF BERNALILLO)	
This instrument was acknowledged	l before me on,	, 20 by
	of of	a npany.
	Notary Public	
My Commission Expires:		
STATE OF NEW MEXICO)	
COUNTY OF BERNALILLO) ss)	
This instrument was acknowledge Sanchez, Executive Director of Authority, a New Mexico politic	f the Albuquerque Bernalill	
My Commission Expires:	Notary Public	

Exhibit A



VICINITY MAP (S-13) NO SCALE VORFYRERG

SUBDIVISION DATA

- 1. Zone Atlas Index No. S-13
- 2. Gross Subdivision Acreage: 83.7296 Acres
- 3. Net Subdivision Acreage: 82.4491 Acres
- 4. Total Number of Lots created 2 -
- 5. Miles of road dedicated: -0-
- 6. Current Zoning: A-1

PURPOSE OF PLAT

This plat has been prepared for the purpose of adjusting the interior lot line between two existing parcels.

- 1. Bearings shown on this plat are New Mexico State Plane Grid Bearings, Central Zone,
- 2. Perimeter distances are field measurements were made on the ground prorated between
- 3. A grading and drainage plan prepared by an engineer registered in the State of New Mexico may be required with future development of these lots.
- 4. Cross lot drainage must not be increased or impacted by development of these lots.
- 5. These lots must accept storm water runoff from adjacent roadways and properties as it currently exists.
- 6. No mass site grading, clearing or grubbing is allowed without an approved grading

SEE SHEET 2 OF 2 FOR EASEMENT NOTES

COUNTY CLERK RECORDING LABEL HERE

SURVEY DESCRIPTION:

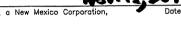
Tracts numbered Two (2) and Three (3) of LANDS OF VG FARMS, Bernalillo County, New Mexico, as the same are shown and designated on the plat thereof, filed in the Office of the County Clerk of Bernalillo County, New Mexico, on March 26, 2012, in Plat Book 2012C, Page 38, and being more particularly described as follows:

BEGINNING at the Northwest corner of the parcel herein described, being a point on the Easterly Right-of-way line of the Barr Interior Drain, from whence the ACS Monument 1-R12 (x=1,513,155.994, y=1,450,434.124, NMSP Central Zone, NAD 83) bears N 08 34' 27" W, 962.74 feet distant; THENCE leaving said Eastery Right-of-way line, S 88' 52' 29" E, 2145.24 feet; THENCE S 01' 07' 31" W, 339.76 feet; THENCE S 88° 52' 29" E, 109.85 feet to the Northeast corner, being a point on the Westerly Right-of-way line of Second Street, SW; THENCE along said Westerly Right-of-way line, S 09' 08' 40" W, 1390.28 feet to the Southeast corner; THENCE leaving said Westerly S 09' 08' 40" W, 1390.28 feet to the Southeast corner; THENCE leaving soid Westerly Right-of-way line, N 89' 37' 21" W, 1023.73 feet; THENCE N 00' 49' 07" E, 54.16 feet; THENCE N 89' 10' 53" W, 1013.37 feet to the Southwest corner, being a point on said Easterly Right-of-way line; THENCE along said Easterly Right-of-way line of the Barr Interior Drain, N 00' 18' 45" E, 1681.25 feet to the point of beginning and

FREE CONSENT AND DEDICATION

The division of the land described hereon and granting of all public easements is with the free consent and in accordance with the desires of the undersigned owner. Soid owner warrants holding complete and indefeasible title in fee simple to the land as shown replatted hereon.

ent. VG Forms Inc., a New Mexico Corporation,



OFFICIAL SEAL OFFICIAL SEAL Timesty R. Johnson

ACKNOWLEDGMENT

STATE OF NEW MEXICO)

COUNTY OF BERNALILLO) ss On this 13 Today of November, 2013, the foregoing instrument was acknowledged

before me by Dudley Price, President, VG Farms Inc., a New Mexico Corporation, on behalf of

PLAT OF TRACTS 2-A AND 3-A LANDS OF VG FARMS

BERNALILLO COUNTY, NEW MEXICO

A REPLAT OF TRACTS 2 AND 3, LANDS OF VG FARMS WITHIN SECTION 30, T. 9 N., R. 3 E., N.M.P.M. BERNALILLO COUNTY, NEW MEXICO

NOVEMBER 2013

APPROVALS as specified by the County of Bernalillo Subdivision Ordinance:

