AGENDA
Borrego Water District Board of Directors
Regular Meeting
June 22, 2016 9:00 a.m.
806 Palm Canyon Drive
Borrego Springs, CA 92004

I. OPENING PROCEDURES

- **A.** Call to Order
- **B.** Pledge of Allegiance
- **C.** Roll Call
- **D.** Approval of Agenda (1-2)
- **E.** Approval of Minutes
  - Special meeting of May 17, 2016 (4-5)
  - Regular meeting of May 25, 2016 (6-9)
- **F.** Comments from Directors and Requests for Future Agenda Items
- **G.** Comments from the Public and Requests for Future Agenda Items (comments will be limited to 3 minutes)
- **H.** Correspondence: Letter from Anza Borrego Foundation (10)
  Letter from Christmas Circle Park (11)

II. CURRENT BUSINESS MATTERS

- **A.** Discussion and possible approval of special consideration of Country Club sewer pipeline (12-14)
- **B.** Discussion and possible approval for change order by Dudek (15)
- **C.** Discussion and possible approval of Support for Water Quality Risk Assessment Cost Analysis by Dudek (16-31)
- **D.** Discussion and possible action regarding the Due Diligence Committee's draft of the components for the Request for Proposal (RFP) to hire a consultant for developing the Groundwater Sustainability Plan (GSP) for the Borrego Valley Groundwater Basin (Borrego Basin) that meets not only the regulatory requirements of the Sustainable Groundwater Management Act (SGMA) but that also addresses the business requirements of the District to provide potable water to its municipal customers; (32-35)
- **E.** Discussion and possible action regarding Jerry's list of incomplete deliverables for the Borrego Water Coalition (the Coalition) ongoing negotiations; (36)
- **F.** Discussion of transition requirements for the location and publishing of existing District data required for the SGMA-required GSP;
- **G.** Discussion and possible action regarding GSP planning assumptions, given the Borrego Basin boundary adjustment and the California Department of Water Resources' (DWR) plan to not rule on this request until 2017;
- **H.** Discussion and potential action for hiring a consultant to assess the District's potential potable water supply liability (water supply shortage over time under SGMA) and development of a schedule for acquiring new capacity for its existing customer base; (37)
- **I.** Discussion and potential action for hiring a consultant to forecast the District's ability to provide municipal water for the inventory of present un-built lots under the County's current zoning, and any potential additional lots under the County's current up-zoning requests;
- **J.** Discussion and potential action for tasking the District's engineer to develop a brief that definitively answers the question of whether the State Water Resources Control Board (SWRCB) will accept mixing as a strategy for meeting potable water quality standards;

K. Discussion and potential action regarding hiring a consultant to develop a forecast of future water quality changes necessary for: (1) establishing the District's eligibility for low cost financing for its proposed mixing and centralized storage CIP; (2) establishing an economically-driven timeframe to reach sustainability before the District's municipal customers are liable for the costs of advanced treatment to meet the State's drinking water quality standards; (38-39)

L. Discussion and potential action for hiring a consultant to establish a draft benchmarking protocol for reductions under SGMA and ongoing well metering program implementation and data collection standards for ongoing discussions with the Coalition. *Note: a cap on annual withdrawals is necessary under SGMA to meet reduction requirements and is also necessary for water credits (an accounting of permanent acre-feet per year [AFY] withdrawals from the basin) to have any validity or value under SGMA*;

M. Discussion and potential action for hiring a consultant to develop a draft set of market rules to update the District's water credit program that will enable the District to secure adequate potable supply for its present and future customers under SGMA (the District will need to acquire new supply under SGMA through water market transactions). *Note: water markets need clear rules to function fairly and efficiently*; (40-41)

N. Discussion and potential action for hiring a consultant to develop a model for estimating the economic value of water credits (a permanent reduction in the use of an AFY of water from the basin) under a variety of scenarios over the estimated 20-years timeframe of SGMA); (42-43)

O. Discussion and potential action for engaging the District's Department of Water Resources (DWR) grant to engage the Center for Collaborative Policy (CCP) regarding the formation of a Water Advisory Committee to assist the Groundwater Sustainability Agencies (GSAs) in developing a GSP in a timely fashion, given the critical nature of the Borrego Valley Groundwater Basin's overdraft;

P. Discussion and possible action regarding Jerry's list of critical District non-SGMA-related business issues for FY 2017;

Q. Update, discussion, and potential action regarding the District's ability to update its billing software system in a timely and economically advantageous fashion, given the delays and operational risks introduced by its present software vendor;

R. Discussion and possible action regarding the District's ongoing public education program.

S. Discussion and Consideration of Recommendation of Personnel Committee for General Manager selection; approval of appointment of General Manager.

T. Review of planning calendar (44-45)

III. STAFF REPORTS

A. Financial Reports –
B. General Manager / Operations Report
C. Water and Wastewater Operations Report – May 2016 (46)
D. Water Production/Use Records – May 2016 (47-50)

IV. ATTORNEY'S REPORT

V. COMMITTEE REPORTS & PROPOSALS:

Ad Hoc Committees

1.	Audit Committee	(L. Brecht, Tatusko)
2.	Due-Diligence	(L. Brecht, Tatusko)
3.	Strategic Planning Committee	(Hart, L. Brecht)
4.	Executive Committee	(Estep, Hart)
5.	Operations & Maintenance Committee	(Delahay, Tatusko)

6. Parks Committee (Hart, Estep)
7. CFD Committee (Estep, Delahay)
8. Conservation Committee (Hart, Tatusko)
9. Personnel (Hart, Tatusko)

VI. INFORMATIONAL ITEMS

A. Email from A. Keslin, Policy Advisor, Chairman Bill Horn (51)

VII. CLOSED SESSION

A. (10:30 a.m.) PUBLIC EMPLOYEE APPOINTMENT – (Government Code Section 54957):
Title: General Manager

B. (1:00 p.m.) Conference with Legal Counsel – Anticipated Litigation
Significant exposure to litigation pursuant to paragraph (2) of subdivision (d) of Government Code section 54956.9. One potential case.

VIII. CLOSING PROCEDURE

The next Special Meeting of the Board of Directors is scheduled for July 19, 2016 at the Borrego Water District
The next Regular Meeting of the Board of Directors is scheduled for July 27, 2016 at the Borrego Water District

Borrego Water District
MINUTES
Special Meeting of the Board of Directors
Tuesday, May 17, 2016
9:00 AM
806 Palm Canyon Drive
Borrego Springs, CA 92004

I. OPENING PROCEDURES

A. Call to Order: President Hart called the meeting to order at 9:00 a.m.

B. Pledge of Allegiance: Those present stood for the Pledge of Allegiance.

C. Roll Call:

Directors:	Present:	President Hart, Secretary/Treasurer Tatusko, Delahay	
	Absent:	Vice-President Brecht, Estep	
Staff:	Jerry Rolwing, General Manager Greg Holloway, Operations Manager Kim Pitman, Administration Manager Wendy Quinn, Recording Secretary		
Public:	Trey Driscoll, Dudek	Harry Ehrlich	
	Susan Percival, Club Circle East HOA	Rebecca Falk, DW Realty	

D. Approval of Agenda: ***MSC: Delahay/Tatusko approving the Agenda as written.***

E. Comments from Directors and Requests for Future Agenda Items: None

F. Comments from the Public and Requests for Future Agenda Items: None

II. CURRENT BUSINESS MATTERS

A. Consideration and possible approval of proposed fee increases and changes: Kim Pitman explained that the proposed fee increases previously discussed did not need to be part of the upcoming Proposition 218 process and could be considered for approval today. Director Tatusko reported that the Operations & Management Committee had met with Jerry Rolwing and Ms. Pitman and concurred in the proposed fees. ***MSC: Delahay/Tatusko approving the proposed fee increases and changes.*** President Hart asked Ms. Pitman to confirm the current returned check charges. The adopted fee for returned checks may be further adjusted so the District does not lose money on these items.

B. Discussion of proposed emergency regulations on Urban Water Conservation: Mr. Rolwing reported that the State Water Resources Control Board would meet tomorrow to discuss draft recommendations for development and implementation of SGMA. They are considering changing the 25 percent water use reduction mandate to a more locally run program. Mr. Rolwing had e-mailed BWD's representative on the SWRCB and will follow up after the meeting.

C. Review of power cost savings from solar array at Wastewater Treatment Plant: Mr. Rolwing announced that BWD is now Number Two on the waiting list for a $65,000 rebate for solar installation (approximately $12,000 per year for five years). Director Tatusko reported that for the first three months of solar operation, the District paid less than $22 to San Diego Gas & Electric. Director Delahay added that this amount was for administrative costs. The projected

electricity savings could be up to $30,000. Director Tatusko reported the system is working at 98 percent efficiency, and the three-month checkup showed everything is operating satisfactorily. Greg Holloway reported the panels would be cleaned in June.

D. Discussion and report by the personnel committee concerning their activities to secure a replacement General Manager: Harry Ehrlich reported on the General Manager search efforts, which included advertising in the *San Diego Union-Tribune,* a Palm Springs newspaper, on line, and through the Association of California Water Agencies. To date there have been 28 written responses and three or four phone calls. The process is approximately half way through. President Hart asked Mr. Ehrlich to talk to all the District employees.

Director Tatusko reported that Trey Driscoll of Dudek was available to provide interim administrative support to the District during the General Manager transition. Mr. Driscoll will submit a proposal for two days per week as needed, before and after the new General Manager is selected. President Hart asked that the proposal be included in next week's Agenda.

E. Discussion of potential agenda items for May 25th board meeting: Items for the next Agenda will include consideration of a potential fee increase for returned checks, discussion and possible approval of an interim General Manager contract with Dudek, the LAFCO runoff ballot for Special District Alternate, discussion and report by Personnel Committee, discussion and possible approval of rescinding Ordinance 16-01, discussion and possible approval of a public hearing concerning an MOU between the District and the County of San Diego to serve as joint GSAs, and a Proposition 218 hearing.

Mr. Rolwing reported that Ron Poitras, a retired city planner, had offered to assist the District upon his return to Borrego Springs in the fall. Mr. Rolwing suggested asking him to investigate the District's park powers and their possible activation in connection with the proposed new County park, and perhaps Club Circle and Christmas Circle. Rick Alexander may also be available to assist.

III. CLOSED SESSION

A. Conference with Legal Counsel – Anticipated Litigation:

Significant exposure to litigation pursuant to paragraph (2) of subdivision (d) of Government Code section 54956.9. One potential case.

President Hart declared a recess at 9:45 a.m. The Board reconvened in closed session at 10:00 a.m., and the open session reconvened at 10:20 a.m. There was no reportable action.

IV. CLOSING PROCEDURE

There being no further business, the Board adjourned at 10:20 a.m. The next Regular Meeting of the Board of Directors is scheduled for May 25, 2016 at the Borrego Water District.

Borrego Water District
MINUTES
Regular Meeting of the Board of Directors
Wednesday, May 25, 2016
9:00 AM
806 Palm Canyon Drive
Borrego Springs, CA 92004

I. OPENING PROCEDURES

A. Call to Order: President Hart called the meeting to order at 9:00 a.m.

B. Pledge of Allegiance: Those present stood for the Pledge of Allegiance.

C. Roll Call: Directors: Present: President Hart, Secretary/Treasurer Tatusko, Delahay, Estep
Absent: Vice-President Brecht

Staff: Jerry Rolwing, General Manager
Greg Holloway, Operations Manager
Kim Pitman, Administration Manager
Diana Del Bono, Administrative Assistant
Wendy Quinn, Recording Secretary

Public: Trey Driscoll, Dudek; Jim Engelke; David Dale; Susan Percival, Club Circle East HOA; Harry Ehrlich; P. Barbaros; Rick Alexander; Mark Stevens, BSUSD; Kathy O'Meara; Judy Heyer, Sun & Shadows HOA

D. Approval of Agenda: ***MSC: Brecht/Tatusko approving the Agenda as written.***

E. Approval of Minutes:

Special meeting of April 19, 2016

MSC: Delahay/Estep approving the Minutes of the Special Meeting of April 19, 2016 as corrected (Item II.C, first three paragraphs, amend in part to read, ". . . Notes from those Committee meetings were included in the Board package. According to the documents provided by the County Planning Department, they are claiming that SGMA does not apply to the upzoning requested for Rudyville.

Director Brecht explained that the DWR had indicated it would take six months to approve BWD and the County as joint GSAs once the MOU is submitted; and even with approval as GSAs, they would have no authority until the GSP was approved. Director Brecht went on to outline the current MOU negotiations with the County. . . ."

Regular Meeting of April 27, 2016

MSC: Delahay/Estep approving the Minutes of the Regular Meeting of April 27, 2016 as corrected (Item II.H, change last sentence to reflect that Mr. Rolwing, rather than Director Tatusko, reported.)

F. Comments from Directors and Requests for Future Agenda Items: None

G. Comments from the Public and Requests for Future Agenda Items: None

H. Correspondence: None

II. CURRENT BUSINESS MATTERS

A. Public Hearing to hear testimony regarding the proposed water and sewer rate changes: President Hart opened the public hearing at 9:07 a.m. Mark Stevens of the Borrego Springs Unified School District protested the rate increases, noting that the School District's San Diego Gas & Electric costs had increased by 38 percent last year. Director Tatusko defended the

Raftelis study, noting the firm's reputation and his comfort with their findings. He emphasized that the Water District continues to promote conservation, and offered to work with the School District to this end, possibly including solar. Jerry Rolwing suggested a joint solar project benefitting both the School District and the Water District's adjacent pump. President Hart explained that the Water District is obligated by law to treat all customers equally. Mr. Stevens also submitted a written protest. Hearing no further comments, the public hearing was closed at 9:15 a.m.

B. Consideration and approval of proposed fee increase: Kim Pitman reported that the Umpqua Bank's overdraft fee is $10, so the District's $25 fee adopted at the last meeting is adequate, taking administrative expenses into consideration.

