



LAS VIRGENES MUNICIPAL WATER DISTRICT
 4232 Las Virgenes Road, Calabasas CA 91302

AGENDA
REGULAR MEETING

Members of the public wishing to address the Board of Directors are advised that a statement of Public Comment Protocols is available from the Clerk of the Board. Prior to speaking, each speaker is asked to review these protocols and **MUST** complete a speakers' card and hand it to the Clerk of the Board. Speakers will be recognized in the order cards are received.

The **Public Comments** agenda item is presented to allow the public to address the Board on matters not on the agenda. The public may present comments on any agenda item at the time the item is called upon for discussion.

Materials prepared by the District in connection with subject matter on the agenda are available for public inspection at 4232 Las Virgenes Road, Calabasas, CA 91302. Materials prepared by the District and distributed to the Board during this meeting are available for public inspection at the meeting or as soon thereafter as possible. Materials presented to the Board by the public will be maintained as part of the records of these proceedings and are available upon written request to the Clerk of the Board.

5:00 PM

June 9, 2015

PLEDGE OF ALLEGIANCE

1. **CALL TO ORDER AND ROLL CALL**
2. **APPROVAL OF AGENDA**
3. **PUBLIC COMMENTS**

Members of the public may now address the Board of Directors **ON MATTERS NOT APPEARING ON THE AGENDA**, but within the jurisdiction of the Board. No action shall be taken on any matter not appearing on the agenda unless authorized by Subdivision (b) of Government Code Section 54954.2

4. **CONSENT CALENDAR**

A Directors' Per Diem: May 2015 Ratify (Pg.5)

B List of Demands: June 9, 2015 Approve (Pg.10)

5. ILLUSTRATIVE AND/OR VERBAL PRESENTATION AGENDA ITEMS

A Legislative and Regulatory Updates

B Water Supply Conditions and Drought Response

6. TREASURER

7. FACILITIES AND OPERATIONS

A Calabasas Tank Rehabilitation Project: Final Acceptance (Pg.36)

Approve execution of a Notice of Completion by the Secretary of the Board and have the same recorded, and in the absence of claims from subcontractors and others, release the retention, in the amount of \$111,847.42, thirty (30) calendar days after filing the Notice of Completion for the Calabasas Tank Rehabilitation Project.

B Construction of Impressed Current Cathodic Protection System for Centrate Treatment and Storage Tanks: Final Acceptance (Pg.39)

Approve execution of a Notice of Completion by the Secretary of the Board and have the same recorded, and in the absence of claims from subcontractors and others, release the retention, in the amount of \$5,000, thirty (30) calendar days after filing the Notice of Completion for the Construction of Impressed Current Cathodic Protection System for Centrate Treatment and Storage Tanks Project.

C Discussion of Triunfo Sanitation District's Interest in Conducting a Partnering Workshop on Recycled Water Policy (Pg.43)

Discuss Triunfo Sanitation District's interest in conducting a partnering workshop with Las Virgenes Municipal Water District to discuss future recycled water policy decisions.

8. FINANCE AND ADMINISTRATION

A Information Systems Master Plan: Receive and File (Pg.81)

Receive and file the Information Technology Assessment and Information Systems Master Plan prepared by NexLevel Information Technology, Inc., and authorize staff to incorporate the recommended organizational changes and information technology projects in the proposed Fiscal Year 2015-16 Budget.

9. LEGAL SERVICES

A Update of Las Virgenes Municipal Water District Code: Session No. 8 (Pg.199)

Consider seven policy issues identified during the course of the review process for the Las Virgenes Municipal Water District Code and provide staff with feedback.

10. NON-ACTION ITEMS

A Organization Reports

(1) MWD Representative Report/Agenda(s) (Pg.206)

(2) Other

B Director's Reports on Outside Meetings**C General Manager Reports**

(1) General Business

(2) Follow-Up Items

D Director's Comments**11. FUTURE AGENDA ITEMS****12. PUBLIC COMMENTS**

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13. CLOSED SESSION**A Conference with District Counsel – Existing Litigation (Government Code Section 54956.9(a)):**

Las Virgenes - Triunfo Joint Powers Authority v. United States Environmental Protection Agency and Heal the Bay, Inc. v. Lisa P. Jackson

14. OPEN SESSION AND ADJOURNMENT

June 1, 2015

To: Payroll

From: David W. Pedersen
General Manager

RE: Per Diem Request – May 2015

Attached are the Director statements of attendance for meetings, conferences and miscellaneous functions, which are summarized in the table below. If you have any questions, please contact me. Thank you.

On February 26, 2008, the Board unanimously voted to amend the daily per diem to \$200, effective February 27, 2008. On January 26, 2010, during the annual review of compensation, the Board opted for the per diem to remain at \$200 and requested that a per diem survey be conducted along with the next employee compensation study.

<u>Director</u>	<u>No. of Meetings</u>	<u>Rate</u>	<u>Total</u>
Charles Caspary	8	\$200.00	\$1,600.00
Glen Peterson LVMWD* – 6 MWD** – 8	14	\$200.00	\$2,800.00
Leonard Polan	8	\$200.00	\$1,600.00
Lee Renger	4	\$200.00	\$800.00
Jay Lewitt	6	\$200.00	\$1,200.00

*LVMWD Code Section 2-2.401(a): "not exceeding a total of ten (10) days in any calendar month"

**LVMWD Code Section 2-2.401(b): MWD director "not exceeding a total of (10) days in any calendar month."

LAS VIRGENES MUNICIPAL WATER DISTRICT - PER DIEM REPORT

To: Clerk of the Board _____ Director's Name: Charles Caspary

Month of: May-15 Division: 1



The following are Las Virgenes Municipal Water District Board of Directors Meetings, Committee Meetings/Conferences I have attended:

Date(s)	Event	# of Days Claimed		Reimbursible Expenses ² (Y/N)	Check One		Event Title
		Travel ¹	Total		MWD	LVMWD	
5/2/2015	0		0	N		X	LVMWD Potable Water Public Tour
5/4/2015	1		1	N		X	LV-TSD JPA Board Meeting
5/5-8/2015	4		4	Y		X	State Water Resources Control Board - Drought Hearing (5/5/15) and Assn. of California Water Agencies Spring Conference - both in Sacramento
5/12/2015	1		1	N		X	LVMWD - Regular Board Meeting
5/14/2015	0		0	N		X	Malibu Creek Stormwater MS4 Workshop
5/21/2015	1		1	N		X	Association of Water Agencies - Thousand Oaks
5/26/2015	1		1	N		X	LVMWD - Regular Board Meeting
ITEM 4			TOTAL		8		

NOTES: 1. Travel the day before and/or after an authorized meeting or seminar outside of LA, Ventura and Orange Counties may be paid in accordance with Board Policy. 2. Attach completed Statement of Account and Claim for Personally Incurred

LAS VIRGENES MUNICIPAL WATER DISTRICT - PER DIEM REPORT

To: Clerk of the Board

Director's Name: Glen Peterson

Month of: April, 2015

Division: 2




The following are Las Virgenes Municipal Water District Board of Directors Meetings, Committee Meetings/Conferences I have attended:

Date(s)	# of Days Claimed		Reimbursible Expenses ² (Y/N)	Check One		Event Title
	Event	Travel ¹		Total	MWD	
5/1/15	1		1 y		x	ACWA State Leg Committee Sacramento
5/5-7/15	3		3 n/a	x		ACWA Spring Conference Sacramento
5/11/15	1		1 n/a	x		committee meetings
5/12/15	1		1 n/a		x	Board meetings
5/13-14/15	2		2 n/a	x		Colorado River Board of California
5/15-17/15	3		3 n/a		x	Solar Cup at Lake Skinner
5/21/15	1		1 n/a	x		Colorado River Users Association Mid Year Meeting Las Vegas
5/22/15	1		1 n/a	x		Bay Delta Meeting Briefing
5/26/15	1		1 n/a		x	Committee meetings and Board Meetings
TOTAL				14	8	6

Date Submitted: 5-28-15
 Director Signature: [Signature]

NOTES: 1. Travel the day before and/or after an authorized meeting or seminar outside of LA, Ventura and Orange Counties may be paid in accordance with Board Policy. 2. Attach completed Statement of Account and Claim for Personally Incurred Expenses form.

LAS VIRGENES MUNICIPAL WATER DISTRICT - PER DIEM REPORT


 To: Joanne Bodenhamer, Clerk of the Board Director's Name: Leonard Polan
 Month of: May Division: #4

The following are Las Virgenes Municipal Water District Board of Directors Meetings, Committee Meetings/Conferences I have attended:

Date(s)	# of Days Claimed		Reimbursible Expenses ² (Y/N)	Check One		Event Title
	Event	Travel ¹		Total	MWD	
5/4/15	1	---	1	---	Y	JPA Board Meeting
5/5-8/15	4	---	4	Y	Y	ACWA conference Sacramento
5/12/15	1	---	1	---	Y	LVMWD BOARD MTG
5/21/15	1	---	1	---	Y	AWA VC Meeting
5/26/15	1	---	1	---	Y	LVMWD BOARD MTG
TOTAL			8			

Date Submitted: 5/29/15
 Director Signature: Electronically Signed Leonard E. Polan

NOTES: 1. Travel the day before and/or after an authorized meeting or seminar outside of LA, Ventura and Orange Counties may be paid in accordance with Board Policy. 2. Attach completed Statement of Account and Claim for Personally Incurred Expenses form.

LAS VIRGENES MUNICIPAL WATER DISTRICT - PER DIEM REPORT



To: Dave Pedersen		Director's Name: LEE RENGER			
Month of: MAY		Division:			
The following are Las Virgenes Municipal Water District Board of Directors Meetings, Committee Meetings/Conferences I have attended:					
Date(s)	# of Days Claimed	Reimbursible Expenses2 (Y/N)	Check One		Event Title
			MWD	LVMWD	
5/4/2015	1			X	JPA BOARD MEETING
5/12/2015	1			X	LVMWD BOARD MEETING
5/21/2015	1			X	AWA MEETING
5/26/2015	1			X	LVMWD BOARD MEETING
TOTAL				4	

TEM 4A

NOTES: 1. Travel the day before and/or after an authorized meeting or seminar outside of LA, Ventura and Orange Counties may be paid in accordance with Board Policy. 2. Attach completed Statement of Account and Claim for Personally Incurred Expenses form.

Date Submitted: 30/May/15
 Director Signature: Lee Renger

LAS VIRGENES MUNICIPAL WATER DISTRICT - PER DIEM REPORT



To: Dave Pedersen Director's Name: Jay Lewitt
 Month of: May Division: 5

The following are Las Virgenes Municipal Water District Board of Directors Meetings, Committee Meetings/Conferences I have attended:

Date(s)	# of Days Claimed		Reimbursible Expenses ² (Y/N)	Check One		Event Title
	Event	Travel ¹		Total	MWD	
5/4/2015	1		N		X	JPA Board Meeting
5/6 - 5/7/2015	2		Y		X	ACWA Conference Sacramento
5/12/2015	1		N		X	LVMWD Board Meeting
5/21/2015	1		N		X	AWA Breakfast Meeting
5/26/2015	1		N		X	LVMWD Board Meeting
TOTAL			6			

ITEM _____ Date Submitted: 28-May-15
 Director Signature: Jay Lewitt by email

NOTES: ¹ Travel the day before and/or after an authorized meeting or seminar outside of LA, Ventura and Orange Counties may be paid in accordance with Board Policy. ² Attach completed Statement of Account and Claim for Personally Incurred Expenses form.

LAS VIRGENES MUNICIPAL WATER DISTRICT

To: JAY LEWITT, TREASURER

Payments for Board Meeting of : June 9, 2015

Upon certification by the Treasurer the checks and wire transfers were correct and supporting documents available, it is recommended the following demands on the various funds be approved and payments authorized.

Wells Fargo Bank A/C No. 4806-994448

Checks Nos. 69391 through 69512 were issued in the total amount of \$ 439,302.47

Payments through wire transfers as follows:

5/29/2015 Metropolitan Water Dist. Payment for water deliveries in the month of March 2015 \$ 1,399,267.72

Total wires \$ 1,399,267.72

Total payments \$ 1,838,570.19

(Reference is hereby to these demands on file in the District's Check Register and by this reference the same is incorporated herein and made a part hereof.)

**CHECK LISTING FOR BOARD MEETING
06/09/15**

Company Name	Company No.	Check No. 69391 thru 69413 05/26/15	Amount	Check No. 69414 thru 69447 06/02/15	Amount	Check No. 69448 thru 69512 06/09/15	Amount	Total
Potable Water Operations	101	28,831.92		1,790.98		194,338.54		224,961.44
Recycled Water Operations	102							0.00
Sanitation Operations	130	98.11				46.72		144.83
Potable Water Construction	201							0.00
Water Conservation Construction	203							0.00
Sani- Construction	230							0.00
Potable Water Replacement	301	18,106.78				48,954.37		67,061.15
Reclaimed Water Replace	302							0.00
Sanitation Replacement	330							0.00
Internal Service	701	27,137.81		46,959.12		34,697.61		108,794.54
JPA Operations	751	34,055.36		14,002.00		20,035.33		68,092.69
JPA Construction	752							0.00
JPA Replacement	754	187.00		2,640.00		1,716.10		4,543.10
Total Printed		108,416.98		65,392.10		299,788.67		473,597.75
Voided Checks/ payment stopped:								
CK#69230	101	(206.10)						(206.10)
CK#65948 & 69138	701	(33,925.68)						(33,925.68)
CK#69388	751	(163.50)						(163.50)
Total Voids		(34,295.28)		0.00		0.00		(34,295.28)
Net Total		74,121.70		65,392.10		299,788.67		439,302.47



MWD
METROPOLITAN WATER DISTRICT OF SOUTHERN CALIFORNIA
 700 North Alameda Street
 Los Angeles, CA, 90012-2944

INVOICE

Billed To:
 Las Virgenes Municipal Water District



Service Address
 4232 Las Virgenes Road
 Calabasas, CA 91302

March 2015	Page No. 1 of 1
Mailed: 04/10/2015	Due Date: 05/29/2015
Invoice Number: 8315	Revision: 0

NOTICE

The MWD Administrative Code Section 4507 and 4508 require that payment must be made in "Good Funds" by the due date or the payment will be considered delinquent and an additional charge shall be assessed.

DELIVERIES	Volume (AF)
Total Water Treated Delivered	1,221.3

SALES	Type	Volume (AF)	Rate (\$ /AF)	Total (\$)
Full Service	Tier 1 Supply Rate	1,460.3	\$158.00	\$230,727.40
	System Access Rate	1,460.3	\$257.00	\$375,297.10
	Water Stewardship Rate	1,460.3	\$41.00	\$59,872.30
	System Power Rate	1,460.3	\$126.00	\$183,997.80
	Treatment Surcharge	1,460.3	\$341.00	\$497,962.30
SUBTOTAL				\$1,347,856.90

OTHER CHARGES AND CREDITS	Rate (\$ /AF)	
Conservation Debit/Credit	(\$125,346.00)	
Readiness To Serve Charge(Payment Schedule: M)	\$136,611.82	
Capacity Charge(Payment Schedule: M)	\$40,145.00	
SUBTOTAL		\$51,410.82

ADDITIONAL INFORMATION	Volume (AF)	Tier1 %	Peak Day	Flow (CFS)
Purchase Order Commitment (Jan 2015 to Dec 2024)	162,386.7			
Purchase Order Firm Delivery To Date (Jan 2015 to Dec 2024)	5,007.6			
Tier 1 Annual Limit (For Current Calendar Year)	24,358.0			
Tier 1 YTD Deliveries (For Current Calendar Year)	5,007.6	20.6		
Tier 1 Current Month Deliveries	1,460.3			
Capacity Charge			7/7/2011	43.4

INVOICE TOTAL

Volume AF	Amount Now Due
1,460.3	\$1,399,267.72

Note: Amount Due is based on highlighted fields

Approved for Payment
David W. Pedersen 04/15/15
 David W. Pedersen, P.E.

Approved for Payment
David R. Lippman 4/9/15
 David R. Lippman

P A I D
 wired @ 5/29/15
 SC

Batch Number - 237608
Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Document Ty	Document Number	Key Ltr	Key Co	Amount	Invoice Number
69391	05/25/15	2869	AT&T	SRV	PV	139246	001	00751	75.25	4860/051415
				5/14-6/13/15						
				SRV	PV	139247	001	00701	75.25	4639/051415
				5/14-6/13/15						
				SRV	PV	139248	001	00130	98.11	2220/050715
				5/7-6/6/15						
				SRV	PV	139249	001	00101	196.22	2045/050715
				5/7-6/6/15						
				SRV	PV	139250	001	00101	396.38	2043/050715
				5/7-6/6/15						
				SRV	PV	139251	001	00701	114.11	7719/050715
				5/7-6/6/15						
				SRV	PV	139252	001	00701	114.11	7720/050715
				5/7-6/6/15						
				SRV	PV	139253	001	00701	83.19	7721/050715
				5/7-6/6/15						
				SRV	PV	139254	001	00101	65.53	0123/050715
				5/7-6/6/15						
				SRV	PV	139255	001	00101	32.29	0124/050715
				5/7-6/6/15						
				Payment Amount					1,250.44	
69392	05/26/15	18654	AT&T	CONF	PV	139267	001	00701	139.50	505-016056
			TELECONFERENC	CALLS@4/10&4/						
			E SERVICES	2/1/15						
				CONF	PV	139267	002	00701	55.15	505-016056
				CALLS@4/10&4/						
				2/1/15						
				Payment Amount					194.65	
69393	05/26/15	7965	B&B PALLET CO.	55 YDS WOOD	PV	139216	001	00701	638.00	113160
				CHIPS						
				55 YDS WOOD	PV	139217	001	00701	638.00	113376
				CHIPS						
				55 YDS WOOD	PV	139218	001	00701	638.00	113377
				CHIPS						
				55 YDS WOOD	PV	139219	001	00701	638.00	113378
				CHIPS						
				55 YDS WOOD	PV	139220	001	00701	638.00	113379
				CHIPS						
				55 YDS WOOD	PV	139221	001	00701	638.00	113380
				CHIPS						
				Payment Amount					3,828.00	

Payment Number	Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key itm Co	Amount	Invoice Number
65394	05/26/15	2425	BANK OF AMERICA	VISA CHG-F&A-APR1	PV	139222	001 00701	4,749.73	3071/050715
				5					
				VISA CHG-F&A	PV	139223	001 00701	3,537.87	9885/050715
				N2-APR'15					
				VISA CHG-CASPARY-A	PV	139224	001 00701	413.71	8392/050715
				PR'15					
				VISA CHG-PATTERSON	PV	139225	001 00701	184.88	0212/050715
				-APR'15					
				VISA CHG-R	PV	139226	001 00701	5.36	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	002 00701	241.40	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	003 00701	500.21	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	004 00701	126.21	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	005 00701	265.00	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	006 00701	441.85	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	007 00701	52.22	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	008 00701	81.74	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	009 00701	265.43	3954/050715
				CNSV					
				N1-APR'15					
				VISA CHG-R	PV	139226	010 00701	156.00	3954/050715
				CNSV					
				N1-APR'15					

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Item	Key Co	Amount	Invoice Number
				VISA CHG-R	PV	139226	011	00701	679.54	3954/050715
				CNSV						
				N1-APR'15						
				VISA CHG-R	PV	139226	012	00701	45.65	3954/050715
				CNSV						
				N1-APR'15						
				VISA CHG-R	PV	139226	013	00701	235.33	3954/050715
				CNSV						
				N1-APR'15						
				VISA CHG-R	PV	139226	014	00701	95.10	3954/050715
				CNSV						
				N1-APR'15						
				VISA	PV	139227	001	00751	336.60	7366/050715
				CHG-OPS-APR'1						
				5						
				VISA	PV	139227	002	00751	300.00	7366/050715
				CHG-OPS-APR'1						
				5						
				VISA	PV	139227	003	00751	13.63	7366/050715
				CHG-OPS-APR'1						
				5						
				VISA	PV	139227	004	00751	85.91	7366/050715
				CHG-OPS-APR'1						
				5						
				VISA	PV	139227	005	00751	15.51	7366/050715
				CHG-OPS-APR'1						
				5						
				VISA	PV	139228	001	00701	898.28	6218/050715
				CHG-ENG-APR'1						
				5						
				VISA	PV	139229	001	00701	942.85	1611/050715
				CHG-LEWITT-AP						
				R'15						
				VISA	PV	139230	001	00701	96.13	8721/050715
				CHG-RANCHO-AP						
				R'15						
				VISA	PV	139231	001	00754	187.00	2698/050715
				CHG-TAPIA-APR						
				'15						
				VISA	PV	139231	002	00754	63.04	2698/050715
				CHG-TAPIA-APR						

Batch Number - 237608
 Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Item	Co	Key	Amount	Invoice Number
	'15				PV	139231	003	00754		133.69	2698/050715
				VISA CHG-TAPIA-APR							
	'15				PV	139231	004	00754		360.24	2698/050715
				VISA CHG-TAPIA-APR							
	'15				PV	139231	005	00754		165.00	2698/050715
				VISA CHG-TAPIA-APR							
	'15				PV	139231	006	00754		447.30	2698/050715
				VISA CHG-TAPIA-APR							
	'15				PV	139231	007	00754		912.01	2698/050715
				VISA CHG-TAPIA-APR							
	'15				PV	139232	001	00701		99.69	3713/050715
				VISA CHG-WTR DIST							
	N1-APR'15				PV	139232	002	00701		92.49	3713/050715
				VISA CHG-WTR DIST							
	N1-APR'15				PV	139232	003	00701		280.00	3713/050715
				VISA CHG-WTR DIST							
	N1-APR'15				PV	139232	004	00701		280.00	3713/050715
				VISA CHG-WTR DIST							
	N1-APR'15				PV	139232	005	00701		117.27	3713/050715
				VISA CHG-WTR DIST							
	N1-APR'15				PV	139232	006	00701		197.38	3713/050715
				VISA CHG-WTR DIST							
	N1-APR'15				PV	139233	001	00101		208.13	8102/050715
				VISA CHG-WTR DIST							
	N2-APR'15				PV	139234	001	00701		1,028.99	7961/050715
				VISA CHG-POLAN-APR							
	'15				PV	139235	001	00751		98.09	7431/050715
				VISA							

Batch Number - 237608
Bank Account - 00146607 Cash-General

Payment Number	Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key itm Co	Amount	Invoice Number
				CHG-WSTLK-APR					
				'15					
				VISA	PV	139235	002 00751	107.10	7431/050715
				CHG-WSTLK-APR					
				'15					
				VISA	PV	139235	003 00751	120.16	7431/050715
				CHG-WSTLK-APR					
				'15					
				VISA	PV	139235	004 00751	43.59	7431/050715
				CHG-WSTLK-APR					
				'15					
				VISA CHG-R	PV	139256	001 00101	75.00	4847/050715
				CNSV-APR'15					
				VISA	PV	139257	001 00751	1,229.48	1302/050715
				CHG-MAINT-APR					
				'15					
				VISA	PV	139258	001 00701	537.24	0663/050715
				CHG-PETERSON-					
				APR'15					
				VISA CHG-OPS	PV	139259	001 00751	146.21	2248/050715
				ADMN-APR'15					
				VISA CHG-OPS	PV	139259	002 00751	22.54	2248/050715
				ADMN-APR'15					
				VISA CHG-OPS	PV	139259	003 00751	193.59	2248/050715
				ADMN-APR'15					
				VISA CHG-OPS	PV	139259	004 00751	409.00	2248/050715
				ADMN-APR'15					
				VISA CHG-OPS	PV	139259	005 00751	318.68	2248/050715
				ADMN-APR'15					
				VISA CHG-OPS	PV	139259	006 00751	118.91	2248/050715
				ADMN-APR'15					
				VISA	PV	139266	001 00701	9.49	2808/050715
				CHG-PEDERSEN-					
				APR'15					
				VISA	PV	139266	002 00701	500.00	2808/050715
				CHG-PEDERSEN-					
				APR'15					
				VISA	PV	139266	003 00701	500.00	2808/050715
				CHG-PEDERSEN-					
				APR'15					
				VISA	PV	139266	004 00701	500.00	2808/050715

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Payment Number	Payment Date	Name	Address Number	Payment Stub Message	Document	Ty	Key	Amount	Invoice Number
Number	Date				Number		Item Co		
		CHG-PEDERSEN-							
		APR'15							
		VISA			139266	PV	005 00701	1,066.60	2808/050715
		CHG-PEDERSEN-							
		APR'15							
		VISA			139266	PV	006 00701	40.32	2808/050715
		CHG-PEDERSEN-							
		APR'15							
		VISA			139266	PV	007 00701	25.19	2808/050715
		CHG-PEDERSEN-							
		APR'15							
		VISA			139266	PV	008 00701	34.16	2808/050715
		CHG-PEDERSEN-							
		APR'15							
		VISA			139266	PV	009 00701	10.00	2808/050715
		CHG-PEDERSEN-							
		APR'15							
		VISA			139266	PV	010 00701	108.97	2808/050715
		CHG-PEDERSEN-							
		APR'15							
		Payment Amount							
69395	05/26/15	CALIFORNIA	19641	RTN#14 5MG	139214	PV	001 00301	16,122.56	10476/RTN#14
		UNITED BANK		TNK					
		CHG-PEDERSEN-							
		APR'15							
		Payment Amount							
69396	05/26/15	CONSOLIDATED	4586	1- OPERATOR	139241	PV	001 00701	214.63	9009-714942
		ELECTRICAL							
		DISTRIBUTORS							
		CHG-PEDERSEN-							
		APR'15							
		Payment Amount							
69397	05/26/15	ENVIRONMENTAL	8923	2-O/G STND 10	139242	PV	001 00701	194.46	1000372410
		EXPRESS LTD		MG HEM					
		CHG-PEDERSEN-							
		APR'15							
		FREIGHT			139242	PV	002 00701	13.39	1000372410
		CHG-PEDERSEN-							
		APR'15							
		2-O/G STND 5			139243	PV	001 00701	194.46	1000372799
		MG HEM							
		CHG-PEDERSEN-							
		APR'15							
		FREIGHT			139243	PV	002 00701	13.46	1000372799
		CHG-PEDERSEN-							
		APR'15							
		SYRINGE			139244	PV	001 00701	240.16	1000372363
		CHG-PEDERSEN-							
		APR'15							
		FILTER 0.45			139244	PV	002 00701	13.39	1000372363
		CHG-PEDERSEN-							
		APR'15							
		FREIGHT			139244	PV	002 00701	13.39	1000372363
		CHG-PEDERSEN-							
		APR'15							
		Payment Amount							
69398	05/26/15	FUGRO	4971	3/20-4/23/15	139240	PV	001 00701	1,225.00	04.62140112-5
		CONSULTANTS,		VLLY CIRC PMP					
		INC.		EVL					

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key	Item	Co	Amount	Invoice Number
All Payee 6803 FUGRO CONSULTANTS, INC. P. O. BOX 301083 DALLAS TX 75303-1083											
69399	05/26/15	17199	GOVERNMENT STAFFING SERVICES, INC.	5/4--5/15/15 A.UMALI	PV	139239	001	00701		2,756.25	125617
										1,225.00	
69400	05/26/15	19548	GRM INFORMATION MANAGEMENT SERVICES-CA	3/15 MINT FEE&WRK ORDR	PV	139211	001	00701		91.95	0255593
										2,756.25	
69401	05/26/15	3083	JCI JONES CHEMICALS, INC	4/15 STORAGE 4/15 MAINT FEE&WRK ORDRS 5/15 STORAGE	PV	139212 139237 139238	001	00701		362.42 58.60 356.28	0255594 0258508 0258509
										869.25	
69401	05/26/15	3083	JCI JONES CHEMICALS, INC	4,857 GAL HYPOCHLORITE	PV	139245	001	00701		2,826.63	653555
All Payee 13647 JCI JONES CHEMICALS, INC P.O. BOX 636877 CINCINNATI OH 45263-6877											
69402	05/26/15	2611	LA DWP	RECTIFIER 4/14--5/13/15 TWN LKS PS 2/13--5/13/15 RECTIFIER 4/15--5/14/15	PV	139215 139261 139265	001	00101		40.97 21,643.13 36.42	017698/051415 875698/051415 503850/051515
										2,826.63	
69403	05/26/15	17229	OMEGA ENGINEERING, INC.	LOAD CELL DISPLAY/DRVR	PV	139271	001	00701		882.90	A00000081211
										21,720.52	
69404	05/26/15	17860	SHERRI PANIAGUA	EXP-ACWA CONF 5/4--5/7/15	PV	139262	001	00701		225.38	050715
										882.90	
69405	05/26/15	2585	PURETEC	14" DI RNTL	PV	139268	001	00701		225.00	1404521
										225.38	

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Item	Key Co	Amount	Invoice Number
				5/1-7/31/15						
				8" DI RNTL	PV	139269	001	00701	71.57	1404734
				5/1-7/31/15						
				Payment Amount					296.57	
69406	05/26/15	10643	JEFF REINHARDT	EXP-ACWA CONF	PV	139263	001	00701	873.27	050815
				5/5-5/8/15						
				Payment Amount					873.27	
69407	05/26/15	19093	SOLARCITY - AU SOLAR 1 (GS1)	RW P/S	PV	139213	001	00751	21,889.70	9133440-00-01
				4/1-4/30/15						5
				SOLAR						
				Payment Amount					21,889.70	
69408	05/26/15	18095	TOTAL BARRICADE SERVICE, INC.	TRFFC	PV	139273	001	00701	350.00	29786
				4/22/15						
				Payment Amount					350.00	
69409	05/26/15	3394	UNITED STATES POSTAL SERVICE	BUS RPLY	PV	139260	001	00101	905.00	052115
				PRMT-WTR BDGT						
				SRVY						
				Payment Amount					905.00	
69410	05/26/15	16623	VELOCITY TECHNOLOGY SOLUTIONS, INC.	JUN'15	PV	139274	001	00701	3,114.00	306592
				DISASTR						
				RECOVERY						
				Payment Amount					3,114.00	
69411	05/26/15	3047	WESCO DISTRIBUTION, INC.	AUTO TRANSFR SWITCH	PV	139270	001	00701	1,749.75	430018
				Payment Amount					3,114.00	
				AUTO TRANSFR SWITCH						
				Payment Amount					1,749.75	
				AUTO TRANSFR SWITCH						
				Payment Amount					234.47	
				Payment Amount					1,984.22	
69412	05/26/15	18640	WEST COAST POWER SOLUTIONS	SRV@BLDG#8	PV	139264	001	00701	665.00	S4671
				4/17/15						
				Payment Amount					665.00	
69413	05/26/15	19554	GIL/SHARON ZAHAVI	EASEMENT-6021 COLODNY	PV	139236	001	00101	1.00	2055-028-036
				Payment Amount					1.00	