ROJECT NO.: SRP 2013-0057	
my	12-9,2013
Bernalillo Coupty Development Review Authority, Chair	Date
Them a ken	1/14/13
Bernalillo County Zoning	Date
Frederick a. Hubes	11/14/2013
Bernalillo County Environmental Health	Date
Morrister 8. 2	11/14/2013
Bernglillo County Public Works Department	Date
Charles	14 NOV 13
Bernalillo County Fire Marshal	Date
nla	
A.B.C.W.U.A.	Date
Live & loston	11-13-13
City Surveyor	Date
A DROD	12-6-13

APPROVED on the condition that all rights of the Middle Rio Grande Conservancy District in easements, rights of way, assessments and liers, are fully reserved to sold District, and that if provision for irrigation source and easements are not provided for by the subdivider for the subdivision, addition, or plat, said District is absolved of all obligations to furnish irrigation waters and services to any portions thereof, other than from existing turnouts.

DATE 12-6-13

SURVEYOR'S CERTIFICATE

I, Thomas D. Johnston, licensed as a Professional Surveyor under the laws of the State of New Mexico, do hereby certify that this plat was prepared by me or under my supervision, that I am responsible for this plat that it shows all easements of the recorded plat and made known to me by the title company, utility companies or by the owner of record, meets the minimum standards for monumentation and surveys of the Bernalilla County Subdivision Ordinance, and meets the Minimum Standards for Land Surveys as adopted by the New Mexico State Board of Registration for Professional Engineers and Surveyors, effective May 1, 2007 and is true and correct to the best of my knowledge and belief. to the best of my knowledge and belief





330 LOUISIANA BLVD., N.E. ALBUQUERQUE, N.M. 87108 PHONE: (505) 255-2052 FAX: (505) 255-2887

INDEXING INFORMATION FOR COUNTY CLERK DRAWN:
OWNER:
VG FARMS INC. LOCATION: SECTION 30 T. 9 N., R. 3 E., N.M.P.M.

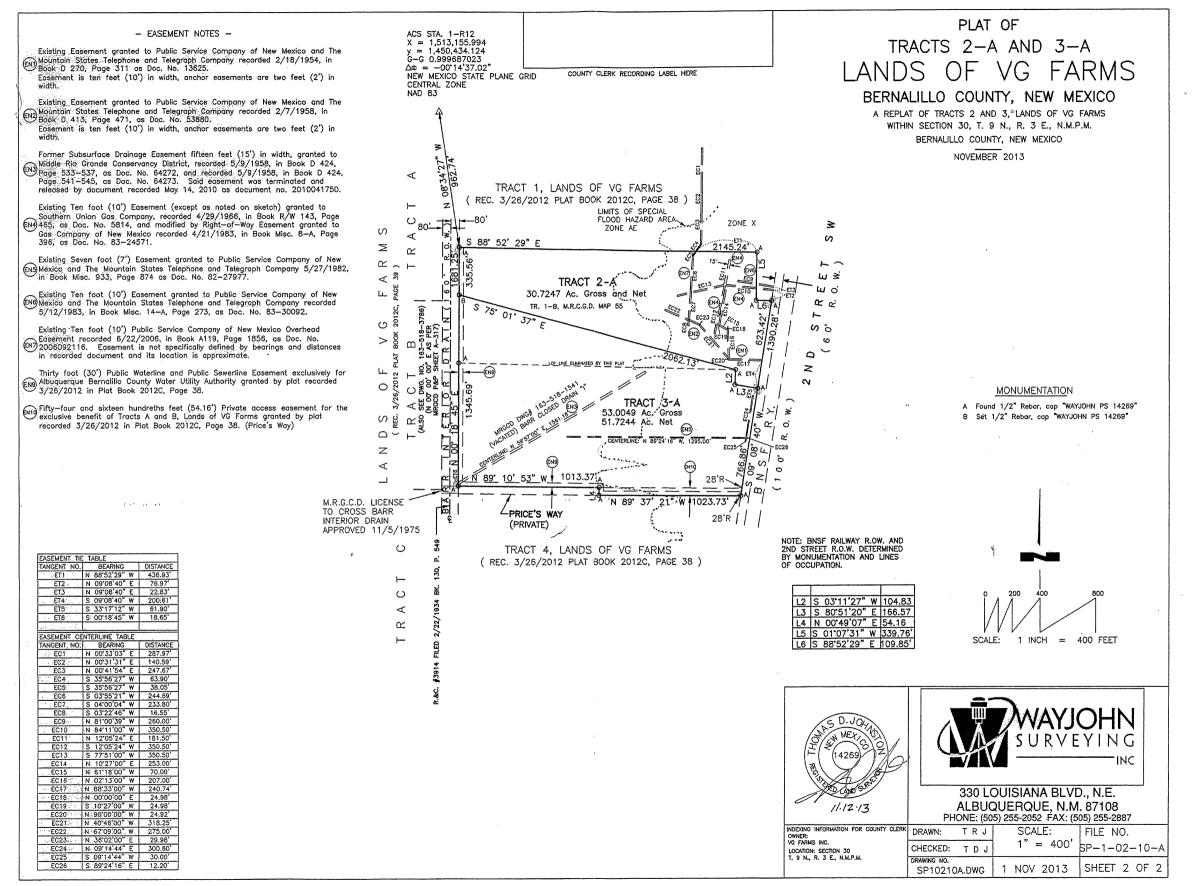
JK. 2013C, Ph. 136, TRJ SCALE: FILE NO. 1" = 400' | SP-1-02-10-1CHECKED: T D J DRAWING NO. 1 NOV 2013 | SHEET 1 OF 2 SP10210A.DWG