C. Discussion and possible approval of rescinding Ordinance 16-01, Urgency Ordinance establishing water conservation requirements by limiting landscape watering: Mr. Rolwing announced that according to changes in State law, after June 1, the two-day-a-week landscape watering restriction can be lifted, although residents are encouraged to continue to conserve. The community will be notified. He reported that the proposed 2016-17 budget includes free irrigation audits for ratepayers, and the service is already being provided by Master Gardener Ken Okey. ***MSC: Estep/Delahay rescinding Ordinance 16-01 effective June 1, 2016.***

D. Discussion and possible approval of interim personnel contract with Dudek Engineering: Director Tatusko introduced Dudek's proposal for Trey Driscoll to provide two days a week administrative support to the District during the transition from Mr. Rolwing's retirement to the installation of his successor. Director Estep expressed opposition to the proposal, citing concern about the cost and pointing out that at least one of the General Manager candidates has a strong engineering background and could ensure a smooth transition. After discussion, and considering the deadline for applications is June 7 and there is a Special Meeting on June 9, the majority of those present and voting postponed the decision on the Dudek proposal until June 9.

E. Discussion and possible approval of holding a Public Hearing regarding the Memorandum of Understanding between the Borrego Water District and the County: Mr. Rolwing reported that the County has postponed its meeting with the Deputy Executive Director until June 2 and may have more changes to the MOU at that time. A decision on the public hearing was postponed until June 9.

F. Discussion and possible vote for Special District Candidate: Harry Ehrlich, Mr. Rolwing and the Board discussed the two candidates in the runoff election for LAFCO Alternate Special District Member, Judy Hanson and Dennis A. Sanford. The majority of Directors present and voting preferred Dennis A. Sanford, and President Hart was authorized to sign the ballot accordingly.

G. Discussion from Personnel committee: Mr. Ehrlich reported that 35 responses to the advertisements for General Manager had been received. The Personnel Committee will meet on June 8 to review the applications, and Mr. Rolwing will check with Morgan Foley on the wording of the June 9 Agenda item and whether it should be in closed session. Mr. Ehrlich hoped to make a final recommendation to the Board on June 22.

H. Consideration and possible approval of process for handling claims received for Tier 2 refunds: Ms. Pitman reported that seven more claims had been received during the past month, totaling $3,180.57. With approval of these, the number of claims comes to 109, totaling $53,879.50. ***MSC: Estep/Delahay approving the Tier 2 conservation rate refunds as presented.***

I. Update Umpqua signature card to add Greg Holloway and remove Jerry Rolwing and Diana Del Bono as of June 30, 2016: Diana Del Bono announced that her last day as Administrative Assistant will be July 8. Customer Service Representative Esmeralda Garcia will replace her, and a candidate has been selected to replace Ms. Garcia. ***MSC: Delahay/Estep***

adding Greg Holloway as a signatory on the Umpqua Bank account and removing Jerry Rolwing and Diana Del Bono, effective June 30, 2016.

J. Review of planning calendar: Mr. Rolwing reported that Rams Hill does not currently need any spare capacity, but does need to buy 500 acre-feet from the District by 2018. Director Tatusko reported that he and Director Brecht have the final draft 2016-17 budget, which will be on the June 9 Agenda. Discussion followed regarding a public hearing on the District/County MOU for joint GSA status. A public hearing is not legally required. If it is termed "stakeholder input," the two-week notice is not required. Mr. Rolwing will discuss the issue with Mr. Foley.

III. STAFF REPORTS

A. Financial Reports – April 2016: Ms. Pitman reported that water income decreased last month by nearly $30,000. Material expenditures for the Country Club pipeline came to approximately $44,000, maintenance on the tractors was $8,000, and the Raftelis study was $18,000. The District's cash is now over $3 million. Discussion followed over work that Dudek is doing at Rams Hill. The District pays Dudek when the invoice is received, but doesn't always receive the money from Rams Hill right away. Direct payments from Rams Hill to Dudek could create legal and bookkeeping problems. Mr. Driscoll agreed to await payment to Dudek until the District receives Rams Hill's payment.

B. General Manager/Operations Report: Mr. Rolwing reported on the semi-annual water level measurements. Two systems are monitored, the production wells and the CASGEM wells. Water levels are declining as expected but under control. Mr. Driscoll reported that Rams Hill had approved a budget for a groundwater study using the USGS model.

Mr. Rolwing reported that the Chamber of Commerce had expressed concern about recent articles in the *San Diego Union-Tribune* and *Los Angeles Times* indicating there is a water crisis in Borrego Springs. He invited the Board's attention to his draft "Water Fact Sheet," showing that although our aquifer is declining, plans are underway to resolve the situation.

C. Water and Wastewater Operations Report – April 2016: Mr. Holloway reported that a meeting with the District's insurance carrier was scheduled for 1:00 p.m. today to discuss the claim against the contractor for work on the 800 Tank. There was a complaint from Indian Head about dirty water, and the fire hydrants have been flushed. Some issues occurred with the clarifiers at the treatment plant, where owls were living. Some pumps were clogged but now are all working and back on line. A new pump for the clarifier is in the budget.

D. Water Production/Use Records – April 2016: Director Delahay noted that unaccounted for water due to inaccurate meter readings ("water loss") had increased. Mr. Holloway reported that the meter replacement program is continuing.

IV. ATTORNEY'S REPORT

None

V. COMMITTEE REPORTS & PROPOSALS

Ad Hoc Committees

1. Audit Committee

Director Tatusko reported that the Committee would meet next week.

2. Due-Diligence

Director Tatusko reported that the Committee would meet next week.

3. Strategic Planning Committee

President Hart reported the Committee had been working with the County on the GSA MOU. Directors Tatusko and Brecht have been attending Borrego Water Coalition meetings.

4. Executive Committee

No report.

5. Operations & Management Committee

Director Tatusko reported on a meeting with the State Water Resources Control Board concerning grant applications. David Dale and Mr. Driscoll attended. One involves a feasibility study for tertiary treatment.

6. Parks Committee

The Committee will meet via conference call to discuss a park ordinance and the proposed new County park.

7. CFD Committee

No report.

8. Conservation Committee

Mr. Rolwing reported that the District is required to report to the State in December as to what has been done to encourage conservation.

9. Personnel Committee

The Committee's work was covered earlier in this meeting.

VI. INFORMATION ITEMS

None

VII. CLOSING PROCEDURE

There being no further business, the Board adjourned at 10:25 a.m. The next Special Meeting of the Board of Directors is scheduled for June 9, 2016 at the Borrego Water District. The next Regular Meeting of the Board of Directors is scheduled for June 22, 2016 at the Borrego Water District.

ANZA BORREGO FOUNDATION

587 Palm Canyon Dr.
Suites 110 & 111
P.O. Box 2001
Borrego Springs, CA 92004

Phone (760) 767-0446
Fax (760) 767-0465

May 21, 2016

Beth Hart, President
Borrego Water District
806 Palm Canyon Drive
Borrego Springs, CA 92004

Subject: Proposed Mixing and Centralized Storage Project

Dear Ms. Hart:

This letter is to inform you of the Anza Borrego Foundation's desire to be consulted in the planning for the above project.

ABF is supportive of the District's efforts to ensure adequate quantity and quality of the community's water supply. We also want to ensure that all necessary steps are taken to preserve the area's unsurpassed vistas and scenic beauty. Accordingly, as planning begins for this capital project, we would appreciate being on the list of those you consult, particularly as to the siting and visual impacts of the project.

Thanks in advance for your attention to this.

Sincerely,

Paige Rogowski
Executive Director

Cc: Kathy Dice, Anza-Borrego Desert State Park Superintendent

Christmas Circle Community Park

A California Nonprofit Public Benefit 501 C3 Corporation Federal ID #91-1774674
P.O. Box 1025 Borrego Springs, California, 92004

Beth Hart, President
Borrego Water District
Board of Directors

June 13, 2016

The Board of Directors of Christmas Circle Community Park request the BWD to include an agenda item for the June 22, 2016 BWD meeting to review the process for activating the BWD Parks Authority to establish a fee on all taxable land parcels for the purpose of financing the operation and maintenance of Christmas Circle Community Park a 501(c)3 non-profit corporation.

In the past the funding for the Park was provided by Grants from San Diego Board of Supervisors, Supervisor Bill Horn. (50% of operating cost), an annual donation from the Burnand Foundation (40% of annual cost) the remaining 10% was provided by local private and organization donations.

As the Burnand Foundation support is no longer available and the possibility the replacement for Supervisor Bill Horn (after 2018) may not provide the same level of financing the CCCP board has review other possibilities of financing. Of the sources of funding (Establish a Parks District with taxing authority, acquire funds through donations to fund an Endowment) it may be that the greatest chance for success is by using the BWD Parks Authority.

We are aware there are issues that must be addressed (who finances, what is the relationship between the CCCP and BWD) to work through these issues and others we are willing to work with a BWD sub-committee you mentioned in your Email.

Please inform us if there is the opportunity for this very important item to be included in the June 22nd meeting.

We hope we can work together on this effort to save our park.

Jim Wilson, President. BOD
Christmas Circle Community Park

SITE DESIGN ASSOCIATES, INC.
1016 BROADWAY, SUITE A, EL CAJON, CA 92021; (619) 442-8467
EMAIL: ken@site-design-associates.com

June 15, 2016

Board of Directors Borrego Water District
P.O. Box 1870
806 Palm Canyon Drive
Borrego Springs, CA 92004

Attention: Beth Hart, President

Re: Country Club Road Sewer Installation

Dear Board Members,

I would like to formally request that the Borrego Water District (the District) Board of Directors place on the agenda for its meeting on June 22nd, the opportunity for me to present a matter of concern that I will describe in more detail below. What I would like to ask is that the Board consider a means to resolve this issue with District staff that is potentially holding up a $10 million grant from the County for a new library in Borrego in a fair, impartial and timely manner.

Background

Jenny and Bill Wright (Family) have been endeavoring to donate approximately 25 acres of pristine virgin land to the Village for civic, educational and cultural uses for approximately 15 years. Finally, the first project, a 10 million dollar library by San Diego County, has been fully approved. This project is subject to the installation of the public sewer, which is now in jeopardy.

In January of 2015, the Family made arrangements with the District to extend the existing sewer system located at Christmas Circle southwesterly to Country Club Road. The installation was proposed to be along the southeast side of Sunset Road, outside of the pavement but within the existing County right-of-way of Sunset Road. In April of this year, we submitted construction plans for this installation. The plans indicated an 8" sewer main to be located 29' southeast of the centerline of Sunset Road with manholes

located in the dirt area of the street. This same sewer system will service the remaining 25 acres of the Family property southwest of Country Club Road.

In the same construction plans submitted to the District in April 2016, it was proposed to continue the sewer system northwesterly along Country Club Road. The sewer location was proposed to be similar to that shown in Sunset Road. The sewer line was located in the dirt portion of the right-of-way of Country Club Road, 32' southwest of the centerline and 12' from the existing waterline. This is located off the paved portion of Country Club Road. The sewer pipeline was proposed to be installed across the County Library Property at the same time it was installed in Sunset Road. This would complete the construction along the Library frontage so that in the future this area would not be disturbed. The County Library Project will be constructing the rest of the improvements on Country Club Road to include curb, gutter and sidewalk, and the remainder of the pavement to match the existing improvements.

District Staff has indicated that there is a strong possibility that the District will need to install a new transmission water line in Country Club Road. The preferred location for this new transmission line would be on the southwesterly side of Country Club Road. Therefore, Staff rejected the position of the sewer line being 32' southwesterly of the centerline, and requested the sewer to be on centerline of the Country Club Road.

The Family requests an alternate location for future development in a 20' easement immediately adjacent to and southwest of the Country Club right-of-way on the Library property and extending westerly onto the remaining Family Property.

Neither the Family nor do we believe, the District would benefit by installing the sewer line or the future water line in the pavement of Country Club Road because this would complicate the construction and increase the costs for this work and any future maintenance of the sewer line. The sewer line construction is proposed to be completed before the County completes the improvements to their frontage of Country Club Road. We understand the District water transmission line does not have a projected installation time frame.

The District Staff also states that the District would not accept the sewer line located in an easement outside of the County right-of-way into their public sewer system. This means the sewer would be constructed and maintained by the landowners it serves as a private sewer main and not maintained by the District. Our understanding is that the County does not like this proposed solution.

The Family understands why the District is attempting to preserve the location for a future water transmission line in the Country Club Road corridor, from our perspective however the reasoning appears to be somewhat flawed. The District wants to protect the pipeline corridor along the southwest side of the existing 6" water line in order to be able to install the water line outside of the paved portion of the road. However, the timing is such that this installation appears to be *after* the County improves the southwest half of the roadway which would place the transmission line into pavement anyway. If this is the case, then placing the transmission line northeasterly of the existing 6" water line may be more advantageous, since it would be installed in the older section of pavement. The Family sewer installation will be completed *before* the County improves the street frontage, which makes more sense for all parties to have the sewer completed in the public right-of-way before year's end.

The Family requests that the District consider the original proposed plans from April of this year, showing the sewer line installation 32' southwesterly of the centerline of Country Club Road in the public right-of-way as a public sewer main owned and maintained by the District. This location is consistent with the installation located in Sunset Road.

I would like to present this matter at your June 22nd board meeting for clarification and ask the Board to approve a process to arrive at a final resolution. Time is of the essence.

Thank you very much for your consideration.

Respectfully,

Kenneth Discenza, PE

KJD:kd
Cc: William Wright

DUDEK
605 Third St.
Encinitas, CA 92024
T 760.942.5147
F 760.632.0164

CONTRACT AMENDMENT AUTHORIZATION

TO: Client Representative

Client:	Borrego Water District				
Address:	806 Palm Canyon Drive, PO Box 1870				
City:	Borrego Springs	State:	CA	Zip:	92004
Phone:	(760) 767-5806	Fax:	(760) 767-5994		

This form is provided to document your written authorization to amend our existing contract with your organization for additional work as discussed. By documenting your written authorization for these contract amendment(s), we hope to avoid any misunderstanding between your organization and Dudek, and to expedite our ability to immediately proceed on work as requested. All other terms and conditions of the original contract between Client and Dudek described below remain in effect, apply to and are unaltered by this contract amendment authorization.