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Payment Number	Date	Address Number	Name	Payment Stub Message	Ty	Number	Document	Key	ilm	Co	Amount	Invoice Number
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Total Amount of Payments Written 108,416.98

Total Number of Payments Written 23

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Document Ty	Document Number	Key Item	Key Co	Amount	Invoice Number
69414	06/02/15	16051	ACCURATE TELECOM INC.	ANALOG LINE SRV@5/7/15	PV	139305	001	00701	212.50	14645
				Payment Amount					212.50	
69415	06/02/15	18661	ACTION AUTO GLASS	VEH#860-RPL WINDSHIELD	PV	139296	001	00701	225.35	1-241641
				Payment Amount					225.35	
69416	06/02/15	3077	AIRGAS USA, LLC	48 DIAL LIQ SOAP	PV	139313	001	00701	167.53	9039259863
				Payment Amount					167.53	
			All Payee							
			6658 AIRGAS USA, LLC							
			P. O. BOX 7423							
			PASADENA CA 91109-7423							
69417	06/02/15	7965	B&B PALLET CO.	55 YDS WOOD CHIPS	PV	139321	001	00701	638.00	113381
				Payment Amount					638.00	
				55 YDS WOOD CHIPS	PV	139322	001	00701	638.00	113382
				Payment Amount					638.00	
				55 YDS WOOD CHIPS	PV	139323	001	00701	638.00	113383
				Payment Amount					638.00	
				55 YDS WOOD CHIPS	PV	139324	001	00701	638.00	113500
				Payment Amount					638.00	
				Payment Amount					2,552.00	
69418	06/02/15	6472	BUSINESS MACHINES CENTER	PRINTR RPR@5/18/15	PV	139297	001	00701	128.55	7978
				Payment Amount					128.55	
69419	06/02/15	18992	CDW GOVERNMENT	55" TV&WALL ARM-CONF RM	PV	139312	001	00701	1,378.85	VK32477
				Payment Amount					1,378.85	
				55" TV&WALL ARM-CONF RM	PV	139312	003	00701	5.00	VK32477
				Payment Amount					5.00	
			All Payee							
			19010 CDW GOVERNMENT							
			75 REMITTANCE DR., SUITE 1515							
			CHICAGO IL 60675-1515							
				Payment Amount					1,383.85	
69420	06/02/15	18906	COAST TO COAST COMPUTER PRODUCTS	MICR TONR SECURE CARTRDG	PV	139299	001	00701	271.41	A1326883
				Payment Amount					271.41	
				HP COLOR CARTRIDGES	PV	139317	001	00701	1,956.19	A1326316
				Payment Amount					1,956.19	
				Payment Amount					2,227.60	

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key	Amount	Invoice Number
69421	06/02/15	4586	CONSOLIDATED ELECTRICAL DISTRIBUTORS	BLADE SCREWS&RELAYS	PV	139326	001 00701	190.92	9009-715223
69422	06/02/15	19060	CAROLA DANKERT	Payment Amount REFD BAL CLOSED A/C	PV	128313	001 00101	206.10	1010862
69423	06/02/15	11330	DIAL SECURITY	Payment Amount WEB REMOTE ACCESS-ENTRE	PV	139309	001 00701	327.00	245101
				BLDG#8- 3 CARD RDRS 2014 SEC SYS MAINT SPPT	PV	139382	001 00701	2,877.00	249133
				2014 SEC SYS MAINT SPPT	PV	139385	001 00751	246.80	215963
				2014 SEC SYS MAINT SPPT	PV	139385	002 00751	246.80	215963
				2014 SEC SYS MAINT SPPT	PV	139385	003 00751	246.80	215963
				2014 SEC SYS MAINT SPPT	PV	139385	004 00751	246.80	215963
				2014 SEC SYS MAINT SPPT	PV	139385	005 00751	246.80	215963
69424	06/02/15	7257	DIRECTV, INC.	Payment Amount HQ OPS 6/15-6/16 INFO/LCL CHNL	PV	139311	001 00701	691.88	25876751315
69425	06/02/15	2654	FAMCON PIPE	Payment Amount BRSS NIPPLES&COUPL INGS PIPE, CPLG, RDCR, FNG	PV	139318	001 00701	184.87	168748
				Payment Amount 1 PKG DEL 5/19/15 DEL SRV@5/18 & 5/21/15	PV	139310	001 00701	3,820.18	168749
69426	06/02/15	2658	FEDERAL EXPRESS CORP	Payment Amount MILEAGE/MEAL- LOW WKSHIP 4/29/15	PV	139406	001 00701	37.00	5-041-41818
				Payment Amount	PV	139308	001 00701	37.72	5-048-31898
69427	06/02/15	19146	LOURDES FIGUEROA	Payment Amount	PV	139308	001 00701	94.16	042915
				Payment Amount				94.16	

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Payment . . . Number Date	Address Number	Name	Payment Stub Message	Document . . . Ty Number	Key Itr Co	Amount	Invoice Number
69428 06/02/15	2684 FLW INC		AI-TEK	PV 139315	001 00701	773.90	1102400
			BI-DRCTNL				
			SENSR				
			AI-TEK	PV 139315	002 00701	9.30	1102400
			BI-DRCTNL				
			SENSR				
			Payment Amount			783.20	
69429 06/02/15	2705 HACH COMPANY		ILM SVC P/E	PV 139325	001 00701	2,640.00	9358745
			5/1/15				
		Alt Payee					
	6442 HACH COMPANY						
			2207 COLLECTIONS CENTER DR				
			CHICAGO IL 60683				
			Payment Amount			2,640.00	
69430 06/02/15	10662 MICHAEL HAMILTON		REIMB	PV 139307	001 00701	66.47	042915
			MILEAGE-LCW				
			WRKSHR 4/29				
			Payment Amount			66.47	
69431 06/02/15	3083 JCI JONES CHEMICALS, INC		4,869 GAL	PV 139316	001 00701	2,833.61	654137
			HYPOCHLORITE				
		Alt Payee					
	13647 JCI JONES CHEMICALS, INC						
			P.O. BOX 636877				
			CINCINNATI OH 45263-6877				
			Payment Amount			2,833.61	
69432 06/02/15	19005 JOHN B SCHERRER TRUST		REPLC	PV 139298	001 00701	714.29	470425A
			CK#63519				
			8/27/13				
			Payment Amount			714.29	
69433 06/02/15	8227 KMI REAL ESTATE GROUP		RPLMT-CK#3098	PV 138790	001 00701	3,899.83	S2928150/0622 04
			2 6/22/04				
			Payment Amount			3,899.83	
69434 06/02/15	2611 LA DWP		RECTIFIER	PV 139380	001 00101	40.97	557160/052615
			4/23-5/22/15				
			RECTIFIER	PV 139407	001 00101	36.42	851260/052715
			4/24-5/26/15				
			Payment Amount			77.39	
69435 06/02/15	3352 LAS VIRGENES MUNICIPAL WATER DISTRICT		RLV FARM	PV 139327	001 00751	136.59	2080/051315
			3/5-5/7/15				

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Document Ty	Document Number	Key Itm	Key Co	Amount	Invoice Number
				TAPIA	PV	139328	001	00751	474.41	1760/051315
				3/5-5/7/15						
				RLV	PV	139329	001	00751	375.95	2090/051315
				3/5-5/7/15						
				BLDG#1	PV	139330	001	00101	426.76	2620/051315
				3/5-5/7/15						
				BLDG#8	PV	139331	001	00701	438.31	2647/051315
				3/5-5/7/15						
				BLDG#8 FIRE	PV	139332	001	00701	15.00	2650/051315
				3/5-5/7/15						
				BLDG#7 FIRE	PV	139333	001	00701	15.00	2654/051315
				3/5-5/7/15						
				BLDG#7	PV	139334	001	00701	881.66	2656/051315
				3/5-5/7/15						
				BLDG#2	PV	139335	001	00701	547.66	2658/051315
				3/5-5/7/15						
				Payment Amount					3,311.34	
69436	06/02/15	2614	MCMASTER-CARR SUPPLY CO	PLUGS-DECANT	PV	137110	001	00701	59.62	20932687
				PMPS@RLV						
				DIGESTER						
				FREIGHT	PV	137110	003	00701	5.58	20932687
				RETRN-250 AIR	PD	137111	001	00701	1,080.92-	20811486
				FILL VLVS						
				NUTS,	PV	138537	001	00751	31.79	26522429
				SCREWS&WASHRS						
				MISC PIPE	PV	138538	001	00751	40.40	26522428
				FITTINGS						
				SOCKET HEAD	PV	138539	001	00751	29.04	26766432
				CAP SCREWS						
				(3) 7.5MM SS	PV	138540	001	00751	86.42	26855830
				METERS						
				WRAP AROUND	PV	138541	001	00751	14.62	26868423
				PIPE MARKR						
				PIPE MARKR	PV	138732	001	00751	24.42	27337810
				SUPPLIES						
				VEHCL WNDW	PV	138733	001	00701	253.07	27302449
				WSHG EQUIP						
				SS COMP TUBE	PV	138734	001	00751	90.07	27656228
				FITTG						
				2 MULTIPRP SS	PV	139301	001	00751	154.70	29710169
				SHEETS						

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key	Amount	Invoice Number		
						Number	Item Co				
69437	06/02/15	2839	MOTION INDUSTRIES, INC.	HYD FLW/DIR CON VLVS	PV	139320	001 00701	932.37	CA22-591215		
Alt Payee				MOTION INDUSTRIES INC. FILE 749376 LOS ANGELES CA 90074							
69438	06/02/15	3481	DEBORAH PETERS	REIMB MILEAGE-SOLR CUP 5/14-17	PV	139300	001 00101	188.31	050715		
Alt Payee				DEBORAH PETERS 3481							
69439	06/02/15	10643	JEFF REINHARDT	REIMB MILEAGE-SOLR CUP 5/16-17	PV	139381	001 00101	209.44	051715		
Alt Payee				JEFF REINHARDT 10643							
69440	06/02/15	3526	ROSEMOUNT INC.	EMERSON 375 HART COMM PWR SPLY	PV	139314	001 00701	81.56	70757581		
Alt Payee				ROSEMOUNT INC. 3526							
69441	06/02/15	19665	ERIC SCHLAGETER	REIMB MILEAGE-LCW SMNR 4/29/15	PV	139294	001 00701	50.60	042915		
Alt Payee				ERIC SCHLAGETER 19665							
69442	06/02/15	8228	SEMELE GROUP, INC.	MAIN EXTN REIMB AGRMNT	PV	132739	001 00701	30,025.85	4472-027-014		
Alt Payee				SEMELE GROUP, INC. 8228							
69443	06/02/15	19468	BO SLYAPICH	REIMB MILEAGE-SOLR CUP 5/19/15	PV	139295	001 00701	125.00	051915		
Alt Payee				BO SLYAPICH 19468							
69444	06/02/15	16947	VENCO POWER	REIMB MILEAGE-SOLR CUP 5/28/15	PV	139304	001 00751	550.00	0002648-IN		
Alt Payee				VENCO POWER 16947							

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key Item	Co	Amount	Invoice Number
SWEEPING, INC										
-STRM WTR RUN										
OFF										
69445	06/02/15	3035	VWR SCIENTIFIC	Payment Amount	PV	139319	001	00701	550.00	8041279959
				THERMOMETER W/1 BOTTLE					74.53	
				THERMOMETER W/1 BOTTLE	PV	139319	002	00701	9.25	8041279959
All Payee 3216 VWR INTERNATIONAL, INC P. O. BOX 640169 PITTSBURGH PA 15264-0169										
69446	06/02/15	19211	WEST COAST ELECTRIC MOTORS	Payment Amount	PV	139383	001	00701	83.78	
				60HP 404TP FRAME					1,931.90	WC15517
69447	06/02/15	8514	WEST COAST IRRIGATION	Payment Amount	PV	139143	001	00751	1,931.90	
				SPRYFLD IRRIG PIPE FTG					163.50	7957
				CREDIT INV#7957	PD	139408	001	00751	163.50-	7968
				SPRYFLD IRRIG PIPE FTG	PV	139409	001	00751	160.18	7989
									160.18	
									65,392.40	
Total Amount of Payments Written										34
Total Number of Payments Written										34

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Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key	Amount	Invoice Number
69448	06/09/15	19666	DANIEL ANDERSON	TURF RMVL REBATE	PV	139340	001 00101	1,326.00	1150576
69449	06/09/15	5625	ASSOC. OF WATER AGENCIES OF VENTURA CO	Payment Amount REG-WTRWISE@5 /Z1 (8)	PV	139370	001 00701	200.00	05-8734
69450	06/09/15	19668	DOUGLAS BENEDON	Payment Amount TURF RMVL REBATE	PV	139342	001 00101	11,370.00	710846
69451	06/09/15	19643	JOHN BRENKUS	Payment Amount RFND BAL - CLOSED A/C	PV	139355	001 00101	101.83	2200825-05385 3
69452	06/09/15	8458	CALPELRA	Payment Amount FY15-16 MBRSHPC&CONF OCT/15	PV	139289	001 00701	1,020.00	051915
69453	06/09/15	19660	JOAN CARLSON	Payment Amount TURF RMVL REBATE	PV	139280	001 00101	4,270.00	2130402
69454	06/09/15	7884	CHARLES CASPARY	Payment Amount MILEAGE-ACWA CONF	PV	139351	001 00701	352.05	050815
69455	06/09/15	2534	CITY OF CALABASAS	Payment Amount RFND BAL - CLOSED A/C	PV	139389	001 00101	23,179.94	2091280-02599 4
69456	06/09/15	19661	JILL COBB	Payment Amount TURF RMVL REBATE	PV	139281	001 00101	1,922.00	530978
69457	06/09/15	7109	ERNEST COLTON	Payment Amount TURF RMVL REBATE	PV	139336	001 00101	2,600.00	1110236
69458	06/09/15	9107	SUZANNE/THEODOR CORWIN	Payment Amount TURF RMVL REBATE	PV	139338	001 00101	1,866.00	1130340-2ND
69459	06/09/15	3690	DEPARTMENT OF WATER RESOURCES	Payment Amount DAM FEE@WLK RSV FY15-16	PV	139290	001 00101	23,813.00	1800091478
								23,813.00	

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Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key Lim	Key Co	Amount	Invoice Number
69460	06/09/15	7764	LAURA EDELMAN	TURF RMVL REBATE	PV	139337	001	00101	2,290.00	681206
69461	06/09/15	18441	EMPLOYEE RELATIONS NETWORK	Payment Amount BACKGRND RPT-T,WRIGHT	PV	139414	001	00701	361.10	71052
69462	06/09/15	2654	FAMCON PIPE	Payment Amount CLMP,HYD,BTT STRP, SDDL	PV	139399	001	00701	1,749.45	189005
69463	06/09/15	2684	FLW INC	Payment Amount 4 ASCO REBLD KITS	PV	139372	001	00701	327.87	1103041
69464	06/09/15	19669	JEREMY FRANK	Payment Amount 4 ASCO REBLD KITS	PV	139372	002	00701	11.58	1103041
69465	06/09/15	19678	YANA GALUZ	Payment Amount TURF RMVL REBATE	PV	139343	001	00101	3,060.00	830152
69466	06/09/15	19667	VIRGINIA GOLDMAN	Payment Amount TURF RMVL REBATE	PV	139349	001	00101	25,198.00	170828
69467	06/09/15	19656	JEN GRANT	Payment Amount RFND BAL - CLOSED A/C	PV	139275	001	00101	68.33	750659
69468	06/09/15	19670	DENISE HARRINGTON	Payment Amount TURF RMVL REBATE	PV	139344	001	00101	1,500.00	710402
69469	06/09/15	18646	HDR ENGINEERING, INC.	Payment Amount 3/29-5/2/15 WLFP EXP DSN	PV	139368	001	00701	27,140.62	213912-B
69470	06/09/15	18235	MICKIE HINES	Payment Amount REBATE	PV	139369	001	00701	18,093.75	213912-B
69471	06/09/15	19680	HIRING DONE RIGHT LLC	Payment Amount ETHICS TRNG@5/20/15	PV	139413	001	00701	1,500.00	2100985

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Batch Number - 237906
Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Document Ty	Document Number	Key Lim	Key Co	Amount	Invoice Number
69472	06/09/15	3083	JCI JONES CHEMICALS, INC	Payment Amount 4,843 GAL HYPOCHLORITE	PV	139371	001	00701	2,818.48	654776
Alt Payee 13647 JCI JONES CHEMICALS, INC P.O. BOX 636877 CINCINNATI OH 45263-6877										
69473	06/09/15	19675	JOHN W. KRIEGER	Payment Amount EASEMT-422 WSTLK BLVD	PV	139354	001	00101	1.00	2058-015-031
69474	06/09/15	19657	JOHN N LAMONT	Payment Amount RFND BAL - CLOSED A/C	PV	139276	001	00101	31.87	022976
69475	06/09/15	3352	LAS VIRGENES MUNICIPAL WATER DISTRICT	Payment Amount L/S#2 3/12-5/13/15	PV	139291	001	00130	46.72	0570/052015
69476	06/09/15	19396	JAY LEWITT	Payment Amount MILEAGE-AWA WTR SYMPISM 4/16/15	PV	139352	001	00701	30.94	041615
69477	06/09/15	2789	LIEBERT CASSIDY WHITMORE	Payment Amount SPVSR NGTN-P/E 4/30/15	PV	139415	001	00701	3,087.50	1403922
69478	06/09/15	19652	JONATHAN LITVACK	Payment Amount TURF RMVL REBATE	PV	139282	001	00101	1,910.00	600330
69479	06/09/15	19663	VIRGINIA MALONEY	Payment Amount TURF RMVL REBATE	PV	139283	001	00101	226.00	500498
69480	06/09/15	19664	CHERYL MARKILLIE	Payment Amount TURF RMVL REBATE	PV	139284	001	00101	1,280.00	720590
69481	06/09/15	18940	MP PRINTING &	Payment Amount WTR	PV	139292	001	00101	2,301.44	57948

ITEM 4

Batch Number - 237906
Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key	Amount	Invoice Number
MAILING									
				RESTRCTN-PRNT					
				/MAIL SRV					
				WTR SRVY PSTG	PV	139390	001 00701	4,581.50	58025
				DEPOSIT					
				CRRNT	PV	139391	001 00701	1,276.90	57852
				FLW#3-ENVELOP					
				ES					
				CRRNT	PV	139392	001 00701	1,690.99	57853
				FLW#3-PSTG					
				PRESRT					
				Payment Amount				9,850.83	
69482	06/09/15	2365	MISO	APR'15 WLK PS	PV	139395	001 00701	910.00	4932
			TECHNOLOGIES	UPGRD					
				APR'15 WLFP	PV	139396	001 00701	910.00	4932
				EXPNSN					
				APR'15 5 MG	PV	139404	001 00701	1,400.00	4931
				TNK SRV					
				Payment Amount				3,220.00	
69483	06/09/15	2302	OFFICE DEPOT	MISC OFFICE	PV	139398	001 00701	571.32	770910586001
				SUPPLIES					
				MISC OFFICE	PV	139401	001 00701	393.84	770910666001
				SUPPLIES					
				BPNT PENS	PV	139402	001 00701	12.59	770910664001
				MISC OFFICE	PV	139403	001 00701	93.73	771780187001
				SUPPLIES					
				Payment Amount				1,071.48	
69484	06/09/15	19671	CAROLINE OHANIAN	TURF RMVL	PV	139345	001 00101	6,370.00	860320
				REBATE					
				Payment Amount				6,370.00	
69485	06/09/15	13586	ORACLE AMERICA, INC.	JDE MAINT	PV	139412	001 00701	17,159.29	42864094
				2/23--5/22/15					
				Payment Amount				17,159.29	
69486	06/09/15	18821	LEONARD POLAN	MILEG.TXIMEA	PV	139350	001 00701	61.30	050815
				L-ACWA CONF					
				5/5--8					
				Payment Amount				61.30	
69487	06/09/15	8484	PRAXAIR DISTRIBUTION, INC	MAY'15	PV	139397	001 00701	116.91	52689945
				CYLINDR RNTL					
				Payment Amount				116.91	

ITEM 48

All Payee 8898 PRAXAIR DISTRIBUTION INC.

Batch Number - 237906

Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Document Ty	Document Number	Key Lim	Key Co	Amount	Invoice Number
DEPT. LA 21511										
PASADENA CA 91185-1511										
69488	06/09/15	13645	PSOMAS	Payment Amount APR'15 STNDBY CHG SRV	PV	139367	001	00701	116.91 500.00	5LAS030100
69489	06/09/15	19672	RAGNAR ROSINKRANZ	Payment Amount TURF RMVL REBATE	PV	139346	001	00101	9,834.00	610374
69490	06/09/15	6766	SAWYER PETROLEUM	Payment Amount 795 GAL RED DYE DIESEL	PV	139378	001	00701	9,834.00 2,220.30	V90297
69491	06/09/15	19673	WILLIAM SCHWARTZ	Payment Amount TURF RMVL REBATE	PV	139347	001	00101	6,196.00	750369
69492	06/09/15	19658	SHIMMICK CONSTRUCTION CO. INC.	Payment Amount RFND BAL - CLOSED A/C	PV	139277	001	00101	6,196.00 696.20	9998312
69493	06/09/15	19659	DANA SHINE	RFND BAL - CLOSED A/C Payment Amount	PV	139356	001	00101	218.72 914.92	000998312
69494	06/09/15	2948	SMITH PIPE & SUPPLY	RFND BAL - CLOSED A/C Payment Amount	PV	139278	001	00101	329.01 329.01	051861
69495	06/09/15	8645	SOUTHERN CALIFORNIA TROPHY COMPANY	2 MEASURING WHEELS Payment Amount ANNIV GIFT-C.MIXON	PV	139287	001	00101	196.85 196.85 131.01	2529954
69496	06/09/15	16385	SOUTHWEST VALVE & EQUIPMENT, INC.	Payment Amount 16" PLUGS FOR PLUG VLV	PV	139357	001	00701	131.01 3,206.78	4414
69497	06/09/15	16034	TASC	FREIGHT Payment Amount FSA 7/1-9/30/15 Payment Amount	PV	139357	002	00701	111.00 3,317.78 708.00	4414 IN548041
									708.00	

ITEM 4B

Batch Number - 237906
Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Sub Message	Document Ty	Document Number	Key Item Co	Amount	Invoice Number
69498	06/09/15	19874	GLEND A TEAGUE	TURF RMVL	PV	139348	001 00101	23,780.00	753148
				REBATE					
				Payment Amount			23,780.00		
69499	06/09/15	2980	TERRAMAR GRAPHICS	DEVELACTVY	PV	139393	001 00701	763.52	4473
				RECPT BKS					
				FREIGHT				15.95	4473
				Payment Amount			779.47		
69500	06/09/15	4595	THE COPY DEPARTMENT	PRNT	PV	139288	001 00101	708.50	1485599
				SRV/IRRIG					
				NOTICE					
				Payment Amount			708.50		
69501	06/09/15	2780	VALLEY NEWS GROUP	5/14 2 ADS RE	PV	139293	001 00101	300.00	5-15
				DRGHT&IRR					
				5/14 2 ADS RE				380.00	5-15
				DRGHT&IRR					
				Payment Amount			680.00		
69502	06/09/15	18604	VENTURA PEST CONTROL	QTLY BIRD	PV	139359	001 00701	50.00	486073
				INSP					
				QTLY BIRD				100.00	486073
				INSP					
				Payment Amount			150.00		
69503	06/09/15	3034	VORTEX INDUSTRIES	JAM SEALS ON	PV	139360	001 00701	552.00	01-924206-1
				2 DOORS					
				JAM SEALS ON				622.00	01-924213-1
				3 DOORS					
				Payment Amount			1,174.00		
69504	06/09/15	3035	VWR SCIENTIFIC	GLVS,WEIGHG	PV	139373	001 00701	473.76	8041336312
				DISH,SOD					
				HYDROX					
				FREIGHT&HAZ				102.79	8041336312
				CHGS					
				FILTRS&THERMO				857.98	8040405462
				METRS					
				FREIGHT				10.35	8040405462
				All Payee					
			3216	VWR INTERNATIONAL, INC					
				P. O. BOX 640169					
				PITTSBURGH PA 15264-0169					
				Payment Amount			1,444.88		
69505	06/09/15	3109	W. LITTEN	SRV	PV	139285	001 00754	1,221.55	320376
				4/12-4/25/15@					

Batch Number - 237906
Bank Account - 00146807 Cash-General

Payment Number	Payment Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key	Amount	Invoice Number
69506	06/09/15	3025	WATER & SANITATION SRV./VENTURA COUNTY	PURCH WTR 4/14-5/19/15	PV	139410	001 00101	25,263.44	1063432
69507	06/09/15	18914	WECK LABORATORIES, INC.	LAB SRV@RLV CENTRATE VOC	PV	139374	001 00701	75.00	W5E0903-LV
69508	06/09/15	3047	WESCO DISTRIBUTION, INC.	LAB SRV@BACTI RM DI WTR LAB SRV@DCBM ANALYSIS LAB SRV@TAPIA Payment Amount (10) 125V 2P 3WR GFCI	PV	139377	001 00701	25.00 236.25 157.50 230.97	W5E0904-LV W5E0996-LV W5E1143-LV 437606
69509	06/09/15	3048	WEST COAST AIR CONDITIONING	LIGHT BULBS LIGHT BULBS Payment Amount A/C PM@BLDG#7&8	PV	139368	001 00701	282.24 132.57 645.78 395.00	438447 442051 S65962
69510	06/09/15	8060	WIL-POWER BATTERY DISTRIBUTORS	RPR WEST A/C UNIT@RLV Payment Amount (4) 12V BATTERIES	PV	139366	001 00701	9,918.00 10,313.00 169.60	S65541 172028
69511	06/09/15	8510	WORK BOOT WAREHOUSE	Payment Amount PRTCTV FTWR-D.CURRAL	PV	139386	001 00701	151.51	2-13744

ITEM 4B

Batch Number - 237906

Bank Account - 00146807 Cash-General

Payment Number	Date	Address Number	Name	Payment Stub Message	Ty	Document Number	Key Item	Co	Amount	Invoice Number
69512	06/09/15	9942	PHILIP YOWS	L						
				Payment Amount					151.51	
				TURF RMVL	PV	139279	001	00101	1,884.00	1080574
				REBATE						
				Payment Amount					1,884.00	
				Total Amount of Payments Written					299,788.67	
				Total Number of Payments Written					65	



June 9, 2015 LVMWD Regular Board Meeting

TO: Board of Directors

FROM: Facilities & Operations

Subject: Calabasas Tank Rehabilitation Project: Final Acceptance

SUMMARY:

On May 27, 2014, the Board awarded a contract to Blastco, Inc. for the Calabasas Tank Rehabilitation Project in the amount of \$2,197,538.00. The scope of the project included removal and replacement of lead-based exterior and coal tar-based interior coatings; structural repairs of rafters and beam connections; replacement of lateral bracing between rafters; and installation of gusset plates around the circumference of the tank to provide improved seismic resistance. Additionally, the project included installation of a security fence and access road pavement replacement.

On April 10, 2015, the interior scope was completed, and the tank was placed back in service while the exterior tank was being recoated. On June 5, 2015, the entire project was completed. There are no outstanding issues to prevent acceptance of the project. As a result, staff recommends that the District file the Notice of Completion and release the retention as stipulated in the contract documents.

RECOMMENDATION(S):

Approve execution of a Notice of Completion by the Secretary of the Board and have the same recorded, and in the absence of claims from subcontractors and others, release the retention, in the amount of \$111,847.42, thirty (30) calendar days after filing the Notice of Completion for the Calabasas Tank Rehabilitation Project.

FISCAL IMPACT:

No

ITEM BUDGETED:

Yes

FINANCIAL IMPACT:

The final construction cost for the project is as follows:

Construction Contract	\$2,197,538.00	
Change Order No. 1	\$5,292.10	0.2% increase
Change Order No. 2	\$39,118.25	1.8% increase
Change Order No. 3	-\$5,000.00	0.2% decrease
Total Construction Cost	\$2,226,948.35	

The adopted Fiscal Year 2013-14 and 2014-15 Budgets provided a total project appropriation of \$2,756,038 for the project, CIP No. 10508. No additional appropriation is required.

DISCUSSION:

ITEM 7A

Change Order No. 1, in the amount of \$5,292.10, was administratively approved on February 10, 2015 and reported to the Board on March 10, 2015.

Change Order No. 2, in the amount of \$39,118.25, was administratively approved on June 3, 2015 to address the following items:

- (1) Due to spotted incomplete coating mix, HDR performed a tank coating inspection and suggested a dry tank inspection in nine months and at two years. Also, Blastco, Inc. agreed to extend its warranty period from one to two years. In order to conduct the nine-month and 2-year dry inspections, the temporary tanks will continue to be required and, therefore, should not be removed. As a result, a credit of \$8,591.00 was provided.
- (2) The original design for the ladder and safety climb inside the tank was a fiberglass ladder with an aluminum safety climb. Field observation revealed that nuts and bolts of the ladder and safety climb had already started rusting. As a result, it was decided to replace them with stainless steel material to prevent future corrosion. The total amount of the increase was \$2,812.00.
- (3) During the structural repair for the interior tank, the District instructed the contractor to perform vacuum box testing to find tank floor weld seam leaks. The District is paying for the blasting and vacuum box testing, and the contractor is responsible for any repairs that were identified. The total amount of this increase was \$11,149.95.
- (4) During the construction, it was decided to apply a sika-grout-pump injection beneath the chime and floor to support the bottom ring and floor at the ring wall. The total amount of increase was \$8,683.30.
- (5) As requested by the adjacent property owner, the roadside berm "curbing" was added to the new access road to prevent direct runoff to the residents. The amount of increase was \$5,316.
- (6) Additional asphalt overlay around the new security gate was required. The amount of the increase was \$3,708.
- (7) Asphalt overlay and spot repairs were required for the roadway around the water tank. The amount of increase was \$16,040.00.

The original contract in the amount of \$2,197,538 included a \$5,000 option bid item to perform the exterior coating in the year following completion of the interior coating, if necessary. However, the contractor was able to complete both the interior and exterior coatings this year. Therefore, Change Order No. 3, in the deductive amount of \$5,000.00, was administratively approved.

Finally, HDR provided the following additional engineering support services during construction: (1) assessment of structural issues following the coating removal; (2) additional interior tank inspection to address potential quality problems associated with incomplete mixing of the polyuria coating; (3) additional support work to justify extending the contractor warranty period; and (4) assistance in obtaining a temporary easement extension required for the nine-month and two-year inspections. The total amount of the additional work was \$15,200, which was administratively approved.