DOC# 2013130794

THIS IS TO CERTIFY THAT TAXES ARE CURRENT AND PAID ON UPC# 1 013 050 111 392 20130, 1 013 050 109 306 20125 PRICES VALLEY GOLD DAIRIES INC BERNAULLO COUNTY TREASURER'S OFFICE 12 9 13

FOR BERNALILLO COUNTY TREASURER'S OFFICE USE ONLY

12/99/2013 01:12 PN Page: 1 of 2 htyPLAT R:\$25.00 6: 2013C P: 0136 M. Toulous Olivere, Bernalillo Cou



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112/199/2013 01:12 PM Page: 2 of 2
112/199/2013 01:13 PM: 0136 PM: Toulous Olivere, Bernalillo Cou



September 6, 2016

Chair Trudy E. Jones City of Albuquerque Councilor, District 8

Vice Chair
Art De La Cruz
County of Bernalillo
Commissioner, District 2

Richard J. Berry City of Albuquerque Mayor

Pat Davis City of Albuquerque Councilor, District 6

Maggie Hart Stebbins County of Bernalillo Commissioner, District 3

Debbie O'Malley County of Bernalillo Commissioner, District 1

Ken Sanchez City of Albuquerque Councilor, District 1

Ex-Officio Member Pablo R. Rael Village of Los Ranchos Board Trustee

Executive Director Mark S. Sanchez

Website www.abcwua.org

Jeffrey Johns
US Fish & Wildlife Service
PO Box 1306
Albuquerque, New Mexico 87103

RE: Water and Sanitary Sewer Serviceability Statement #160517
Project Name: Valle De Oro National Wildlife Refuge
Project Location: 7851 2nd Street SW - Zone Atlas Map: S13/S12

Dear Mr. Johns:

Project Information: The subject site is located between 2nd St. and the Barr Interior Drain just south of the Barr Spur Drain in an unincorporated area of Bernalillo County. The property is comprised of Tract 2-A and Tract 3-A (Plat of Tracts 2-A and 3-A Lands of VG Farms) and consists of approximately 84 acres that is currently zoned A-1 for residential/agricultural use. The property lies within the Pressure Zone 1E in the Hubbell trunk. The request for information indicates plans to construct administrative offices, visitor center space, multi-use classroom/public space totaling approximately 11,000 square feet that will also include a 1,710 square feet maintenance building with all associated storage, work areas, parking lots, green house, garden trails and related site improvements for future use.

Development Agreement: Pursuant to the System Expansion Ordinance, this property is outside of the Water Authority service area and the Water Authority Board must approve a Development Agreement to serve this property and establish requirements as a condition of service. Contact Utility Development in regards to Development Agreements.

Water Supply Charge: All developments located outside of the Water Authority's service area will be assessed a Water Supply Charge (WSC) as provided in the Water Authority's Water and Sewer Rate Ordinance for the development of new water resources, rights and supplies necessary to serve the development. The WSC shall not be used for reimbursement of master planned facilities.

Existing Conditions: Water infrastructure in the area consists of the following:

- 36 inch concrete cylinder transmission main (project #26-7565.81-08) along the Barr Spur Drain
- Eight inch PVC stub (project #26-7565.81-08) extending south from the existing 36 inch transmission line located approximately at the midpoint of the northern property line of Tract 1.
- Ten inch PVC stub (project #26-7565.81-08)) extending south from the existing 36 inch transmission line located along 2nd St. near the northeast corner of Tract 1.
- 16 inch AC stub (project #09-002-84) located approximately 1,500 feet north along 2nd St. at the intersection of Lagunitas La.