Contract Name:	Initial Support To Develop Borrego Valley Groundwater Basin Groundwater Sustainability Plan		
Contract/Purchase Order No.:			
Dudek Job No.:	9299	**Dudek Project Manager:**	Trey Driscoll
Contract Effective Date:	11/2/2015		

AMENDED/ADDITIONAL CONTRACT WORK DISCIPLINE

See Attached Scope of Work

Original Budget:	$89,020.00	**Time & Materials Not to Exceed:** ☒
Previous Change Orders:	$0.00	**Time & Materials:**
This Change Order:	$39,000.00	**Fixed Fee:**
Reimbursable Direct Costs:	$1,000.00	
New Contract Amount:	$129,020.00	

Client Authorized Signature: _____

Title: _____ **Date:** _____

TO EXPEDITE THE ADDITIONAL CONTRACT WORK, PLEASE E-MAIL BACK TO DUDEK

DUDEK

MAIN OFFICE
605 THIRD STREET
ENCINITAS, CALIFORNIA 92024
T 760.942.5147 T 800.450.1818 F 760.632.0164

April 18, 2016

Jerry Rolwing, General Manger
Borrego Water District
806 Palm Canyon Road
PO Box 1870
Borrego Springs, CA 92004
(Submitted via e-mail: jerry@borregowd.org)

Subject: Support for Water Quality Risk Assessment Cost Analysis

Dear Mr. Rolwing:

Dudek has developed the following scope to assist the Borrego Water District (BWD) in assessing the potential risk associated with temporal changes in water quality that may result in exceedances of drinking water maximum contaminant levels (MCLs) in BWD production wells due to the log-standing critical overdraft of the Borrego Valley Groundwater Basin (BVGB).[1] The U.S. Geological Survey (USGS) in cooperation with the BWD recently published Scientific Investigation Report 2015-5150 that evaluated available water quality data in BVGB.[2] The USGS found that concentrations of total dissolved solids (TDS) and nitrate exceed their respective water quality standard thresholds in the upper aquifer of the BVGB. The highest concentrations of both constituents were generally found in the northern portion of the Borrego Valley, and the concentration of TDS was found to increase as water levels decline. Sulfate, another constituent of concern (COC), was also found to increase in concentration as water levels decline. In addition to nitrate TDS and sulfate, other potential COCs in the BVGB include gross alpha radiation and arsenic.

There are both anthropogenic and natural sources of the COCs in the BVGB. Anthropogenic sources that may contribute to degradation of the current water quality in the basin include agricultural use of pesticides and fertilizers, salt accumulation resulting from agricultural

[1] The overdraft of the BVGB was definitely established by the US Geological Survey (USGS) work conducted in 1982 for San Diego County. Since 1982, the overdraft has more than doubled. See http://www.borregowd.org/uploads/BWD_Report_USGS_1982.pdf.

[2] USGS Scientific Investigation Report 2015-5150, Hydrogeology, hydrologic effects of development, and simulation of groundwater flow in the Borrego Valley, San Diego County, California, available at: https://pubs.er.usgs.gov/publication/sir20155150

irrigation practices, and septic return flow. Natural sources of COCs in the BVGB include the rocks and minerals that comprise the aquifer matrix material. Evaporite minerals, which can dissolve and increase TDS concentration in the aquifer, silicate minerals, which can contribute arsenic to the groundwater, and sulfate minerals, which as their name suggests can contribute sulfate to the groundwater, are all found in differing amounts in the upper, middle and lower aquifers. Differences in the mineralogical composition of the aquifers can result in water quality differences between the aquifers.

Below, we discuss the current distribution and trends of COCs overall and by proposed BVGB management area; north, central and south, in the BVGB (Figure 1).

Nitrate

The USGS found that the concentration of nitrate as nitrogen (as N) from samples throughout the BVGB ranged from less than 1 mg/L to approximately 67 mg/L. The California drinking water MCL for nitrate as N is 10 mg/L (45 mg/L nitrate as nitrate [as NO_3]). Only five of the 36 wells sampled had nitrate concentrations that exceeded the MCL. These five wells are in the vicinity of Henderson Canyon Road in the northern part of the valley, adjacent to areas of agricultural use, and three of the five wells were screened in the upper aquifer. The concentration of nitrate measured in the remaining 31 wells was less than 7 mg/L nitrate as N.

Historical nitrate data for BWD wells ID4-4, ID4-11, ID4-18 and MW-1 located in the North Management Area were also reviewed to determine trends. North Management Area well information including elevation, well depth, groundwater level, pump information, screen interval, casing diameter and production rate is provided in Figure 2. These wells are located on the fringe of current and historical agricultural production in both the upper and middle aquifer and display a slight increasing trend of nitrate as NO_3 (Figure 3). All concentrations of the BWD wells are below one-half the California drinking water MCL for nitrate.

Historical nitrate data for BWD wells ID1-10, ID1-12, ID1-16, Wilcox, ID4-10, ID5-5, MW-4 and the private Cocopah well located in the Central Management Area were reviewed to determine current lateral distribution and trends. Central Management Area well information including elevation, well depth, groundwater level, pump information, screen interval, casing diameter and production rate is provided in Figure 4. These wells are located in or near to the primary area of municipal groundwater production in the BVGB. Golf courses and septic return flow with limited areas of agriculture are the probable anthropogenic sources of nitrate to wells in this area of the basin. Increasing nitrate as NO_3 trends are noted in wells ID1-10 and ID1-12; however concentrations in all wells are below one-half the California drinking water MCL for nitrate (Figures 5 and 6).

Historical nitrate data for BWD well ID1-8 located in the South Management Area was reviewed to determine trend. Sorth Management Area well information including elevation, well depth, groundwater level, pump information, screen interval, casing diameter and production rate is provided in Figure 7. Well ID1-8 is the only potable BWD production well located in the South Management Area. Wells located at the Borrego Air Ranch are also used for potable water supply in the South Management Area. Well ID1-8 displays an increasing nitrate concentration trend from 1972 to present; however the current concentration is below one-half the California drinking water MCL (Figure 8). Well ID1-8 is downgradient from the Rams Hill golf course which is the probable anthropogenic source of nitrates in the South Management Area in addition to the percolation ponds at the wastewater treatment plant. Rams Hill wells RH-5 and RH-6, which are located on the old golf course, indicate elevated nitrate as NO_3 concentrations at 29 mg/L and 14 mg/L, respectively. Rams Hill will monitor water quality annually from its wells as part of the Long-Tern Cooperation Agreement with the BWD. Additionally, Dudek recommends monitoring well MW-3 to determine water quality in shallower zones of the principal aquifer.

TDS

TDS concentrations that exceed the California drinking water secondary MCL of 1,000 mg/L were detected in eight of the 36 wells sampled by the USGS. Each of the wells that exceeded the MCL for nitrate also exceeded the secondary MCL for TDS. Additionally, two wells screened in the middle aquifer and one well screened in the lower aquifer that had concentrations of nitrate as N below 7 mg/L had TDS concentrations above 1,000 mg/L. Typically, however, the concentration of TDS in the lower aquifer was lower than that in the middle and upper aquifers for the wells analyzed as part of the USGS study.

Historical TDS data for BWD wells ID4-4, ID4-11, ID4-18 and MW-1 located in the North Management Area were reviewed to determine trends. These wells display relatively stable TDS concentrations from the early 1980's to present (Figure 3).

Historical TDS data for BWD wells ID1-10, ID1-12, ID1-16, Wilcox, ID4-10, ID5-5, MW-4 and the private Cocopah well located in the Central Management Area were reviewed to determine current lateral distribution and trends. These wells display stable TDS concentrations in each well for the period of record monitored (Figures 5 and 6).

Historical TDS data for BWD well ID1-8 located in the South Management Area was reviewed to determine trend. This well displays increasing TDS concentrations since 1972 (Figure 8).

Sulfate

None of the samples analyzed as part of the USGS study had concentration of sulfate that exceeded the California secondary MCL for sulfate of 500 mg/L, however four wells had increasing sulfate concentrations with time.[3] The USGS was not able to determine the reason for the increasing concentration trend observed in these wells and the wells are spread throughout the valley, with no immediate geographic link to the observed trends.

Historical sulfate data for BWD wells ID4-4, ID4-11, ID4-18 and MW-1 located in the North Management Area were reviewed to determine trends. These wells display relatively stable sulfate concentrations from the early 1980's to present (Figure 3).

Historical sulfate data for BWD wells ID1-10, ID1-12, ID1-16, Wilcox, ID4-10, ID5-5, MW-4 and the private Cocopah well located in the Central Management were reviewed to determine current lateral distribution and trends. These wells display relatively stable sulfate concentrations for the period of record monitored in each well (Figures 5 and 6). All wells indicate concentrations below the California drinking water secondary recommended MCL of 250 mg/L except MW-4 at a concentration of 330 mg/L. This concentration is below the California drinking water secondary upper MCL of 500 mg/L.

Historical sulfate data for BWD well ID1-8 located in the South Management Area was reviewed to determine trend. This well displays relatively stable sulfate concentration since 1972 (Figure 8).

Arsenic

Arsenic concentrations have been rising in several wells in the BVGB since the late 1990's. Arsenic was first detected in four wells in the BVGB in 2001 at a concentration of 3 to 5 micrograms per liter (µg/L). Since then, arsenic concentrations in these wells have increased. Arsenic has been detected in non-potable wells up to 22 µg/L in Rams Hill Golf Course well RH-4. The California drinking water MCL for arsenic is 10 µg/L.

Naturally occurring arsenic concentrations in ground water are highly variable, though naturally occurring concentrations that exceed the California drinking water MCL are common in semi-arid and arid groundwater basins in the western United States (Welch et al. 2000). In these

[3] The recommended, upper and short-term California drinking water secondary MCLs for sulfate are 250 mg/L, 500 mg/L and 600 mg/L, respectively.

basins, groundwater recharge is limited and the residence time of the groundwater in the basin is high. The long residence time of the groundwater in the basin allows for more interaction between the groundwater and the minerals that comprise the aquifer matrix material. With time, arsenic desorbs from sediments and enters the groundwater. This process is more efficient in groundwater with higher pH. The groundwater in the BVGB has a pH of 7.5 to 9.0, a range which is conducive for this transfer of arsenic from the sediment to the water.[4]

Historical arsenic data for BWD wells ID4-4, ID4-11, ID4-18 and MW-1 located in the North Management Area were reviewed to determine trends (Figure 3). These wells have arsenic concentrations less than one-half the California drinking water MCL.

Historical arsenic data for BWD wells ID1-10, ID1-12, ID1-16, Wilcox, ID4-10, ID5-5, MW-4 and the private Cocopah well located in the Central Management were reviewed to determine current lateral distribution and trends (Figures 5 and 6). These wells display increasing arsenic concentrations with time for wells with multiple samples.

Historical arsenic data for BWD well ID1-8 located in the South Management Area was reviewed to determine trend. This well displays increasing arsenic concentrations with time (Figure 8).

Groundwater Quality Sampling Plan and Work Effort

Based on the observed concentration trends, the known processes that affect the concentration of COCs in groundwater, and the likelihood of pumping older groundwater as water levels continue to decline in the basin, Dudek has outlined below a plan that will assist the BWD assess the current distribution of COCs in the Valley, both laterally and with depth in the aquifer. In the first phase of the plan, Dudek will review, compile and analyze existing BWD and private well data to determine the appropriate water quality parameters and list of COCs to be collected during the initial sampling event and which wells should be sampled to delineate the anticipated spatial variability in concentrations for a select list of COCs.

After the initial sampling round, a lateral and vertical spatial analysis of existing concentrations of COCs will be conducted in order to assess what role both anthropogenic and geologic processes may have in influencing the observed trends and distribution of COCs. The primary

[4] Elevated pH is common in the alluvial desert aquifer of California due to long residency time of water in the aquifer and associated weathering of primary silicate minerals that consume large amounts of hydrogen ions (H+) and increases the pH of groundwater to an alkaline condition (Izbicki, J.A. et 2008).

products of this work effort are a technical memorandum and presentation to the Board of the BWD. Both the technical memorandum and the presentation will document the wells sampled, the concentrations of the COCs detected in the samples collected, the results of the spatial analysis, and recommendations for future sampling to comply with water quality sampling requirements set forth under the Sustainable Groundwater Management Act.

Dudek will work with the USGS and the BWD to coordinate the sampling efforts in the valley. Dudek anticipates conducting additional analyses once additional data are available from the USGS vertical well profiling effort. This later round of analyses, and the resulting refinements to the proposed sampling plan, are not included in the scope or cost provided with this proposal. Dudek's anticipated cost to conduct phase 1 of this effort is $25,300. The scope for each task and the detailed costs are attached.

We look forward to working on this project with you, USGS staff, County staff and the Borrego Springs community. Please contact me at 760.415.1425, tdriscoll@dudek.com with any questions or communications.

Sincerely,

Trey Driscoll, PG No. 8511, CHG No. 936
Principal Hydrogeologist

Att: *Exhibit A, Figures 1-8*
cc: *Lyle Brecht, BWD Board Vice President – Due Diligence Committee*
Joe Tatusko, BWD Board Secretary/Treasurer – Due Diligence Committee
Greg Holloway, Operations Manager

References

J.A. Izbicki et al. (2008) Chromium, chromium isotopes and selected trace elements, western Mojave Desert, USA. Applied Geochemistry, v.23, p. 1325-1352.

Welch, A.H., Westhohn, D.B., Helsel, D.R., and Wanty, R.B., 2000. Arsenic in groundwater of the United States- Occurrence and Geochemistry. Groundwater v. 38 no. 4, p. 589-604.

EXHIBIT A
Scope of Work and Cost Estimate

April 18, 2016

Task 1 Data Review, Compilation and Quality Assurance/Quality Control

Dudek will work with the BWD, the USGS and private well owners to compile currently available water quality data for wells in the Borrego Valley. Dudek will complete preliminary quality assurance/quality control (QA/QC) of the compiled data.

Total for Task 1 ..... ***$1,940.00***

Task 2 Concentration Trend Analysis

Using the compiled data, Dudek will conduct a spatial analysis of the lateral and vertical extent of water quality in the BVGB. Dudek will incorporate the geologic analysis and contaminant source analysis into an evaluation of the best fit model or models for the concentration trends observed. These models will be used develop a framework to account for the uncertainty in when, and if COCs will be detected at concentrations exceeding the California drinking water MCL in BWD wells.

Total for Task 2 ..... ***$4,000.00***

Task 3 Economic Risk Assessment

Dudek will incorporate the findings of the concentration trend analysis into an evaluation of potential treatment alternatives. These treatment options include blending water from an affected well, or wells, modifying individual wells, replacing wells, and wellhead treatment. Additionally, Dudek will complete a preliminary existing conditions assessment of District supply sources by well and by zone to determine the remaining useful life of wells and ability of wells to serve multiple zones.