GOALS:

Construct, Manage and Maintain All Facilities and Provide Services to Assure System Reliability and Environmental Compatibility

Prepared By: Lindsay Cao, P.E., Associate Engineer

ATTACHMENTS:

[Notice of Completion](#)

Las Virgenes Municipal Water District

AND WHEN RECORDED MAIL TO

Name Susan Brown
Street Address Las Virgenes Municipal Water District
4232 Las Virgenes Road
City & State Calabasas, CA 91302
Zip

T 420 LEGAL (9-94)

SPACE ABOVE THIS LINE FOR RECORDER'S USE

Notice of Completion

NOTICE IS HEREBY GIVEN THAT:

- 1. The undersigned is the owner of the interest or estate stated below in the property hereinafter described.
2. The full name of the undersigned is Las Virgenes Municipal Water District (NAME).
3. The full address of the undersigned is 4232 Las Virgenes Road, Calabasas, CA 91302
4. The nature of the title of the undersigned is
5. The full names and full addresses of all persons, if any, who hold title with the undersigned as joint tenants or as tenants in common are:
6. The names of the predecessors in interest of the undersigned, if the property was transferred subsequent to the commencement of the work of improvement herein referred to are (OR IF NO TRANSFER WAS MADE, INSERT THE WORD "none"):
7. A work of improvement on the property hereinafter described was completed on Jun 9, 2015 (DATE).
8. The name of the original contractor, if any, for the work of improvement was Blastco, Inc.
9. The property on which the work of improvement was completed is in the City of Calabasas, County of Los Angeles, State of California, and is described as follows:
10. The street address of the said property is None

Dated: June 9, 2015

Las Virgenes Municipal Water District

(SIGNATURE)
Charles P. Caspary, Secretary of the Board (TYPED NAME)

VERIFICATION

I, the undersigned, say:
I am the person who signed the foregoing notice. I have read the above notice and know its contents, and the facts stated therein are true of my own knowledge.

I declare under penalty of perjury that the foregoing is true and correct.

Executed at Calabasas, California, this 9th day of June, 2015.

(SIGNATURE)
Charles P. Caspary, Secretary of the Board ITEM 7A



June 9, 2015 LVMWD Regular Board Meeting

TO: Board of Directors

FROM: Facilities & Operations

Subject: Construction of Impressed Current Cathodic Protection System for Centrate Treatment and Storage Tanks: Final Acceptance

The Las Virgenes-Triunfo Joint Powers Authority (JPA) approved funding for this matter in the JPA Budget. This recommendation is before the LVMWD Board for action, as Administering Agent of the JPA, as authorized in the JPA Agreement.

SUMMARY:

On February 3, 2014, the JPA Board awarded a construction contract to Exaro Technologies Corporation, in the amount of \$98,800, for the installation of an impressed current cathodic protection system for the JPA's two centrate treatment and storage tanks. On June 1, 2015, the project was completed, and there are no outstanding issues to prevent acceptance of the project. As a result, staff recommends that the District file the Notice of Completion and release the retention as stipulated in the contract documents.

RECOMMENDATION(S):

Approve execution of a Notice of Completion by the Secretary of the Board and have the same recorded, and in the absence of claims from subcontractors and others, release the retention, in the amount of \$5,000, thirty (30) calendar days after filing the Notice of Completion for the Construction of Impressed Current Cathodic Protection System for Centrate Treatment and Storage Tanks Project.

FISCAL IMPACT:

No

ITEM BUDGETED:

Yes

FINANCIAL IMPACT:

The final construction cost for the project as follows:

Construction Contract	\$98,000.00	
Change Order No. 1	\$2,000.00	2% of increase
Total Construction Cost	\$100,000.00	

The adopted Fiscal Year 2013-14 and 2014-15 Budgets provided a total project appropriation of \$118,816 for the project, CIP No. 10544. No additional appropriation is required.

DISCUSSION:

Change Order No. 1 was administratively approved on June 1, 2015. The contract called for the contractor's corrosion engineer to inspect, activate, adjust, and evaluate the effectiveness of the system.

protection system for both tanks in one trip; however, due a leaking valve discovered during the inspection, the contractor's corrosion engineer had to make a second trip to inspect the other tank after the valve had been replaced by staff. The cost increase for the second trip was \$2,000.00.

The construction contract of \$98,000 included an optional pay item of \$5,000 to compensate the Contractor for a one-year delay at the District's discretion in the event that discharge to Malibu Creek was necessary to augment flow in the creek last summer. Staff exercised this option, and informed the JPA Board on June 2, 2014. Exaro completed the submittals and material procurement in early 2015 and completed the construction in May 2015.

GOALS:

Construct, Manage and Maintain All Facilities and Provide Services to Assure System Reliability and Environmental Compatibility

Prepared By: Lindsay Cao, P.E., Associate Engineer

ATTACHMENTS:

[Notice of Completion](#)

AND WHEN RECORDED MAIL TO

Name
Street
Address
City &
State
Zip

SPACE ABOVE THIS LINE FOR RECORDER'S USE

T 420 LEGAL (9-94)

Notice of Completion

NOTICE IS HEREBY GIVEN THAT:

1. The undersigned is the owner of the interest or estate stated below in the property hereinafter described.
2. The full name of the undersigned is _____ (NAME).
3. The full address of the undersigned is _____

 (NUMBER AND STREET, CITY, STATE, ZIP).
4. The nature of the title of the undersigned is _____
 (E.G., owner in fee OR vendee under contract of purchase OR lessee OR OTHER APPROPRIATE DESIGNATION).
5. The full names and full addresses of all persons, if any, who hold title with the undersigned as joint tenants or as tenants in common are:

Names	Addresses
_____	_____
_____	_____
6. The names of the predecessors in interest of the undersigned, if the property was transferred subsequent to the commencement of the work of improvement herein referred to are (OR IF NO TRANSFER WAS MADE, INSERT THE WORD "none"):

Names	Addresses
_____	_____
_____	_____
7. A work of improvement on the property hereinafter described was completed on _____ (DATE).
8. The name of the original contractor, if any, for the work of improvement was _____
 (NAME OF CONTRACTOR, OR IF NO CONTRACTOR FOR THE WORK OF IMPROVEMENT AS A WHOLE, INSERT THE WORD "none"). [IF NOTICE COVERS COMPLETION OF CONTRACT FOR ONLY PART OF THE WORK OF IMPROVEMENT, ADD: The kind of work done or material furnished was _____
 (GIVE GENERAL STATEMENT, E.G., furnishing of concrete for sidewalks].
9. The property on which the work of improvement was completed is in the City of _____, County of _____, State of California, and is described as follows: _____

 (set forth description of jobsite sufficient for identification, using legal description if possible).
10. The street address of the said property is _____
 (NUMBER AND STREET, OR, IF THERE IS NO OFFICIAL STREET ADDRESS, INSERT THE WORD "none".)

Dated: _____, _____ Las Virgenes Municipal Water District

(SIGNATURE)

(TYPED NAME)

VERIFICATION

I, the undersigned, say:
 I am the person who signed the foregoing notice. I have read the above notice and know its contents, and the facts stated therein are true of my own knowledge.

I declare under penalty of perjury that the foregoing is true and correct.

Executed at _____, California, this _____ day of _____,
 _____ (SIGNATURE)

DO NOT RECORD**Recommended Procedure in the Preparation of a Notice of Completion**

A notice of completion must be filed for record *within 10 days* after completion of the work of improvement (to be computed exclusive of the day of completion), as provided in section 3093, Civil Code.

The "owner" who must file for record a notice of completion of a building or other work of improvement means the owner (or his successor in interest at the date of notice is filed) on whose behalf the work was done, though his ownership is less than the fee title. For example, if A is the owner in fee, and B, lessee under a lease, causes a building to be constructed, then B, or whoever has succeeded to his interest at the date the notice is filed, must file the notice.

If the ownership is in *two or more persons as joint tenants or tenants in common*, the notice may be signed by any one of the co-owners (in fact, the foregoing form is designed for giving of the notice by only one co-tenant), but the names and addresses of the other co-owners must be stated in paragraph 5 of the form.

In paragraphs 3 and 5, the full address called for should include street number, city, county and state.

As to paragraph 6, insert the date of completion of the work of improvement as a *whole* if applicable. However, if the notice is to be given only of completion of a particular contract, where work of improvement is made pursuant to two or more original contracts, strike the words "a work of improvement" and insert a general statement of the kind of work done or materials furnished pursuant to such contract (e.g. "The foundations for the improvements").

If the notice is to be given as a notice of completion of the work of improvement as a *whole*, insert the name of the prime contractor, if any, in paragraph 7. No contractor's name need be given if there is no general contractor, e.g., on so-called "owner-builder jobs". However, if the notice is to be given only of completion of a particular contract, where work of improvement is made pursuant to two or more original contracts, insert the name of the contractor who performed that particular contract.

Paragraph 8 should be completed only where the notice is signed by a successor in interest of the owner who caused the improvement to be constructed.

In paragraph 9, insert the *full legal* description, not merely a street address or tax description. Refer to deed or policy of title insurance. If the space provided for description is not sufficient, a rider may be attached.

In paragraph 10, show the street address, if any, assigned to the property by any competent public or governmental authority.

**NOTICE
OF COMPLETION**

CHICAGO TITLE COMPANY



WESTERN DIVISION HEADQUARTERS
245 S. LOS ROBLES AVENUE, SUITE 105
PASADENA, CALIFORNIA 91101-2820
(818) 432-7600

CHICAGO TITLE COMPANY



ITEM 7B



June 9, 2015 LVMWD Regular Board Meeting

TO: Board of Directors

FROM: Facilities & Operations

Subject: Discussion of Triunfo Sanitation District's Interest in Conducting a Partnering Workshop on Recycled Water Policy

SUMMARY:

On February 23, 2015, the Triunfo Sanitation District (TSD) Board received a presentation from Susan Mulligan, General Manager of Calleguas Municipal Water District (Calleguas), on the potential sale of Calleguas' recycled water system to TSD. Calleguas expressed a willingness to sell the recycled water system, including the portions serving Oak Park and Lake Sherwood for \$17 million, provided that TSD accept the system "as-is" and maintain delivery of recycled water to Calleguas' other retailers at 80% of the Tier 1 potable water rate.

Since the Calleguas presentation, the TSD Board has had a number of follow-up discussions on recycled water to review historical cost-sharing data for construction of the Las Virgenes-Triunfo Joint Powers Authority (JPA) system, TSD's vision for recycled water as a JPA partner and a potential "policy to make the JPA's recycled water system more equitable to TSD." Based on the discussions, TSD staff was directed to investigate the cost of hiring a facilitator to conduct a partnering workshop with LVMWD to discuss future recycled water policy decisions.

RECOMMENDATION(S):

Discuss Triunfo Sanitation District's interest in conducting a partnering workshop with Las Virgenes Municipal Water District to discuss future recycled water policy decisions.

FISCAL IMPACT:

No

ITEM BUDGETED:

No

DISCUSSION:

For reference, attached are copies of the following pertinent TSD Board meeting agenda items and minutes.

- Minutes from February 23, 2015; Presentation from Susan Mulligan (Calleguas Municipal Water District) Regarding Potential Sale of Calleguas' Recycled Water System to Triunfo Sanitation District
- Agenda items and minutes from March 23, 2015; Discussion of Triunfo Sanitation District's Participation in JPA Recycled Water Projects and Historical JPA Cost-Sharing of Recycled Water Projects
- Agenda item and minutes from April 27, 2015; Update Regarding Contracting with a Facilitator for a Workshop Regarding JPA Recycled Water Cost Sharing and Projects
- Agenda item from May 18, 2015; Update Regarding Contracting for a Facilitator for a Workshop Regarding JPA Recycled Water Cost Sharing and Projects (minutes not yet available)

ITEM 7C

Also attached is a copy of the JPA's November 2013 report entitled *Overview of the Management of Treated Effluent from the Tapia Water Reclamation Facility* that provides background information on the development of the JPA recycled water system.

GOALS:

Lead in Sanitation and Recycled Water Services Focusing on Maximum Reuse

Prepared By: David R. Lippman, P.E., Director of Facilities and Operations

ATTACHMENTS:

[TSD Board Agenda Items and Minutes](#)

[JPA Report No. 2540: Overview of the Management of Treated Effluent from the Tapia Water Reclamation Facility](#)

TRIUNFO SANITATION DISTRICT

Minutes of regular meeting of February 23, 2015

Film & Lecture Room, Oak Park Library, 899 N Kanan Road, Oak Park, CA.

1. Call to Order and Roll Call – (4 present). Chair Wall called the meeting to order at 5:15 p.m. Directors Steven Iceland, Janna Orkney, and Michael Paule, and Chair James Wall were present. Director Michael McReynolds was absent. District Manager Mark Norris, Director of Finance Vickie Dragan, Management Specialist Lisa McKinley, Legal Counsel John Mathews, and Clerk of the Board Josie Guzmán were also present.
2. Pledge of Allegiance – Led by Chair Wall.
3. Amendments to the Agenda – Mr. Norris asked to add an item on the agenda for a Presentation from Monica Greenberg from the California Special Districts Association regarding membership. Director Orkney asked that Item 8 be moved to Action Items. Chair Wall asked that Item 7 be moved to Action Items.

It was moved by Director Paule, seconded by Director Iceland, to approve the agenda as amended. Directors Iceland, Orkney, and Paule, and Chair Wall were in favor. Director McReynolds was absent. Motion carried.

4. Approval of Minutes – The minutes of January 26, 2015 were continued to the March 23, 2015 Board meeting.
5. Public Comments – None.

PRESENTATION

Presentation from Monica Greenberg, California Special Districts Association Membership – Ms. Greenberg from the California Special Districts Association (CSDA) provided a presentation on the benefits of CSDA membership. She noted the District could take advantage of a free 90-day trial membership by registering before March 31 and could also receive a 20 percent discount of membership dues for the first year. She noted that the dues structure is based on the District's operating revenue.

Director Paule suggested the Board place an item on the agenda to consider the free 90-day trial membership. Ms. Greenberg stated she would email the rate structure to the Clerk of the Board.

Director Orkney inquired regarding Special District members from Ventura County who serve on CSDA Boards and Commissions. Ms. Greenberg stated she would email the list to the Clerk of the Board.

6. Presentation from Susan Mulligan (Calleguas Municipal Water District) Regarding Potential Sale of Calleguas' Recycled Water System to Triunfo Sanitation District – Susan Mulligan, General Manager of Calleguas Municipal Water District

ITEM 7C
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(Calleguas), provided a PowerPoint presentation regarding the potential sale of the Oak Park, North Ranch, and Sherwood Recycled Water Systems to Triunfo Sanitation District (TSD), and an update of the defective pipe litigation.

Dan Smith, Manager of Finance of Calleguas, provided information regarding the financial components of the costs and revenues of the system.

Ms. Mulligan stated the Calleguas Board was not eager to sell the recycled water system; however, they would be willing to do so with payment of \$17 million, TSD's continued obligation to deliver water to Cal Water and Hidden Valley at 80 percent of Tier 1 potable rates, and facilities to be transferred to TSD as-is with no future liability for Calleguas.

CONSENT ITEMS – (Item 9 only)

9. Revised Purchase Order for Access Road Restoration at Former Conifer Reservoir Site – It was moved by Director Iceland, seconded by Director Paule, to approve a budget adjustment in the amount of \$1,605; and authorize the Director of Finance to issue a revised Purchase Order with General Pavement Management, Inc., and increasing it by \$16,955 to a total of \$20,845. Directors Iceland, Orkney, and Paule, and Chair Wall were in favor. Director McReynolds was absent. Motion carried.

REPORTS – (Items 10 through 12)

10. Report from Standing Subcommittees – Director Paule reported the Finance Committee did not meet. Chair Wall reported the Recycled Water Committee did not meet. Director Paule noted that the Triunfo Sanitation District/Ventura Regional Sanitation District draft contract was currently under review by Ventura Regional Sanitation District.
11. Status of Stage 1 Water Supply Shortage – Mr. Norris referred to Item 24 on the agenda. Mr. Jones noted that water use was lower in December due to recent rain, and customers are cooperating better with water conservation efforts.
12. Status of Automatic Meter Infrastructure Project – Mr. Jones reported that the contractor began to install the new meters as of February 4, and 979 new meters were installed to date. Mr. Norris noted that customers would be able to access information through the customer portal at the end of the project. He also noted that five inquiries were received regarding options to opt out. He stated that the new water meters technology was different from Southern California Edison's smart meter, and he suggested the Board may want to consider establishing a policy for options to opt out.

ACTION ITEMS – (Items 7 and 8, and 13 through 18)



TRIUNFO SANITATION DISTRICT

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Board of Directors

James Wall, Chair

Michael Paule, Vice Chair

Steven Iceland, Director

Michael McReynolds, Director

Janna Orkney, Director

February 19, 2015

Board of Directors
Triunfo Sanitation District
Ventura County, California

DISCUSSION OF TRIUNFO SANITATION DISTRICT'S PARTICIPATION IN JPA RECYCLED WATER PROJECTS

SUMMARY

Director Orkney requested that an item be placed on the agenda to provide an opportunity for the Board to discuss the future participation of the District in JPA recycled water projects.

RECOMMENDATION

It is recommended the Board:

- a. Discuss Triunfo Sanitation District's participation in Las Virgenes/Triunfo Joint Powers Authority recycled water projects; and
- b. Provide direction to staff.

APPROVED FOR MARCH 23, 2015 AGENDA

Mark Norris – District Manager



TRIUNFO SANITATION DISTRICT

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Board of Directors

- James Wall, Chair
- Michael Paule, Vice Chair
- Steven Iceland, Director
- Michael McReynolds, Director
- Janna Orkney, Director

February 19, 2015

Board of Directors
Triunfo Sanitation District
Ventura County, California

DISCUSSION OF HISTORICAL JPA COST-SHARING OF RECYCLED WATER PROJECTS

SUMMARY

Director Orkney requested that staff provide information regarding the historical JPA cost-sharing of JPA recycled water projects. Included for the Board's review and discussion is a system map and a list of recycled water projects, including a cost breakdown for each agency.

RECOMMENDATION

It is recommended the Board:

- a. Discuss the historical Las Virgenes/Triunfo Joint Powers Authority cost-sharing of recycled water projects; and
- b. Provide direction to staff.

APPROVED FOR MARCH 23, 2015 AGENDA

Mark Norris – District Manager

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TSD Minutes

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March 23, 2015

It was moved by Director Paule, seconded by Director McReynolds, to join the CSDA under the current promotion with 90-day free membership and one year with the 20 percent discount. Motion carried unanimously.

14. Service Contract with Utility Cost Management, LLC for Utility Usage Analysis for Potential Cost Savings and Rebates – Mr. Norris presented the report.

It was moved by Director Orkney, seconded by Director Iceland, to authorize the Director of Finance to execute a service agreement with Utility Cost Management, LLC to potentially reduce the utility billings for the District, and to include the District receives the discount from CSDA membership. Motion carried unanimously.

15. Calendar Year 2015 Standing Committees – Mr. Norris presented the report.

Director Orkney stated she would step down from the Recycled Water Committee. Director McReynolds expressed his interest in serving on this committee. Directors Iceland and Paule expressed their interest in continuing to serve on the Finance Committee. Directors McReynolds and Orkney expressed their interest in continuing to serve on the Website Oversight Committee.

Chair Wall reappointed Directors Iceland and Paule to the Finance Committee; appointed himself and Director McReynolds to the Recycled Water Committee; and reappointed Directors McReynolds and Orkney to the Website Oversight Committee.

16. Calendar Year 2015 Ad Hoc Committees and Other Board Appointments – Mr. Norris presented the report.

Chair Wall reappointed Directors Iceland and Paule to the TSD/VRSD Contract Renewal Committee; reappointed Director McReynolds to perform financial oversight and bimonthly billing review of TSD invoices; and appointed himself to attend Ventura Regional Sanitation District Board meetings at the Chair's discretion with his calling other Board members if he is unable to attend.

18. Discuss Historical Las Virgenes/Triunfo Joint Powers Authority (JPA) Cost-Sharing of Recycled Water Projects – Mr. Norris presented the report. Color maps of the recycled water system were distributed to the Board.

The Board held a lengthy discussion regarding future participation in JPA-funded recycled water projects, concerns with revenue equity, historical challenges, and various strategies. The Board also discussed scheduling a workshop with a facilitator to discuss TSD's vision for recycled water as a partner in the JPA, consider acquisition of the Calleguas Municipal Water District's recycled water system, discuss setting a policy to make the JPA's recycled water system more equitable to TSD, and forming a subcommittee to screen facilitators for the workshop.

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It was the consensus of the Board to appoint Directors McReynolds and Paule to a subcommittee to screen and interview facilitators and for staff to bring back this item on the April 27 agenda to schedule a workshop.

17. Discuss Triunfo Sanitation District's Future Participation in Las Virgenes/Triunfo Joint Powers Authority's Recycled Water Projects – This item was discussed under item 18.
19. District Manager Evaluation – Mr. Norris presented the report.

The Board discussed conducting the District Manager's performance evaluation annually in July; using Ventura Regional Sanitation District's (VRSD) General Manager Performance Evaluation form as a template; and providing the completed form to the Chair to prepare a summary to be presented at a Board meeting.

It was moved by Director McReynolds, seconded by Director Orkney, to evaluate the District Manager once a year and adopt VRSD Board of Director's General Manager Performance Evaluation form as Triunfo Sanitation District's District Manager Performance Evaluation form, and the evaluation will be given to the District Manager at the July Board meeting. Motion carried unanimously.

INFORMATION ITEMS – (Items 20 through 30)

It was moved by Director Orkney, seconded by Director Iceland, to receive and file the Information Items. Motion carried unanimously.

20. Investment Report – February 2015
21. Disbursements – February 2015
22. Revenue & Expense Report – February 2015
23. Oak Park Water Service Update
24. Water Conservation Report
25. Water Supply Conditions Report
26. Water Conservation Customer Rebate Program
27. TSD Website – Google Analytics Report
28. Comprehensive Annual Financial Report for the Fiscal Year Ended June 30, 2014 and June 30, 2013
29. VRSD Billable Rates



TRIUNFO SANITATION DISTRICT

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Board of Directors

James Wall, Chair

Michael Paule, Vice Chair

Steven Iceland, Director

Michael McReynolds, Director

Janna Orkney, Director

April 22, 2015

Board of Directors
Triunfo Sanitation District
Ventura County, California

UPDATE REGARDING CONTRACTING WITH A FACILITATOR FOR A WORKSHOP REGARDING LAS VIRGENES/TRIUNFO JOINT POWERS AUTHORITY RECYCLED WATER COST SHARING AND PROJECTS

Summary

This item is included on the agenda to provide the Board an opportunity to discuss the use of a facilitator for a workshop regarding Las Virgenes/Triunfo Joint Powers Authority recycled water cost sharing and projects.

Background

At the March 23, 2015 Board meeting, the Board discussed scheduling a workshop with a facilitator to discuss TSD's vision for recycled water as a partner in the Las Virgenes/Triunfo Joint Powers Authority (JPA), consider acquisition of the Calleguas Municipal Water District's recycled water system, consider setting a policy to make the JPA's recycled water system more equitable to TSD, and forming a subcommittee to interview facilitators for the workshop.

Based on the Board's direction to seek consultants who provide facilitator services, staff reached out to local special districts and cities for referrals. Staff contacted several potential consultants; however, only two have responded favorably. Amistad Associates was utilized by the City of Thousand Oaks for a City Council goal setting session, and Ventura Consulting Group was utilized by the City of Oxnard for a partnering workshop.

Amistad Associates has provided a preliminary quote of \$2,500 per day for their services. A brief biography is attached. Ventura Consulting Group provided a comprehensive proposal, which is also attached.

If you have any questions, please contact me at 805-658-4621 or email marknorris@vrds.com.

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April 22, 2015
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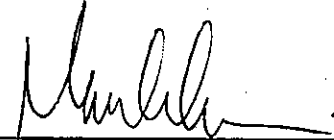
Fiscal Impact

No fiscal impact at this time.

Recommendation

It is recommended that the Board discuss the use of a facilitator for a workshop to discuss the Las Virgenes/Triunfo Joint Powers Authority recycled water cost sharing and projects, and direct staff accordingly.

APPROVED FOR THE APRIL 27, 2015 AGENDA



Mark Norris – District Manager



To: Josie Guzman, Triunfo Sanitation District
From: Jim Eisenhart - Ventura Consulting Group
Re: "Good to World Class" partnering process with Las Virgenes WD and Triunfo SD JPA
Date: April 21, 2015

Purpose

Design and facilitate a partnering process for the Triunfo SD and Las Virgenes WD JPA. This process will ensure teamwork between the two entities that meet our definition of World Class teamwork within 5 months of the initial initial workshop.

The results of the workshop can be expected to include:

- Definition of and commitment to compelling, measurable goals that acknowledge but are not limited by, contractual requirements. NOTE: In our experience, contract requirements and design specs rarely speak to the client's/end users real intent.
- Creation of collaborative processes that support achievement of these goals backed up by personal commitments to action with names, dates, and specific deliverables.
- Commitment to a communication protocol that emphasizes verbal communication with e-mails/written communication *only* to confirm or memorialize a verbal conversation.
- Engaging in a risk assessment process that has the team identify what could get in the way of their ability to achieve the partnership goals.
- Creation of a process for expediting the resolution of disputes while sustaining action toward the goals and with "World Class" teamwork still maintained.
- Development of a collaborative process for resolving and past/current disputes between the entities with velocity.
- An explicit process for measuring, monitoring and improving future project delivery team success.

Suggested Project Activity:

Preliminary Interviews -- on site:

These interviews of selected participants will enable us to understand key concerns,



risks, organizational structure and opportunities unique to this project. In turn this will allow us to introduce the partnering process and ourselves as well as develop a focused, project specific agenda.

Initial Partnering Workshop (8:00AM to 1:30 PM with working lunch)

This workshop should include all key stakeholders to Key criteria for participation: Can this person significantly influence the future success of the JPA and its projects? A principal of each major stakeholder must attend the full workshop.

Review workshops (1/2 Day) -- optional but recommended:

These half day activities should follow from 2-3 months after the initial full day workshop. Their purpose is to initiate new partners, review validity of goals, assess performance of goals, acknowledge successes, and develop new action plans.

Monthly project surveys: -- optional but recommended:

Workshop participants are surveyed anonymously by e-mail relative to performance of partnership goals and teamwork. This input mechanism flags potential project and relationship issues at an early stage, before they produce a detrimental impact on team behavior and project performance. Results are collated and sent to all workshop participants.

8.0 Team Celebration

After the project team realizes a teamwork score of 8.0 or better in a review workshop, VCG will host a lunch for the team after the next scheduled ½ day review workshop. VCG is committed to the team achieving World Class teamwork and to recognizing this accomplishment and celebrating it with the team.

World Class Teamwork Guarantee

- a. If, following the 2nd review session conducted within 3-6 months after the construction, the project team does not rate themselves at least an 8.0 or better on our "Good to World Class" definition of project teamwork, VCG will conduct an additional review session at no additional charge excluding travel (the 3rd review workshop would be free)
- b. A principal or executive from each of the major stakeholders must be present for the full duration of the initial and review workshops. Nor can there have been any change in personnel at the PM or above level during this 6-month period.

Project Fees

Onsite interviews and workshop design Initial partnering workshop to include delivery and follow-up notes:	\$9,500.00
Half Day Review Workshops (1 facilitator) and derivative sessions	\$8,000.00
Monthly Project Surveys (per month-optional)	\$ 600.00
Facility Coordination Fee (if VCG plans)	\$ 200.00
World Class Team Luncheon Celebration	No Charge



- Workshop facility, meals and audiovisual costs to be borne by client
- ~~Facilitator travel, meals and lodging costs to be borne by client at cost~~
- Terms: Billed at conclusion of workshop, net 30 days
- Proposal valid for 30 days
- Cancellation or postponement of scheduled and mutually agreed upon workshop date by the client within 10 working days of delivery will be considered "delivered" and will be billed for accordingly. See Cancellation Policy below:

Jim Eisenhart, President

Name:

Ventura Consulting Group

Organization:

Date: April 21, 2015

Date:

Signed: signature on file

Signed: _____

--- Please sign and return via email to Ventura Consulting Group ---

VCG CANCELLATION POLICY

CLIENT NOTICE PRIOR TO WORKSHOP	PERCENT OF FEE CHARGED
10 or more days	No charge
5-9 Days	75%
4 days or less	100%

IN OTHER WORDS

Cancellation or postponement of scheduled and mutually agreed upon workshop date by the client within 10 working days of delivery will be considered "delivered" and will be billed for accordingly. For cancellations within 10 working days, 75% of the workshop fee is due; for those within 5 working days, the full fee is due.

WHAT DOES A SHORT TERM CANCELLATION MEAN TO YOUR TEAM?



The short term cancellation or postponement of a scheduled workshop by management sends a message to project team members that the partnering process is less than a key priority. The result? Participant's commitment to teamwork and their personal commitments made in prior workshops are marginalized. Likewise, it will abrogate our/VCG's guarantee of "World Class" teamwork if the review sessions are not executed within the time frame noted above.

WHY MUST WE DO THIS?

As partnering facilitators, dedicated to your project success, the only thing we have to sell is partnering workshops and the time we commit to delivering and preparing for them. We do not do any other billable work such as studies, analyses, assessments, or project management like other consultants. Furthermore, when we hold a date for a client and that date is cancelled/postponed even within three (3) weeks, we cannot resell it. It is lost time and revenue to us. And we invariably have turned away other clients to hold that date for you. The scheduling of our workshops always requires at least 3-5 weeks lead time.

ADDITIONAL EXAMPLES

We are not like doctors or dentists who, as you know, have multiple patients on a day and will call you within 48 hours to confirm an appointment because even at that short notice they can move in another patient on their waiting list. And we are not similar to airlines and hotels that have a 24-48 hour cancellation policy because they can resell those tickets/rooms on Orbitz, Expedia, etc. We are more like a specialized vacation firm. Who, when you book a vacation with them, has a very specific 90 day, 60 day, and 30 day cancellation policy.

WHAT WE WILL DO

Our office will be giving you e-mail reminders of upcoming workshops 30 days in advance and agendas at least 10 days out (provided we are advised of the location of the workshop) to help you confirm workshop dates in advance with all stakeholders or, if necessary change the date at that time.

If you have any questions about the above, please call our office so we can clarify this with you before you execute our agreement.

WHAT DOES IPI SAY?

This policy is consistent with the International Partnering Institute's (IPI) partnering model and has been endorsed by IPI.