Sanitary sewer infrastructure in the area consists of the following:

 Eight inch PVC collector line (project #26-2932.86) along Clark Rd. located approximately 3,000 feet north of the subject site.

Water and Sewer Service: New metered water service to the property can be provided contingent upon a developer funded project which extends the existing ten inch distribution stub south along 2nd St., covering the entire eastern property frontage of the tracts being developed (Tracts 2A and 3A). The required development agreement will also include the requirement of the extension of the aforementioned waterline along 2nd St. to cover the entire eastern property frontage of the remaining tracts (Tracts 4 and 5). Service is also contingent upon compliance with the Fire Marshal's instantaneous fire flow requirements. Water service will not be sold without adequate fire protection. Water service will only be sold in conjunction with sanitary sewer service.

Sanitary sewer service can be provided contingent upon a developer funded project to extend a collector line along 2nd St. to cover the property frontage of the tracts being developed (Tracts 2A and 3A), which can discharge to the existing sanitary sewer system located approximately 3,000 feet north along Clark Rd. if grades allow. The required development agreement will also include the requirement to extend the sanitary sewer collector line south to cover the eastern property frontage of the remaining tracts (Tracts 4 and 5). A study shall be completed for sizing the sanitary sewer so that it also takes into account other properties within the basin. All food service establishments must install a grease trap upstream of the domestic private sewer connection prior to discharge into the public sanitary sewer lines. Any deviations shall be coordinated with Utility Development.

Cross Connection Prevention: Per the Cross Connection Ordinance, all new non-residential premises must have a reduced pressure principle backflow prevention assembly approved by the Water Authority and installed at each domestic service connection at a location accessible to the Water Authority. All new fire line services to fire protection systems shall be equipped with a reduced pressure principal backflow prevention assembly approved by the Water Authority and Fire Marshal having jurisdiction at each service connection. A double check valve assembly approved by the Water Authority and Fire Marshal having jurisdiction may be installed instead of a reduced pressure backflow prevention assembly provided the fire protection system contains ANSI/NSF Standard 60 or 61 water piping throughout the entire fire protection system, the fire sprinkler drain discharges into atmosphere, and there are no reservoirs, fire department connections, connections from auxiliary water supplies, antifreeze nor other additives. The Water Authority requests that all backflow (containment) devices be located above ground just outside the easement or roadway right-of-way. Contact Cross Connection at 289-3439 for more information.

Fire Protection: The instantaneous fire flow requirements for the subject property were not submitted in the request for availability; therefore, this statement may not be complete and/or valid at the time of future construction. All new required hydrants as well as their exact locations must be determined through the Bernalillo County Fire

Mr. Jeffrey Johns US Fish and Wildlife Service September 6, 2016 Page 3

Marshal's Office and verified through the Utility Development Office prior to sale of service.

Easements: Exclusive public water and sanitary sewer easements are required for all public lines that are to be constructed outside of any dedicated Rights-of-Way. A minimum width easement of 20 feet is required for a single utility and 25 feet for water and sewer both within the same easement. Easements for water meters need to be five feet by five feet and include the length of the water service if located on private property. Actual easement widths may vary depending on the depth of the lines to be installed. Acceptable easements must be documented prior to approval of service.

Pro Rata: As described in this statement, the extension of public water and sanitary sewer lines may be eligible for partial reimbursement through the Pro Rata process as detailed in the Water Authority Water and Wastewater System Expansion Ordinance. Pro Rata is not owed and the property can utilize the services available upon completion of the requirements of this statement to connect to water and sanitary sewer.

Design and Construction of all required improvements will be at the developer / property owner's expense. Improvements must be coordinated through the Bernalillo County Department of Public Works and Water Authority Work Order process. Designs must be by a licensed, New Mexico registered professional engineer. Construction must be by a licensed, bonded, public utility contractor.

Costs and Fees: In addition to installation and construction costs, any new metered water services will be subject to both water and sanitary sewer Utility Expansion Charges (UEC) payable at the time of service application. All charges and rates collected will be based on the ordinances and policies in effect at the time service is actually requested and authorized.