Total for Task 3 ..... ***$5,460.00***

Task 4 QA/QC

QA/QC analyses and studies prepared for the development of the Groundwater Sustainability Plan (GSP) will be conducted by the consultant's Principal Hydrogeologist. QA/QC will be done on both the trend analysis and economic risk assessment analysis, as well as on the draft and final technical memorandum and board presentation.

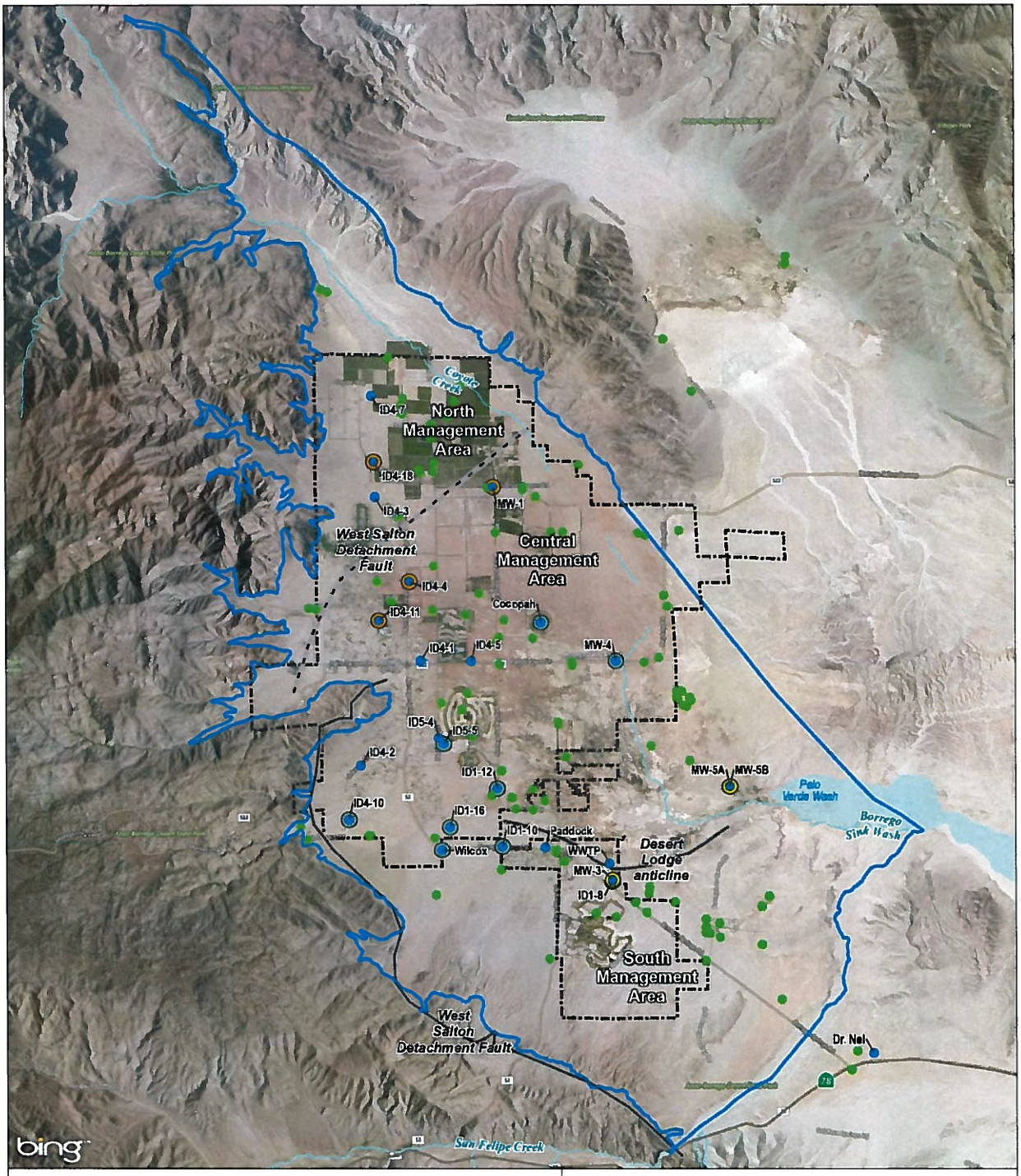
Total for Task 4 ..... ***$1,560.00***

Task 5 Technical Memorandum and Board Presentation

The primary deliverables of this preliminary risk assessment will be a technical memorandum detailing the analyses conducted and results obtained, and a presentation to the BWD Board of the same.

Total for Task 5 ..... ***$12,340.00***

TOTAL ANTICIPATED COST FOR RISK ANALYSIS **$25,300.00**



Borrego Water District
Proposed Borrego Valley Groundwater Basin

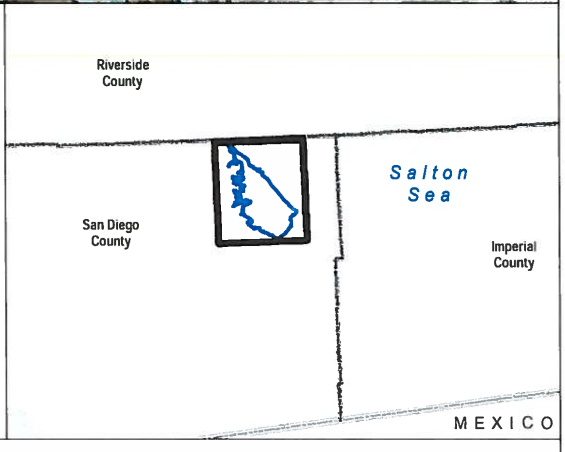
Proposed Management Area Indicator Wells
- North Management Area Wells
- Central Management Area Wells
- South Management Area Well

Borrego Valley Groundwater Basin Wells
- Borrego Water District Wells
- Private, Other Public, or Unknown Owner Wells

Faults and Folds
- Certain
- Un-Certain

Major Streams and Washes/Sinks
- Major Stream Channels
- Wash/Sink

N 0 1 2 Miles



DUDEK

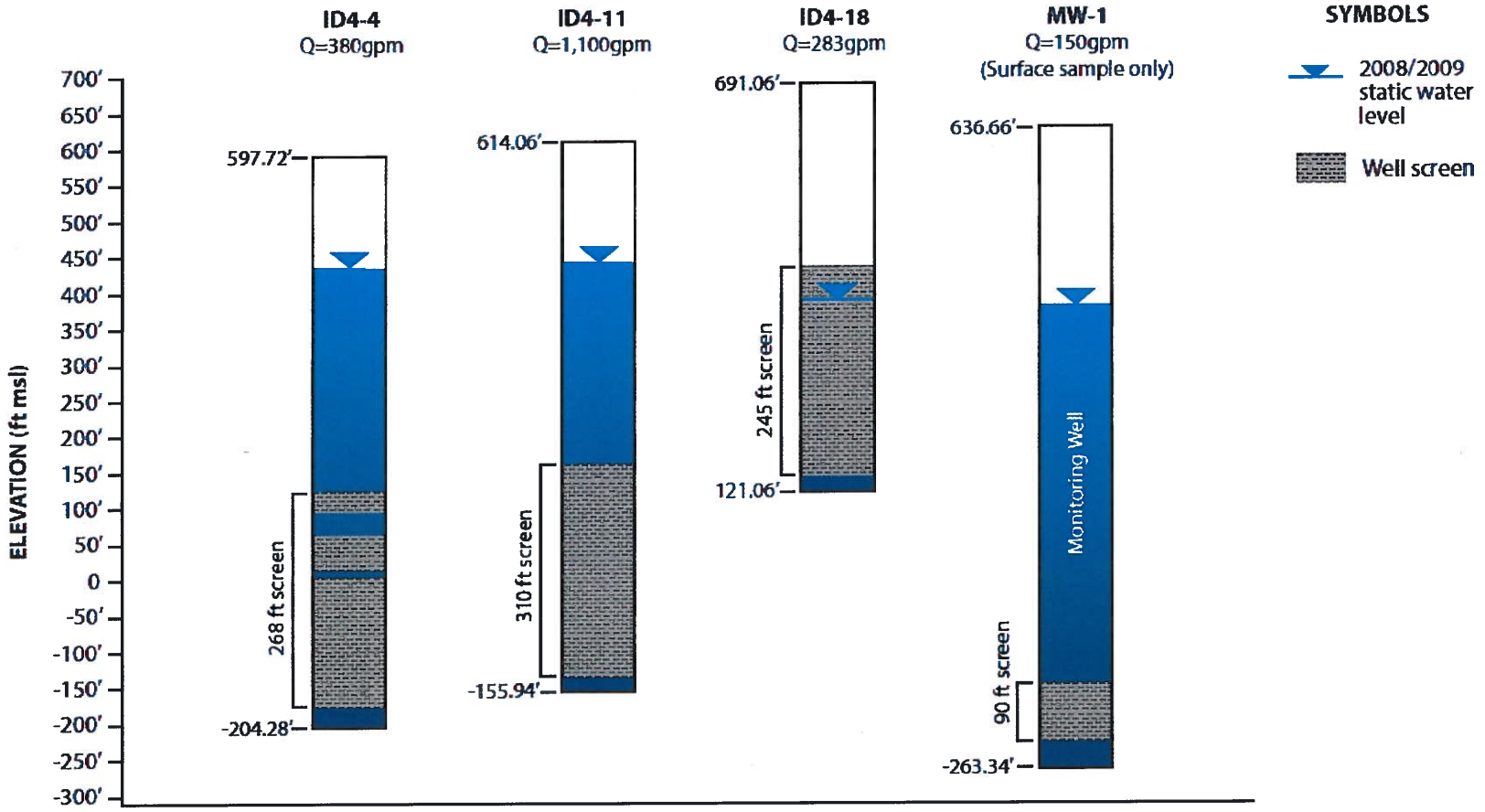
SOURCE: USGS; DWR; BWD; Steely et. al. 2009

Figure 1
Well Location Map and Proposed Management Areas

Borrego Valley Groundwater Basin (7-24) GSP Water Quality Monitoring

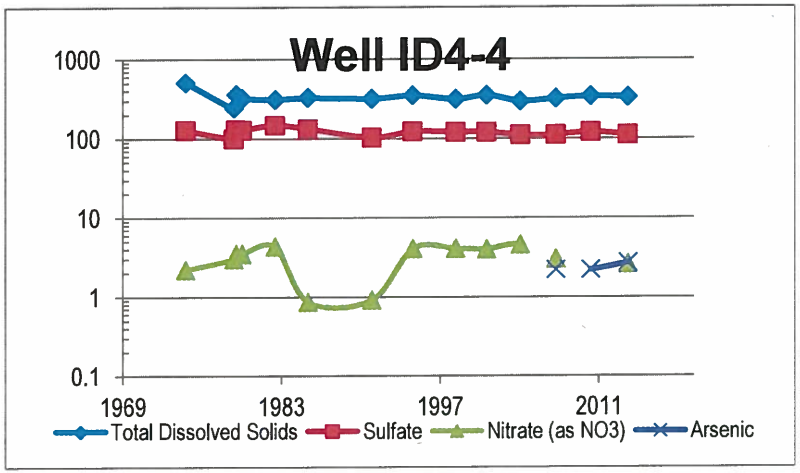
April 2016

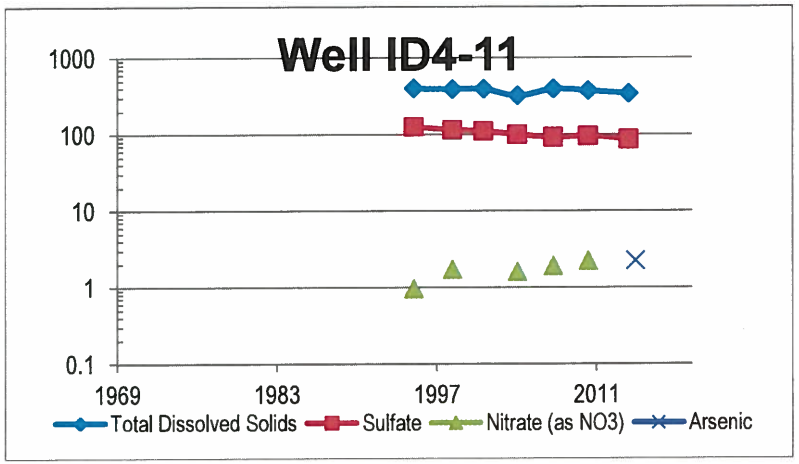
Figure 2. North Management Areas Wells

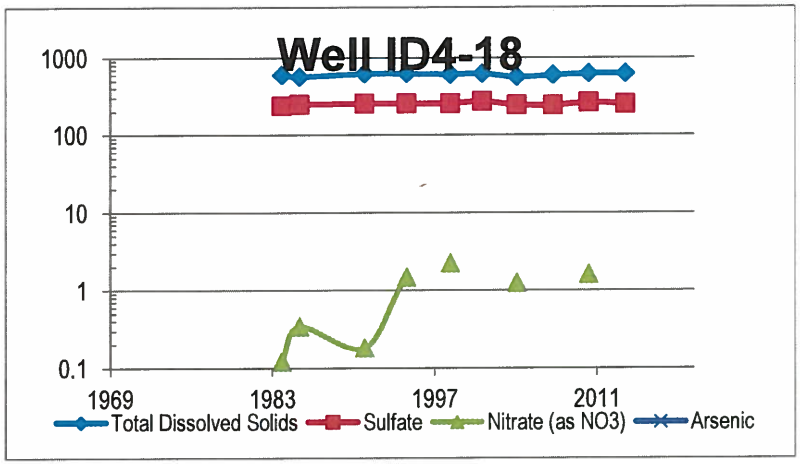


Casing Inside Diameter (in):	14" ID	14" ID	12.75" ID	4" ID
Well Depth (ft bls):	786' bls	770' bls	570' bls	900' bls
Borehole Depth (ft bls):	802' bls	800' bls	699' bls	1,238' bls (2004)
Pump Size:	150 HP (~235 msl)	200 HP (~330 msl)	100 HP (~235 msl)	N/A
Specific Capacity (gal/ft):	12.83 gal/ft 1,155 gpm (1979)	86.95 gal/ft 2,000 gpm (1995)	12.83 gal/ft 1,200 gpm (1982)	00.36 gal/ft