Legal/contractual Interpretation of "Construction Partnering"

California Evidence Code Section 1115

(a) "Mediation" means a process in which a neutral person or persons facilitate



communication between the disputants to assist them in reaching a mutually acceptable agreement. (b) "Mediator" means a neutral person who conducts a mediation ...{and} includes any person designated by a mediator either to assist in the mediation or to communicate with the participants in preparation for a mediation. (c) "Mediation consultation" means a communication between a person and a mediator for the purpose of initiating, considering, or reconvening mediation or retaining the mediator.

California Evidence Code Section 1119

Mediation Confidentiality: Except as otherwise provided in this chapter:

(a) No evidence of anything said or any admission made for the purpose of, in the course of, or pursuant to, a mediation or mediation consultation is admissible or subject to discovery, and disclosure of the evidence shall not be compelled, in any arbitration, administrative adjudication, civil action, or other non-criminal proceedings in which, pursuant to law, testimony can be compelled to be given.

(b) No writing, as defined in Section 250, that is prepared for the purpose of, in the course of, or pursuant to, a mediation or a mediation consultation, is admissible or subject to discovery, and disclosure of the writing shall not be compelled, in any arbitration, administrative adjudication, civil action, or other non-criminal proceedings in which, pursuant to law, testimony can be compelled to be given. (c) All communications, negotiations, or settlement discussions by and between participants in the course of mediation or a mediation consultation shall remain confidential.

County Square Consulting, Inc., a California Corporation DBA Ventura Consulting Group

Josie Guzman

Subject: FW: Facilitator for Triunfo Sanitation District Workshop

From: amistadasc@aol.com [mailto:amistadasc@aol.com]
Sent: Wednesday, April 08, 2015 2:27 PM
To: Josie Guzman
Subject: Re: Facilitator for Triunfo Sanitation District Workshop

Josie,

My daily rate is \$2500.00 per day. I will check with some clients who have reserved dates to confirm and will get back to you next week. Thank you.

Juan

Co-author: The Diversity Calling: Building Community One Story at a Time
TheDiversityCalling.com
Order: <http://bookstore.xlibris.com/Products/SKU-0089588049/The-Diversity-Calling.aspx>

Amistad Associates

Juan T. Lopez, CEO

About Amistad Associates

Amistad Associates is an organizational development and management consulting firm that offers Global Multicultural leadership programs, executive coaching, organizational assessments, strategic planning, and training and consulting services.

Juan Lopez and Giselle Sanchez co-founded Amistad Associates in 1982, in Oakland, California. In 1985, Amistad Associates became a full time venture; in 1988, it relocated to Sebastopol, California. In 1997 Amistad opened its second office in southern California and it closed in 2004 when Mike Vonada retired.

Amistad Associates approaches each organization as a unique system. In its many years of providing consultation and training to organizations on diversity interventions, leadership, innovation and change, we have gained a reputation for quality and for customizing programs to meet a client's specific needs.

About Juan T. Lopez

Juan T. Lopez began his consulting career in diversity in 1980. For five years, he worked with Dr. Price Cobbs, founder of Pacific Management Systems, a nationally recognized firm and one of the first to provide diversity training. His work in diversity began with race relations, and he was part of a small group of diversity pioneers who worked on expanding diversity beyond race relations and affirmative action into managing diversity, diversity awareness, and working with a diverse workforce.

In 1982, Juan Lopez began providing one of the first Latino Leadership programs to Fortune 50 companies. In addition to this program, he initiated multicultural leadership programs for NASA Johnson Space Center in Houston, Texas. Currently, Juan is responsible for Johnson and Johnson's, Crossing the Finish Line: Global Multicultural Leadership Program. He provides accelerated career and leadership training to senior executives who lead businesses around the world.

Juan and Rick Morales are co-founders of LLEAD, which is a premier, intensive, leadership program for Latinos in senior-level positions. They have offered this program to a wide group of corporations over the last 12 years. Rick and Juan are currently collaborating on a book about Latino Leadership.

Since 1985, Juan has assisted government agencies in areas such as: organizational change and development, leadership, diversity, and reinvention. In addition, Juan has worked with many private and public organizations to create hospitable work environments that value and practice equity and inclusion. In addition, he consults on

strategic design of organizational change to prepare for survival and competition in public service.

Juan has worked with PepsiCo leaders on diversity and leadership development and was a member of their Global Diversity & Inclusion Governance Council. He also provides multicultural leadership programs for top talent and future leaders of Lawrence Livermore National Laboratories. In addition, he co-facilitates the Hispanic Leadership program for Fortune 50 corporations.

Juan has his M.S.W. from the University of California at Berkeley, School of Social Welfare, where he emphasized organizational planning/administration and community health services. He holds a Bachelor of Arts Degree, in Psychology and in Latin-American Studies, from Sonoma State University.

Juan co-created Diversity 2000, a national think tank that meets annually to work on compelling diversity issues. Thus far, the group has produced 18 reports of innovative ideas and programs. In addition, Mr. Lopez was the co-chair for three years of the National Diversity Conference, which had been one of the premier national events addressing diversity issues. He has been a member of the Collegium since 1993, a diversity think tank of diversity pioneers who develop diversity concepts and leadership models. He recently was featured in *The Diversity Journal* as one of the *Diversity Pioneers*. Juan is a Co-author of: *The Diversity Calling: Building Community One Story at a Time*, published in 2012. He also is a Co-author of a chapter: *Leading for Diversity*, in the ASTD Leadership Handbook.

Amistad Associates – Partial Client List

Corporations

AT&T Bell Laboratories	Avon
AT&T Communications	AT&T Information and Network
Systems Circle K Corporation	Cosat Mobil
Digital Equipment Corporation	Dupont
Fannie Mae	Frito Lay
Hewlett Packard	Johnson & Johnson
Kaiser Permanente	Kelling, Northcross, and Nobriga
Kodak	Levi Strauss and Company
Lucent Technologies	Lucky Stores
McDonalds	Pacific Bell
Pinole Point Steel	Pepsi Co.
Sara Lee	Southern California Edison
Sierra West Electronics	Southland Corporation
S.C. Johnson Wax	TRW Space & Electronic Group

Wal-Mart

Wells Fargo Bank

Government

Berkeley School District
 City of Long Beach
 City of Palo Alto
 City of Riverside
 Contra Costa County Health Center
 Housing Authority of the City of Los Angeles
 L.A. Co. Community Development
 Municipal Treasurer's Association
 NASA Johnson Space Center
 Port of Long Beach
 Riverside County Maternal and Child Health
 Sacramento County Housing and Redevelopment
 San Mateo County Health Services
 Health Visalia Fire Department

City of Los Altos
 City of Napa
 City of Petaluma
 City of Yuba City
 Department of Energy
 League of California Cities
 Merced County Public Health
 Stanislaus Housing and
 National Park Service
 Port of Oakland
 Santa Clara Drug and Alcohol
 San Francisco Fire Department
 State of Ca. Maternal and Child
 Visalia School District

Non-Profit Organizations

Anti Defamation League
 Hispanic Corporate Council
 National Hispanic University
 Oakland YWCA
 Saint Mary's College
 Self-Help Enterprises
 Project Change

Berkeley YWCA
 Katz Foundation
 Tiburcio Vasquez Health Center
 Planned Parenthood
 Salvation Army
 San Francisco Linking Program

Mr. Juan T. Lopez Biography

Amistadassociates.wordpress.com

Mr. Lopez co-founded Amistad Associates in 1982 in Oakland, California, with Ms. Giselle Sanchez and a small group of human resource professionals who were working with non-profits, educational institutions and government. In 1985, Mr. Lopez became the CEO of Amistad Associates. In 1988, Amistad Associates relocated to Sebastopol, California.

Currently, Mr. Lopez is the primary consultant for Johnson and Johnson's Global Multicultural Leadership Program. In this role he is responsible for designing organizational leadership competencies, using 360's for professional development, mentoring and developing career strategies for fast track advancement. He works closely with executive management to evaluate and track progress. His program is recognized nationally and is being benchmarked as a best in the field model. Mr. Lopez was a member of the Global Diversity and Inclusion Governance Council with PepsiCo for 5 years. He offers strategic insight on diversity management, organizational change, leadership development and innovation.

Since 1985, Mr. Lopez has worked with local government agencies by providing organizational assessment and development, strategic management, meeting facilitation, leadership, and reinvention. Mr. Lopez has worked with many private and public organizations to create work environments that are productive, efficiently managed and practice collaborative management. In addition, he consults on strategic design of organizational change to prepare for survival and competition in public service.

As a consultant with Sentient Systems, Mr. Lopez provided training to senior leadership from cities and counties throughout California through the Continuing Education for Public Officials (CEPO) project, sponsored by the League of California Cities. His area of focus was systemic organizational change, performance improvement, and development of *best practices*. Additionally, Mr. Lopez was a co-founder and principal with the Center for Reinventing Government, working closely with Ted Gaebler. The consulting group offered organizational development and strategic planning to a number of agencies at the federal and state level.

Before Mr. Lopez co-founded Amistad Associates, he worked for San Mateo County Mental Health for seven years, directing the NIMH Block Grant program for organizational consultation and education. In this capacity, Mr. Lopez worked throughout San Mateo County with a number of NGO's and public agencies. His role was to provide organizational consultation that included assessment, strategic design and planning, program alignment, staff development, leadership coaching, team building and research.

Mr. Lopez is an associate of O'Mara and Associates. He has worked in the public and private sectors for the last thirty years. Fifty percent of his work has focused on organizational development and strategic planning with local government and non-profit

Mr. Juan T. Lopez Biography**2014**

educational institutions. Under Mr. Lopez's guidance, Amistad Associates has contributed to the organizational and leadership development of (partial list) Lawrence Berkeley; Lawrence Livermore National Laboratory; Contra Costa Health and Human Services; Napa County Health and Human Services; Port of Oakland; Port of Long Beach; Los Angeles Community Development Commission; Housing Authority of the City of Los Angeles; Sonoma State University, UC Berkeley Equity and Inclusion and several cities in northern and southern California.

Mr. Lopez has his M.S.W. from the University of California at Berkeley, School of Social Welfare, with a focus on organizational planning and community health services. He holds a Bachelor of Arts degree in Psychology and Latin-American Studies from Sonoma State University.

Juan co-created Diversity 2000, a national think tank that meets annually to work on compelling diversity issues. Thus far, the group has produced 20 reports of innovative ideas and programs. In addition, Mr. Lopez was the co-chair for three years of the National Diversity Conference, which had been one of the premier national events addressing diversity issues. He was a member of the Collegium since 1993, a diversity think tank of diversity pioneers who develop diversity concepts and leadership models. He recently was featured in *The Diversity Journal* as one of the *Diversity Pioneers*. Juan is a Co-author of: *The Diversity Calling: Building Community One Story at a Time*, published in 2012. He also is a Co-author of a chapter: *Leading for Diversity*, in the *ASTD Leadership Handbook*.

TSD Minutes

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April 27, 2015

per week on Mondays and Thursdays and other details as suggested by Director Paule, and send a press release as soon as possible to the local newspapers. Motion carried unanimously.

Director Iceland suggested including a message regarding water use restrictions on the entrance boards to Oak Park.

13. Update Regarding Facilitator for JPA Recycled Water Cost Sharing and Projects Workshop – Mr. Norris presented the report.

A discussion ensued regarding whether a facilitator is needed for a study session to discuss the Las Virgenes/Triunfo Joint Powers Authority (JPA) recycled water cost sharing and projects; discussing with Las Virgenes Municipal Water District (Las Virgenes) Board that Triunfo Sanitation District (TSD) invested in JPA infrastructure in Los Angeles County and would like to see a partnership that benefits both agencies by investing in Ventura County; bringing up at a JPA Board meeting that the TSD Board is interested in developing a more positive relationship; and forming a committee of both boards to develop a consolidated plan to share with the entire JPA Board. Mr. Norris stated he would discuss the TSD Board's comments with Las Virgenes General Manager, Dave Pedersen.

It was the consensus of the Board to continue this item to the May 18 Board meeting.

Mr. Kwong departed from the meeting at 7:22 p.m. due to a prior commitment.

14. Discussion Regarding Setting a Policy for Water Customers to Opt Out of Installation of Automated Water Meters – Mr. Norris presented the report.

Nicole Johnson expressed her concern that the Board did not provide an opportunity for water customers to opt in for the installation of the new automated water meters. She also expressed concern with surveillance and potential health risks. She suggested the Board seek an expert to speak regarding automated water meters and electromagnetic field (EMF) emission.

Caroline Aslanian expressed concern that she was not provided an opportunity for a choice and her concern with aggregate consumption. She also expressed concern with EMF emission and with how the data from the automated water meters would be transmitted to the two stations. She asked the Board to reconsider the installation of automated water meters, consider potential health risks, and bring in an outside expert to speak about engineering, how the system works, and how much EMF is emitted. Mr. Jones noted that the vendor has this information available on its website.

A discussion ensued regarding the costs and work efforts involved to manually read water meters, the fact that the automated water meters are installed in the parkway close to the street as opposed to electric meters which are installed on

ITEM 7C
4-5



TRIUNFO SANITATION DISTRICT

A PUBLIC AGENCY

Providing Outstanding Service Since 1963

Board of Directors

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Michael Paule, Vice Chair

Steven Iceland, Director

Michael McReynolds, Director

Janna Orkney, Director

May 11, 2015

Board of Directors
Triunfo Sanitation District
Ventura County, California

UPDATE REGARDING CONTRACTING WITH A FACILITATOR FOR A WORKSHOP REGARDING LAS VIRGENES/TRIUNFO JOINT POWERS AUTHORITY RECYCLED WATER COST SHARING AND PROJECTS

Summary

This item was continued from the April 27, 2015 Board meeting.

Background

At the April 27, 2015 Board meeting, the Board discussed the possible use of a facilitator to assist the TSD Board in developing a policy for future participation in JPA recycled water projects. TSD has invested significantly in historical JPA recycled water projects in Los Angeles County. TSD would like to develop an improved relationship with its JPA partner that reflects a more equitable sharing in both costs and benefits, including JPA investment in Ventura County.

If you have any questions, please contact me at 805-658-4621 or email marknorris@vrzd.com.

Fiscal Impact

No fiscal impact at this time.

Recommendation

It is recommended that the Board discuss the use of a facilitator for a workshop to discuss the Las Virgenes/Triunfo Joint Powers Authority recycled water cost sharing and projects, and direct staff accordingly.

APPROVED FOR THE MAY 18, 2015 AGENDA

Mark Norris – District Manager

ITW 2015-1

Overview of the Management of Treated Effluent from the Tapia Water Reclamation Facility

Las Virgenes – Triunfo Joint Powers Authority Report No. 2540

November 2013

Contents

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Recycled Water System Maps	2

Executive Summary - 1

Executive Summary

The Las Virgenes – Triunfo Joint Powers Authority (JPA) operates the Tapia Water Reclamation Facility (Tapia) that serves approximately 100,000 residents in the Las Virgenes Municipal Water District (Las Virgenes) and Triunfo Sanitation District (Triunfo) service areas. Both agencies provide sanitation, recycled water distribution, and potable water service within their respective districts.

Tapia produces approximately 10,000 acre feet per year of treated effluent that must be managed by one or more of the following options: 1) disposal to the Malibu Creek; 2) disposal to the 005 discharge point; 3) disposal through JPA operated spray fields; and/or 4) distribution through the recycled water system developed both jointly by the JPA and through individual efforts by Las Virgenes and Triunfo.

The least expensive and most direct option for managing the treated effluent is to discharge to the Malibu Creek. Creek discharge requires no pumping (electricity) and very little infrastructure (capital, labor or maintenance costs) to accomplish. Discharge to Malibu Creek, however, is *prohibited* seven (7) months out of each calendar year¹. To manage its treated effluent and to maximize beneficial use (both during and outside of the creek avoidance period), the JPA directs significant amounts of treated effluent through the recycled water system.

Approximately 6,000 acre feet of treated effluent are “recycled” or reused each year through efforts of the JPA. In Ventura County, recycled water is transmitted through approximately sixteen (16) miles of pipeline owned by the Calleguas Municipal Water District and the Triunfo Sanitation District. Within the Las Virgenes service area, recycled water is moved through approximately 68 miles of transmission and distribution pipelines. Of the 68 miles of pipelines, approximately 44 miles (65%) of the system were financed through activities of the JPA. The balance, approximately 24 miles (35%) were paid for by the Las Virgenes Municipal Water District or developers working with Las Virgenes.

The purpose of this report is to help characterize significant milestones related to the development of the JPA’s recycled water system. In addition to the background information provided in the series of Questions/Answers provided below, maps detailing the recycled water system’s significant features and flows by service area are provided in Section 2.

1. *What are the organizational differences between the agencies involved (Las Virgenes, Triunfo, and Calleguas) and how is that significant to this report?*

The Las Virgenes Municipal Water District (LVMWD) was formed under the Municipal Water District Law of 1911 for the purpose of distributing water for domestic and municipal purposes and to provide sanitation services. LVMWD is a member public agency of the Metropolitan Water District of Southern California (Metropolitan) and purchases water directly from Metropolitan. The Triunfo Sanitation District (Triunfo) was formed under Division 5 of the Health and Safety Code for the purpose of providing sanitation service. Triunfo distributes potable

¹ Tapia NPDES Order No. R4-2010-0165.

water through the Oak Park Water Service, which it owns. The potable water is purchased from the Calleguas Municipal Water District – also a member public agency of the Metropolitan Water District of Southern California. Triunfo also retails recycled water that is purchased from Calleguas (Calleguas gets its recycled water from Triunfo, who purchases the recycled water from the JPA).

2. *What is the significance of LVMWD's relationship with Metropolitan?*

Through LVMWD's status of as a "member public agency of Metropolitan", the JPA is eligible to participate in financing programs related to recycled water system development sponsored by Metropolitan. Two significant examples include:

- The JPA Western System expansion (1983 agreement for approximately 12 miles of pipeline, a pumping station and a reservoir) for which Metropolitan provided approximately \$7.3 million in capital contribution in exchange for entitlement to a portion of the recycled water produced by the project. In 1993, the JPA bought out Metropolitan's interest in the agreement for \$3 Million. Triunfo's share was \$882,000; Las Virgenes' share was \$2,118,000.
- In 1989, the JPA entered into an agreement with Metropolitan for the Calaberas Reclaimed Water System extension (Local Resource Program). The project included the installation of approximately 7 miles of 4-10 inch distribution pipe (Calaberas) and 3 miles of 24-inch parallel trunk line from Mulholland to Las Virgenes' headquarters. In exchange for the JPA's investment, Metropolitan subsidized the cost of delivering up to 700 acre feet per year through the expanded system. The 25 year term of this agreement ends in fiscal year 2014-2105, at which point the JPA will have received approximately \$2.2 million through this agreement. It should be noted that the LRP funds are not included in the calculation of the wholesale recycled water rate, so the expiration will not have any impact on that calculation.

It is worth mentioning that since the Metropolitan LRP revenue is *not* included in the wholesale recycled water rate calculation, JPA participants receive the benefit as a direct off-set to agency expenses (from the \$2.2 million above, approximately \$1,550,000 goes to Las Virgenes and \$650,000 to Triunfo).

While these projects were sponsored by Metropolitan – a potable water agency – they served to accomplish the JPA's goal of expanding the disposal management options for treated effluent coming from Tapia.

3. *Are there other examples of outside agencies funding JPA water system expansion?*

In 2009, the United States Bureau of Reclamation awarded the JPA a \$2 million grant to construct a 24" recycled water pipeline from Tapia to Mulholland Highway.

4. *How was Tapia effluent characterized in the original JPA agreement?*

Nothing in the original JPA agreement or four subsequent amendments referred to Tapia wastewater treatment plant effluent as "recycled water". Prior to 1982, recycled water was considered effluent (discharge to Malibu Creek at this point was prohibited eight months per year). The Joint Ventura Agreement contemplated that the parties will share in the cost of effluent disposal facilities (70/30 split). Significant projects constructed during this period include: 1) Las Virgenes Valley Pipeline; 2) Reservoir 2 (at LVMWD Headquarters); 3) Calabasas (Eastern) Reclaimed water pump station; and 4) Reservoir 3 and pipelines to Calabasas Golf course.

5. *What changed after 1982?*

The Regional Water Quality Control Board (RWQCB) permitted year-round discharge into Malibu Creek if tertiary filters were added to the Tapia treatment plant. Filters were installed and a low cost effluent disposal option was achieved by discharging to Malibu Creek. At this point in time, JPA partners had the option to either choose creek discharge or expand their recycled water system (for effluent disposal) on their own.

6. *Does the JPA own any facilities in Ventura County?*

No. Characterization of the development of the recycled water system in Ventura County is provided in Question 7, below.

7. *What are some of the important milestones in the development of the recycled water system in Ventura County?*

The first extension into Ventura County was constructed in the late 1980's. Las Virgenes was offered the option to participate in the construction of the pipeline as required by the Agreement, but was encouraged by Triunfo not to. This project was completed with TSD as the sole participant.

Plans to extend the recycled water system into Ventura County to North Ranch, through the Oak Park area were designed by the Joint Venture, with Triunfo as administering agent. Las Virgenes was offered the option to participate in funding this project, and did so at a level of 70.6%.

In the early 1990's when plans for the North Ranch system were nearly complete, the Calleguas Municipal Water District decided its role in Ventura County would be as the wholesale water agency of both potable and recycled water supplies. Calleguas purchased the Lake Sherwood pipeline from Triunfo and paid for the design effort expended by the Joint Venture for the North Ranch system. Calleguas redesigned and constructed the pump station, tank and main transmission line to North Ranch. California Water Service converted the North Ranch golf course to recycled water.

Following the purchase of the private mutual water company serving potable water to the Oak Park community, Triunfo offered Las Virgenes the option to participate in funding recycled water systems in that community, however the offer was declined.

Using recycled delivered by the Triunfo Sanitation District, private companies and developers also helped extend the recycled water system in Ventura County. California Water Service extended its recycled water distribution system to new customers in Ventura County. Lake Sherwood developers extended their recycled water distribution system, including construction of an underground storage tank. These private projects were completed without requests for participation of the JPA.

8. *What are the three different groups shown on the maps in Section 2 of this report? What is the significance of each group?*

The maps provided in Section 2 show the transmission and distribution systems (pipes in the ground) that are responsible for moving the treated effluent from Tapia to disposal (005 discharge point) and to recycled water distribution points (Las Virgenes/Triunfo).

Group A (28.8 miles) - The JPA's recycled water transmission or "Backbone" system. This series of pipelines transmits water from Tapia to the 005 discharge point and to two (2) Ventura County connection points. Without the backbone, movement of treated effluent between the points identified above would not be possible.

Group B (15.6 miles) – JPA funded distribution system. This group includes distribution (typically smaller diameter pipelines) pipelines that were necessary for the participation in the two programs described in Question 2, above.

Group C (23.8 miles) - Distribution system funded by either Las Virgenes or through developer agreements. These pipelines were paid for by either Las Virgenes or by developers with agreements with Las Virgenes. From a budget standpoint, the operations and maintenance expense for this group resides 100% with Las Virgenes. There is no cost to JPA partners for this portion of the system.

The maps also indicate recycled water sales data (one year average sales data based on 2009-2013 data). The recycled water sales information shows Las Virgenes Municipal Water District Accounts (groups A, B and C) and sales from Triunfo's two primary recycled water service areas, Oak Park and Lake Sherwood.

9. *Why is replacement cost used and how was it calculated?*

Replacement cost method was used to develop an "apples to apples" comparison of the value of the transmission and distribution components of the recycled water system within the Las Virgenes service area. The replacement cost calculation was made using construction cost estimating criteria based on unit prices for 4", 6", 8", 10", 12", 14", 16", 18", 20" and 24" pipelines extended across every foot of pipeline identified in this study.

10. *Is recycled water a commodity or waste? Which is correct?*

Recycled water system expansion projects prior to the 1982 Joint Venture agreement, were funded appropriately for effluent disposal projects. After 1982, both agencies chose the option

of developing a recycled water transmission/distribution system rather than use the creek discharge disposal option.

Commencing in May 1998, Malibu Creek discharge was prohibited by the RWQCB for seven (7) months per year. The sale of recycled water makes up the largest option for creek avoidance based on volume.

The 2009 Joint Exercise of Powers Agreement (Article Four: Effluent Disposal) identifies recycled water distribution as one of four (4) options for disposing of treated effluent. Under the umbrella category of "Tapia effluent management", discharge of effluent to the Malibu creek *and* distribution of effluent through the recycled water system to recycled water customers both achieve the same goal.

11. *What is the benefit to JPA partners to participate in a recycled water projects outside of the agency's service area?*

As discussed previously in this report, expansion of the recycled water system enhances the JPA capability to manage treated effluent from Tapia. Additionally, as pointed out in Question 2, partners can benefit from programs that either aren't available - or aren't being pursued - within their service area. Examples include Metropolitan's Local Resource Programs (LRP).

Additionally, when effluent is managed through the recycled water system, costs associated with moving the water and maintaining the necessary infrastructure are paid for by the end user through the JPA wholesale recycled water rate. Put in another context, recycled water customers pay for the pumping that is associated with the disposal of recycled water.

12. *What percentage of recycled water sales happens during the prohibition or "creek avoidance" period?*

Approximately 75% of all recycled water sales (by JPA partners) are during the creek avoidance (or prohibition) period. Without this level of retail recycled water retail sales during the prohibition period, the volume of treated effluent that must be disposed would triple.

13. *Without the existing recycled water system, what options would the JPA have for effluent management?*

The 2005 "Tapia Effluent Alternative Study" (Report No. 2321.03) identifies a number of alternatives/enhancements for managing effluent from Tapia. While the study was commissioned to identify mechanisms for achieving 100% creek avoidance, the projects are options to manage effluent that can be implemented in addition to (or in lieu of) the JPA's recycled water system. It should be noted that each of the projects featured on the narrowed down list of 13 projects has significant capital outlay and ongoing operations and maintenance requirements that would likely make the option more expensive than investment in the recycled water system.

At a minimum, the *cost of disposing* the treated effluent that is currently recycled during the prohibition period would equal the pumping costs to get the water to the discharge point. Currently, through sale of the recycled water, retail customers pay this expense.

14. Summary

The following tables summarize data provided on the included maps.

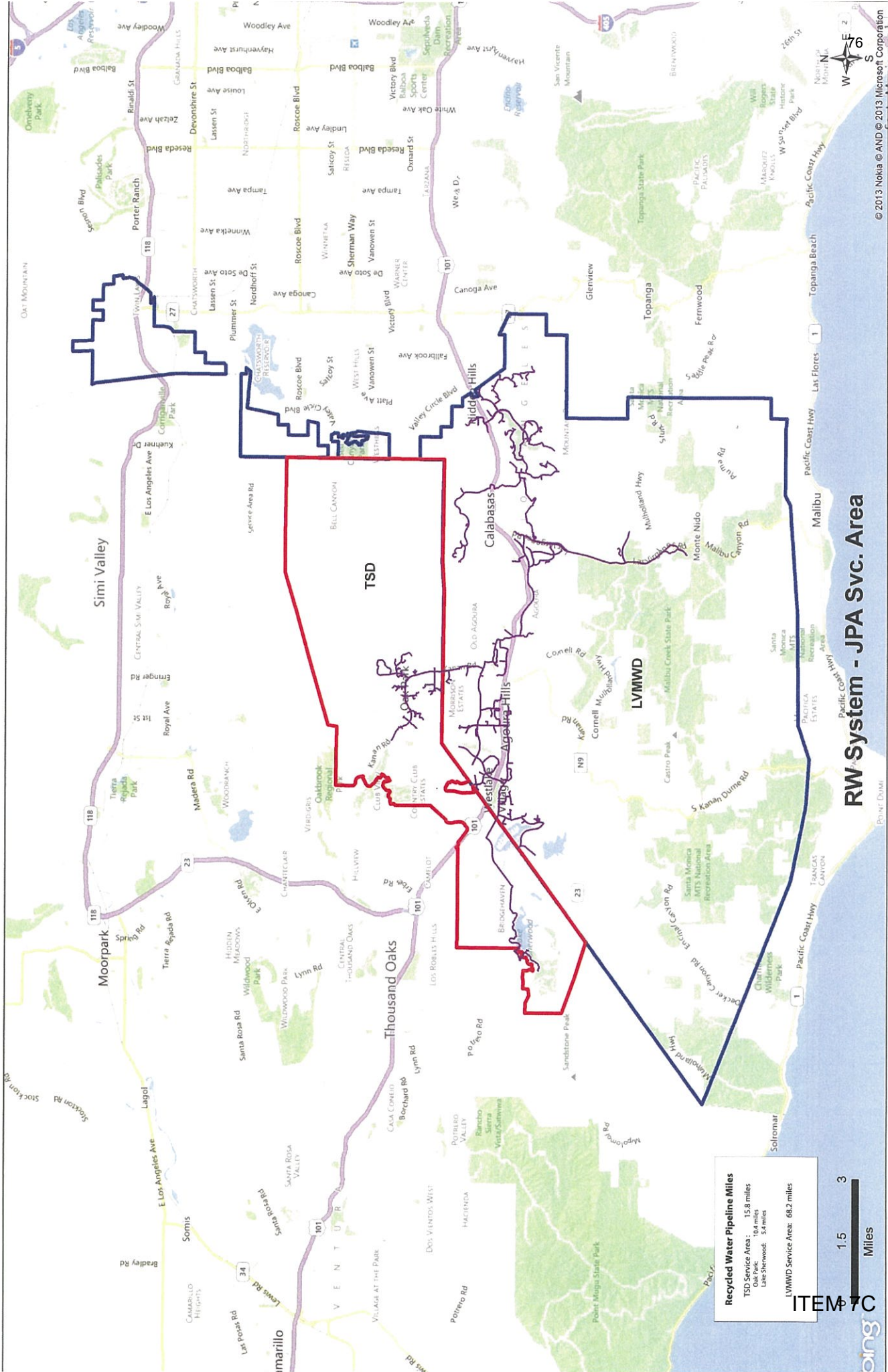
Table 1: Investment by Agency

	RW System Pipeline Grouping			Total
	A	B	C	
Las Virgenes	\$ 15,990,900	\$ 3,741,800	\$ 7,500,000	\$ 27,232,700
Triunfo	\$ 6,659,100	\$ 1,558,200	\$ -	\$ 8,217,300
Total Replacement:	\$ 22,650,000	\$ 5,300,000	\$ 7,500,000	\$ 35,450,000

Table 2: Annual Recycled Water Sales by Agency

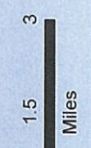
	Las Virgenes		Triunfo		Total
	Prohibition	Non-Prohib.	Prohibition	Non-Prohib.	
Group A	1,069	376			1,445
Group B	982	354			1,336
Group C	1,413	575			1,988
Triunfo			1,277	269	1,546
Total:	3,464	1,305	1,277	269	6,315