Water Use: When metered water service becomes available to this site, the Water Authority is ready, willing, and able to provide the maximum annual requirement for the subject subdivision/project for a period of at least 70 years as required by the Bernalillo County Subdivision Ordinance. However, the Water Authority is also committed to meeting water conservation goals and requirements. Accordingly, all new development utilizing Water Authority services are subject to the requirements for water usage and water conservation requirements as defined by the Water Authority. Where available, outdoor water usage shall utilize reclaimed water. All new commercial developments shall be subject to the requirements for water usage and water conservation requirements as defined by the Water Authority, particularly the Water Waste Ordinance (O-07-13), Water Conservation Large Users Ordinance and Water Conservation Water by Request Ordinance.

Closure: This statement only provides details of infrastructure that is available and potential precursors to development for the proposed development. For service to be provided, a Board approved development agreement must supplement this serviceability, therefore causing this serviceability to be in effect for a period of one year upon approval of the development agreement. Under no circumstances does this serviceability commit to service without the above mentioned conditions. Changes in the proposed development may require reevaluation and should be brought to the attention of the Utility Development Section of the Water Authority as soon as possible.

Mr. Jeffrey Johns US Fish and Wildlife Service September 6, 2016 Page 4

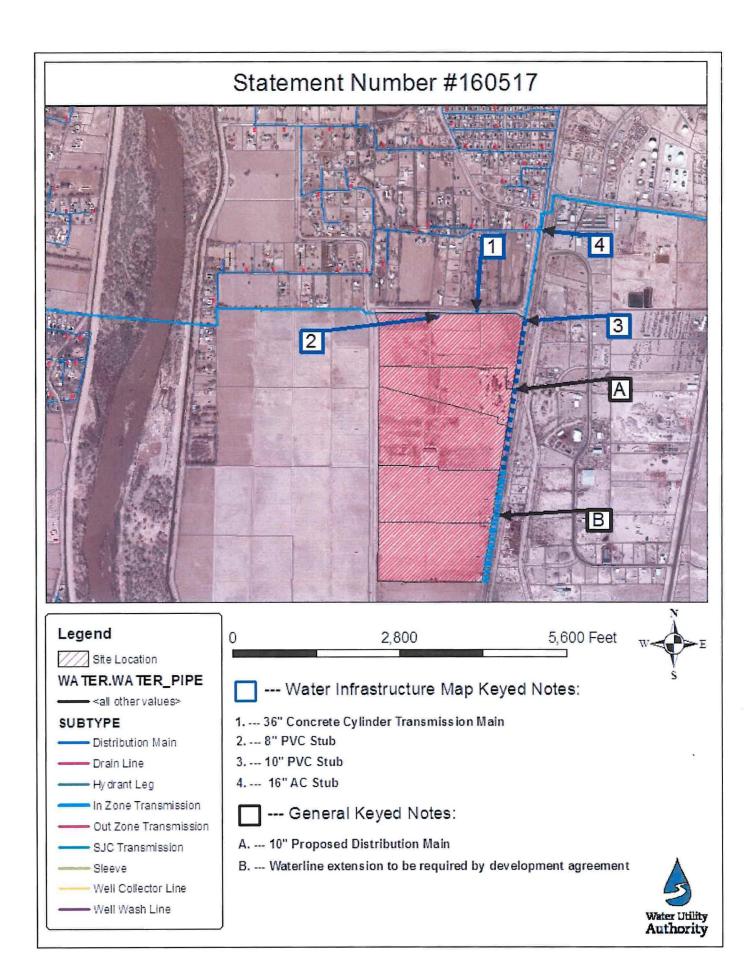
Please feel free to contact the Mr. Kristopher Cadena in our Utility Development Section at (505) 289-3301 or email at kcadena@abcwua.org if you have questions regarding the information presented herein or need additional information.

Sincerely,

Mark S. Sanchez Executive Director

Enclosures: Infrastructure Maps (2)

f/ Serviceability 160517



Statement Number #160517 Legend 2,800 5,600 Feet Site Location Sewer Pipe

<all other values>

SUBTYPE

- COLLECTOR
- FORCE MAIN
 - INTERCEPTOR
- VACUUM LINE

- --- Sanitary Sewer Infrastructure Map Keyed Notes:
- 1. --- 8" PVC Collector Line
- --- General Keyed Notes:
- A. --- Proposed Sanitary Sewer Collector Line
- B. -- Sanitary Sewer line extension to be required by development agreement





Meeting Date: November 16, 2017

Staff Contact: Charles S. Leder, P.E., Engineering Division Plant Manager

TITLE: C-17-34 – Approving Recommendation of Award, P2018000003

Vulnerability Assessment

ACTION: Recommend Approval

SUMMARY:

The Albuquerque Bernalillo County Water Utility Authority issued the referenced Request for Proposals (RFP) to solicit proposals from qualified vendors to provide Vulnerability Assessment Services.