Figure 3. North Management Area Water Quality – BWD Production and Monitoring Wells







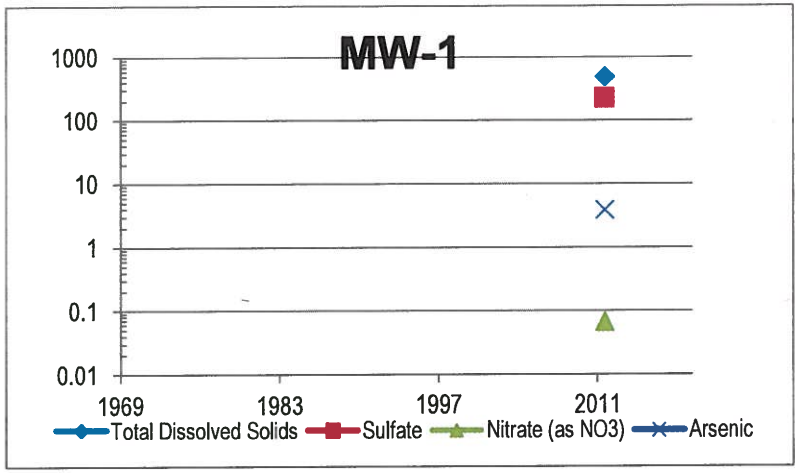
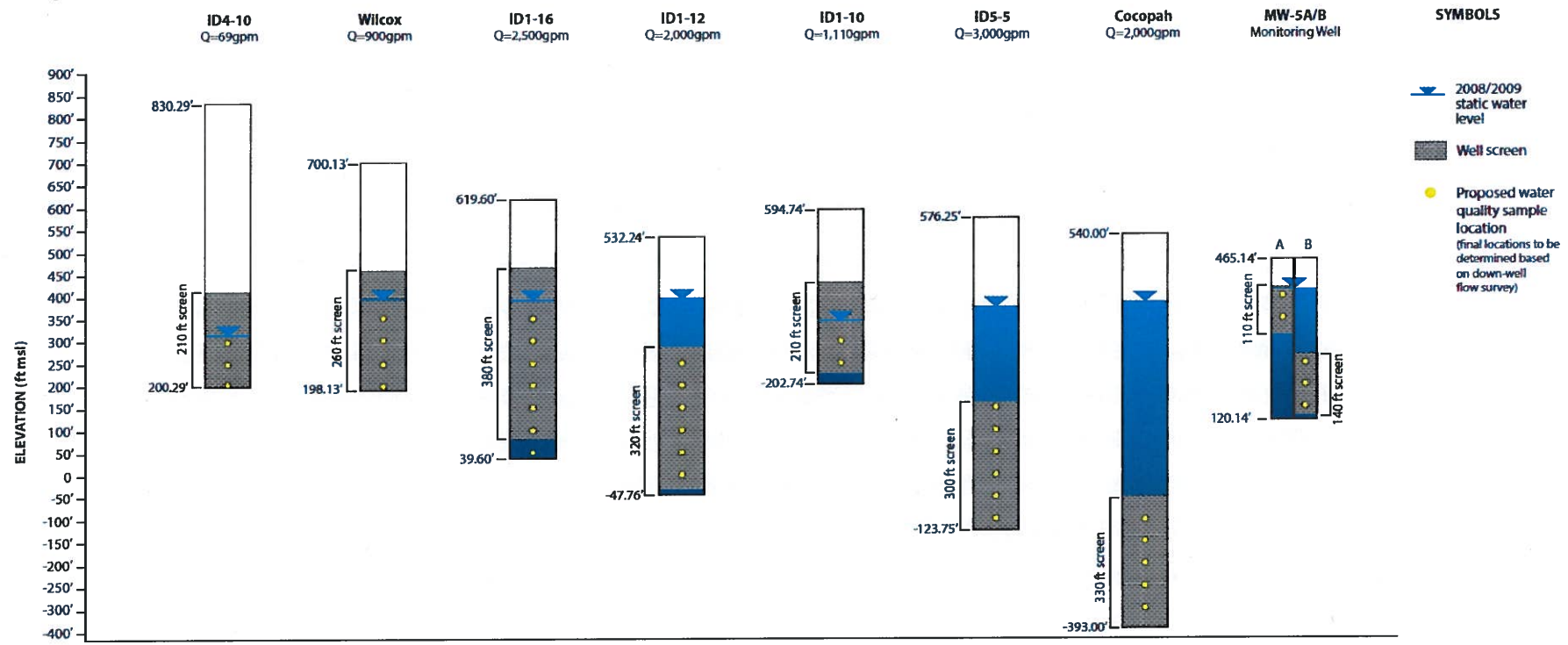
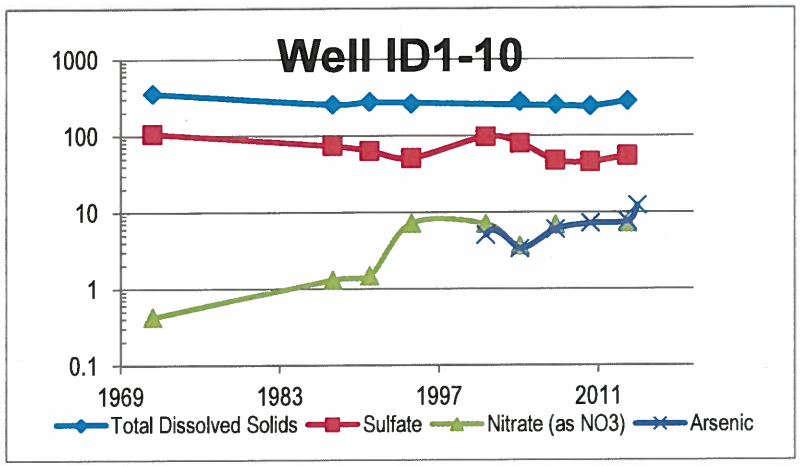


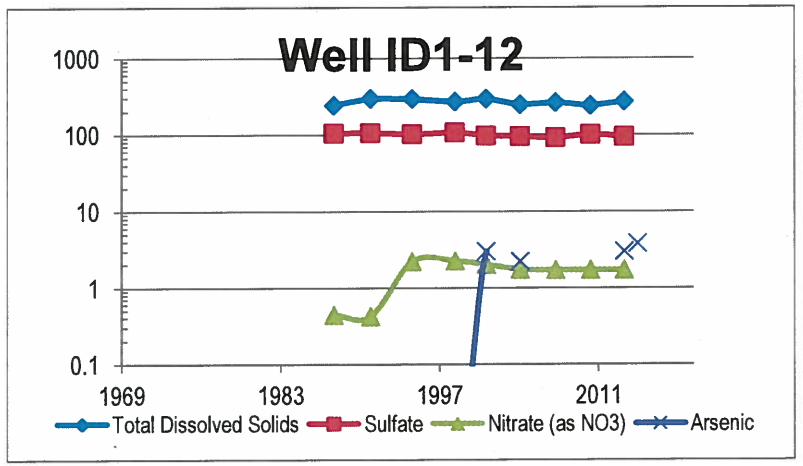
Figure 4. Central Management Areas Wells

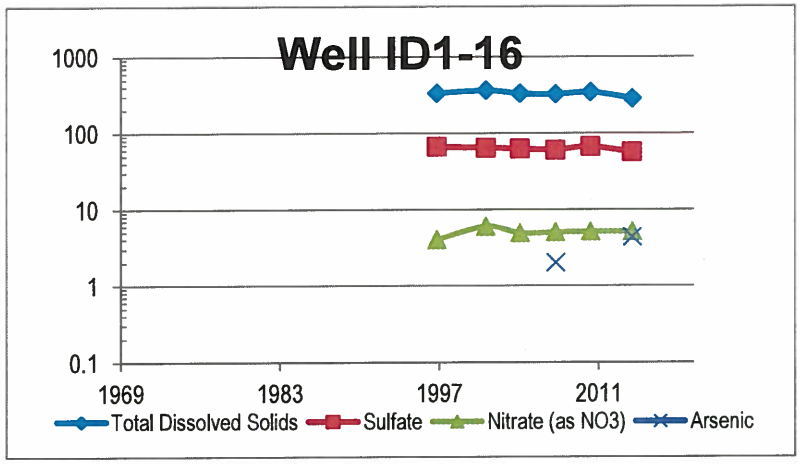


	ID4-10	Wilcox	ID1-16	ID1-12	ID1-10	ID5-5	Cocopah	MW-5A/B
Casing Inside Diameter (in):	8" ID	12.75" ID	16" ID	14.75" ID	12.75" ID	16" ID	14" ID	4" ID
Well Depth (ft bls):	630' bls	502' bls	550' bls	580' bls	392' bls	700' bls	570' bls	900' bls
Borehole Depth (ft bls):	630' bls	502' bls	705' bls	726' bls (2004)	816' bls	708' bls	699' bls	1,238' bls (2004)
Pump Size:	25 HP	61 HP	300 HP	200 HP	150 HP	200 HP	160 HP	N/A
Specific Capacity:	20 gal/ft	26.4 gal/ft	31.0 gal/ft	75.4 gal/ft	20.3 gal/ft	N/A	N/A	
Estimated Production Rate:	69 gpm	175 gpm	723 gpm	965 gpm	400 gpm	1,500 gpm	1,166 gpm	

Figure 5. Central Management Area Water Quality







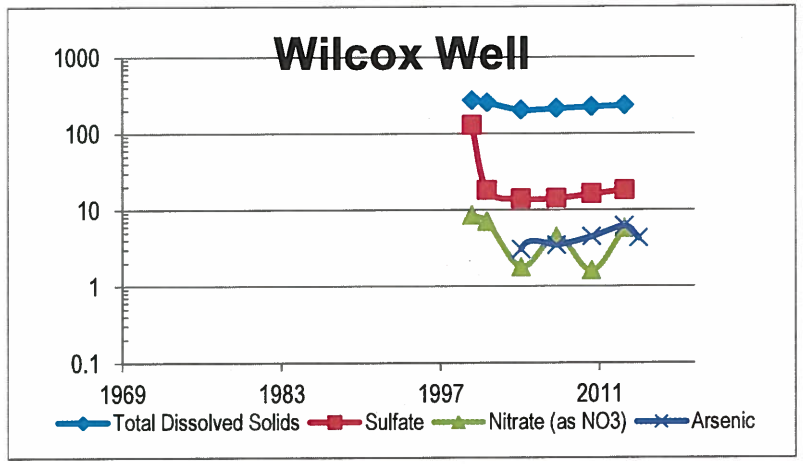
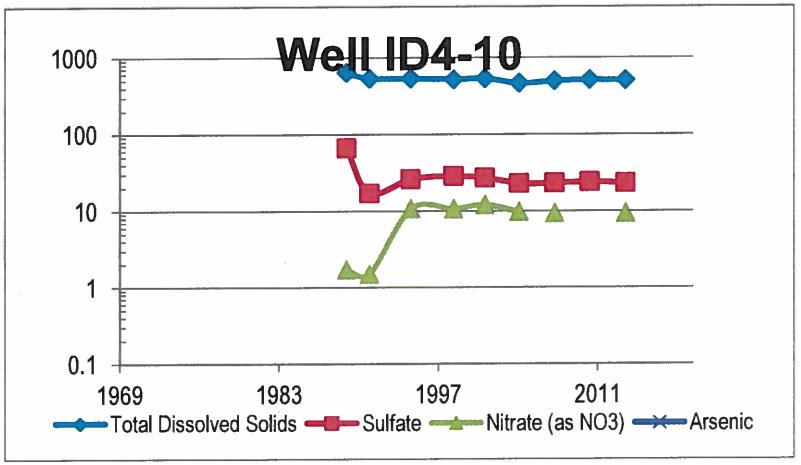
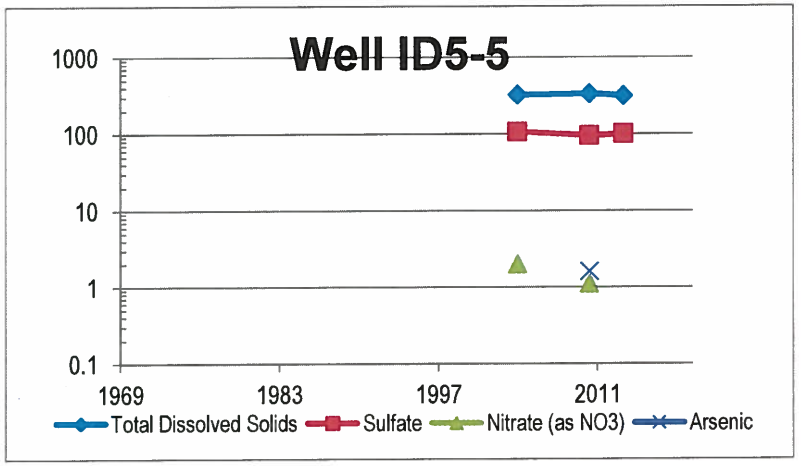
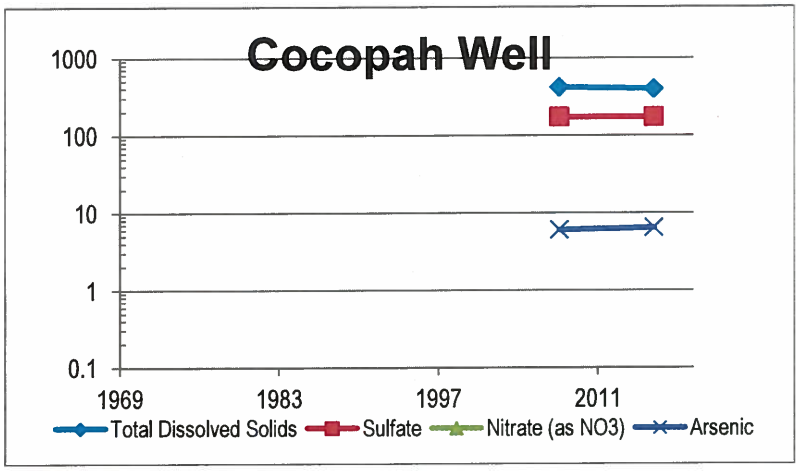


Figure 6. Central Management Area Water Quality (Continued)