Recycled Water System Maps - 2

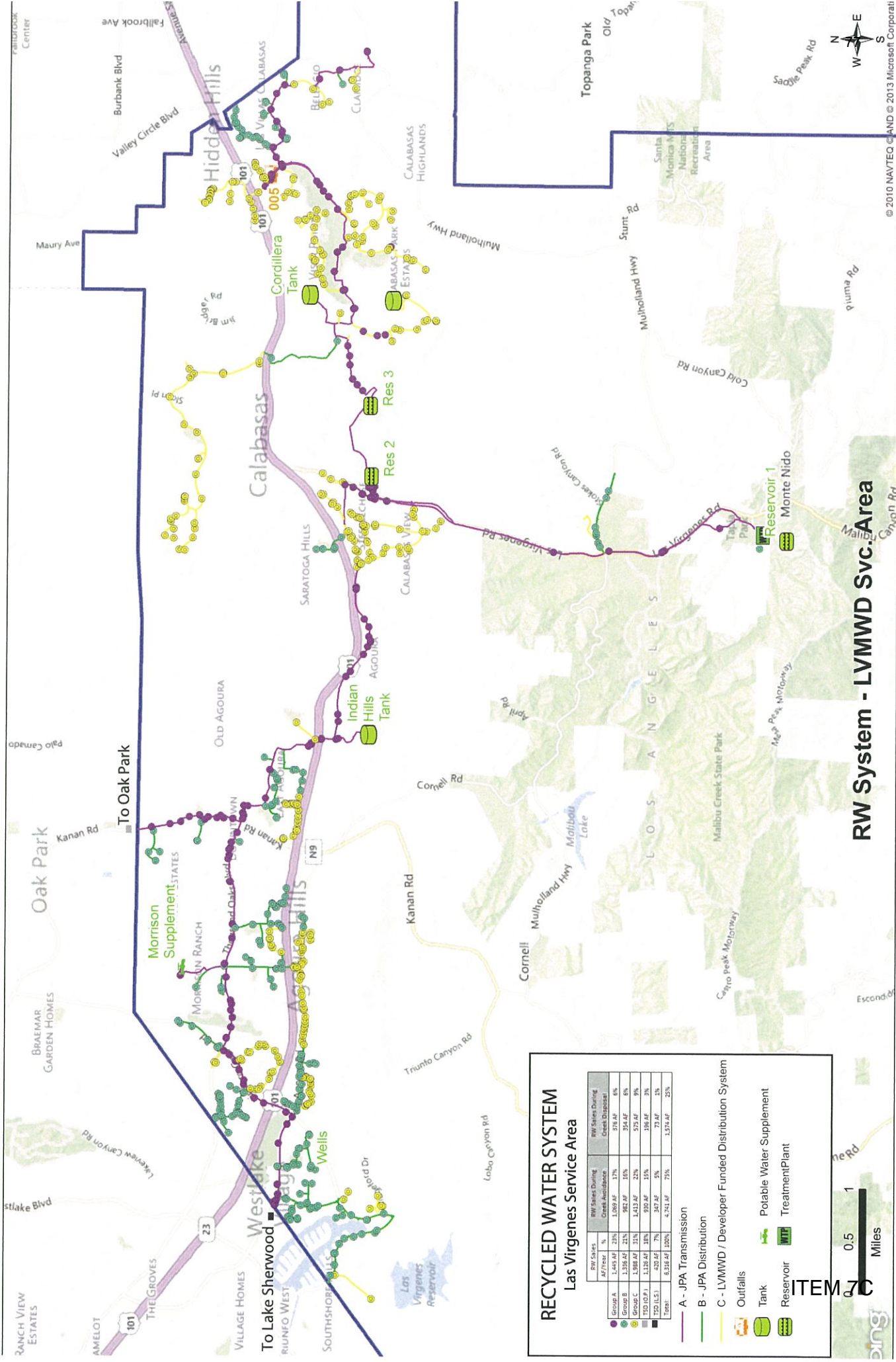


Recycled Water Pipeline Miles

TSD Service Area:	15.8 miles
Thousand Oaks Service Area:	10.4 miles
Lake Sherwood:	5.4 miles
LVMWD Service Area:	68.2 miles



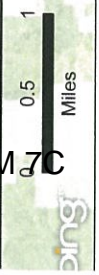
ITEM 7C



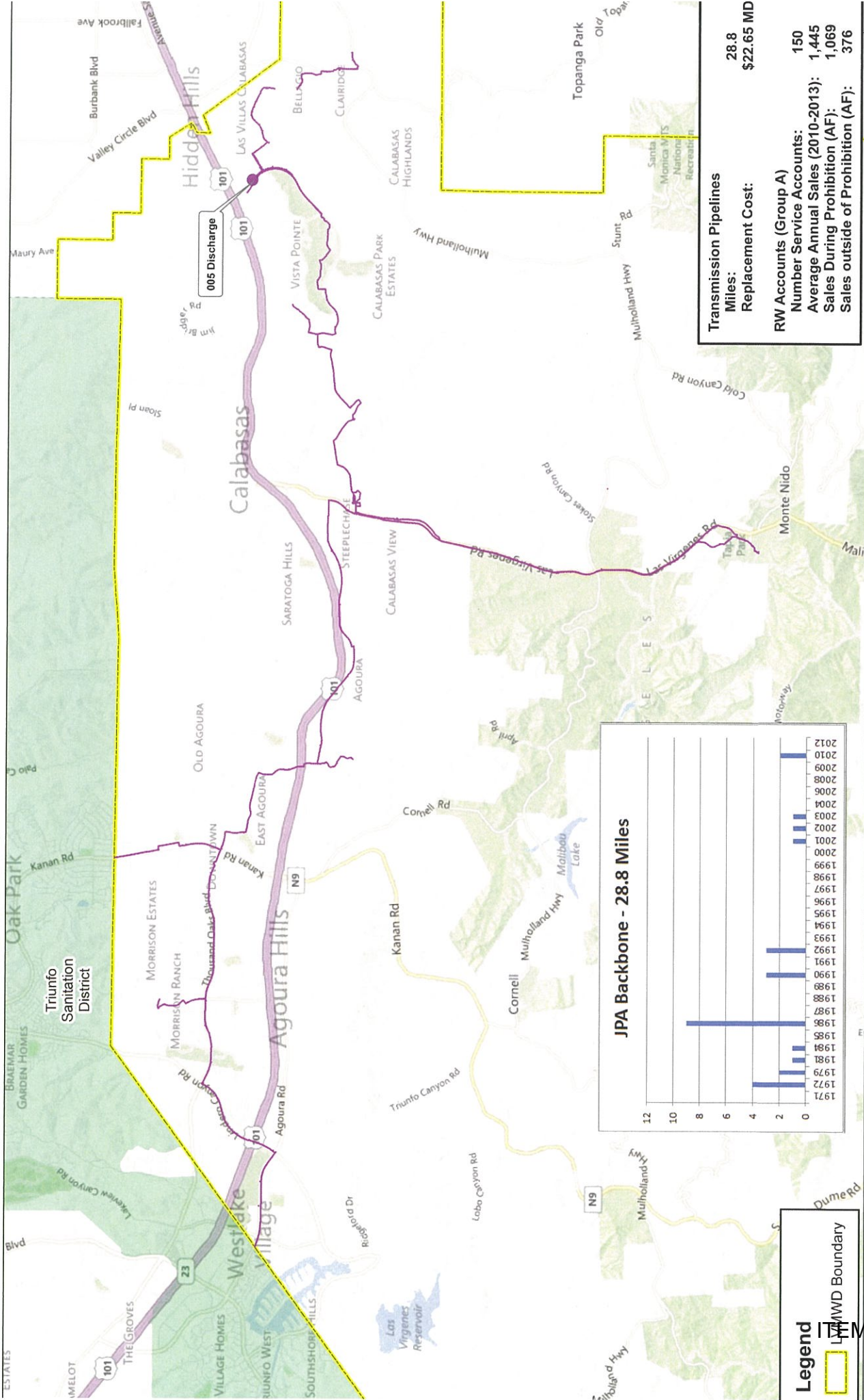
RECYCLED WATER SYSTEM Las Virgenes Service Area

Group	RW Sales AF/Year	%	RW Sales During Creek Availability	RW Sales During Creek Disposal
Group A	1,445 AF	25%	1,069 AF	376 AF
Group B	1,316 AF	25%	982 AF	334 AF
Group C	1,988 AF	35%	1,432 AF	575 AF
TSD (D.P.)	1,126 AF	18%	930 AF	196 AF
TSD (L.S.)	420 AF	7%	347 AF	73 AF
Total	6,316 AF	100%	4,761 AF	1,574 AF

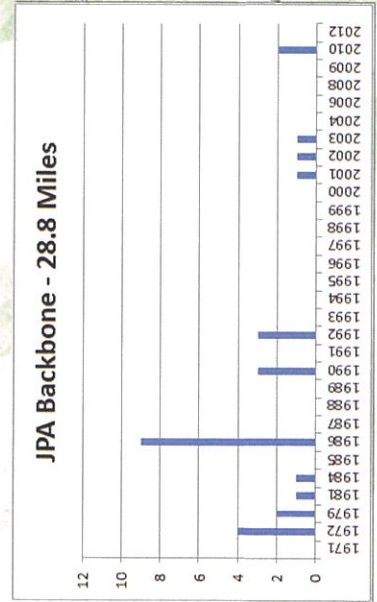
A - JPA Transmission
 B - JPA Distribution
 C - LVMWD / Developer Funded Distribution System
 Outfalls
 Tank
 Reservoir
 Potable Water Supplement Treatment Plant



ITEM 7C



Transmission Pipelines	28.8
Miles:	
Replacement Cost:	\$22.65 MD
RW Accounts (Group A)	150
Number Service Accounts:	1,445
Average Annual Sales (2010-2013):	1,069
Sales During Prohibition (AF):	376
Sales outside of Prohibition (AF):	

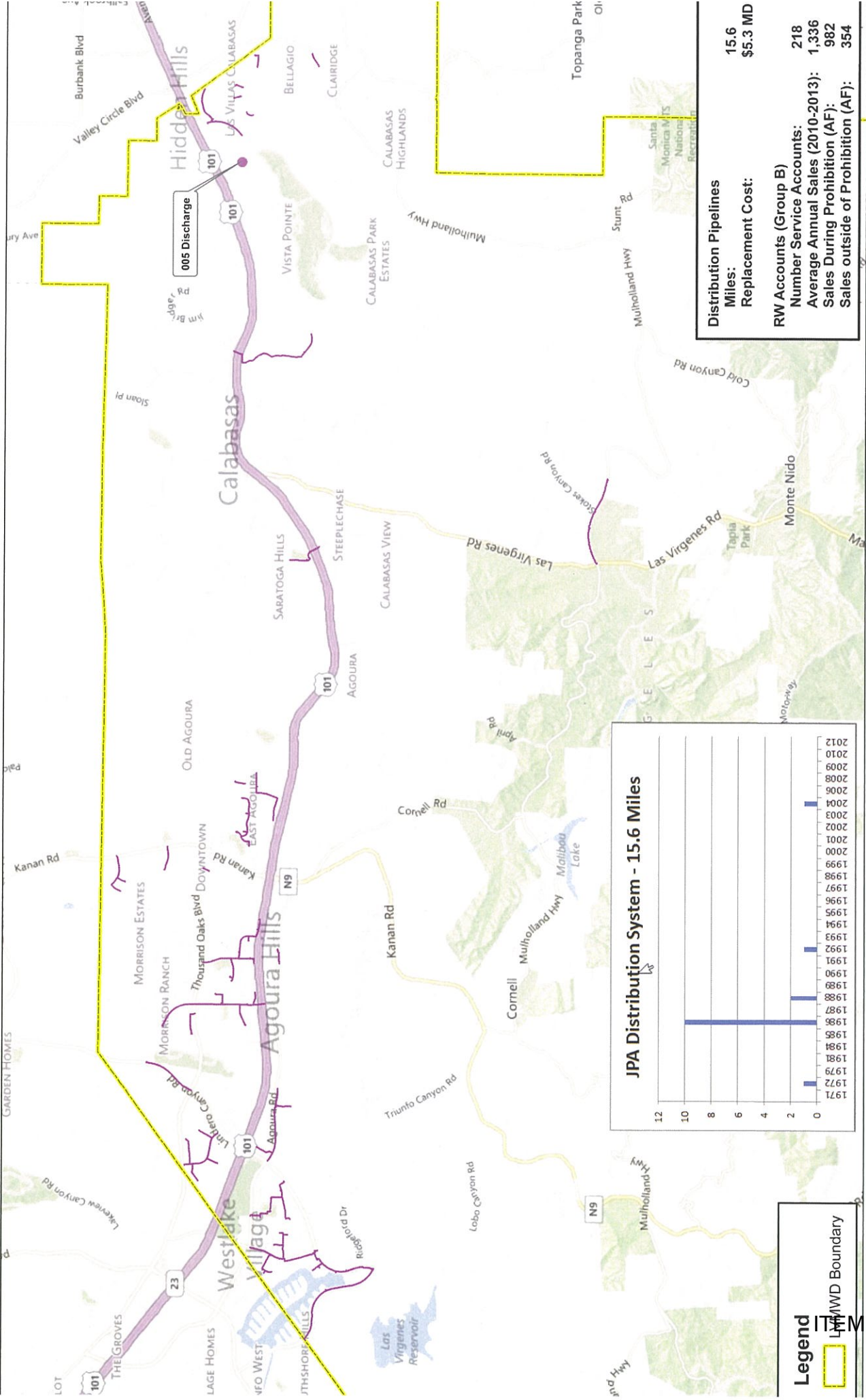


Group A - Joint Venture Transmission System

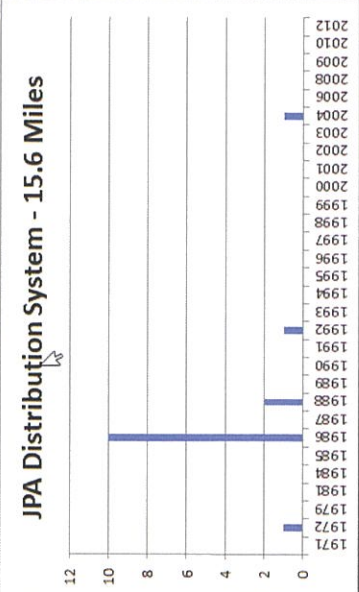
Legend

- ITHWD Boundary
- JPA Boundary





Distribution Pipelines	15.6
Miles:	\$5.3 MD
Replacement Cost:	
RW Accounts (Group B)	218
Number Service Accounts:	1,336
Average Annual Sales (2010-2013):	982
Sales During Prohibition (AF):	354
Sales outside of Prohibition (AF):	



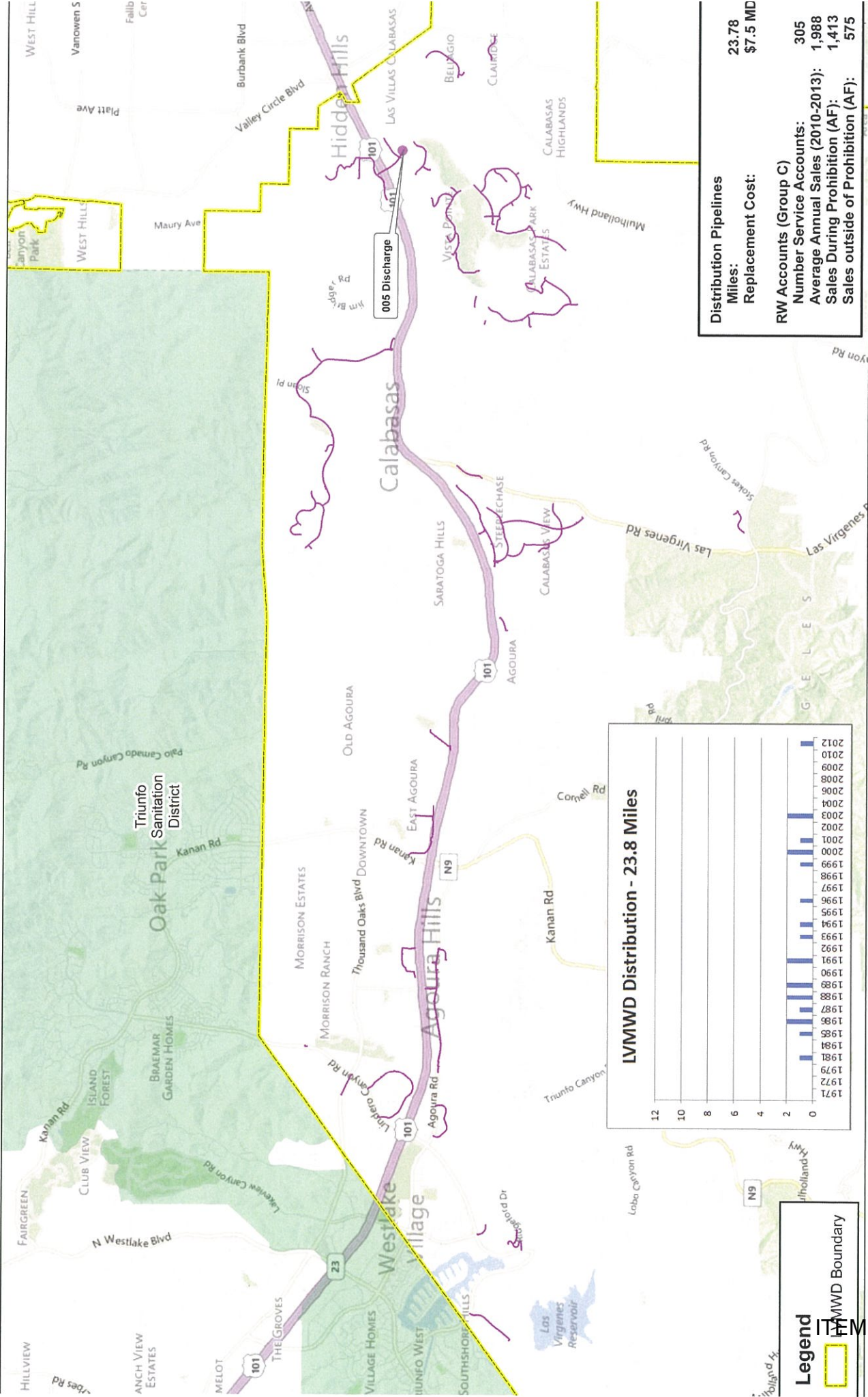
Legend

- ITM 70
- JPA WWD Boundary

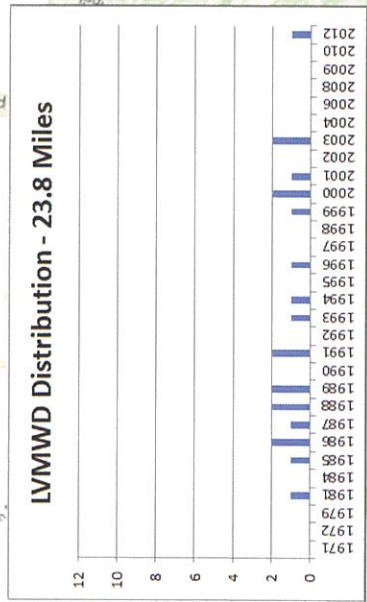


Group B - JPA Funded Distribution System





Distribution Pipelines	23.78
Miles:	\$7.5 MD
Replacement Cost:	
RW Accounts (Group C)	305
Number Service Accounts:	1,988
Average Annual Sales (2010-2013):	1,413
Sales During Prohibition (AF):	575
Sales outside of Prohibition (AF):	



Legend

- LVMWD Boundary



Group C - LVMWD / Developer Funded Distribution System



June 9, 2015 LVMWD Regular Board Meeting

TO: Board of Directors

FROM: Finance & Administration

Subject: Information Systems Master Plan: Receive and File

SUMMARY:

On October 28, 2014, the Board approved a Professional Services Agreement with NexLevel Information Technology, Inc., to complete an organizational review of the Information Systems Division and develop an Information Systems Master Plan. The work has been completed and culminated in the attached Information Technology Assessment and Information Systems Master Plan.

RECOMMENDATION(S):

Receive and file the Information Technology Assessment and Information Systems Master Plan prepared by NexLevel Information Technology, Inc., and authorize staff to incorporate the recommended organizational changes and information technology projects in the proposed Fiscal Year 2015-16 Budget.

FISCAL IMPACT:

Yes

ITEM BUDGETED:

No

FINANCIAL IMPACT:

The recommended organizational changes for the Information Systems Division will result in budget impact of approximately \$59,700 per year beginning in Fiscal Year 2015-16. The addition of a new Information Systems Technician position proposed in Fiscal Year 2016-17 will have a budget impact of approximately \$90,100 per year beginning that fiscal year. The recommended information technology projects will result in a increase of \$305,000 to the Fiscal Year 2015-16 Budget, consisting of \$250,000 in the Capital Improvement Budget and \$55,000 in the Information Systems operating budget.

DISCUSSION:

The Information Technology Assessment and Information Systems Master Plan reflect input received from staff throughout the organization. Improvements were identified to address the following key areas:

- Technology Governance
- Service Delivery
- Business Technology Applications
- Infrastructure
- Security
- Administration

The organizational analysis identified the need to change four current positions to best address the current technology needs of the District, including providing after-hours operational support for the District's SCADA

system and additional focus on network administration and security. The study recommends adding an Information Systems Technician position to the organization, but staff proposes to defer that item until Fiscal Year 2016-17 to minimize current budgetary impacts. The staffing recommendations for Fiscal Year 2015-16 also include reclassification of three existing Information Systems Division positions and one Facilities and Operations Department position.

The following information technology projects are recommended for the proposed Fiscal Year 2015-16 Budget:

- Disaster Recovery and Business Continuity Plan
- Emergency Operations Center Technology "Crash Cart"
- Helpdesk Tracking Software
- Comprehensive Network Security Assessment
- Performance Management Software

These projects reflect the highest priority items identified through the assessment process and constitute an attainable workload for upcoming fiscal year. For oversight of the project, an Information Technology Governance Committee is proposed and would be comprised of the Department Directors and General Manager. The Committee would regularly review progress on the projects and any changes to the schedule.

GOALS:

Ensure Effective Utilization of the Public's Assets and Money

Prepared By: Donald Patterson, Director of Finance and Administration

ATTACHMENTS:

[Information Technology Assessment](#)

[Information Systems Master Plan](#)



Las Virgenes Municipal Water District IT Assessment Report

Prepared by:



May 2015

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Document Control

This is a controlled document produced by NexLevel Information Technology, Inc. (NexLevel). The control and release of this document is the responsibility of the NexLevel document owner. This includes any amendment that may be required.

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Revision History			
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Draft 2	March 23 2015	Linda Lang / Pat Griffin	2 nd Draft After Internal Updates
Draft 3	April 14, 2015	Linda Lang / Pat Griffin	3 rd Draft Based on Client Input
Draft 4	April 21, 2015	Linda Lang / Pat Griffin	4 th Draft Final Adjustments
Draft 5	April 27, 2015	Linda Lang / Pat Griffin	Final Version
Final	May 26, 2015	Linda Lang / Pat Griffin	Updated Final Version

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Confidentiality Statement

The information contained herein is for the exclusive use of NexLevel and the Las Virgenes Municipal Water District (LVMWD). This information is not to be made available to any third party without the express written permission of NexLevel or the LVMWD and should be considered confidential.

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1 *Executive Summary*

Las Virgenes Municipal Water District (LVMWD) contracted with NexLevel Information Technology, Inc. (NexLevel) to complete an Information Systems Master Plan (ISMP) and Operational Review. An important step in the creation of the ISMP is an assessment that focuses on how effectively the delivery of technology supports the District's business and day-to-day operations. More specifically, the IT Assessment focuses on how the District is leveraging technology to attain its mission and vision.

Overall, the District has implemented core business technologies and provides support services that are similar to peer public agencies. In most cases, the technologies and associated services are supporting users and helping the District provide services to its customers and internal staff. However, based on our findings, the day-to-day operation and management of the technology infrastructure has service delivery resource challenges. Recent staffing level issues have significantly impacted the IS Division's ability to deliver consistent services to the District in a proactive manner. The limited staff has caused IS (Information Systems) to focus on the maintenance needs and service responses for the day to day technology operations. While in maintenance mode it is difficult to always be proactive in areas of service delivery.

A primary objective is to provide constructive advice and alternative methodologies based on NexLevel's experience. Technology best practices should be explored to create improved operations and a platform for implementation of future technology. NexLevel makes the following broad recommendations, which are further expanded upon throughout this report:

1 - The IS Division is not staffed nor organized to support full service delivery and value for the use of technology. This causes frustration with users and forces departments to become the default subject matter experts in order to support department technology needs. The District should consider adding one full time position to the IS Division to provide the resources necessary to support the complex technology systems currently in place and being implemented in the future. Subsequently, the IS Division should implement organizational modifications, reassign responsibilities; and address 24x7x365 support requirements to ensure that expected service levels for the Division are being met;

2 - The District should complete a comprehensive assessment of its core business applications to identify opportunities for enhancement, leverage, training needs and possible replacement;

3 – Many application systems are siloed and make District-wide integration of data difficult. Many components of the District’s IT environment were implemented over time without a well-articulated vision or strategic plan for how the District utilizes information technology to support its business and operational goals. Future consideration as to how those components align with the District’s long-term objectives and how they should work together to support the District’s needs for reporting and decision making should be reviewed;

4 - The IS Division should create a formal IT Document Catalog to guide District technology processes. The District IS Division lacks adequate documentation to effectively manage the deployment of technology, including a technical blueprint that documents the IT infrastructure, a fully documented Business Continuity and Disaster Recovery plan, and complete technology policies/procedures.

This report provides recommendations for service improvement through each assessment dimension. The findings and recommendations will provide suggestions to address areas of weakness and to help improve the overall level of technology services delivery for the District.

2 *Project Approach*

2.1 Purpose

The Information Systems Master Plan (ISMP) is intended to help guide the District in the effective planning, procurement, implementation, and management of technology. An important step in the creation of the Plan is an IT Assessment that includes a comprehensive assessment of existing technology and the associated IT support environment, whether that is at the IS Division level or within District departments.

The IT Assessment focuses on how effectively the District is leveraging technology to attain its stated mission and vision, and evaluates whether the District's technology infrastructure, business technology software applications, security, service delivery and support resources are prepared to support the District's current and future needs.

The IT Assessment provides information about how well the District's IS services comply with best practices, and will identify gaps between the level of service provided by the District's IT resources and user service level expectations.

The IT Assessment provides an objective review of the District's technology use, along with a set of recommendations pertinent to the District's existing technical environment (i.e. technology infrastructure, network, software applications, documentation, technical standards and policies, etc.) and department needs.

In those areas where the assessment indicates that action is needed, a finding and one or more recommended actions will be provided. The recommendations will provide direction for the IS Division to address these findings.

The recommendations included in the IT Assessment will result in initiatives driven at the executive and the department level to improve service delivery. In some cases, findings and the recommended actions are identified as "projects" and are thus included in the prioritized Projects List included in the ISMP.

2.2 Assessment Tasks

The completion of the IT Assessment followed a structured planning methodology focused on ensuring District staff involvement and input. More specifically, the IT Assessment included the following major tasks and activities:

- ◆ Face-to-face interviews with Executive management staff
- ◆ Interviews with the IS Manager and supporting staff
- ◆ In person interviews with approximately 30 District staff

- ◆ A web-based “Voice of the User” satisfaction survey
 - ✓ An 81% district staff participation response rate was achieved
- ◆ Tour of the IS office area and data center
- ◆ Review of District and IS Documentation (budget, policies, procedures, etc.)
- ◆ Research and analysis of findings

2.3 Assessment Framework

To complete the Information Technology Assessment, NexLevel reviewed the District’s use and management of technology based on a series of assessment dimensions. Assessment Dimensions are defined as best practice technology, service delivery and management roles and responsibilities for a public agency.

It is important that an assessment is inclusive of all technology operations, as a weakness in one dimension can adversely affect overall effectiveness. To achieve best practices for technology management, the District should perform well in all dimensions as identified in Figure 1 – Technology Assessment Framework.



Figure 1 – Technology Assessment Framework

The following provides a brief definition of each assessment dimension:

- ◆ Technology Governance – Practices related to the leadership and reporting structure of the IT organization, degree of management overview, and consistent tracking of technology service delivery that ensure end-user and customer business needs and requirements are met from an enterprise perspective.
- ◆ Service Delivery – This practice relates to day to day coordination of the processes involved in providing customer technology support including training, helpdesk, and service delivery management based on established service delivery standards and tracking the conformance.
- ◆ Business Technology Applications – Practices related to the business and operational technology software applications supporting the District and the support and management of the business technology applications.
- ◆ Security – Practices related to physical hardware security, network vulnerability, passwords management, data backup/recovery processes, and data security, integrity planning, PCs, network, firewall, incident response, patch management, anti-virus / spam protection and emergency operations. The effective application of policies and standards, user conduct, and audits to validate that the District's material and software resources are used only for their intended purposes.
- ◆ Infrastructure – The practices to acquire, utilize, and maintain the technology and equipment, operating systems, support software, and communications network systems used within the District to provide computer services to end users.
- ◆ Administration – The practices surrounding the management of District IT vendors and the technology in terms of budgets, maintenance agreements, and software licenses. Including the development and maintenance of accurate documentation on all technology activities, such that processes can be completed in the absence of any one individual while promoting cross training, enabling backup and recovery, and reducing the risk of change. Strong leadership and IT vision are necessary to maintain the technology objectives.

2.4 IT Assessment Dimension Rankings Summary

In order to evaluate each dimension, NexLevel used information gathered from the user satisfaction survey, on-site interviews with District executives and staff from all departments, IS Division staff interviews, a review of IT documentation provided, and completion of a data center site tour.

The assessment dimensions were calculated based on NexLevel's findings and are provided in Table 1 IT Assessment Dimension Findings below.

<u>Assessment Dimensions</u>	<u>Ranking</u>
Technology Governance	48%
Service Delivery	48%
Business Technology Applications	62%
Security	53%
Infrastructure	79%
Administration	62%

Table 1 – IT Assessment Dimension Findings

NexLevel has plotted these results for each of the assessment dimensions within the hexagon in Figure 2 – Assessment Dimension Ranking, providing an overview perspective of all dimensions. To assist in interpreting the graphic, the following information is provided:

- ◆ Each of the rings represents a level in the best practice conformance model, with the outer most (red) ring representing the Frontier level of an organizational maturity (the lowest level of conformity with best practices) and the inner (green) ring of the diagram representing the Service and Value levels (the highest degree of conformity with best practices).
- ◆ The diagram allows the reader to quickly identify areas requiring focus, as well as areas that are performing at or near best practice levels.
- ◆ The black points represent each of the Las Virgenes Municipal Water District’s six dimension rankings noted in Table 1.
- ◆ The blue dotted line represents Las Virgenes Municipal Water District’s overall best practices average of 55%.
- ◆ NexLevel has segmented the hexagon into two halves. The upper half of the hexagon is composed of the best practice dimensions that involve participants other than IS support groups, labeled Customers (External); while the lower half of the hexagon is composed of the best practice categories where the IS support groups are the principal parties involved in the delivery of the services and are categorized as Operations (Internal).