The RFP was posted on the Sicomm website and advertised in the local newspapers. Two responses were received and submitted for evaluation. The ad hoc evaluation committee reviewed, evaluated, and scored the responses in accordance with the evaluation criteria published in the RFP. Pursuant to the process outlined in the City of Albuquerque Purchasing Ordinance and Rules & Regulations, and the subject RFP, the Ad Hoc Advisory Committee is submitting the following list, in ranking order:

<u>Offeror</u>	Total Composite Score	Total Composite Score w/Preferences		
iParametrix	2,686	2,686		
Tynwdd	2,736	2,736		

After reviewing and discussing the submittals, the committee recommended the contract be awarded to Tynwdd Consulting Group, LLC.

FISCAL IMPACT:

The funding to support this contract is appropriated for Fiscal Year 2017.

PO Box 568 Albuquerque, NM 87103-0568 505-768-2500 www.abcwua.org

Memo

To: Mark S. Sanchez, Executive Director

From: John M. Stomp, P.E., Chief Operating Officer

Date: November 7, 2017

Re: Recommendation of Award, P2018000003, Vulnerability Assessment

The Albuquerque Bernalillo County Water Utility Authority issued the referenced Request for Proposals (RFP) to solicit proposals from qualified vendors to provide Vulnerability Assessment Services.

The RFP was posted on the Sicomm website and advertised in the local newspapers. Two (2) responses were received and submitted for evaluation. The ad hoc evaluation committee reviewed, evaluated, and scored the responses in accordance with the evaluation criteria published in the RFP. Pursuant to the process outlined in the City of Albuquerque Purchasing Ordinance and Rules & Regulations, and the subject RFP, the Ad Hoc Advisory Committee is submitting the following list, in ranking order:

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iParametrix	2,686	2,686		
Tynwdd	2,736	2,736		

After reviewing and discussing the submittals, the committee recommended the contract be awarded to Tynwdd Consulting Group, LLC. I concur with the committee's recommendation.

Water Authority Board approval is required for this procurement. Negotiations with the vendor shall begin immediately upon your approval.

Approved:

Recommended:

Mark S. Sanchez

Executive Director

Date

Stanley Allred

Chief Financial Officer

Date

Attachments:

Composite Score Sheet

Original:

Kelli De Angelis-Craig, Contract Administrator

Copy:

Jonathan Daniels, Purchasing Officer

File:

P2018000003

P.O. Box 568

Albuquerque, NM 87103

Memo

To:

Mark S. Sanchez, Executive Director

From:

John M. Stomp, P.E., Chief Operating Office

Date:

October 31, 2017

Re:

AD HOC COMMITTEE - RFP2018000003, "Vulnerability Assessment"

The following individuals are recommended to serve as members of the Ad Hoc Advisory Committee ("Committee") P2018000003 – Vulnerability Assessment. This Committee will review and evaluate the proposals and submit a ranked list of offerors to you for selection.

John M. Stomp, P.E. Chief Operating Officer, ABCWUA, Committee Chair Charles S. Leder, P.E., Engineering Division Manager, ABCWUA Frank J. Roth, Senior Policy Manager, ABCWUA

Kelli De Angelis-Craig, Contract Administrator, will manage the Request for Proposals and serve as a procedural advisor to the Committee.

I respectfully request your approval of this Committee so that the request for proposals can be published.

RECOMMENDED:
Mhilling
John M. Stomp III, P.E.
John M. Stomp III, P.E. Chief Operating Officer
Date: 11/1/