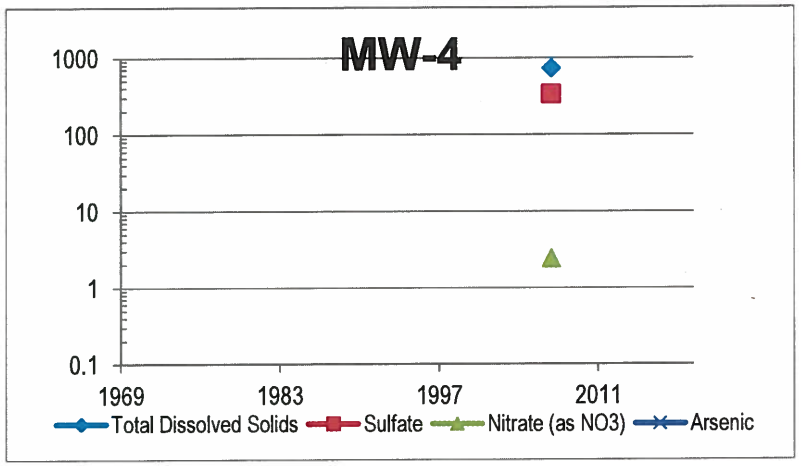
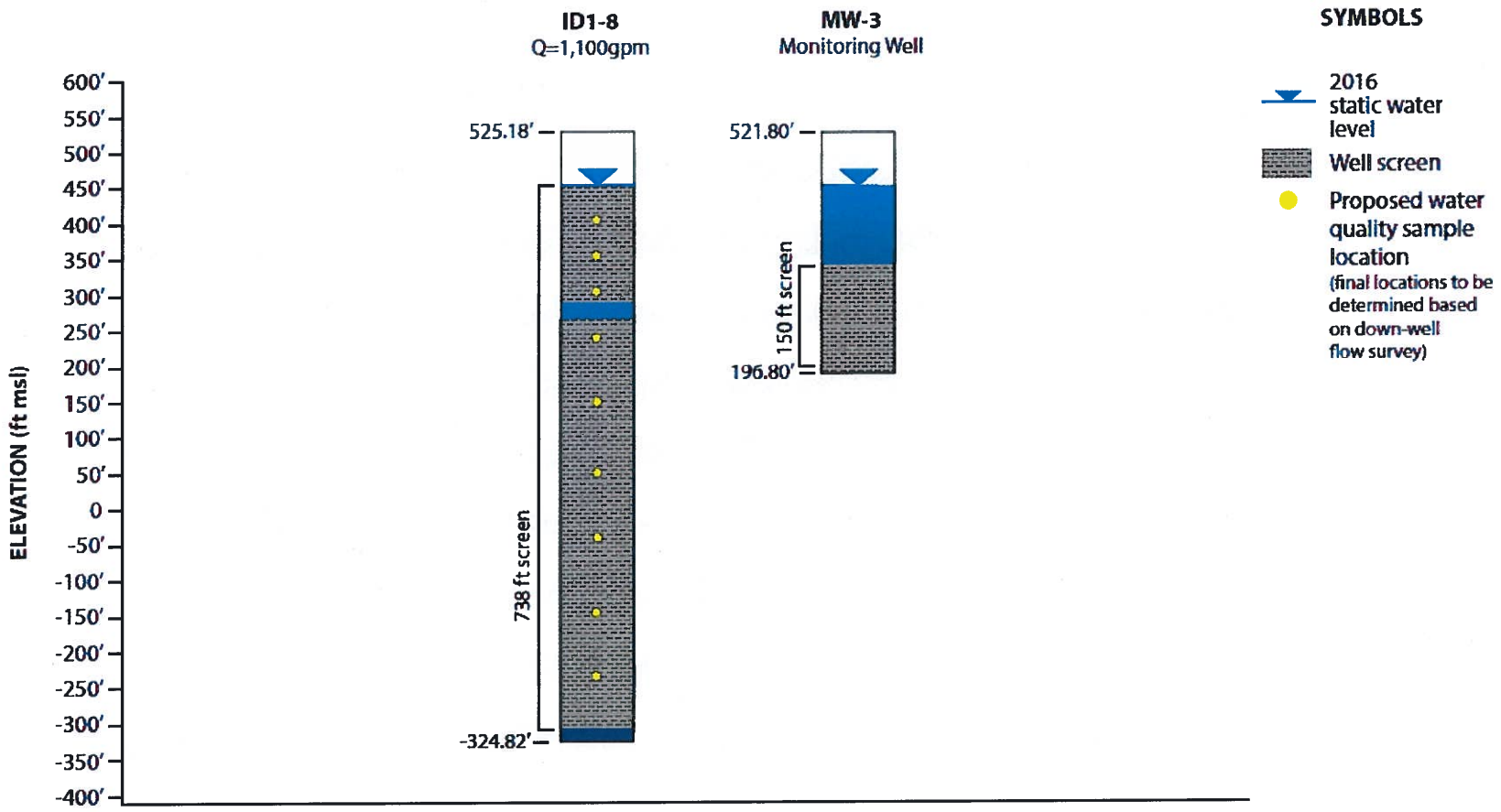
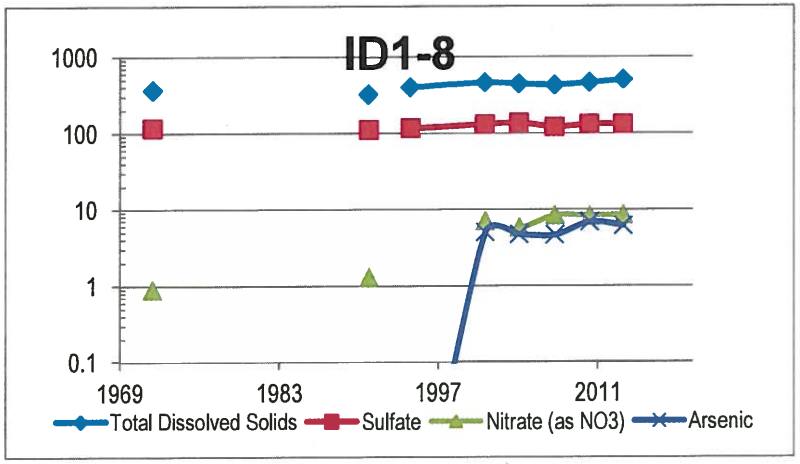


Figure 7. South Management Areas Wells



Casing Inside Diameter (in):	12.75" ID	4" ID
Well Depth (ft bls):	850' bls	325' bls
Borehole Depth (ft bls):	938' bls	344' bls
Pump Size:	125 HP	N/A
Specific Capacity:	8.7 gal/ft	N/A
Estimated Production Rate:	350 gpm (2013)	N/A

Figure 8. South Management Area Water Quality



Note: This is a conceptual discussion document only for the purposes of illuminating the business requirements of any Groundwater Sustainability Plan (GSP) regarding the District's ability to serve its municipal customers while satisfying the regulatory requirements of the Sustainable Groundwater Management Act (SGMA).

Background:

The County of San Diego (the County) and the Borrego Water District (the District), as co-Groundwater Sustainability Agencies (GSAs) for the Borrego Valley Groundwater Basin (Borrego Basin) are looking to retain a consultant for the purposes of developing a Sustainable Groundwater Management Act (SGMA) compliant Groundwater Sustainability Plan (GSP) for the Borrego Basin.

The objectives of the GSP are to develop an appropriate mechanism to reduce present average annual groundwater withdrawals from the Borrego Basin of approximately 19,000 acre-feet per year (AFY) to the average annual recharge rate of approximately 5,700 AFY determined by the US Geological Survey (2015 study; https://pubs.er.usgs.gov/publication/sir20155150). It is the desire of the GSAs for the Borrego Basin that this reduction occurs within a timeframe to avoid *undesirable results* as defined under SGMA, but in any case, no longer than 2040, as mandated by SGMA for a critically overdrafted basin, the California Department of Water Resources (DWR) designation for the Borrego Basin.

Some of the foundational documents for the GSP that specify the characteristics of the Borrego Basin; the economics that prohibit imported water to augment existing groundwater supply to address the overdraft; lack of economically available water from nearby aquifers; and some of the business requirements for the provision of future municipal supply are located at: http://www.borregowd.org/Historical_Reports.php.

Policy recommendations that meet SGMA requirements agreed to by the Borrego Water Coalition members representing pumpers who withdraw approximately eighty percent (80%) of the groundwater extracted annually from the Borrego Basin are located at: http://www.borregospringschamber.com/bwc/documents/2014/BWC%20Policy%20Recs%20FINAL%2011-06-14.pdf.

GSP Components:

1. Reduction Plan to meet SGMA basin sustainability requirements in no more than 20-years:

   - establish a benchmarking protocol for reductions under SGMA : protocol for ongoing well metering program; and water quantity and water quality data collection standards and protocol;
   - establish baseline pumping period as a starting point for reduction program
   - establish reduction schedule to avoid *undesirable results*;
   - develop penalties schedule for not abiding by metering protocols and meeting water supply and/or water quality data collection standards.

2. Water Market Rules to establish fair, efficient and timely transactions:

   - establish market rules for water credits (an accounting for annual reduction in AFY withdrawals from the Borrego Basin) and production credits (an accounting for available withdrawals from the Borrego Basin in 2040 or the end of the Reduction Plan period);
   - develop an economic model for establishing value of water credits and production credits over the life of the reduction plan taking into account the probabilistic risk of the cost of advanced treatment dues to water quality degradation;
   - develop analytically-justified penalties for missing reduction targets.

3. Negotiated and Signed Agreements with stakeholders to abide by the Reduction Plan:

   - negotiate an agreement with stakeholders to accept and agree to abide by benchmarking protocol;
   - negotiate market rules for establishing a water market using water credits and production credits;
   - negotiate reduction schedule;
   - achieve agreement on penalties schedule to discourage free-riders;

- negotiate language of GSP sections.

4. Financing Plan to effectuate the implementation of the Reduction Plan:

   - credit requirements for rating financing;
   - financing sources;
   - financing schedule to meet Reduction Plan implementation schedule;
   - requirements of GSP to meet state, foundation, and bond market due diligence requirements.

5. Legal Plan to reduce the ongoing possibility for litigation that could forestall the implementation of the Reduction Plan:

   - review of GSP components as they are being developed to ascertain their analytical-basis and defensibility in case of disputes;
   - work with legal counsel on establishing defensibility of overall GSP in case of disputes.

6. Technical requirements to assess *undesirable results* issues:

   - depth-dependent water quality to forecast future need for advanced treatment to meet potable water quality for municipal use;
   - ongoing water quality monitoring program development;
   - management of fallowed farmland over long term to reduce dust and unsightliness and provide for land restoration for other uses, including use by the Anza-Borrego Desert State Park (the Park), as applicable;
   - Enforcement Plan for the components of the GSP.

7. Land Use Planning, Permitting, and Enforcement Measures

   - recommended County land use planning changes necessary to support the Reduction Plan;

- recommended County permitting changes necessary to support the Reduction Plan;

- recommended changes in Enforcement Measures to effectuate the efficient and fair implementation of the Reduction Plan and to avoid ongoing environmental and public health issues (e.g. exceeding air quality standards from fallowed farmland that may impact public health).

BWC GSP projects in que for Jerry Rolwing June 6, 2016

1) Create a basin-wide groundwater quality monitoring program to enable future planners to detect trends of water quality change
2) Work to establish baseline pumping period beginning set point for reduction plan
3) Establish depth dependent water quality sampling program with USGS to incorporate water quality at depth to the USGS model
4) Establish monitoring protocols for pumping flow, water level and water quality measuring
5) Build a water marketing concept to enable purchase of sustainable production credits
6) Work with County to change the existing water credit process
7) Change the existing water credit program to address sustainable water production credits
8) Basin boundary adjustment waiting for DWR and CWC – expected end of 2016
9) Oasis Ranch proposal to donate water credits and property possibly utilizing American Heritage Grant or donate to ABF or BWD
10) Watch for grant application programs designed to address GSP projects from both the SWRCB and DWR
11) More education/information out to all Valley-wide pumpers and water users

Other things:

- DWR CCP facilitator set to begin work with stakeholders after BWD/County MOU signed
- Document and locate all wells in valley with name/number, location, well log, owner info, present use
- Develop protocol for future well drilling parameters such as allowing replacement/new residence wells
- End use for fallowed farmland
- What happens when DWR stops semi-annual water level monitoring?
- Storm water catchment? Note: Pajaro WD in Salinas/San Jose area is now crediting private storm water retention/infiltration projects. Need to establish monitoring to determine if the process actually works
- Outside of basin possible projects in Clark Lake (Gilbert Rock homestead) and San Felipe Wash (Texas Dip)
- Domestic landscape ordinance specific to Borrego desert
- District-wide conversion to sewer connection in order to generate reclaimed water supply

Agenda Items:

- Discussion and potential action for hiring a consultant to assess the District's potential potable water supply liability (water supply shortage over time under SGMA) and development of a schedule for acquiring new capacity for its existing customer base;
- Discussion and potential action for hiring a consultant to forecast the District's ability to provide municipal water for the inventory of present un-built lots under the County's current zoning, and any potential additional lots under the County's current up-zoning requests.

Discussion:

In 2011, the District's financial consultant indicated that there were 2,157 improved and 3,914 unimproved parcels in the District boundary. Under SGMA, the District needs another ~1,000 production credits for its existing customers and the basin needs to be able to support another 3,052 production credits for future demand from these un-built lots.[1] There are not that many available production credits for future residential development in the District's boundaries under SGMA constraints i.e. sustainability.

W/re to the County's present up-zoning requests (e.g. Rudyville, etc. that would add another 500 EDUs w/in the District's boundaries): Up-zoning to approve additional lots may not be supportable under SGMA. To our knowledge, the County has never taken physical water limits into account in its land use decisions for the Valley. Under SGMA, my understanding from DWR is that this posture would not be acceptable under SGMA, which both the County and District are required to abide by since January 1, 2015 as the Borrego Basin is a medium priority, critically over-drafted DWR designated basin.

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[1] For example: if a platted lot = 1 EDU, and the average direct usage per EDU is ~0.55 AFY and the indirect usage/reserve is ~0.23 AFY (includes public space, commercial usage based on population + reserve from broken pipes, changes in consumption, etc.; essentially a safety amount), then the amount of physical water the District must be ready to provide at some time in the future is a reserve of # of unbuilt EDUs x 0.78 AFY. The District needs another ~1,000 production credits for its existing customers and the basin needs to be able to support another 3,052 production credits for future demand based on presently platted and County-approved lots. There are not that many available production credits available for future residential development under SGMA, assuming golf courses will also require additional supply under SGMA.