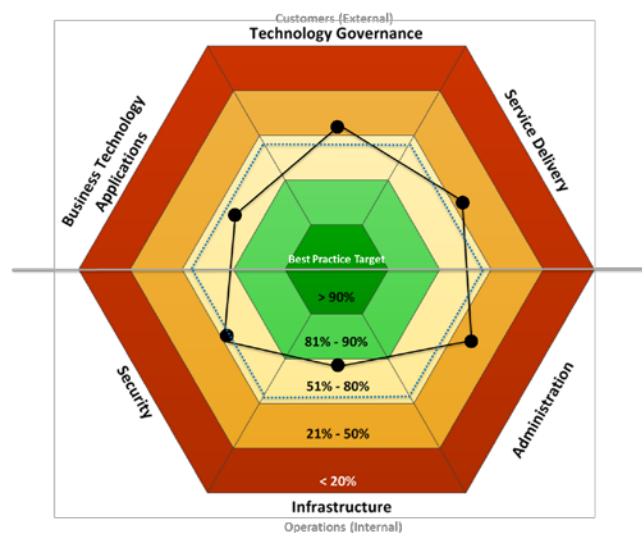


Figure 2 – Assessment Dimension Ranking

If the District is performing consistently within industry standards, we rate that performance at the green end of the scale. If, on the other hand, the District is performing at a level that may jeopardize security, risk of data loss, computer operations, or service delivery, we rate that performance at the red end of the scale. Any measurement between the solid green and red indicate that the District is not performing at an optimum level, and areas for improvement have been identified that keep it from performing at a higher level.

2.5 Current Maturity State

Based on the average dimension rankings NexLevel has found that the District IS Division falls just above the Reactive Level and is considered a minimally “Proactive” organization as noted in Figure 3 – Current State of Maturity. NexLevel recommends that IT organizations work to achieve at least 50% to 65% average compliance with best practices, with 65% being the desired target. The best practices are heavily weighted towards the development and use of formalized rather than ad-hoc procedures and supporting documentation since these provide the basis for sustaining and improving services and service levels.

	Maturity Level	% of Best Practice Compliance
LVMWD Current State 55% Average	Frontier	Less than 20% Compliance
	Reactive	21% to 50% Compliance
	Proactive	51% to 80% Compliance
	Services	81% to 90% Compliance
	Value	More than 91% Compliance

Figure 3 – Current State of Maturity

2.6 Best Practices Conformance and Maturity Level Model

NexLevel has found that Figure 4, Progressive Growth in the Maturity of Processes and in the Capabilities of IT Organizations, provides a useful graphic to depict the relative capabilities of IT service organizations. The model is based on five levels of maturity ranging from “Frontier” (where the IT organization is largely unstructured) to levels of progressively higher value. Each level of maturity is associated with a degree of compliance with best practices. Typically, IT organizations at the Frontier level find that fewer than 20% of their processes are in compliance with best practices, and the range of compliance gradually increases as the IT organization matures and adopts well-defined and repeatable processes. The highest level of performance (“Value”) is generally applicable only to private sector firms that use technology as a competitive differentiator or profit center, although public sector organizations find that some components of the Value level are useful.

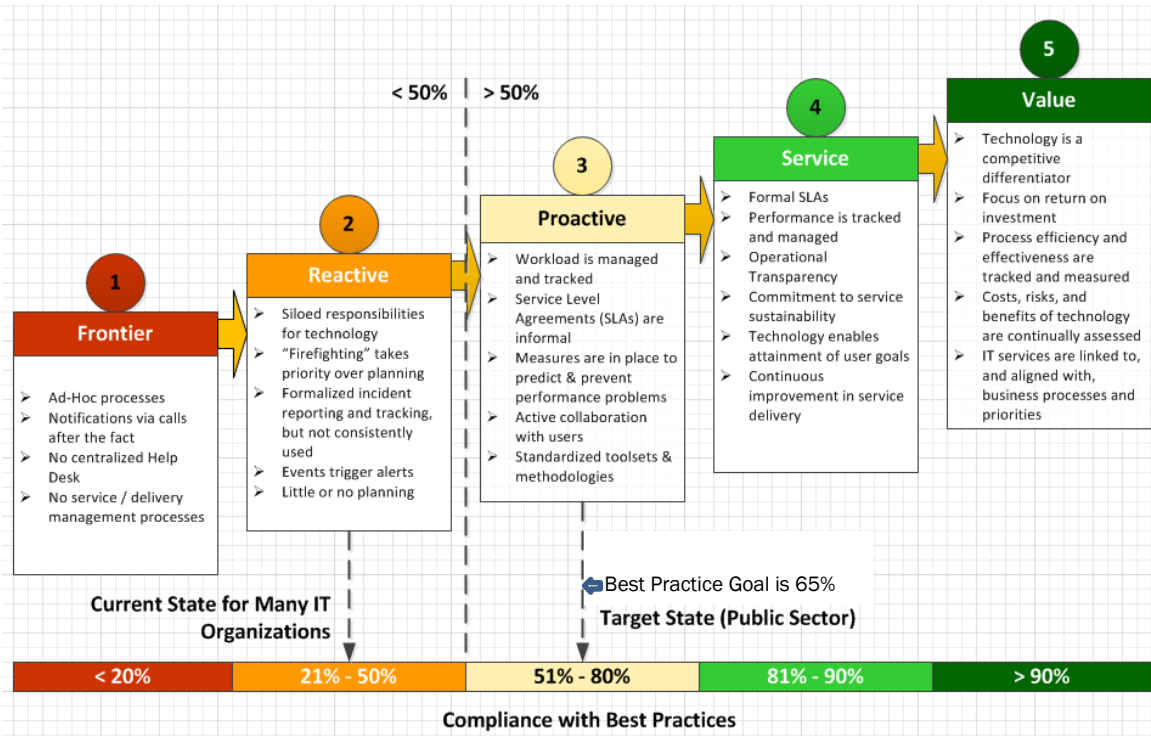


Figure 4 – Progressive Growth in the Maturity of Processes and in the Capability of IT Organizations

Many IT organizations, particularly those that have been under-funded, are struggling to adopt new technologies while supporting their existing base. Additionally, IT organizations that are in transition from decentralized service models to centralized or hybrid service models find themselves in a reactive state (less than 50% compliance with best practices). Organizations that have highly decentralized IT service models similarly find it difficult to achieve a consistent level of conformance with best practices. Consequently, the current state of best practice compliance for many IT organizations is around 35% (the middle of the reactive level). NexLevel recommends that IT organizations work to achieve at least 50% compliance with all best practices, with 65% being the desired target.

A word of caution about best practices is appropriate. An IT organization need not meet or exceed every best practice in order to provide excellent customer service; however, a higher degree of conformity with best practices generally enables an IT organization to sustain excellent service delivery levels over time and to successfully cope with external and internal factors that have the potential to disrupt its ability to deliver services. If we were to compare two comparable IT organizations, providing the same services and service levels, and with the same degree of user satisfaction, the organization that has more formalized processes and documentation will have a higher degree of compliance.

2.7 User Satisfaction Survey Results Summary

As part of the IT Assessment, 114 District staff received access to a web-based user satisfaction survey in order to gather their observations relative to IS service

management and delivery. Of the 114 staff, 92 responded (an 81% response rate) to the survey. The survey included specific questions that focused on the District's delivery and management of technology, and participants were instructed to respond to each question with a "rated" response (Very Satisfied, Satisfied, Dissatisfied, Very Dissatisfied, and Not Applicable).

Table 2 – User Satisfaction Survey Results identifies the percentage of the respondents that provided a rating of either Very Satisfied or Satisfied.

Survey Question	LVMWD Satisfied	Peer Average	Best Practice
Ability to solve problem on the first call	69.2%	81.5%	85%
Time to respond service request	69.2%	79.3%	85%
Arrives on time to appointment schedule	81.1%	83.9%	75%
Time to satisfy request for service	66.7%	76.8%	80%
Check back on service provided	68.1%	69.8%	75%
Communications network reliability	76.8%	73.7%	85%
Network responsiveness / speed	66.3%	69.7%	80%
Control of viruses and malware	92.6%	88.9%	90%
Control of spam	80.5%	88.8%	90%
Computer programs meet business needs	82.1%	46.1%	75%
Version of the computer programs used	80.0%	68.8%	75%
Equipment used (computer, printer)	82.3%	67.4%	75%
Communication of updates, status, outages	77.8%	76.9%	80%
GIS solutions provided	86.7%	74.6%	80%
Technical knowledge of the IS Division staff	81.5%	85.4%	85%
Amount of training received	76.9%	58.0%	70%
Technology leadership and planning	54.0%	64.0%	80%
Management of technology projects	57.4%	67.7%	75%
Understand department's business needs	73.2%	71.0%	75%
Understand the District's business objectives	85.9%	76.3%	75%
Overall service	69.9%	80.1%	85%

Table 2 – User Satisfaction Survey Summary Results

Of note when interpreting the information contained in Table 2:

- ◆ “LVMWD Satisfied” is the combination of Very Satisfied and Satisfied survey responses.
- ◆ “Public Agency Peer Average” is the average score for all surveys conducted by NexLevel within other similar public sector entities. This percentage represents the average score NexLevel has recorded for the stated question.
- ◆ “Best Practice Goal” is based on the NexLevel team’s collective experience with public sector entities.

The District’s survey results are consistent with the feedback and findings obtained during the department interviews. The user survey indicates that the District staff in general are satisfied with IS Division support, and that IS Division staff are able to meet the user’s general day to day requests. A User Survey Results Report has been delivered to the District and contains additional detailed data for all survey questions.

The User Satisfaction Survey provided the ability for written comments, and some of these included specific concerns regarding the level of support, in depth knowledge, and resource availability of IS Division staff, specifically as it relates to certain core applications (SCADA, AMMS, CIS), These concerns are addressed in Section 3.1 - IS Organizational Structure and Scope of Services, where NexLevel provides recommendations regarding augmenting the District’s current IS Division staffing.

Tables 3 and 4 below provide the responses to the frequency IS support service is requested and the areas of technology requiring assistance from the IS Division.

How often do you contact the IS Division for assistance each month?	
Never = 15	17.9%
1 - 2 times = 58	69.0 %
3 - 4 times = 10	11.9%
More than 5 times = 1	1.2%

Table 3 – Frequency for Requesting Assistance

Reason for Call	Number of Responses	Percent of Total Responses
Printer	42	55.2%
PC	23	29.1%
Laptop	22	27.8%
SCADA	21	26.6%
Kronos	19	24.1%
Internet	17	21.5%
Email	15	19.0%
Password Assistance	15	19.0%
JD Edwards	15	19.0%

GIS	14	17.7%
Microsoft Office	13	16.5%
Phones / Voice Mail	12	15.2%
Other	11	13.9%
CIS	8	10.1%
Adobe	8	10.1%
AMMS	7	8.9%
Equipment Relocation	6	7.6%
Cetova	3	3.8%
PDA	3	3.8%
Camera / Video	0	0%

Table 4 – Technology Requiring Assistance

2.8 Consolidated Recommendations

The District performs effectively in many of the assessment dimensions. However, there are still opportunities for improvement and because of the changing technology and user needs, the District must continue to evolve technology management, services, and support activities to ensure a secure, reliable, and robust technology environment.

Dimension	Recommendations
Technology Governance	<ul style="list-style-type: none"> ◆ Establish an Information Technology Advisory Committee (ITAC) that would meet quarterly and provide a forum for formal communications on IT endeavors and have a voice to oversee the District’s technology strategic direction. ◆ Restructure the IS Division by adding one full time position to the Division, reclassifying several current positions, and distributing responsibilities to more effectively deliver the expected services (as further detailed beginning on Page 23). ◆ Invest in formal on-going training for the IS Division staff. IS resources should specifically focus their education to meet the needs of the District. Learning on-the-job will continue, but will be more effective with technology training. ◆ Meet with departmental SME’s and discuss departmental succession plans and coordinate on-going training from the application vendors as needed. ◆ Develop a service level agreement (SLA) to identify the responsibilities of the IS Division and the departmental supported applications. The SLA’s should define the responsibility for application management and support, technical systems

Dimension	Recommendations
Technology Governance	<p>administration and hardware support.</p> <ul style="list-style-type: none"> ◆ Consider the potential for outsourcing specific tasks that are currently completed by District IS staff (for example, deployment of desktop computer refreshment). ◆ Implement basic project management principles and follow when involved in technology projects. ◆ IT Staff should keep the ITAC informed of IS involved technology projects.
Service Delivery	<ul style="list-style-type: none"> ◆ Continue to communicate the opportunities for self-guided training offered and encourage usage by conducting department challenges to participate. ◆ Regularly review the contacts made to District IS staff to identify the primary reasons for the calls and determine if additional training can reduce the call volume. (This is a manual process till an automated Help Desk system is implemented.) ◆ Annually reach out and survey the District user community to solicit training suggestions. ◆ Communicate known changes due to version upgrades and provide enhancement vendor training as needed. ◆ Develop a formal cross training plan that addresses the single points of technology support at the District. (SCADA, AMMS, CIS, JD Edwards, etc.) ◆ Work with department SME's on core application training needs so that IT can adequately support when need arises. ◆ Maintain an annual training budget for each IS Division staff member and identify specific training goals relative to job duties as part of staff performance goals. Suggested areas: <ul style="list-style-type: none"> ○ Virtualization Practices and Management ○ SCADA Operation Support / Administration Back-up ○ JD Edwards Support / Administration Back-up ○ AMMS Support / Administration Back-up ○ CIS Support / Administration Back-up ○ Microsoft Exchange Administration ◆ Proactively research District business technology provider webinars, local user groups and annual conferences and participate to stay current on supported technologies and available enhancements.

Dimension	Recommendations
<p style="text-align: center;">Service Delivery</p>	<ul style="list-style-type: none"> ◆ Implement a more formal method to manage the IS Divisions support requests and reporting of activities provided. <p>Leverage the current Solarwinds investment to additionally manage help desk requests.</p> <p>Follow best practices to follow-up with users to insure their satisfaction with the resolution of issues.</p> <ul style="list-style-type: none"> ◆ Provide monthly activity reports of call tickets opened and closed for the month. ◆ Develop a service level policy to identify the District mission-critical technology that must be available 24/7/365 and may require IS support. The policy should define time commitments and escalation procedures. ◆ Work with the District Human Resources division to address after-hours employee requirements ◆ Define the procedure for requesting after-hours support and identify the IS Division staff member(s) responsible for providing support. ◆ Publish and distribute to departments a monthly, after-hours schedule of IS Division support staff, and their contact information. ◆ Create an IS Division policy and service catalog with published service levels that can be used to manage user expectations. The service catalog should describe what the Help Desk supports and what the user can expect for the response. This would include describing the service levels in the maintenance agreements the District has with outside vendors and service providers. ◆ Obtain additional network management tools to assist with troubleshooting and data storage capacity management and error tracking, etc. ◆ The IS Division should establish baseline metrics for servers including CPU utilization, memory and storage. Once established, the IS Division should evaluate the current environment against the baseline on a regular basis to identify issues or trends. ◆ Schedule remote site standing IS Service visits to proactively reach out to district staff. ◆ The IS Division should continue to use basic change management processes that ensure timely communication with users, effective planning and management of risks associated with changes being introduced, The processes should ensure changes are well planned and fully documented to include change management logs that

Dimension	Recommendations
	record who, what, where, and when, for changes made.
Business Technology Applications	<ul style="list-style-type: none"> ◆ Complete Core Business Application Assessments for JD Edwards, AMMS and the SCADA systems. ◆ Identify and implement a District Asset Management System. ◆ Focus on data consolidation and eliminate redundant capture of the same data multiple places and further leverage current technology investments through interfaces. ◆ Identify and implement internal and external collaboration tools for large size, multi-participant projects. ◆ Procure and implement a formal Electronic Document Management System. ◆ Continue with plans to replace the current Performance Evaluation system. ◆ Continue with the Kronos upgrade to address the java conflict issues and the additional needs identified by the District. ◆ Reevaluate the Agenda Management System (Novus) and replace if District needs are not able to be met with further configuration to the process and workflow.
Infrastructure	<ul style="list-style-type: none"> ◆ Complete the SCADA Communications Network Project ◆ Expand the wide area network to include all District facilities ◆ Expand accessible Wi-Fi / Wireless to support future mobility needs and remote locations ◆ Complete Building 7 & 8 network projects ◆ Proactively monitoring Internet capacity in order to effectively plan for increased bandwidth when needed is recommended. ◆ Engage the ITAC to review the current Communications and Usage policy for acceptable internet use language. ◆ Continue to support the Public Affairs department in maintaining the District Intranet. ◆ Continue to use the Virtual Private Network Acceptable Use Policy for granting remote network access through a properly enforced secure VPN ◆ Requests for remote network access should be directed to IS Division. When approved, the ITAC will be notified that remote access has been granted. ◆ Routinely review the list of granted VPN access and validate if VPN

Dimension	Recommendations
Infrastructure	<p>account still being used or in-activate / remove account until confirmed.</p> <ul style="list-style-type: none"> ◆ Review current VPN RAS Server and client software to validate it meets security and remote access controls needed. ◆ Implement server virtualization technology when physical servers are due for replacement. ◆ Schedule virtualization software training for IS staff and possibly contract services to support IS Division staff with the initial deployment. ◆ Continue with planned SAN and server updates to replace old equipment and outdated server software on regular schedule. ◆ Schedule routine administration for all District servers (IS and Non-IS supported) maintenance tasks. ◆ Continue with the current technology hardware refreshment standard practices. ◆ Contact users prior to completing refreshment of older equipment to validate their future requirement needs ◆ Consider adding temporary labor to install new refreshment PC's as a project in order to complete the installations in a timely manner. ◆ Maintain current OS systems and MS Office versions. ◆ Monitor the evolution of mobile computing devices (i.e. smartphones, tablets, etc.) and implement standards, training, and support as necessary to allow staff to leverage mobile technologies to improve day to day operations. ◆ Establish a BYOD policy for mobile devices. Legal council should be sought in this process and include approval by the Information Technology Advisory Committee. ◆ Evaluate the potential future mobile capabilities of the District's core business applications before launching mobile access projects. Most application developers are releasing software that supports mobile computing, but older application versions may not be compatible. ◆ Assess the mobile computing needs mentioned during interviews for the following core businesses: AMMS (work orders), JD Edwards (approval processing), CIS (remote service completion such as disconnects), and GIS (as-builts, valve locations, etc.) ◆ Encrypt laptop / mobile computers to prevent unauthorized access in the event the computer is stolen and further consider wipe technology.

Dimension	Recommendations
Infrastructure	<ul style="list-style-type: none"> ◆ Complete the data rack and cabling project upgrades as planned for in the next fiscal year annual budget. ◆ Evaluate and address the data center A/C issue to adequately prevent servers and other equipment from extreme heat vulnerabilities. ◆ Address the data center overhead fire sprinklers to prevent potentially unrecoverable major problems from water damage if activated.
Security	<ul style="list-style-type: none"> ◆ Conduct third party network penetration tests and address items that are identified to have a potential impact to the District. ◆ Verify procedures are in place to immediately notify the IS Division of employee separations in order that access to District network and telephone systems can be terminated. Also, verify the IS Division receives appropriate authorization to add new users to the network. ◆ Update the data center entrance access from key entry to a card / badge reader. Or at a minimum in the interim, require those entering the data center to update an entry log with relevant information as to reason for entrance. ◆ Review and strengthen the process of distributing gate codes and look at ways to automate gate activity via a mobility app or cell phone. ◆ Implement data encryption on District hardware vulnerable to being lost or stolen, including laptop computers and other mobile devices, in order to protect District information from being accessed by unauthorized individuals. ◆ Conduct periodic data recovery testing for core business applications managed internally and with third party recovery sites the District uses for back-up and redundancy. ◆ Regularly review who has local desktop administrative rights and enforce rules to limit local admin rights. ◆ Continue to enforce a formal Passwords Policy designed to protect the organizational resources on the network by requiring strong passwords along with protection of these passwords, and establishing a minimum time between changes to passwords. ◆ Routinely test the ability to recover from all its backup devices and third party disaster recovery vendors. ◆ Adopt a back-up / recovery policy to support the Business Continuity recommendations.

Dimension	Recommendations
Security	<ul style="list-style-type: none"> ◆ Develop a Business Continuity Plan (BCP) to ensure adequate processes, procedures, and resources are available to support an orderly recovery of the District's technology and applications within a defined timeframe and in priority order necessary for restoring technology business applications, as deemed by the departments. ◆ Expand the current Disaster Recovery Plan (DRP) and schedule tests to ensure ability to support DRP of all District servers and BCP. ◆ Assure that the DRP and BCP additional will support the EOC needs. ◆ Designate permanent equipment to the EOC. At minimum an EOC crash cart should be established. (Laptop, printer, communication radio, charged cell phone, land line phone, etc.) The periodic installation of patches on the laptop should be an assigned duty to insure available for use in the event of the EOC is activated. Designate the responsible party. ◆ Include GIS in the EOC to bolster the preparedness in case of emergency. ◆ Update the EOC Manual to reflect the Business Continuity requirements related to technology. ◆ Establish a policy for non-IS servers to complete mandatory updates and enforce with the responsible department to complete the necessary virus protection updates on department managed equipment. ◆ The District is following best practices for Virus and SPAM control and should continue by staying current on version releases. ◆ Investigate the implementation of a fully automated patch management system for deploying relevant patches, hotfixes, and security updates. ◆ Complete regularly scheduled server updates and patches. Follow best practice to apply and test in the test environments prior to applying to production servers. ◆ Routinely monitor the non-IS / department managed servers for current updates. ◆ Centralize log files to prevent overwriting.
	<ul style="list-style-type: none"> ◆ Migrate administrative duties when possible to support personnel to reduce the amount of time IS Division Manager spends on routine, nontechnical functions. ◆ Continue the Districts current refreshment (Desktop and Servers)

Dimension	Recommendations
Administration	<p>practice and stay on schedule to replace old hardware.</p> <ul style="list-style-type: none"> ◆ Centralize all technology expenditures to the IS Division. This will provide visibility of the District's total cost of technology. Opportunities may exist for reducing expenses through consolidation or discounts. ◆ As new IT projects are implemented, the necessary resources to support them internally or through 3rd party consultants should be identified and be included in the total cost for implementation budgets and future support costs. ◆ Approval for projects identified in the Information Services Master Plan will require funding, and should be included in the IS Division budget. ◆ Continue to require all IT related purchases be made by the IS Division. ◆ Major technology procurements should be submitted to the IS Division Manager and then presented to the ITAC. This will ensure that standards and policies are met, and provide an avenue for communication on major IT projects. ◆ Review all maintenance agreements annually to confirm the agreements provide the appropriate level of service. ◆ Continue to maintain a centralized repository for all maintenance contracts within the IS Division. This method allows for the consolidation of like vendors, acquisition of volume discounts, and having a single point of contact for all technology agreements within the District. This methodology also provides increased control over the total technology expenditure within the District. ◆ Generate a complete vendor contact list (inclusive of vendor summary information, vendor contacts, support numbers, department contacts, etc.) as part of the IS Division's IT documentation catalog. ◆ Review all maintenance and renewal costs and budget through IS for a true cost of District IT ownership. ◆ Maintain a complete inventory of all IT assets (software, hardware, infrastructure equipment, etc.) and manage the refreshment cycle. ◆ Leverage current technology investment in Solarwinds by looking into its asset management module to automate the process of IT asset discovery, tracking, and reporting. If Solarwinds is not able to meet the Division IT asset inventory needs, other automated tools should be evaluated. ◆ Validate the current IS Division documentation list and identify

Dimension	Recommendations
Administration	<p>what is missing to assure Division continuity of processes and procedures in the absence of key resources.</p> <ul style="list-style-type: none"> ◆ Complete the creation of the documents identified as missing and establish and complete the content of the Division IT Documentation Catalog. ◆ Centralize the IT Documentation Catalog and all technical documentation for all aspects of the IS Division's day-to-day operation as identified above. Personal folders, notes and instructions should be written in a consistent format and moved to a central repository. ◆ Assign on-going processes and procedures maintenance of the IT Documentation Catalog content to each IS Division staff member's job description and use as a measureable objective in the employee's annual performance review. ◆ Review the current documents and update: <ul style="list-style-type: none"> ○ SCADA Security (AP-6) or IT Security (AP-7) last revised June 29, 2004 ○ WTS – Disaster Recovery Subscribers Guide last revised 2010 ◆ Engage the Information Technology Advisory Committee in the review of all existing IT Policies to obtain input on potential gaps or shortcomings and identify what policies need to be added. ◆ Complete a joint review of current policies content and update. ◆ Complete the creation of newly identified policies. ◆ Distribute policies to District staff and consider requiring signatures to indicate that the policies have been reviewed and accepted during annual performance reviews. ◆ Set policy to complete post implementation evaluation reviews (PIER) three to six months after go-live of any technology related project. The review may identify needs for additional training, or support services to increase the value of the system and leverage the District's investment.

The remainder of this report provides detailed discussions for each assessment dimension. The evaluation and subsequent recommendations will improve the District's technology management, reduce risk if change is introduced, improve customer IS service, improve communication with users relative to technology, and better prepare the District to meet future challenges and complete projects identified in the resulting Information Systems Master Plan.

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3 *Technology Governance*

Technology Governance is generally defined as the leadership, communication structure and processes that ensure the organization's information technology sustains and extends the District's strategies and objectives. More specifically, Technology Governance helps ensure that:

- ◆ Technology is aligned with the District's business goals
 - Strategic alignment
- ◆ Technology is a business enabler and maximizes benefits
 - Performance measurement
- ◆ Technology resources are used responsibly
 - Resource management
- ◆ Technology risks are managed appropriately
 - Risk management
- ◆ Technology delivers value to the organization
 - Value delivery

In today's environment, industry studies completed by respected research firms have suggested that as high as 20% of all technology investment is wasted each year. After factoring in the potential wasted investment, along with the annual expenditure of an entity on technology, the importance of technology governance in managing and ensuring an adequate return on investment is significant.

The overall success of a technology organization is generally measured by their ability to help the organization achieve their business goals. In addition, as an organization's dependency on technology to support day-to-day business goals increases, the importance of a strong technology governance structure becomes more critical.

This dimension of the IT Assessment evaluates the organizational foundation of technology service delivery within the District. A strong delivery structure, management overview and consistent tracking of technology services will help ensure end-user business needs and requirements are met.

3.1 Technology Oversight

Currently, technology related decisions are made by the Division's department management with limited input from end users or other management in the organization. Technology is informally discussed during executive meetings or when a Project Committee is formed when new District technology projects are initiated.

The executive meetings are used for communicating information between the IS Division and the department executives, and the Project Committee's function as more of a user group than a formal advisory committee with consistent practices.

The IS Division reports to the Director of Finance and Administration. This organization is appropriate. In an effort to focus on important Districtwide technology projects, IS Division staff participates in technology projects, but are not necessarily involved beyond the initiation and procurement requirements. In some cases, IS has been included only after purchase has been made at a departmental level; thus the overall impact of a purchase was not vetted through IS.

Without input and direction from the District's executive management team, clear priorities are not always established, or conflicting priorities are not resolved, which can lead to IS Division and department staff frustration. A form of formal governance would assist to prioritize projects, establish policies and give direction to resolve issues.

The District lacks a formal technology governance structure that includes well-defined processes, policies, and procedures for providing oversight and input on the District's technology service delivery and management from an enterprise perspective. To address the concerns outlined above, NexLevel recommends that an Information Technology Advisory Committee (ITAC) be formed, consisting of the General Manager and Department Directors. The proposed ITAC would be chartered with providing direction to jointly discuss technology endeavors, assisting in establishment of technology priorities for the District, and reviewing and providing input on policies presented by the IS Division.

The ITAC will also provide a conduit for enhanced communication of IS Division activities, and as a forum for all District departments to channel requests or concerns relating to technology.

As new technology endeavors are considered, the ITAC should review the current IS Division staffing levels to ensure adequate support for the increased reliance on technology. In addition, the ITAC should provide a focus to succession planning for the IS Division staff and departmental subject matter experts (SME).

Recommendations

- ◆ Establish an Information Technology Advisory Committee (ITAC) that would meet quarterly and provide a forum for formal communications on IT endeavors and provide input toward the District's technology strategic direction.

3.2 IS Organizational Structure/Scope of Services

The IS Division reports to the Director of Finance and Administration and has six approved full time positions. This reporting organization is effective and there is no compelling reason to change the existing reporting structure.

Figure 5 – Current IS Organization Chart illustrates the current approved staffing level of the IS Division.

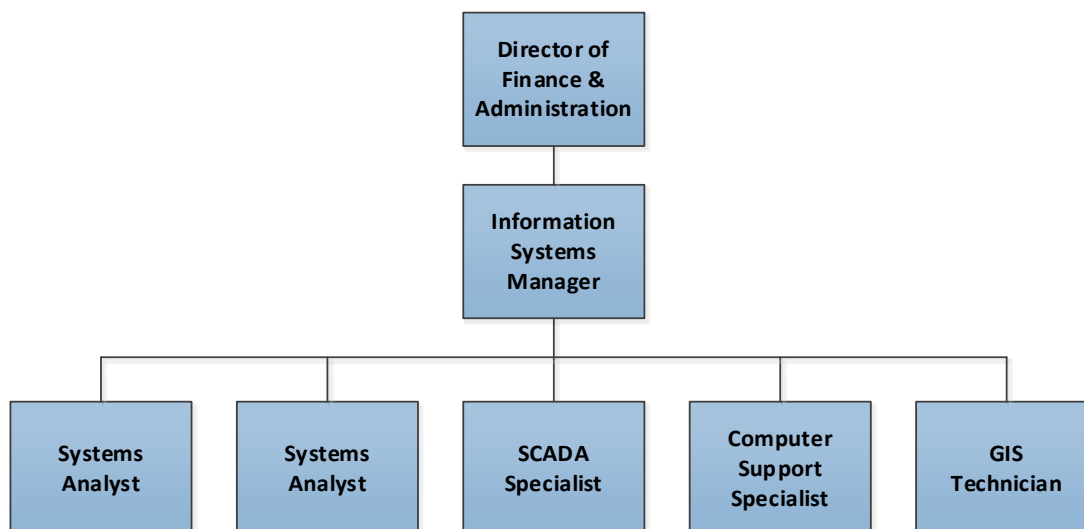


Figure 5 – Current IS Organization

The IT Assessment examined the current organizational structure and the technology supported. The scope of high-level services provided by the IS Division includes:

- ◆ Technology hardware procurement, deployment and support (desktops, laptops, printers, servers, VM's, SAN, and backups, etc.)
- ◆ Infrastructure (wide area network, wireless access, internet access, network security, capacity management, administration, virus and spam etc.)
- ◆ Help Desk services (user day to day desktop support, printers, peripherals, etc.)
- ◆ Technical and administrative support of core applications in support of departmental SME's
- ◆ Communications technology (voice and voice mail, email exchange, mobile, etc.)
- ◆ Budgeting of annual hardware refreshment and deployment
- ◆ Maintenance of IT vendor contracts, applications portfolio, and IT inventories
- ◆ Technical lead and primary support for the District SCADA system and communications network
- ◆ Technical lead and primary support for the District GIS system
- ◆ Creation and maintenance of IT Document Catalog and Content (Policies, Procedures, Technical documents, Diagrams, etc.)
- ◆ Project management for IT related projects as required

The District's IS Division is faced with a variety of challenges in their efforts to meet the needs and expectations of their District clients. These challenges include:

- ◆ The IS Division has not been fully staffed for some period of time.