Original: Luz del Carmen Carreon, Executive Services Coordinator

Copy: Kelli De Angelis-Craig, Contract Administrator

		OFFERORS		1
EVALUATION CRITERIA	EVALUATION FACTORS	Parametrix	Tynwdd	1
The Offeror's general approach and plans to meet the requirements of the RFP	7	90	100	j
		BO	90	ŀ
	Up to 100	92	90	F
	BUB TOTAL	162	200	4
. The Offeror's detailed plans to meet the objectives of each task, activity, etc. on the	000 TOTAL	90	100	١,
equired schedule	Up to 100	70	90	ď
ngari ve verivenie:		G4	95	
	SUB TOTAL	284	JR.	4
Experience and qualifications of the Offeror and personnel as shown on staff resumes to	SOU LOIPE	130	140	۱,
perform tasks described in Part 3. Scope of Services	Up to 150	130	140	ď
		150	150	1
2.0834				1
	SUB TOTAL	410	430	4
Adequacy of proposed project management and resources to be utilized by the Offeror		130	140	ď
	Up to 150	140	140	ď
	Up 10 130	145	140	ľ
	SUB TOTAL	415	420	1
The Offeror's past performance on projects of similar scope and size.	The walk is the	170	180]:
	Up to 200	150	190	ŀ
		175	150	f
	SUB TOTAL	495	520	1
The overall ability of the Offeror, as judged by the evaluation committee, to successfully		170	180],
implete the project within the proposed schedule. This judgment will be based upon		180	190	ŀ
ctors such as the project management plan and availability of staff and resources.	Up to 200	200	200	ľ
	SUB TOTAL	\$50	578	1
Cost Proposal - The costs proposed by the Contractor as described in Section 2.2 of this		100	77	۱,
FP to perform the tasks listed in Part 3, Scope of Services. The evaluation of this section		100	77]
all occur after the technical evaluation, based on a cost/price analysis.	Up to 190	100	77	ľ
	SUS TOTAL	300	231	ł
		4.	in	t
TOTAL COMP	DATTÉ SCORES	2006	2738	1
Small Preference	Up to 5%	0	0]
Local Preference	Up to 8%	0	0	1
Resident Business Preference	Up to 8 %	0	0	1
Resident Voteran Preference	Up to 10%	0	0 -	1
Pay Equity Preference	Lip to 1%	0	0	1
	Preference Max	0	0	1
TOTAL COMPOSITE SCORES WITH P	REFERENCES	2880	2736	1



Meeting Date: November 16, 2017 Staff Contact: Rick Shean, Water Quality Hydrologist

TITLE: OB-17-12 – Status Update for the Kirtland Air Force Base Bulk Fuels Facility Fuel Leak Corrective Action Activities

SUMMARY:

The Albuquerque Bernalillo County Water Utility Authority (Water Authority) staff and their independent contractor, Intera, Incorporated (Intera), reviewed the recently submitted Resource Conservation and Recovery Act (RCRA) Investigation Report (RFI), and has provided comments to the New Mexico Environment Department (NMED), Kirtland AFB, the Air Force Civil Engineering Center, the U.S. Army Corps of Engineers, and their respective contractors.

In their technical review, Intera pointed out some of the following insufficiencies in the RFI:

- 1. Data gaps for vadose zone (or soil) contamination characterization; and
- 2. Inaccurate descriptions of the light nonaqueous phase liquid (LNAPL) plume; and
- A lack of a description of how much contamination in the soil continues to move down towards the aquifer, or be coming into contact with the rising aquifer; and
- 4. An inadequate definition of the vertical extent of the dissolved phase ethylene dibromide (EDB).

When the Air Force submitted the RFI earlier this year, they did acknowledge there are existing data gaps that need to be addressed before the project moves to the next RCRA Corrective Action phase. Water Authority staff encourages the Air Force and their contractors to fill the data gaps and address the concerns provided in Intera's technical review of the RFI document.

In addition to the Water Authority's comments, the NMED responded to the document with their own comments regarding the RFI similar to the Water Authority's, which included that the document provided incomplete characterization of the EDB plume, incomplete and biased estimates of concentration trends and degradation, and incomplete delineation of the LNAPL plume. NMED requested that the Air Force participate in technical meetings with the key stakeholders and to submit a work plan addressing the identified data gaps for review and approval within 60 days for the technical meetings.

FISCAL IMPACT:

None





Review of RCRA Facility Investigation Report for Bulk Fuels Facility Kirtland Air Force Base, New Mexico

Prepared by INTERA, Incorporated for the Albuquerque Bernalillo County Water Utility

Authority

Introduction

Air Force has made much progress in addressing the EDB plume since 2016

Staff and Intera committed to continue working with the Air Force as key stakeholders

Recently submitted RCRA Facility Investigation Report (RFI) by Air Force Contractor insufficient for next phase of work – addendums scheduled

Key Findings

- 1. Soil data insufficient to estimate vadose zone source mass and mass flux to aquifer
- 2. Insufficient data and inaccurate description of LNAPL near and in saturated zone
- 3. Analysis presented misrepresents groundwater contaminant trends
- 4. Incomplete groundwater plume delineation





LNAPL in Vadose Zone

- How much Light NonAqueous Phase Liquid (LNAPL, a.k.a. fuel product) in vadose zone migrates into aquifer now and in future?
- RFI has inadequate data about LNAPL above water table that will act as source
- Data gap may be resolved by proposed coring