MANAGING WATER QUALITY RISK

Agenda Item:

Discussion and potential action regarding hiring a consultant to develop a forecast of future water quality changes necessary for: (1) establishing the District's eligibility for low cost financing for its proposed mixing and centralized storage CIP; (2) establishing an economically-driven timeframe to reach sustainability before the District's municipal customers are liable for the costs of advanced treatment to meet the State's drinking water quality standards.

Discussion:

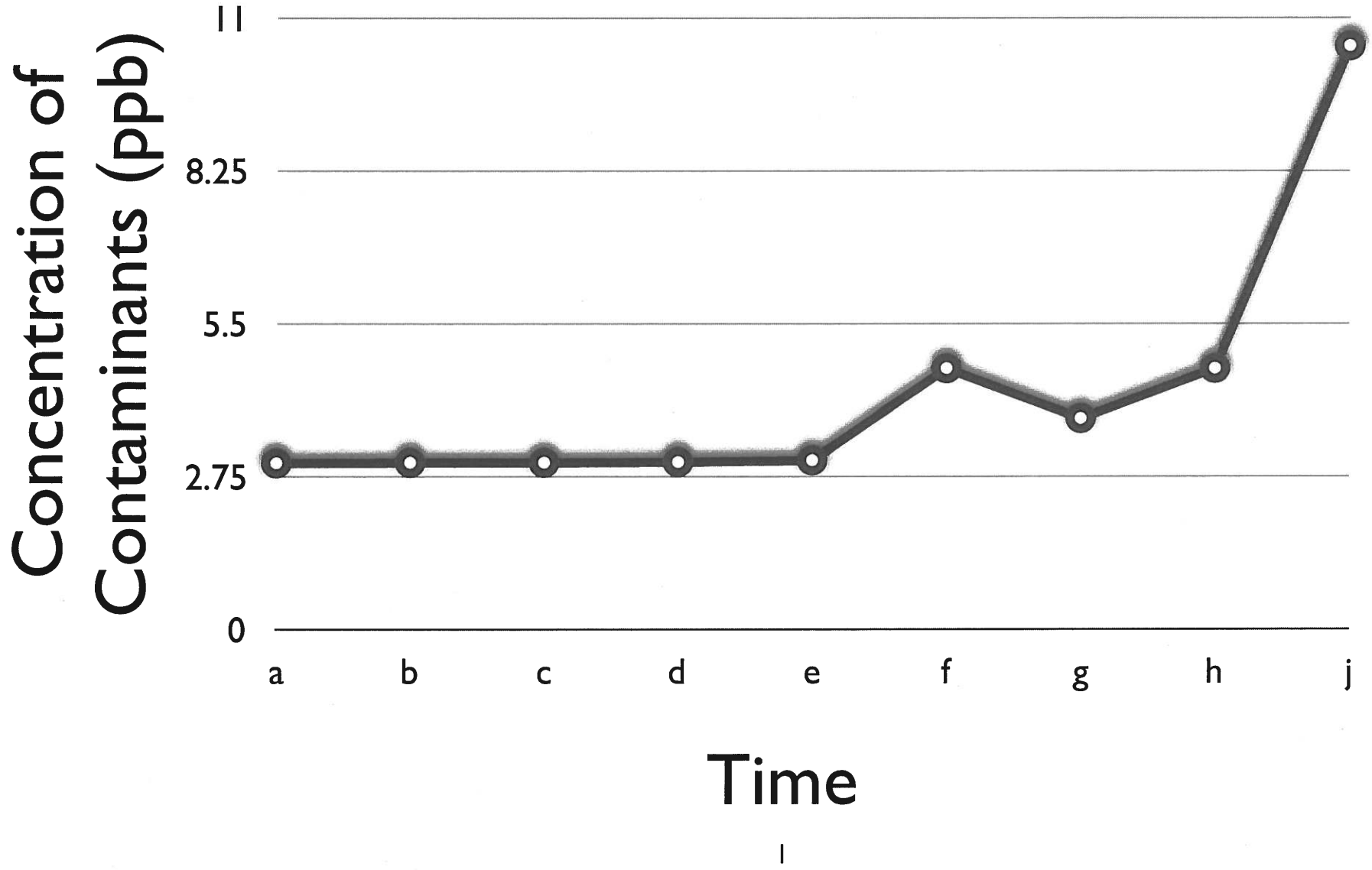
The physical system:

- water quality changes over time are not continuous (linear), but discontinuous (non-linear). That is, one cannot mathematically use a smooth curve projection of future water quality in a basin (see the attached chart that illustrates the physical system) based only on periodic measurements of water quality over time;
- water quality changes occur due to source changes. In a groundwater basin, flow dynamics change with water level changes. In other words, in a basin in overdraft, due to water level changes, from a water quality perspective, over time, it may be like changing sources. E.g. imagine a plume of contaminants heading for one of the District's wells. The District tests good year after year - until then the plume hits the next year and fails its tests;

Why so many water districts end up failing drinking water standards: Today, there are literally thousands of communities that do not currently meet drinking water quality standards. Why is that?

- regulations are one size fits all and regulatory-driven water quality measurements may not occur often enough or at too long of intervals. Thus, purely regulatory-driven measurements may not provide an adequate early warning signal for necessary water quality CIP investments;
- communities have often been unwilling to invest in WQ until a crisis, when costs are double or triple proactive investments;
- risk managers do not adequately understand the physical system and the non-linear nature of water quality change dynamics

Water Quality Changes over Time are Non-Linear



Agenda Items:

- Discussion and potential action for hiring a consultant to develop a draft set of market rules to update the District's water credit program that will enable the District to secure adequate potable supply for its present and future customers under SGMA (the District will need to acquire new supply under SGMA through water market transactions. Note: water markets need clear rules to function fairly and efficiently);
- Discussion and potential action for hiring a consultant to develop a model for estimating the economic value of water credits (a permanent reduction in the use of an AFY of water from the basin) over the estimated 20-years timeframe of SGMA);

Discussion:

- the District may have spent almost $200,000 to date in legal and related costs working on the water credits policy and in transactions involving water credits. It is likely, under the present water credits policy, that these costs will only increase;
- the District has been required to write off the value of its purchased water credits on its books each year. They appear to not be increasing in value. In fact, it is likely that they will only decrease in value over time under SGMA;
- the District has granted water credits of vastly different quality to individuals. Even as a water credit represents the reduction of 1 AFY, the basis for this reduction accounting varies, which places the District and County on a different accounting basis. Under SGMA, this difference is probably not supportable;
- the District may require a valuation of water credits for the water credits is has for sale, but this creates a problem from a tax valuation perspective and actually may hamper free market transactions by setting an artificial price for transactions. This is especially an issue with the present Dudek valuation analysis;
- the economic work that both DWR has paid for and the District has contracted for, which totals approximately $120,000 to date has been largely unsatisfactory and unhelpful for developing policy;
- in other words, the water credits policy, as it stands, is expensive and inefficient, and the economic work on using water credits has been insufficient to date. The uncertainty regarding water credits policy will only create larger problems and expense going forward unless addressed in the near future. From this perspective, we recommend that the Board:
- consider whether the District should get out of the business of selling and valuing water credits;
- consider whether the water credits program be phased out over the next five years;
- consider engaging additional economic policy advice as to exactly how the District can satisfy the need for an additional 1,000 AFY of water rights under SGMA for its current customers, much less many additional AFY for potential customers on the un-built lots the County has already approved.

Water Credit Conversion to Sustainable Credits for Groundwater Sustainability Plan

By: Jerry Rolwing, June 1, 2016

Water Credit Inventory:

765 AG-1's
55 AG-2's
6 T-2's
112 AG-3's

Pending (in progress):

433 AG-2's

Water Credits retired to date:

358

AG-1 credits were created for San Diego County overdraft mitigation as per the BWD/County MOU dated February 4, 2013. AG-2, AG-3 and T-2 credits were created from fallowing projects designed to specifically meet Borrego Water District new water service mitigation. The Borrego Water District conversion factor to Sustainable Water Credits (from Dudek report dated Feb. 24, 2016) is a 4:1 ratio. This number accounts for the estimated 70% reduction to achieve groundwater sustainability. In addition, the District has added a 1.33:1 ratio for conversion of AG-2 credits to AG-1 credits for District purposes only. There is presently no conversion factor for AG-3 credits.

The existing San Diego County water credit program was designed to address "no increase to the overdraft". In March 2016, the Borrego Water District adopted a 4:1 ratio to account for the future groundwater reduction program. Both programs were designed to allow new development to convert existing water usage to future usage (make room for new water use by taking out an existing use). One water credit is equal to 1 acre foot of future water use.

It is anticipated at this early stage of the Groundwater Sustainability Plan that overall groundwater pumping will need a 70% reduction over the 20 year period as prescribed by the Sustainable Groundwater Management Act of 2014. It is also anticipated that this reduction would be "ramped down" in five-year increments with milestones memorializing the reductions.

This proposed concept would allow for water credits to be converted to Sustainable Credits and able to be utilized in the reduction program. This process could work as follows:
765 AG-1 water credits converted to 191 Sustainable Credits (District's 4:1 ratio)
494 AG and T-2 water credits converted to 93 Sustainable Credits (District's 1.33:1, plus 4:1)
At this time, AG-3 credits still need further review

The Sustainable Credits could be utilized instead of reducing groundwater extractions. For instance, if the District had to reduce pumping by 500 acre feet in year five of the GSP and had 100 Sustainable Credits, in this case the District would permanently retire the 100 Sustainable credits, and physical reduce annual pumping by 400 acre feet to satisfy the required pumping reduction.

WATER CREDITS VALUATION TABLE

Assumptions:

- *water credit* - an accounting of the permanent reduction of one acre-foot per year (AFY) of withdrawals from the Borrego Basin; *production credit* - an accounting of expected groundwater availability to the holder at the SGMA-imposed 20-year reduction requirement;

- under SGMA, reductions must proceed from a hard cap for annual water use and a cap is necessary for water credits (and production credits) to have both validity and value;

- under SGMA, validated measurement of annual water use is necessary to determine if 5-year reductions have been achieved and the correct ratio of water credits to production credits has been established;

- the economic value of a water credit are from the perspective of the District only. These economic values do not necessarily representrket values, but could be construed as the maximum tax value for a donation to the District;

- the economic absolute tax value of a water credit must decrease over time as the longer withdrawals continue, the greater the business risk to the District for needing advanced treatment infrastructure and the absorption of these very large costs by municipal water customers;

- **the numbers in the table below are for illustrative purposes only. They have not been analytically determined.**

WATER CREDITS VALUATION TABLE

Water Credits Valuation Under SGMA Table

Year	Annual Reductions	Period Reductions	Penalty for Exceeding Reductions ($/AF)	Estimated Economic Value of Water Credit as Donation to District	Estimated Economic Value of an Acre of Land Donated to ABF w/ Easement Preventing Future Water Use	Estimated Cash Value of Water Credits Based on Recent Market Transactions
1	4%		$150	$3,600	$5,600	$1,600
2	8%					
3	12%					
4	16%					
5	20%	22%				
6	24%		$300	$3,200		
7	28%					
8	32%					
9	36%					
10	40%	44%				
11	44%		$550	$2,800		
12	48%					
13	52%					
14	56%					
15	60%	64%				
16	64%		$875	$2,400		
17	66%					
18	67%					
19	69%					
20	70%	70%	$1,200	$2,200		

	Contract / Project	January	February	March	April	May
	PAYMENTS					
1	T2 Borrego	1/1/15: Pay spare cost in advance			Raftelis spare capacity cost analysis	5/1/15 Notice of 2015/2016 spare capacity due.
2	P & I Payment for ID4 COP's			1st half of payments due		
3	Compass Bank		2016 - payment due March 1st.			2016 - payment due June 1st.
4	**CONTRACTS**					
5	American Red Cross-can cancel any time					
6	Club Circle (Cameron)		option to renew lease by 2/28/2017			
7	Green Desert Landscape		discuss w/ Bob the option of continuing with contract 2/28/2017			
8	Xerox					
9	Pitney Bowes - postage machine				4/1/2017 send letter of cancellation if desired	
10	San Diego Mailing Solutions (Annual maintenance - postage and stuffer machine)					
11	Ramona Disposal - Club Circle					
12	Ramona Disposal - BWD Dumpsters					
13	**REPORTS**					
14	CASGEM				Submit CASGEM water level data	
15	CCR					
16	Cameron Bros. Water Usage Report (golf course) to county					
17	Santago Estate					
18	Annual EAR Report (CDHS)			Due 3/31 for previous year		
19	Check fallow property for water usage					
20	**ADMINISTRATIVE**					
21	Audit					
22	Budget			Pump check	CIP meeting, draft budget document	Final Budget document / FY Rate Resolution
23	Business Plan	Raftelis begins rate analysis	February 2016 -Update Development Fees (water credits & infrastructure buy-in costs for new connections)	Prop 218 rate for FY 2017 - Fy 2021 public hearing		FY Budget and new rates approved
24	Utility Rate Study Schedule	Preliminary Rates Disseminated by 1/29/2016	..Rates Finalized 2/19/2016 ...Initial Draft Report Disseminated 2/24/2016 ... Prop 218 Notice Mailed 2/26/2016	Receive edits and finalize report		
25	Groundwater Sustainability Plan (GSP)	District Meeting Jan. 20 to discuss policy recommendations, DRAFT MOU between County & District. Submit boundary adjustment to DWR	District Meeting February 17th to discuss policy recommendations, Draft MOU of County and Distict with Coaltion; proposal for mechanism(s) to pay for GSP development		District Meeting March 17th to discuss policy recommendations, Draft MOU between County and District; DRAFT MOU of County and District with Coalition; proposal for mechanism(s) to pay for GSP development	
26	Investment Policy					
27	Special Assessments / tax bill resolutions-Taussig					
28	Town Hall Meeting			March 2017'		
29	Water Credit Policy			2015- Check if pricing needs to be adjusted (moved to due dilligence)		
30	Storage/blending infrastructure project					