- ◆ The IS Division is required to support systems that must be operational and accessible 24x7x365 and has historically provided after hours support, with no formal policy to address this need.
- ◆ The SCADA Support Specialist is the single point of knowledge in support of the SCADA system and the SCADA communications network. The SCADA system requires 24x7x365 support availability and the IS Division does not have additional resources to consistently meet the needs of after-hours support. In addition, this position is responsible for the WAN network, the District voice and voicemail system, and other duties as assigned.
- ◆ GIS is supported within the IS Division with a single GIS Technician. There is a high level of satisfaction from user departments in this area. Future integrations and further adoption of AMI may negatively impact GIS support, and the District may wish to consider interim consultant services when needed for special projects. Historically this had been a two person supported application.
- ◆ Historically, the IS Division maintained two Systems Analyst positions to support core business applications; however, over the last two years both positions either retired or were on extended leave. The ultimate loss of these two key persons had a significant impact on the IS Division and its ability to support JD Edwards, Cetova Reports, CIS and other District systems. While user department staff play a lead role in user support of these applications, they rely strongly on IS for system administration, infrastructure, network, etc. IS recently filled one of the two Systems Analyst positions.
- ◆ JD Edwards is a highly functioning application with capabilities and reporting needs that are typically beyond the ability of department users to support. The IS Division participates in core software installations, custom reporting, system configuration, upgrades, and server oversight, but have a limited role for day to day user support of departmental applications.
- ◆ The CIS - Advanced Utilities System and AMMS systems are largely supported by the department SME's for day to day user operations. The IS Division staff assist in coordinating software version upgrades with department SME's and vendors. All infrastructure and behind the application server support is provided by the IS Division.
- ◆ The current Computer Support Specialist position is the primary contact for District technology general support services, supporting desktops and printers and local applications for the District staff. The annual refreshment of 20% of District hardware is completed by this position as well. Additional responsibilities include oversight of key network management servers, network security, active directory, virus and spam server management, firewall support, Microsoft updates and pushes, and SAN and local servers. This position is also the lead on transitioning to server virtualization and data backups.

- ◆ The IS Manager plans, organizes, and coordinates information system technology to meet the District departmental needs. The position provides leadership and direction for LAN/WAN infrastructure, security requirements, and develops policies and procedures related to the use of district systems. Additionally, the IS Manager is responsible for oversight of, and provides direction to, the IS Division staff, and has an active role in providing backup support to IS staff. The IS Manager is also responsible for oversight of technology vendor contract and license management, the IS Division budget, and other administrative duties.

Numerous technology applications are in use within the District departments that support core business activities. The IS Division must be able to support all technology in use, including application end users and system administration, and this is not a realistic expectation with the current level of resources allocated to the IS Division. While the IS Division personnel have an overall disposition to provide a high level of service to the District staff they support, limited resources present challenges in meeting all the demands. The current Division staffing provides primarily reactive service delivery to District customers, providing little or no capacity for technology planning, documentation, future visioning, or active collaboration with District executives and users in advance of technology needs. In order to address these concerns, NexLevel makes the following recommendations:

Recommendations

- ◆ Restructure the IS Division staffing as follows:
 - A.) Create a new IS Technician position to provide the necessary additional support within the IS Division. This position would assist the Division in providing the proactive support and service delivery to its internal customers. The suggested responsibilities include:
 - ✓ Providing a working knowledge and support of the District's application portfolio;
 - ✓ Providing support for the Systems Analyst and SCADA Analyst;
 - ✓ Providing management of IT inventory;
 - ✓ Generating monthly IS service metrics reports and analysis;
 - ✓ Providing administrative support to assist in the management of the IS Division IT Document Catalog (Policies, Procedures, Knowledgebase, etc.);
 - ✓ Supporting future mobility needs at the District and providing the necessary resources to enhance the level of services provided as new projects are identified that require technical support.
 - B.) Reclassify several current positions and reorganize responsibilities to more effectively deliver the expected services. The proposed restructuring includes the following recommendations:

- ✓ Upgrade the GIS position from Technician to Coordinator;
- ✓ Reclassify a Systems Analyst position to Network / Security Coordinator, and update position responsibilities accordingly;
- ✓ Upgrade the SCADA Specialist to SCADA Analyst to align the position with the level of support required by the District. The SCADA Analyst will work collaboratively with a staff recommended SCADA Technician position that will be assigned directly to the Facilities and Operations Department. The SCADA Technician position will be field centric and involved in day to day support, while the SCADA Analyst will be responsible for overall SCADA security and operations. The two positions will help ensure uninterrupted SCADA support and security on a 24 X 7 basis;
- ✓ Move non-SCADA related assignments from the current SCADA Specialist position to the Network / Security Coordinator and IS Technician positions;
- ✓ Utilize the current Computer Support Specialist position to establish and implement a primary “Help Desk” system for day to day IT support requests to conform to best practices. As the initial point of contact, this position would help determine and resolve problems through the initial contact.

The proposed IS organization chart, incorporating these recommended modifications, is shown in Figure 6 below.

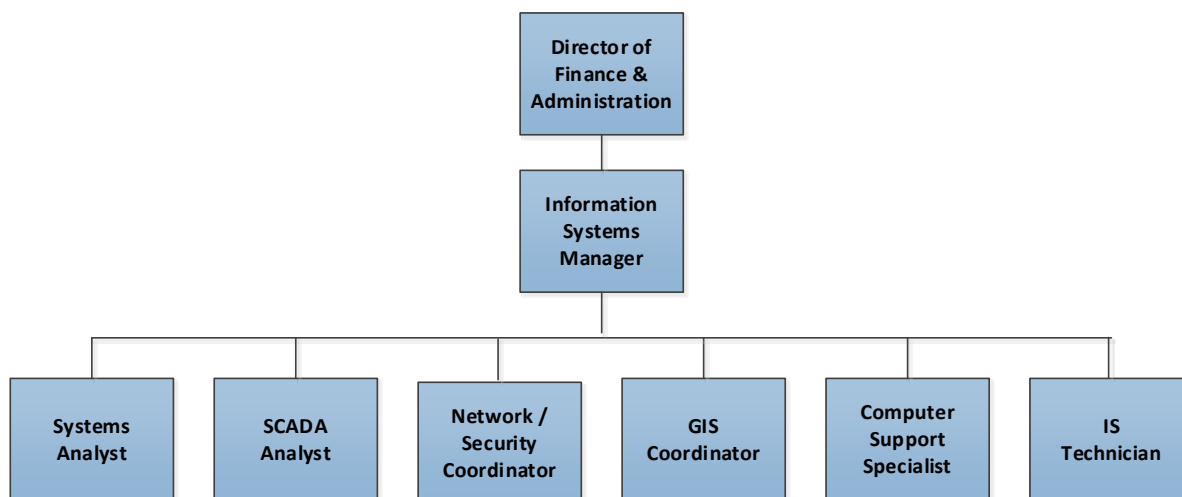


Figure 6 – Proposed IS Organization

- ◆ Invest in formal on-going training for the IS Division staff. IS resources should specifically focus their education to meet the needs of the District. Learning on-the-job will continue, but will be more effective with technology training.

- ◆ Meet with departmental SME's and discuss departmental succession plans and coordinate on-going training from the application vendors as needed.
- ◆ Develop a service level agreement (SLA) to identify the responsibilities of the IS Division and the departmental supported applications. The SLA's should define the responsibility for application management and support, technical systems administration and hardware support.
- ◆ Consider the potential for outsourcing specific tasks that are currently completed by District IS staff (for example, deployment of desktop computer refreshment).

3.3 Project Management

Project Management is the discipline of planning, organizing, securing and managing resources to achieve specific goals. Ineffective project management can result in extended timelines, budget overrun, and project failure. The District department for whom new technology is acquired typically performs project management duties. IS Division staff members attend the initial project / committee meetings when invited and provide coordination as needed for procurement of and installation of necessary software and hardware as part of their services.

The District in general does not have a formal project management methodology in place that is consistently followed. Committees are typically formed for major projects, but no formal technology project initiation process is followed. The user satisfaction survey results indicate a 57% satisfaction with IS projects, and establishing IS project management standards will help in improving the overall satisfaction and clarity of responsibilities for IS involvement in these future projects.

While department personnel should serve as subject matter experts (SMEs), assigning project management to staff inexperienced with the implementation of technology is problematic. Projects should be executed following basic standard project management practices and templates that include a project charter, project plan, estimated schedule, budget, status reporting and a communication plan. The use of a standardized project management framework will help ensure a comprehensive understanding of projects among stakeholders and impacted staff, and reduce project risks.

A project manager needs the skill set, time and authority to effectively perform the required project duties. The project manager should be accountable to the project owner, as well as the Information Technology Advisory Committee to provide project updates.

Project management services could be procured from a consultant as needed to support active projects. Other alternatives are to provide project management training to designated staff, or to create a project manager position in the District.

Prior to initiating a project involving technical support, a formal project charter should be completed to help ensure that the project is well defined. A project charter authorizes a project and ensures that necessary resources are provided to be successful. It is a document that provides an understanding of the roles and responsibilities of all affected

District staff before the project starts. It provides a common understanding of what the project is about, why it is being done, who is involved, roles and responsibilities, schedule and delivery approach.

Once a project is initiated, the District should have standardized templates for the project manager to track and report on project progress. At a minimum, the project manager should complete the following templates throughout the project:

- Project Plan
- Issue Tracking and Management
- Risk Management
- Project Schedule and Resource Tracking
- Budget Tracking
- Project Communication / Status Reports

Recommendations

- ◆ Implement basic project management principles and follow when involved in technology projects.
- ◆ IT Staff should keep the ITAC informed of IS technology projects.

4 *Service Delivery*

This dimension identifies core competencies that are the foundation of all technology organizations. To be successful, the technology organization must be capable of addressing these areas, effectively balance among them, and plan resources to ensure coverage in all capacities. NexLevel evaluates the daily operation of the IS Division service delivery environment including training, help desk, and service delivery management.

4.1 User Training

User training is important because it supports District staff productivity and lessens the possibility of unintentional errors. Training is a challenge for all organizations, as it typically requires staff to be away from their day-to-day operational duties, requires a training budget, and if an onsite training room is not available, requires travel to an off-site location.

The District recognizes the importance of on-going staff training and launched an on-line Microsoft training solution (CustomGuide.com) offering self-guided web-based training. This allows staff to use the solution at their convenience. A review of recent activity shows District staff is not actively taking advantage of this tool.

Periodic emails are sent from the IS Division to educate staff on current topics that may impact end users. Recently an email was sent to all District staff relative to security threats / scams and how to avoid them. The IS staff recently tested the helpfulness of this type of email by conducting an internal phishing test.

During face-to-face department interviews, staff expressed a desire to receive training specific to their needs, such as refresher training on core applications and new features relative to upgrades, patches, etc. Additionally, staff is interested in classroom type training for opportunities to learn new technology.

Recommendations

- ◆ Continue to communicate the opportunities for self-guided training offered and encourage usage by conducting department challenges to participate.
- ◆ Regularly review the contacts made to District IS staff to identify the primary reasons for the calls and determine if additional training can reduce the call volume.
- ◆ Annually survey the District user community to solicit training suggestions.
- ◆ Communicate known changes due to version upgrades and provide enhancement vendor training as needed.

4.2 IS Division Staff Training

Technical training for IS Division staff supports the ability to remain up to date on the current and future technology needs of the District. This is necessary in order to increase competency and to provide optimum support to meet the District's business needs. Training increases the effectiveness of staff and can result in fewer support issues. Without formal training, IS staff learns on the job, which can be time consuming and lead to learning by trial and error.

With the recent loss of key IS subject matter experts (two Systems Analysts) that supported JD Edwards and CIS, the IS Division was not able to provide the same level of proactive support it had historically for these core applications. The IS Division recently filled one of the Systems Analyst positions, and arrangements have been made for training (twice a week) with the previous person that supported JD Edwards. The training is focusing on key functional responsibilities and areas of support for annual processes. SME's within the departments are able to meet the day to day user needs for both applications, but IT staff assigned to core applications require additional training to support the technical and administrative requirements of the JD Edwards and other core District applications.

The SCADA system is an area of concern for the Operations group and additional support resources should be considered for this area.

Recommendations

- ◆ Develop a formal cross training plan that addresses the single points of technology support at the District (SCADA, AMMS, CIS, JD Edwards, etc.).
- ◆ Work with department SME's on core application training needs so that the IS Division can adequately support users when the need arises.
- ◆ Maintain an annual training budget for IS Division staff and identify specific training goals relative to job duties as part of staff performance goals. Suggested areas for training opportunities:
 - Virtualization Practices and Management
 - SCADA Operation Support / Administration Back-up
 - JD Edwards Support / Administration Back-up
 - AMMS Support / Administration Back-up
 - CIS Support / Administration Back-up
 - Microsoft Exchange Administration
- ◆ Proactively research District business technology provider webinars, local user groups and annual conferences, and participate to stay current on supported technologies and available enhancements.

4.3 Help Desk

A Help Desk provides assistance to users requiring support for hardware issues, use of software applications or assistance with other technology challenges. Ideally, a help

desk is the single point of contact and provides for the timely resolution of issues. The goal and best practice is to resolve the issue during the user's first call for help.

The IS Division staff supports 117 District users. Currently, there is no formal Help Desk system in use at the District to assist with the management of service requests. Users currently contact IS support staff directly via phone, email or in person when in need of support services. Users typically reach out to the person they are most familiar with, are comfortable with, or that they are the person responsible for specific applications or technology support. IS staff manages their calls and work independently, and users are generally satisfied with the services provided. Remote access to user PCs is available to allow IS Division support staff the ability to resolve issues without leaving their work area.

With the absence of any electronic Help Desk system to capture requests for services, there is not a formal way to report on the services provided and completed by IS staff. The lack of this critical data being available prevents the District from understanding the true number of support requests received and services performed by the IS Division staff, the length of time a request is open, repeated calls, total monthly /annual volumes, trends, etc.

With the lack of any formal collection of data on services being provided by the IS Division, the district is unable to truly understand the volume of support provided and where the most support is needed. It also prevents the automatic creation of a resource knowledge base after the close of each call, which can be valuable for use in future calls. In addition, there is not a current way to report back to departments on services provided. Statistical summaries, if available, can help identify areas for further training and identify potentially faulty equipment. Providing regular automated activity reports provides a means to communicate with departments.

Based on District staff interviews and responses to the user survey, the majority of the users contact the IS Division for assistance once or twice a month. The survey indicates the top five reasons for contacting the IS Division are printers, desktop pc's, laptops, SCADA and Kronos. Printer issues were the overall highest percentage reason to contact the IS Division for support, at 55.2%.

During interviews users cited examples where requests for service went unresolved or remained open for extended periods of time with no action or communication. With Help Desk software these requests would have been documented and managed.

The IS Division is evaluating the Solarwinds help desk module and plans on purchasing in May and implementing in June 2015. This will further leverage an in-house system.

Recommendations

- ◆ Implement a more formal method to manage the IS Division's support requests and reporting of activities provided.
- ◆ Leverage the current Solarwinds investment to additionally manage Help Desk requests.
- ◆ Follow best practices to follow-up with users to ensure their satisfaction with the resolution of issues.
- ◆ Provide monthly activity reports of call tickets opened and closed for the month.

4.4 Service Hours of Support

The IS Division is staffed Monday through Friday from 7:00 am to 5:00 pm. The District works a 9/80 schedule and IS Division staff schedules are coordinated for necessary coverage. The IS Division does not use a formal electronic Help Desk system to assist in the reporting or management of service requests; thus before or after hours requests are not captured or logged until IS staff is available.

The network / server administrators perform server maintenance outside of regular District business hours to have minimal impact during working hours. This follows best practices because server maintenance requires downtime, and the number of users impacted by downtime should be kept to a minimum.

Technology support outside of District business hours is requested by contacting the IS Manager. The District does not have a formal policy requiring IS Division staff be available for after-hours support, and the Operations and Maintenance staff reported concerns about the lack of a formal extended hours support policy for critical technology services and support.

Recommendations

- Develop a service level policy to identify the District mission-critical technology that must be available 24/7/365 and may require IS support. The policy should define time commitments and escalation procedures.
- Work with the District Human Resources division to address after-hours employee requirements
- Define the procedure for requesting after-hours support and identify the IS Division staff member(s) responsible for providing support.
- Publish and distribute to departments a monthly, after-hours schedule of IS Division support staff, and their contact information.

4.5 Service Delivery Management

The District's technology infrastructure for delivery of software and services support is provided by the IS Division staff, consultants and application vendors. The IS Division staff members are the first line of support for desktop and laptop computers, printers, servers, network management and connectivity (including cables, switches and routers), security, telephone and voice mail systems, audio/visual and conference room equipment.

Support of the District's day to day core business application activities is primarily the responsibility of the individual department and department SMEs. IS resources typically support the administration, technical infrastructure, hardware, database management, storage requirements and are responsible for the back-up and recovery support of these systems. Additionally, administrative and reporting services are provided in conjunction with IS staff and the vendors and third party consultants.

The SCADA system and its communications network is business critical in the day to day management of District operations. The system and network is maintained by the IS

Division through a single support resource, and concerns regarding after hours support and lack of clearly identified backup personnel were raised during the face to face staff interviews.

During interviews, it was also noted that staff at offsite locations perceive a lack of support from IS Division staff. Establishing a regular IS schedule to proactively visit offsite locations is recommended. These onsite visits can serve to address specific issues, listen to the needs of remote technology users, and provide an opportunity for IS Division staff to offer suggestion to address technology challenges.

The IS Division does not maintain a service catalog, nor do they have service level agreements (SLAs) in place with the departments. There is no mechanism in place to manage the expectations of the user community.

Capacity planning and management measure the amount of data storage available and provides a historic perspective of usage over time. The IS Division does not have formal tools to monitor the network and servers to proactively identify capacity related issues.

Recommendations

- ◆ Create an IS Division policy and service catalog with published service levels that can be used to manage user expectations. The service catalog should describe what the Help Desk supports and what the user can expect for the response. This would include describing the service levels in the maintenance agreements the District has with outside vendors and service providers.
- ◆ Obtain additional network management tools to assist with troubleshooting and data storage capacity management and error tracking.
- ◆ Establish baseline metrics for servers including CPU utilization, memory and storage. Once established, the IS Division should evaluate the current environment against the baseline on a regular basis to identify issues or trends.
- ◆ Schedule offsite IS Division service visits to proactively reach out to District remote staff.
- ◆ Continue to use basic change management processes that ensure timely communication with users, effective planning and management of risks associated with changes being introduced, The processes should ensure changes are well planned and fully documented to include change management logs that record who, what, where, and when, for changes made.

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5 *Business Technology Applications*

This dimension evaluates the District's core business technology applications by analyzing their strengths and weaknesses, as well as the ability to support future business needs. Collectively, the District's applications make up an application portfolio. Managing this portfolio has many similarities to how a financial portfolio may be managed. For instance, the application portfolio owner should be continually evaluating the performance of each individual asset (application) in terms of delivering value to the District, as well as evaluating the risk associated with the portfolio (technology obsolescence, patch/release management, etc.). In addition, the application portfolio owner needs to carefully analyze and assess the impact of new applications, with recognition that all applications execute on a shared infrastructure.

The District's application portfolio investment is significant, in terms of both the original investment costs (licensing, implementation, training, etc.) and ongoing maintenance and support. In addition, the true return on investment of the District's technology infrastructure (network, desktops/laptops, servers, data centers, etc.) is largely realized through the effectiveness of the application portfolio. A strong application portfolio running on a weak technology infrastructure leads to high user frustration and underutilized assets. In turn, a weak application portfolio running on a strong technology infrastructure results in poor leverage of the District's investment. It is for this reason that a high priority must be placed on implementing the right applications (in terms of features, functions, compatibility, vendor roadmap, and support) to realize the maximum benefits from the District's investment in technology.

Maintaining an application portfolio is a key enabler when working with department applications. It allows for informed decisions on the disposition of an application (i.e. retirement, replacement, technical renovation, functional enhancements or version upgrade requirements). The portfolio notes an application's relevance for the District to maintain business continuity and the plans for recovery if needed. The portfolio should note each application's resource requirements for support, both at the department level and IS Division. The application portfolio should be reviewed annually with the ITAC.

The IS Division has implemented a Change Management process and developed forms that are used to identify, track, and authorize changes, edits, and additions to core applications. These changes require Director level authorization to complete (i.e. version upgrades, add and removal of users, etc.). Best practices are followed, with test and production environments maintained for major applications, requiring departmental user testing and sign-off prior to any major changes.

The collection of data is a major part of daily operations for departments, and rekeying of that same data for use in other applications is a challenge faced by most organizations.

Most core software systems have standard application interface tools that allow for the sharing of this data either automatically or through a manual interface. The District should investigate opportunities to interface core applications through automated means where possible.

Data collaboration and file sharing was brought up in several staff interviews. Currently there is no formal collaboration or project file sharing tools for internal and outside vendors working on projects. The current FTP option offers minimum functions to transfer files only but no revision management or communication capabilities.

The use of Access databases, third party tools or elaborate Excel spreadsheets to complete departmental work is common practice. Several stand-alone systems may benefit from possible interfaces or capturing this data within core District applications (i.e. Budget upload, BinLOGS, project costing, fuel data, additional GIS use, etc.).

Most organizations the size of the District has invested in an electronic means for document / records management. Electronic Document Management systems provide efficiency by creating single points of storage for permanent records / documents (eliminating multiple copies of the same documents in multiple departments), ease in finding documents based on structured file storage indexing, and the application of electronic retention management.

Additionally, the District should consider focusing on public facing opportunities for bi-lateral interactions with the LVMWD customer base through web based opportunities. As the District moves forward with completing the AMI project that is currently underway, constituents will be expecting informative communications. Client self-service opportunities should be a primary focus in the future.

Table 5 identifies the District's **core** business applications, the application description and department owner. A full list of software and application investments at the District is available in Attachment B – Application Inventory.

Business Application	Application Description	Department Owner
AMMS	Work Orders, Fleet Management	Facilities Maintenance
Advanced Utility System	CIS Utility Billing and Management	Customer Service
Custom Guide	Hosted Microsoft Training	Information Systems
Cetova Reports	JD Edwards Report Creation Tool	Finance
GIS (ESRI/Arc View)	Geographic Information System tools	Information Systems
JD Edwards	Financials, HR and Payroll	Finance
Kronos	Timekeeping	Finance
LIMS / WIMS	Water laboratory data and reporting	Facilities and Operations
NEOGOV	Recruiting Application	Human Resources
Novus	Agenda Management System	Clerk of Board
Performance Evaluation	Employee Annual Review System	Human Resources

SCADA (Wonderware Intouch)	SCADA Water Management System	Facilities and Operations
Swaght	Board Meeting Video Service Provider	Clerk of Board
Target Solutions	On-line OSHA Training	Human Resources
Vision Internet	Public Web and Intranet site	Public Affairs

Table 5 – Core Business Applications

5.1 Business Technology Effectiveness

The effective selection, implementation, and management of the applications included in the District’s application portfolio is critical toward attaining a high level of staff productivity, cost effective service delivery, efficient business processes, and a return on the District’s technology investment.

To help evaluate the effectiveness of the District’s application portfolio, NexLevel plots the major applications in a diagram, where the vertical axis represents technology capabilities (i.e. features and functionality) and the horizontal axis represents user effectiveness (i.e. how effective is staff at leveraging the application). The chart provides the ability to quickly understand which applications are being effectively leveraged and which applications are failing to effectively support the District business and operations activities.

For those applications that are failing, the chart also provides a method to quickly identify the reasons for underperforming applications, such as poor technology (i.e. limited features and functions) or weak user effectiveness (i.e. poor processes, lack of training, etc.). Figure 7 – Business Technology Effectiveness Diagram identifies each application’s effectiveness.

Core Business Technology Effectiveness Diagram

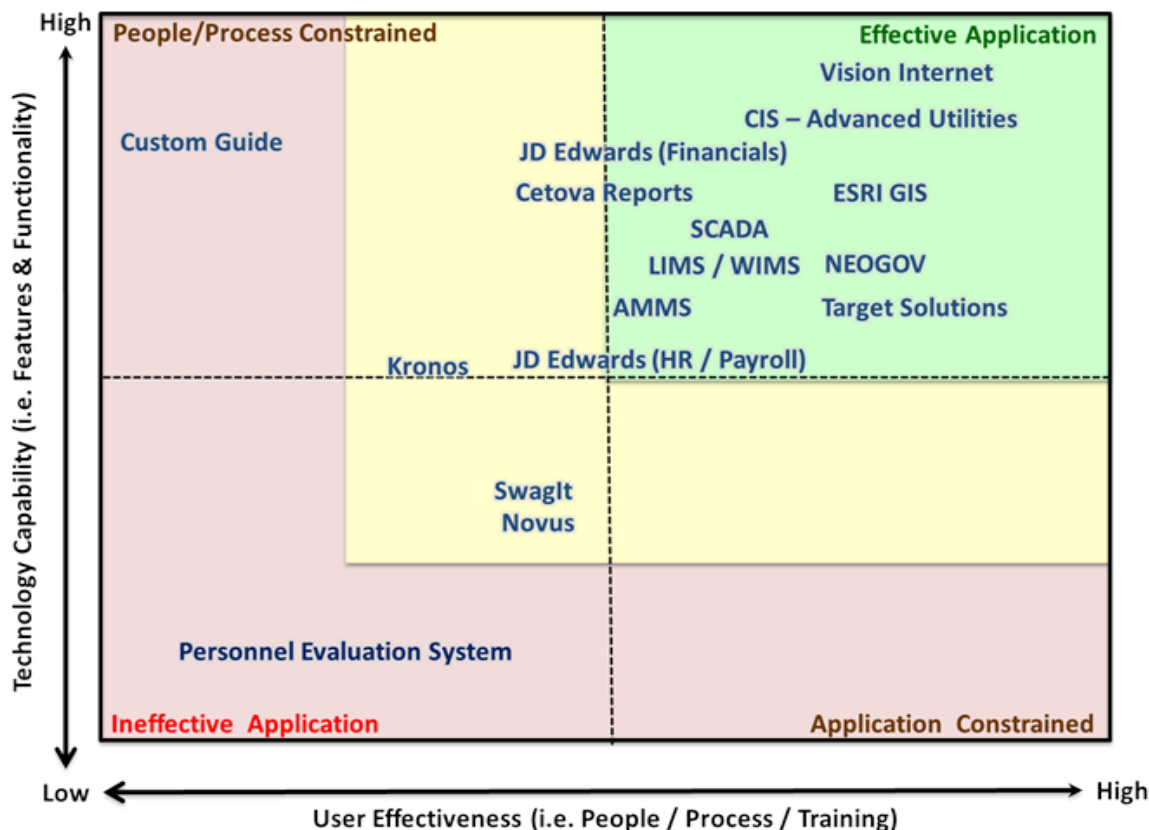


Figure 7 – Business Technology Effectiveness Diagram

5.2 Effectiveness Analysis

An analysis of the Business Technology Effectiveness diagram allows the District to identify specific applications within four areas:

- ♦ **Technology Capability - High** - Indicates that the application is relatively current with today's best practice features/functions and the vendor has a published roadmap to continue to evolve and support the application. In addition, it indicates the District is effectively leveraging the application through well-trained users, strong processes, and alignment to business objectives.

Possible High-Level Recommended Actions - Continue to invest, keep current with vendor releases, use of standard operating procedures reflecting application capabilities, occasional refresher user training, and active participation in user conferences to influence product direction.

- ♦ **Technology Capability - Low** - Indicates the application lacks the capability to effectively support business practices or efficient business processes.

Possible High-Level Recommended Actions - Evaluate whether the application is current in terms of releases/patches, request increased vendor support or

modifications, evaluate technology infrastructure if **performance related**, or evaluate integration to other applications. If application constraints cannot be overcome, then the District may want to consider replacement.

- ◆ **User Effectiveness – High** – Indicates the users are trained and obtaining the maximum benefit available from the application.

Possible High-Level Recommended Actions – Continue in the same manner. Ensure that new staff members receive training on the use of the application.

- ◆ **User Effectiveness – Low** - Indicates the users are not prepared to fully leverage the application.

Possible High-Level Recommended Actions – Meet with the vendor to help determine if user training is needed or if the application can be enhanced to better support the organization. If the application’s technology capability is low, providing additional user training may be ineffective. Determine specific business requirements and needs and proceed with procurement to replace the application as budget and resources allow. Avoid additional investment unless critical issues arise.

Effective Technology

Based on the IT Assessment activities and user department interviews, the following applications are viewed as effective in supporting the District’s business and operational needs:

- ◆ **CIS (Advanced Utilities System)**

High-Level Recommended Actions – The application is highly functional and effective for the department. The application is positioned to support the District as it moves to full AMI services and its new billing program. The CIS system currently interfaces with JD Edwards, and additional interfaces should be considered for AMMS. The District should continue to stay current on the application versions and consider mobile technology for field service workers when available. In addition, the department and the IS Division should continue to look at the necessary support requirements for the future.

- ◆ **ESRI – GIS**

High-Level Recommended Actions – The value of the ESRI GIS application can expand through integration with other applications (i.e. CSI & Utility Billing, Engineering, Valve Management, etc.) by associating data with a physical location. Access to GIS in the field is a growing need in the future and should be considered.