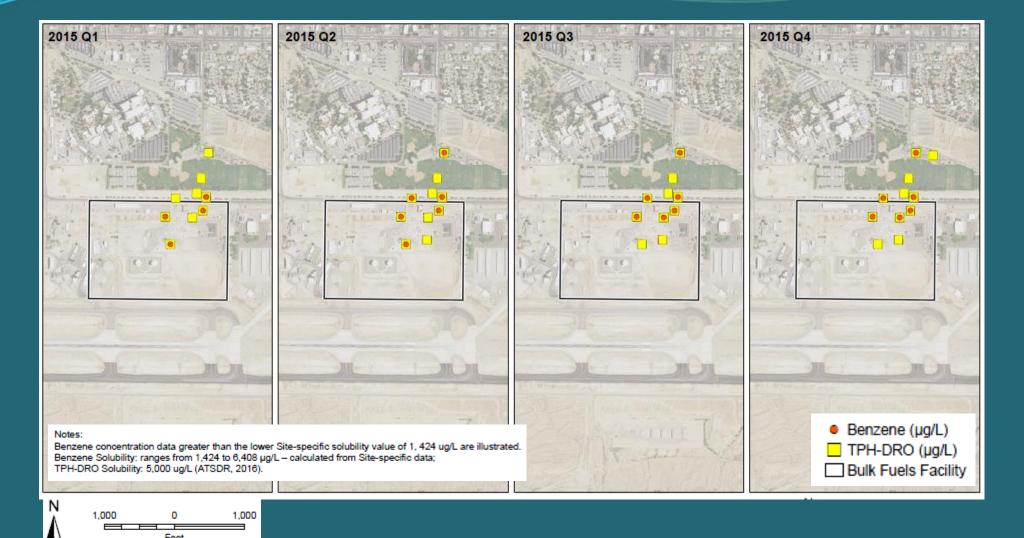
LNAPL in Aquifer

- Location and mass of LNAPL in aquifer critical to evaluate long-term contaminant sources
- RFI does not address new contamination encountered by rising water table
- RFI does not use all available data to estimate how much LNAPL remains in aquifer
- Data gap may be resolved by proposed coring





LNAPL Presence in Groundwater from Effective Solubilities: 2015





Overestimates Degradation Rates

- RFI analysis treats concentration changes as solely caused by degradation
 - other explanations

RFI overestimates degradation rates



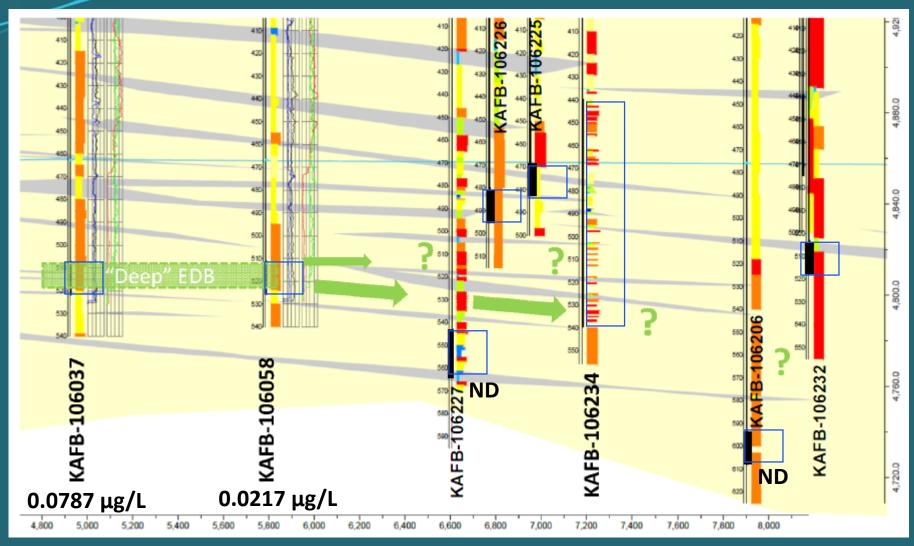
Drowning Well Screens

- Wells screens are drowned, while center of plume mass moving up.
- RFI data show EDB decreases drowning or degradation?
- Need more water table wells to monitor
- Air Force recently agreed to add new shallow wells





Inadequate Vertical Definition of Distal Plume





Summary

- RFI not currently adequate for evaluating corrective measures
- Data gaps to be addressed in RFI Addendum:
 - Define LNAPL location and mass in vadose and saturated zones
 - Get data to estimate contaminant migration into aquifer
 - Define shallow and deep groundwater plume