	June	July	August	September	October	November	December
1	6/15/15: commitment of annual spare capacity due from T2 6/30/15: T2 to fallow 200 acre feet 6/30/15: T2 to pay BWD $110 per a/f over 800.	7/1/17: establish water budget					12/31/14: T2 to purchase land to fallow 12/31/18 lease expires Send invoice for Spare Capacity
2				2nd half of payments due			
3		1st payment due September 1st			Payment due December 1st.		
4							
5							
6	Lease expires 6/30/2017						
7	Agreement expires 6/30/2017	Cost of Water Adjustment each July 1st. With Cameron					
8		Lease contract expires 7/2020					
9		lease expires 7/2017					
10			Annual maintenance contract expires 10/6/16				
11			contact RDS re: contract renewal				rate valid until 12/2016
12			contact RDS re: contract renewal				rate valid until 12/2016
13							
14						Submit CASGEM water level data	
15		CCR to be distributed July 1st			10/1/15 Mail CCR Certification form		
16					Send to County DPLU by 10/31		
17	Occupancy report due						
18							
19				Annual fallow property check			
20							
21			Begin audit	Review of draft audit report			
22	Approval of Budget June 9th						
23		New rates go into effect		March 2015-Identify & Implement Mechansim to pay for GSP costs. March 2016- Update rate structure & water, sewer & WWT rates			
24	Public Hearing 6/9/2016						
25				DRAFT MOU of County and District with Coalition; proposal for mechanism(s) to pay for GSP development			Agree on GSP funding mechanism; start GSP development
26	Investment polices restated						
27	Special Assessments resolutions due						
28							
29							
30							

BORREGO WATER DISTRICT

May 2016

WATER OPERATIONS REPORT

WELL	TYPE	FLOW RATE	STATUS	COMMENT
ID1-8	Production	350	In Use	
ID1-10	Production	300	In Use	
ID1-12	Production	900	In Use	
ID1-16	Production	750	In Use	
Wilcox	Production	80	In Use	Diesel backup well for ID-4
ID4-4	Production	400	In Use	
ID4-11	Production	900	In Use	Diesel engine drive exercised monthly
ID4-18	Production	150	In Use	
ID5-5	Production	850	In Use	

System Problems: All Production Wells and reservoirs are in operating condition. The District is moving forward with ACWAJPIA insurance for a claim on the 800 Tank.

WASTEWATER OPERATIONS REPORT

Rams Hill Water Reclamation Plant serving ID-1, ID-2 and ID-5 Total Cap. 0.25 MGD (million gallons per day):

Average flow: 62,128 (gallons per day)
Peak flow: 93,047 gpd Friday May 20, 2016

BORREGO WATER DISTRICT

WATER PRODUCTION SUMMARY

MAY 2016

DATE	ID-1	ID-3	ID-4	DISTRICT-WIDE TOTALS
May-14	64.47	8.46	116.31	189.24
Jun-14	78.14	9.52	123.76	211.42
Jul-14	100.19	9.13	141.45	250.77
Aug-14	101.13	9.72	114.76	225.61
Sep-14	89.33	10.49	142.82	242.64
Oct-14	99.66	9.71	130.38	239.75
Nov-14	71.94	10.32	123.00	205.26
Dec-14	38.95	6.96	95.47	141.38
Jan-15	32.95	6.38	85.84	125.17
Feb-15	22.13	6.15	86.06	114.34
Mar-15	16.78	5.94	86.54	109.26
Apr-15	32.79	8.30	129.76	170.85
May-15	29.25	7.28	104.29	140.82
Jun-15	32.44	9.02	116.67	158.13
Jul-15	29.94	10.04	108.89	148.87
Aug-15	28.19	8.51	113.56	150.26
Sep-15	29.17	9.63	132.98	171.78
Oct-15	32.88	9.23	117.32	159.43
Nov-15	25.27	8.24	113.84	147.35
Dec-15	17.25	7.39	99.01	123.65
Jan-16	13.70	7.25	72.07	93.02
Feb-16	12.96	7.04	91.40	111.40
Mar-16	13.87	6.51	86.66	107.04
Apr-16	17.04	7.99	94.32	119.35
May-16	15.29	7.70	92.56	115.55
12 Mo. TOTAL	268.00	98.55	1239.28	1605.83

Totals reflect individual improvement district usage. Interties from ID-3 have been subtracted from well pumpage totals and applied to respective ID's. All figures in Acre Feet of water pumped or recorded on intertie meters.

WATER LOSS SUMMARY (%)

PROGRAM DID NOT CALCULATE WATER LOSS FOR JANUARY IN TIME FOR THIS REPORT

DATE	ID-1	ID-3	ID-4	ID-5	DISTRICT-WIDE AVERAGE
May-16	1.98	1.69	15.71	N/A	6.46
12 Mo. Average	6.78	1.88	16.06	N/A	8.24

BORREGO WATER DISTRICT

Water Production / Use Records

ID # 1

Month of May 2016

Water Production (Acre Feet)

Date	Well 1	Well 2	Well 8	Well 10	Well 12	Well 16	-Wells1&2	=TotProdn	LessID3&4
MAY'15	26.99	0.00	4.63	0.00	14.61	17.29	26.99	36.53	29.25
JUN'15	29.81	13.05	0.03	0.26	20.84	20.33	42.86	41.46	32.44
JUL'15	31.62	0.00	0.02	0.00	27.10	12.86	31.62	39.98	29.94
AUG'15	29.12	0.00	8.17	2.56	18.88	7.09	29.12	36.70	28.19
SEP'15	26.32	0.00	17.31	8.03	8.96	4.50	26.32	38.80	29.17
OCT'15	22.39	0.00	0.03	3.93	24.16	13.99	22.39	42.11	32.88
NOV'15	10.12	12.75	0.05	10.48	21.01	1.97	22.87	33.51	25.27
DEC'15	9.77	10.22	0.02	7.65	16.96	0.01	19.99	24.64	17.25
JAN'16	1.88	1.37	1.36	6.34	12.20	1.05	3.25	20.95	13.70
FEB'16	0.02	0.53	7.60	3.73	8.44	0.23	0.55	20.00	12.96
MAR'16	0.00	4.45	17.78	0.09	1.91	0.60	4.45	20.38	13.87
APR'16	0.50	10.87	19.92	0.06	5.03	0.02	11.37	25.03	17.04
MAY'16	9.10	10.31	11.15	0.00	11.84	0.00	19.41	22.99	15.29
TOTALS	170.65	63.55	83.44	43.13	177.33	62.65	234.20	366.55	268.00

Water Use (Acre Feet)

Date	Domestic	Irrigat'n	Constrt'n	Golf Course	Golf Spare Cap	ID 3	ID 4	Total	Water Loss	% Loss
MAY'15	8.29	9.21	0.00	0.00	9.47	7.28	0.00	34.25	2.28	6.24%
JUN'15	8.72	10.93	0.00	0.00	10.82	9.02	0.00	39.49	1.97	4.76%
JUL'15	10.09	14.86	0.00	0.00	2.47	10.04	0.00	37.46	2.52	6.31%
AUG'15	10.71	13.84	0.00	0.00	0.00	8.51	0.00	33.06	3.64	9.95%
SEP'15	10.22	13.04	0.00	0.00	2.57	9.63	0.00	35.46	3.34	8.60%
OCT'15	10.67	11.10	0.00	0.00	8.19	9.23	0.00	39.19	2.92	6.94%
NOV'15	10.12	8.67	0.00	0.00	4.22	8.24	0.00	31.25	2.26	6.74%
DEC'15	8.03	6.95	0.00	0.00	0.00	7.39	0.00	22.37	2.27	9.24%
JAN'16	7.26	4.29	0.00	0.00	0.00	7.25	0.00	18.80	2.15	10.31%
FEB'16	7.19	5.38	0.00	0.00	0.00	7.04	0.00	19.61	0.39	1.95%
MAR'16	6.68	5.79	0.00	0.00	0.00	6.51	0.00	18.98	1.40	6.88%
APR'16	8.08	7.46	0.00	0.00	0.00	7.99	0.00	23.53	1.50	5.96%
MAY'16	7.05	7.79	0.00	0.00	0.00	7.70	0.00	22.54	0.45	1.98%
TOTALS	104.82	110.10	0.00	0.00	28.27	98.55	0.00	341.74	24.81	6.78%

BORREGO WATER DISTRICT
Water Production / Use Records
ID # 3
Month of May 2016

	La Casa del Zorro Total Acre Feet		Deep Well Trail / Others Acre Feet			Total	Total	Total
Date	Irrigat'n	Domestic	Irrigat'n	Domestic	Total	Irrigat'n	Domestic	Acre Feet
MAY'15	0.00	2.46	0.25	4.37	4.62	0.25	6.83	7.08
JUN'15	0.00	3.32	0.24	5.17	5.41	0.24	8.49	8.73
JUL'15	0.00	3.46	0.13	5.93	6.06	0.13	9.39	9.52
AUG'15	0.00	3.43	0.16	5.28	5.44	0.16	8.71	8.87
SEP'15	0.00	3.33	0.14	6.03	6.17	0.14	9.36	9.50
OCT'15	0.00	3.36	0.22	5.49	5.71	0.22	8.85	9.07
NOV'15	0.00	3.10	0.08	4.97	5.05	0.08	8.07	8.15
DEC'15	0.00	2.91	0.07	4.23	4.30	0.07	7.14	7.21
JAN'16	0.00	2.86	0.09	4.06	4.15	0.09	6.92	7.01
FEB'16	0.00	2.54	0.12	4.58	4.70	0.12	7.12	7.24
MAR'16	0.00	2.37	0.10	3.82	3.92	0.10	6.19	6.29
APR'16	0.00	3.14	0.09	4.31	4.40	0.09	7.45	7.54
MAY'16	0.00	3.01	0.08	4.48	4.56	0.08	7.49	7.57
TOTALS	0.00	36.83	1.52	58.35	59.87	1.52	95.18	96.70

Date	Water Produced Acre Feet	Water Delivered Acre Feet	Wtr Loss	% Loss
MAY'15	7.29	7.08	0.21	2.88%
JUN'15	9.02	8.73	0.29	3.22%
JUL'15	10.04	9.52	0.52	5.18%
AUG'15	8.51	8.87	-.36	-4.23%
SEP'15	9.63	9.50	0.13	1.35%
OCT'15	9.23	9.07	0.16	1.73%
NOV'15	8.24	8.15	0.09	1.09%
DEC'15	7.39	7.21	0.18	2.44%
JAN'16	7.25	7.01	0.24	3.31%
FEB'16	7.04	7.24	-.20	-2.84%
MAR'16	6.51	6.29	0.22	3.38%
APR'16	7.99	7.54	0.45	5.63%
MAY'16	7.70	7.57	0.13	1.69%
TOTALS	98.55	96.70	1.85	1.88%

BORREGO WATER DISTRICT

Water Production / Use Records

ID # 4

Month of May 2016

Water Production (Acre Feet)

Date	Well 2	Well 3	Well 4	Well 5	Well 10	Well 11	Well 18	Wilcox	Well 85	Total	Less ID5
MAY'15	0.00	0.00	44.16	9.57	6.91	40.55	3.09	0.01	0.00	104.29	104.29
JUN'15	0.00	0.00	50.06	9.12	8.40	45.42	3.67	0.00	0.00	116.67	116.67
JUL'15	0.00	0.00	40.26	18.80	0.00	46.40	3.43	0.00	0.00	108.89	108.89
AUG'15	0.00	0.00	42.85	18.74	0.00	48.91	3.05	0.01	0.00	113.56	113.56
SEP'15	0.00	0.00	47.84	22.20	0.00	59.16	3.74	0.04	0.00	132.98	132.98
OCT'15	0.00	0.00	41.80	20.80	0.00	51.34	3.38	0.00	0.00	117.32	117.32
NOV'15	0.00	0.00	42.96	18.46	0.00	49.35	3.07	0.00	0.00	113.84	113.84
DEC'15	0.00	0.00	44.32	16.53	0.00	35.72	2.44	0.00	0.00	99.01	99.01
JAN'16	0.00	0.00	43.27	12.26	0.00	15.00	1.54	0.00	0.00	72.07	72.07
FEB'16	0.00	0.00	46.93	16.74	0.00	25.44	2.25	0.04	0.00	91.40	91.40
MAR'16	0.00	0.00	38.74	15.50	0.00	30.20	2.14	0.08	0.00	86.66	86.66
APR'16	0.00	0.00	40.13	16.85	0.00	34.93	2.41	0.00	0.00	94.32	94.32
MAY'16	0.00	0.00	38.11	15.97	0.00	36.10	2.38	0.00	0.00	92.56	92.56
TOTALS	0.00	0.00	517.27	201.97	8.40	477.97	33.50	0.17	0.00	1239.28	1239.28

Date	Water Produced Acre Feet	Water Use Acre Feet	Wtr Loss	% Loss	ID 5 Acre Feet
MAY'15	104.29	87.10	17.19	16.48%	0.00
JUN'15	116.67	99.06	17.61	15.09%	0.00
JUL'15	108.89	94.21	14.68	13.48%	0.00
AUG'15	113.56	96.54	17.02	14.99%	0.00
SEP'15	132.98	108.92	24.06	18.09%	0.00
OCT'15	117.32	100.23	17.09	14.57%	0.00
NOV'15	113.84	94.66	19.18	16.85%	0.00
DEC'15	99.01	83.23	15.78	15.94%	0.00
JAN'16	72.07	58.73	13.34	18.51%	0.00
FEB'16	91.40	74.06	17.34	18.97%	0.00
MAR'16	86.66	73.79	12.87	14.85%	0.00
APR'16	94.32	78.79	15.53	16.47%	0.00
MAY'16	92.56	78.02	14.54	15.71%	0.00
TOTALS	1239.28	1040.24	199.04	16.06%	0.00

From: **Keslin, Allyson** <Allyson.Keslin@sdcounty.ca.gov>
Date: Fri, Jun 3, 2016 at 3:53 PM
Subject: RE: Neighborhood Reinvestment Grant application by Borrego Water District (BWD)
To: Joseph Tatusko <jatmpk@gmail.com>

Hi Joe,

Thank you for checking in. Unfortunately, we have allocated all of our NRP funds for this Fiscal Year. If you are still in need of funding, you are welcome to reapply for next Fiscal Year after July 1st.

Regards,

Allyson Keslin
Policy Advisor
Chairman Bill Horn
County of San Diego
(619) 531-5555