- ◆ **Vision Internet / Intranet**

High-Level Recommended Actions – This hosted system is meeting the District’s public web needs and has the flexibility to manage future needs as well. The District should continue to look at ways to electronically communicate via its web content with its customer base. In addition, departments should consider using the internal intranet site to automate manual processes when possible.

- ◆ **JD Edwards - Financial Module**

High-Level Recommended Actions – The JD Edwards financial system is a Tier 1 solution and highly capable system that has been in place for over ten years, meeting the District's day to day business needs. During the time that the system has been in place, processes and requirements have changed, and manual processes not originally automated suggest the need to reevaluate the capabilities of the system. Based on staff input during interviews there are processes, procedures and functions that are performed both outside the system, and not well within the current JD Edwards configuration. (The purchasing process is an example.) It is recommended that an assessment of the JD Edwards financial system be completed to determine the potential for more fully utilizing the current system, or if the current system may be ready for replacement.

- ◆ **AMMS**

High-Level Recommended Actions – The AMMS application provides departmental work order management, fleet management and preventive maintenance management. The District should implement additional system capabilities to support mobility, bar code scanning for department inventory, and electronic dissemination of work order assignments / closure to field staff. The AMMS is a siloed system which impedes the sharing of data between systems and departments. Day to day user oversight is provided by the department, and long term support should be evaluated to ensure that department needs are being met.

- ◆ **LIMS / WIMS**

High-Level Recommended Actions – The Laboratory Information Management System (LIMS) has been in use for over 15 years at the District and is meeting the needs for process control reporting and regulatory requirements. The Laboratory Division primarily supports this application without IS Division support, and works with consultants as needed. The Division is in md-project to add Waste Information Management System (WIMS) to meet the requirements for National Pollution Discharge Elimination System NPDES, drinking quality and other reporting needs. The District should maintain consultant agreements for the support of these systems. In addition, the District should investigate the possibility of integrating Lab data with GIS in future.

- ◆ **NEOGOV**

High-Level Recommended Actions – The applicant tracking and recruitment application, supported by the Human Resources Division, is effectively meeting requirements. Future on-boarding interfaces of new employee information from NeoGov to JD Edwards should be considered.

- ◆ **Target Solutions**

High-Level Recommended Actions – The application is effectively meeting requirements for the District to provide mandatory OSHA training.

- ◆ **SCADA (Wonderware / InTouch)**

High-Level Recommended Actions – The SCADA software and PLC (program logic controllers) equipment and associated software has served the District for many years. As with all technology investments, an assessment should be completed to validate that the current system components meet and will continue to meet the future needs of the District. During interviews, it was noted that specific PLC hardware is at end of life and the District is purchasing used equipment to replace non-supported portions of the system. As a part of the assessment additional capabilities and new functionality should be considered. The SCADA communications network project that is currently in process will assure remote access.

- ◆ **JD Edwards - Payroll and HR Application Modules**

High-Level Recommended Actions – The JD Edwards Payroll and Human Resources modules provide minimal features and functionality to support the District's employee management needs. During departmental interviews, the core users noted numerous external processes used to manage their day to day support of the system. An assessment of the JD Edwards Payroll and HR areas is recommended to address current configuration or module limitations. The assessment should be conducted in conjunction with the financial module assessment by a third party consultant specializing in JD Edwards systems.

It should be noted that just because an application is an effective technology, there could be opportunities to improve the application leverage via more effective integration with other core technologies, increased user training, or business process re-engineering to better leverage application. If an application does not continue to evolve, along with user adoption of new features/functions, then eventually that application will fall into an ineffective state.

User Effectiveness Constrained

Based on the IT Assessment activities and user department interviews, the following applications are viewed as not fully effective in supporting the District's business and operational needs due largely to user ineffectiveness:

- ◆ **Custom Guide On-Line Training**

High-Level Recommended Actions – Though Custom Guide provides an easy method for District staff to participate in self-guided training on the Microsoft Suite of products; very few persons have taken advantage of this system. The District should evaluate the cost benefits and consider eliminating this training tool or finding additional ways to encourage usage.

- ◆ **Cetova Reports**

High-Level Recommended Actions – Though the Cetova reporting tool is capable for generating reports from the JD Edwards financial module, it is not intuitive and requires advanced skills to generate reports. During the recommended JD Edwards assessment, it is recommended that the reporting needs be further evaluated to determine if additional reporting tools are required.

Technology Constrained

Based on the IT Assessment activities and user department interviews, the following applications are viewed as not fully effective in supporting the District's business and operational needs due to limited technology features and functionality:

- ◆ **Novus – Agenda Management**

High-Level Recommended Actions – The Novus system is identified as an application that is not meeting the needs of the District. The hosted solution configuration for workflow approvals is causing much frustration for department staff processing items for presentation to the Board.

- ◆ **SwagIT**

High-Level Recommended Actions – This third party vendor provides the services for capture of the Board meeting videos, time stamping agenda items to jump to points in the video, and publishing the video to the District web site. The District should evaluate this solution when it reviews the Novus system to determine if a single vendor can provide all the needed services.

- ◆ **Kronos**

High Level Recommended Actions - The Kronos time and attendance system provides staff the ability to record their hours worked and time off. Several departments indicated a slowness to access the system and in some cases needing to reboot to even gain access to the system. Some of this may be due to the remote site connectivity issues that are being addressed. There is a known issue with Java 7 that impedes other software from upgrading, and this matter should be escalated with the Kronos vendor. Funds are budgeted to address additional remote access requests and to address additional functionality requests.

Ineffective Technology

Based on the IT Assessment activities and user department interviews, the following application is viewed as lacking the features and functions to support District business and operational needs. In addition, significant people and process issues exist which prevent this application from being more effective in supporting District business needs:

- ◆ **Performance Evaluation System**

High-Level Recommended Actions – The current performance evaluation system is at end of life. All departments interviewed expressed an interest in replacing the system with one that provides additional automated processes to complete an employee evaluation. The District had previously identified this system for replacement and should continue to move forward with this project.

Recommendations

- ◆ Complete Core Business Application Assessments for JD Edwards, AMMS and the SCADA systems.

- ◆ Identify and implement a District Asset Management System.
- ◆ Focus on data consolidation and eliminate redundant capture of the same data multiple places and further leverage current technology investments through interfaces.
- ◆ Identify and implement internal and external collaboration tools for large size, multi-participant projects.
- ◆ Procure and implement a formal Electronic Document Management System.
- ◆ Continue with plans to replace the current Performance Evaluation system.
- ◆ Continue with the Kronos upgrade to address the java conflict issues and the additional needs identified by the District.
- ◆ Reevaluate the Agenda Management System (Novus) and replace if District needs are not able to be met with further configuration to the process and workflow.

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6 Infrastructure

This dimension focuses on the effectiveness and management of the District's technology infrastructure. The activities evaluated in this dimension are the daily, weekly, monthly, and yearly tasks that ensure a reliable, robust and high performing technology infrastructure. Areas reviewed include the network architecture, internet and intranet access and usage, remote access management, server administration, desktop standards, operational procedures, environmental considerations, and equipment refreshment planning.

6.1 Network Operation

The District's wide area network (WAN) includes connection to the following facilities: LVMWD Headquarters; Tapia; Rancho; Westlake; LV-2 turnout; Lift Station 1 & 2; Stunt, and Cornell Potable Pump Stations. The WAN support is a shared IS responsibility by IS staff. The WAN connectivity includes fiber, wireless, Pac Bell frame relay, DSL, MPLS, and T-1 leased lines.

The network services provided to the District and supported by IS include:

- ◆ Wide area network (WAN) design
- ◆ Wireless connectivity (public and private)
- ◆ Network management services and monitoring

The SCADA system is supported by the IS Division and includes the SCADA system communication network. The SCADA system network consists of District owned fiber and frame relay lines leased from AT&T. The AT&T frame relay lines are no longer supported; thus the District is currently migrating them to AT&T MPLS lines.

The current Multiprotocol Label Switching (MPLS) connections to Tapia, Rancho and Westlake have not been robust enough to meet the District needs. There is a current funded project that will change these locations to an Ethernet radio backbone and there is a bid out for additional access layers for buildings 7 & 8.

Recommendations

- ◆ Complete the SCADA Communications Network Project
- ◆ Expand the wide area network to include all District facilities
- ◆ Expand accessible Wi-Fi / Wireless to support future mobility needs and remote locations
- ◆ Complete Buildings 7 & 8 network projects

6.2 Internet Access

The District's application portfolio includes several applications that are in the "cloud," meaning access to the application is hosted by the vendor and available only through internet connectivity. This is a common practice for Districts to use web-based solutions.

Remote locations mentioned internet performance issues that can impede staff productivity. Steps are being taken to address the remote access issues.

Recommendations

- ◆ Proactively monitor internet capacity in order to effectively plan for increased bandwidth when needed.
- ◆ Engage the ITAC to review the current Communications and Usage policy for acceptable internet use language.

6.3 Intranet

Intranets have the potential to help staff quickly access common information, share information, and more effectively collaborate. At a minimum, an intranet should include current information such as templates, forms, policies and procedures, staff directory, and other District-wide reference information. The potential features and functionality of an intranet can expand significantly to include department sites, electronic forms, workflows, training materials, alerts, videos, picture galleries, frequently asked questions and more.

Vision Internet supports the District-hosted intranet. The IS Division has limited involvement in the support of the system, with the responsibility and management under Public Affairs.

Recommendations

- ◆ Continue to support the Public Affairs department in maintaining the District intranet.

6.4 Remote Network Access

Remote access to the District's network is available, but due to network security concerns is provided on a limited basis based on the adopted Virtual Private Network Acceptable Use Policy. Internal staff must sign the policy to obtain remote network access. Network access for outside vendors requires review and acceptance of the policy by the outside vendors, and typically the vendors are monitored by the IS Division or departmental SME staff when on the non-SCADA network. SCADA vendors always require District monitoring due to additional security precautions.

Recommendations

- ◆ Continue to use the Virtual Private Network Acceptable Use Policy for granting remote network access through a properly enforced secure VPN.
- ◆ Requests for remote network access should be directed to the IS Division. When approved, the ITAC will be notified that remote access has been granted.

- ◆ Routinely review the list of employees granted VPN access and validate if access is still required. If no longer required, inactivate account.
- ◆ Review current VPN Server and client software to validate it meets security and remote access controls.

6.5 Servers

The District has standardized on Dell servers and the servers are typically scheduled to be refreshed every 4 to 5 years. There are 33 total physical servers in the current inventory. Three SCADA servers and eighteen additional servers are running on a mix of Windows 2003, 2008 R2 and 2012 versions. There are several older servers that are noted for replacement and the District is actively reviewing virtualizing from physical servers to the virtual environment whenever possible during replacement.

Server virtualization is specially designed software that allows one physical server to be configured into multiple virtual servers sharing a data storage device. In the past few years server virtualization has emerged as a leading technology because it conserves space, power consumption and reduces the amount of air conditioning required to cool the data center environment

IS Division staff have begun the process of migrating to server virtualization using a freeware version called HyperV with System Center Virtual Machine Manager SCVMM. This effort is following best practices but the District should further research the best options for future VM expansion and whether the freeware version will continue to support the future needs of the District. The District may be better served with the investment in a maintenance supported product for its virtualization efforts. Either path should include IS staff training funding for implementation and support.

Several servers supporting core business applications are running Windows 2003 and need to be updated to current versions. The administration frequency of core servers should be reviewed and a formal schedule set to ensure servers are kept current.

District data storage is managed with several Cybernetics Storage Area Network (SAN) devices that are mirrored. The IS Division has identified the SAN devices to be replaced and is actively investigating SAN devices for data storage and future server virtualization.

Microsoft Exchange is a core server system for the District and is running at the 2010 version. The District should consider upgrading this to MS Exchange 2013.

Non-IS departmental supported servers exist on the District WAN and are not monitored or managed by IS staff for update frequency and security rules adherence.

Recommendations

- ◆ Implement server virtualization technology when physical servers are due for replacement.
- ◆ Schedule virtualization software training for IS staff, and possibly contract services to support IS Division staff with the initial deployment.
- ◆ Continue with planned SAN and server updates to replace old equipment and outdated server software on a regular schedule.

- ◆ Schedule routine administration for all District servers' (IS and non-IS supported) maintenance tasks.

6.6 Routers and Switches

The District has replaced its perimeter Cisco firewall with a Palo Alto system and has also added a redundant backup Palo Alto firewall. The SCADA firewalls are currently Cisco equipment, and the District is in the process of replacing these core Cisco switches with a Juniper system.

Consistent with best practices, routers and switches are located in secured closets within District facilities. The router and switch closets were described by staff as organized with appropriate cable labeling.

Recommendations

- ◆ The District conforms to industry best practices. No changes are recommended.

6.7 Desktop/Laptop/Printer

To ensure a reliable, robust and high performing computer environment, best practices encourages a periodic replacement (refreshment) of computer desktops and peripheral hardware. Hardware refreshment is important because as equipment ages, it becomes less reliable and replacement parts become more difficult to locate. Eventually, older hardware is not capable of supporting newer software versions.

The District staff indicated through the user survey that they are very satisfied with the computer hardware they are using. The District has standardized on Dell desktop and laptop computers. The IS Division staff support over 100 desktop computers, 16 laptops and 10 laptops specifically formatted for SCADA purposes. Several staff expressed interest in having laptops as their primary hardware in the future as opposed to full desk top workstations. In order to ensure that staff needs are being met, IS staff should contact users prior to completing refreshment of older equipment to validate their requirements.

The District has network printers available that provide users with options of where to print based on functionality needed. The IS staff support over 33 printers. HP is the standard printer, and purchase of additional printers must go through the IS Division. Xerox multifunctional devices provide printing, scanning and fax ability. Printers are one of the primary reasons IS support is contacted, and an analysis of reasons why support is required should be completed to determine if hardware is at issue or user error can be addressed with additional training.

The District's refreshment standard is to replace desktop hardware every 4 years, but occasionally due to budget considerations some may be replaced at 5 years. The IS Division budget includes desktop and laptop replacement, and the IS Division staff are tasked with deployment of new hardware in addition to ongoing activities of the IS Division. Circumstances may warrant this activity be considered for outsourcing in the future.

District tablets and iPhones have a limited distribution at this time but will likely be considered a primary business tool in future. Hardware standards will need to be identified and policies to support and manage these devices created.

The District has standardized on Microsoft operating system and applications. Microsoft Office 2010 and Windows 7 operating system are the current standards.

Recommendations

- ◆ Continue with the current technology hardware refreshment practices.
- ◆ Contact users prior to completing refreshment of older equipment to validate their future requirement needs.
- ◆ Consider adding temporary labor to install new refreshment PCs as a project in order to complete the installations in a timely manner.
- ◆ Maintain current OS systems and MS Office versions.

6.8 Mobile Computing

A challenge for technology professionals is the deployment and support of mobile computing devices (i.e. smartphones, tablets, etc.). While the current use of mobile computing is limited at the District, it should be expected that at some point in the very near future, nearly all employees will have devices that provide them access to the District's system while working out of the office. There are numerous benefits of providing staff mobility in terms of access to District systems; however, it also creates a support challenge and increases potential exposure from a security standpoint. Many technology departments, including the IS Division, are struggling to meet support needs related to mobile devices.

There is a growing demand for "bring your own device" (BYOD), meaning the ability to use a personally owned device to conduct a range of District business activities. It is inconvenient for individuals who are required to be available using a District owned device to also carry a second device for personal use. With the enhanced use of digital communication, even employees who are not required to respond to communication outside of regular business hours may desire to do so.

Technology support for BYOD brings new challenges for support staff. One issue is the needed ability to remove access to District systems in the event the personal device is lost or stolen. Troubleshooting issues with a personal device is a challenge because it is unlikely technology staff can be familiar with every model available. Access to District networks data if not secure or properly encrypted can potentially cause issues.

During the interviews, staff repeatedly expressed an interest in a formal BYOD policy and usage reimbursement plan. Many employees are currently using their personal devices to more efficiently complete their jobs while out of the office during working hours and sometimes after hours. The flip phones provided by the district are limited in features and functionality.

Recommendations

- ◆ Monitor the evolution of mobile computing devices (i.e. smartphones, tablets, etc.) and implement standards, training, and support as necessary to allow staff to leverage mobile technologies to improve day to day operations.
- ◆ Establish a BYOD policy for mobile devices. Legal counsel should be sought in this process, and any potential policy should include review by the Information Technology Advisory Committee.
- ◆ Evaluate the potential future mobile capabilities of the District's core business applications before launching mobile access projects. Most application developers are releasing software that supports mobile computing, but older application versions may not be compatible.
- ◆ Assess the mobile computing needs mentioned during interviews for the following core businesses: AMMS (work orders), JD Edwards (approval processing), CIS (remote service completion such as disconnects), and GIS (as-builts, valve locations, etc.)

6.9 Data Center Environment

The primary data center is located in the District headquarters and contains the computer and communication equipment that support the District's software applications and voice/voice mail systems. The data center is located in a secured environment with key access on the second floor near the IS Division staff area. The room is orderly and has limited unnecessary clutter.

UPS (uninterruptable power supply) units are installed that will supply approximately one hour of battery backup in the event of a power failure. Power to the room is supplemented with a generator that can supply power for an extended time, and the generator is tested periodically.

A project is planned to update the data center, with plans to replace the current server racks and provide enhanced cable management. This update is funded and scheduled for later this year and when completed will provide properly secured racks, overhead cable management and labeling.

The data center is located in a room that has A/C issues, and the new racks will be self-temperature controlled to help address this problem. IS staff is aware of the issue and is working with facilities to further address cooling issues.

The data center is housed in a room that has overhead water sprinklers, and this could cause major issues for the servers and equipment located here if activated. The potential impact to the technology investments of the District are at very high risk if not addressed.

Additional details regarding data center access are addressed in section 7.2 – Security - Physical.

Recommendations

- ◆ Complete the data rack and cabling project upgrades as planned for in the next fiscal year fiscal budget.

- ◆ Evaluate and address the data center A/C issues to adequately prevent servers and other equipment from extreme heat vulnerabilities.
- ◆ Address the data center overhead fire sprinklers issue to prevent potentially unrecoverable major problems from water damage.

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7 *Security*

In this section, we evaluate how the IS Division manages security and potential risk. Effective security and risk management starts at the top levels of the organization by establishing standards and expectations. Once those are established, it is up to the departments to implement the tools, processes, and practices to meet the standards and expectations. Maintaining a secure and protected technology infrastructure is of primary concern for any technology organization. Effective security involves a combination of policies and standards, personal user conduct, software tools (filtering, monitoring, etc.), and occasional audits to validate effectiveness.

7.1 Network

The security of the Las Virgenes Municipal Water District's networks is a critical component of technology best practices. In today's world, every computer / server is subject to malicious attack through the Internet. Skilled computer hackers attempt to break into networks to obtain private information, to utilize disk space for their own use, to attempt to cover malicious attacks to other organizations, or to cause damage to information.

The District has implemented several protocols to address network security. A Palo Alto Firewall for intrusion detection, continual network monitoring for threats, spyware, and vulnerabilities for malicious activities. In addition, all servers are located within the districts trusted network further limiting risk to the District. In addition, the IS Division Manager and an additional staff person recently attended a Homeland Security Conference that focused on cyber security. The conference provided a self-assessment and tools to identify areas of network security, and staff is proactively applying what they learned. IS staff should continue to attend these types of conferences and training when available and budget for them annually.

A network penetration test is a tool to help identify potential weaknesses in an organization's electronic network. These tests are typically conducted by an outside third party to assess the network's ability to prevent an outside attack. The intention of the test is to identify network security weaknesses. Issues are identified, and suggested actions and counter measures to remediate are provided by the outside consultant. This is a best practice and should be conducted on a regular basis to help ensure security and reduce the potential of an attack on the District's network.

The District operates several networks, and should look at both the general network and the SCADA network when coordinating these penetration tests. The frequency of testing should be determined by the IS Division and reviewed by the ITAC.

Recommendations

- ◆ Conduct third party network penetration tests and address items that are identified to have a potential impact to the District.
- ◆ Verify procedures are in place to immediately notify the IS Division of employee separations in order that access to District network and telephone systems can be terminated.
- ◆ Continue educational opportunities to align with best practices for network management.

7.2 Physical

The public entrance to District headquarters is staffed by employees at the front counter. Access to the department areas requires an employee badge. Visitors must sign in and out with the front counter staff and wear a visitor badge. Visitors are then met and escorted to areas of business by District staff.

The IS data center is located on the second floor and is locked. Access requires a key but no logging of entrance is required. The data center houses servers supported by the IS Division and several server / workstations supported by department specific staff. A video camera to monitor departmental servers was recently installed in the data center without IS staff involvement.

Several remote sites have gated entrances for security access reasons and require a code / or badge to gain entrance. Vendor codes have been distributed and appear to be shared freely. Staff at these locations is interested in being able to provide gate entrance to others through mobile capabilities and not have to physically travel to the gates.

Recommendations

- ◆ Update the data center entrance access from key entry to a card / badge reader.
- ◆ Review and strengthen the process of distributing gate codes and investigate ways to automate gate activity via a mobility app or cell phone.

7.3 Data

Safeguarding District information, maintaining confidentiality and data integrity, and assuring availability of the data is the responsibility of the IS Division. This requires controls be in place that ensure security objectives are addressed. The District uses SAN storage devices and some power vaults to house the District databases, and standard practices are in place to secure the servers and data to prevent loss and to recover data if necessary.

With District staff using District issued equipment in field locations, the potential for lost or stolen equipment exists. The use of data encryption and acquiring software for wiping of data located on District issued hardware should be regularly considered for the future.

Recommendations

- ◆ Implement data encryption on District hardware vulnerable to being lost or stolen, including laptop computers and other mobile devices, in order to protect District information from being accessed by unauthorized individuals.
- ◆ Conduct periodic data recovery testing for core business applications managed internally and with third party recovery sites the District uses for back-up and redundancy.

7.4 Desktops

Desktop level security procedures are instrumental to an effective security program. A key component of desktop security is restricting administrative rights to desktops. Administrative rights restrict the authority to someone designated as the system administrator to control what hardware and software can be installed on a computer.

Allowing users to have the ability to install software on their computers presents risk because malware can be inadvertently installed, non-standard software may be installed, or improperly licensed software may be installed. An infected PC has the potential of quickly impacting District computer users and stopping all business applications.

The IS Division follows best practices by restricting administrative rights on all but a select set of computers. The District recently enforced password requirements that require all users to routinely update their account password. IS staff frequently receives requests to reset passwords for users, and has implemented Anixis, a password management system that provides an automated solution.

Recommendations

- ◆ Regularly review who has local desktop administrative rights and enforce rules to limit local admin rights.
- ◆ Continue to enforce a formal password policy that requires strong passwords, protection of these passwords, and establishment of minimum timeframes between password changes.

7.5 Data Backups

A mission critical function for any technology organization is protecting and backing up data. An effective backup and recovery strategy can protect the District from data lost due to hardware failure, damaged equipment, or software failure. Another benefit to having backups is to protect users that may inadvertently delete important files. Having an effective backup strategy provides an opportunity to recover from such an event.

The IS Division follows best practices by scheduling backups for every Friday and Saturday, and the back-ups are spaced for efficiency. Incremental backups are then completed each weekday evening. The backups are done initially to the SAN and then the full backup jobs duplicate to the Linear Tape-Open (LTO) data storage technology tape storing approximately 3 to 4 terabytes of data. The District VMs are backed up and snapshots taken monthly.

The District has contracted with WTS, Inc., a provider of application hosting, for managed disaster recovery services, and uses its co-location services for its CIS and JD Edwards applications.

Separate full weekend backups are run at Tapia (SCADA) and incremental backups run each weekday evening. The LIMS / WIMS sever is backed up to the Tapia server. Universal Serial Bus (USB) backup devices are used and swapped each month for 6 months history.

For disaster recovery purposes, the backup tapes are securely stored off site at Tapia. IS staff report users frequently request file restores, and staff is confident that data recovery could be completed using the backup tapes. However, best practice is to routinely schedule recovery tests.

Recommendations

- ◆ Routinely test the ability to recover from all backup devices and third party disaster recovery vendors.
- ◆ Adopt a back-up / recovery policy to support the Business Continuity recommendations.

7.6 Business Continuity

Business continuity planning provides the foundation for how business would be conducted after a major catastrophic event. The District does not have formal plans related to technology disaster recovery or business continuity related to the technology infrastructure and business applications. The District has placed a duplicate check printer at the Westlake facility in a secure location, but no additional computing hardware or co-locations have been identified.

Recommendations

- ◆ Develop a Business Continuity Plan (BCP) to ensure adequate processes, procedures, and resources are available to support an orderly recovery of the District's technology and applications within a defined timeframe and in priority order necessary for restoring technology business applications.
- ◆ Expand the current Disaster Recovery Plan (DRP) and schedule tests to ensure ability to support DRP of all District servers and BCP.
- ◆ Assure that the DRP and BCP will support the Emergency Operations Center (EOC) needs.

7.7 Emergency Operations Center (EOC)

An emergency operations center is a central command and control facility responsible for carrying out the functions of emergency preparedness, emergency management, and / or disaster management at a strategic level in an emergency situation, and ensuring the continuity of business operations.

The District has an operational EOC Plan that is maintained by Facilities and Operations. The District does not have a permanent EOC location, and meets in a conference room at headquarters. The District relies on staff to bring laptops and other equipment to facilitate and function during drills. In the event of activation, IS Division staff has written procedures to follow.

Recommendations

- ◆ Designate permanent equipment to the EOC. At a minimum, an EOC crash cart should be established (laptop, printer, communication radio, charged cell phone, land line phone, etc.).
- ◆ Consider the inclusion of GIS support to bolster the preparedness in case of an emergency.
- ◆ Update the EOC Manual to reflect the Business Continuity requirements related to technology.

7.8 Virus/Spam Protection

The introduction of a virus to a network could cause the network/data center to fail and/or damage District data. The District uses the McAfee VSE 8.8 software for network and desktop virus and malware protection. The updates are pushed through the network to the servers / desktop computers and are applied when the user logs into the network.

The District uses the EPolicy Operator (EPO) Dashboard to monitor and view any potential risks to the District network. Staff is able to disable shared drives, specific directories, etc. via the dashboard to mitigate an outbreak and prevent further risk to all network devices. The IS Division conforms to industry best practices in virus and spam protection.

Untangle is a software tool that is used by the District to continually monitor and capture spam and identify any potential email virus within the networks. Users receive a notification regarding suspect emails, and can then mark the email as safe or note to continue blockage. This is a best practice process and should be continued.

The IS Division does not manage several servers located in the data center that are supported by other departments. There is a probability that these servers are not being routinely updated, causing risk to the District network.

Recommendations

- ◆ Establish a policy for non-IS servers to complete mandatory updates and enforce with the responsible department to complete the necessary virus protection updates on department managed equipment.
- ◆ The District is following best practices for Virus and SPAM control and should continue by staying current on version releases.

7.9 Patch Management

Timely patch management is instrumental for protecting the District's data and ensuring that hardware/software executes as intended. Microsoft frequently issues patches for file servers and desktop computers, and the timely installation of patches is important for security and optimum application performance. The District subscribes to Microsoft Windows Server Update Services (WSUS) to obtain patches when they are released.

The IS Division staff routinely sends an email each Tuesday to have the District staff complete the necessary local Microsoft updates at their workstation by clicking the link. These updates are not enforced and are left to the end user to complete.

The IS staff reviews the Microsoft update notes and then server administrators are notified that patches are available. The patches are applied to the servers during non-business hours to avoid staff disruption because the servers must be rebooted to complete the patch installation, which makes them unavailable to the users.

Recommendations

- ◆ Investigate the implementation of a fully automated patch management system for deploying relevant patches, hotfixes, and security updates.
- ◆ Complete regularly scheduled server updates and patches. Follow best practice to apply and test in the test environments prior to applying to production servers.
- ◆ Routinely monitor the non-IS / department managed servers for current updates.

7.10 Server Event Logs

Log files maintained on each server contain information about server performance anomalies. The information can prove invaluable when troubleshooting. As the log file size increases, the errors overwrite the previous information. In the event that an issue repeats, the initial information can be lost. Therefore, it is important that log files are maintained to prevent overwriting.

Recommendations

- ◆ Centralize log files to prevent overwriting.

8 Administration

This dimension focuses on how effectively the IS Division manages the District technology administration in terms of leadership, oversight for IT budget, maintenance / vendor agreements, software licenses, and maintaining an IT inventory. As the title indicates, these functions are largely administrative activities and do not require deep technical expertise.

In addition, an important responsibility of the administration area is maintaining the necessary documentation to support IS Division success. While informal, undocumented processes can be effective, such processes force organizations to rely on individual expertise and knowledge. Best practice organizations maintain current and accurate documentation on all activities such that processes can be completed in the absence of any one individual. Strong documentation promotes cross training, enables backup and recovery, provides succession planning and reduces the risk of impact on the organization when resources change.

8.1 Administrative Staff

Administrative duties required in the IS Division include following District accounting processing when procuring IT hardware and software, managing the software licenses, vendor maintenance renewals, and budget preparation. The IS Manager is performing administrative duties with support from staff.

Recommendations

- ♦ Migrate administrative duties when possible to support personnel to reduce the amount of time the IS Division Manager spends on routine, nontechnical functions.

8.2 Budget

The IS Division's annual budget routinely includes a hardware replacement line item. The Division budgets for 25% of the current District technology hardware to be refreshed annually. If equipment is still functioning adequately, the District may delay replacement of desktop hardware to five years.

Some application maintenance costs are included as part of the IS Division budget, while other maintenance costs are submitted as part of a department budget (i.e. CIS, AAMS, LIMS, etc.).

Recommendations

- ♦ Continue the District's current refreshment (desktops and servers) practice and stay on schedule to replace old hardware.

- ◆ Centralize all technology expenditures in the IS Division. This will provide visibility of the District's total cost of technology. Opportunities may exist for reducing expenses through consolidation or discounts.
- ◆ As new IT projects are implemented, the necessary resources to support them internally or through third party consultants should be identified and be included in the total cost for implementation budgets and future support.
- ◆ Approval for projects identified in the Information Services Master Plan will require funding, and should be included in the IS Division budget.

8.3 Procurement

The District purchasing policy requires the IS Division to approve all technology-related purchases. This is important to ensure that new purchases align with current technology standards, can be supported, and do not adversely impact the existing network and users. In addition, the IS Division staff are best positioned to identify opportunities to leverage existing technology infrastructure.

The IS Division has adopted District-wide standards for its technology hardware and software to ensure any procurement of technical assets is compatible and can be supported. Standards reduce complexity and ensure that hardware, software, operating systems, and applications all work together and can be easily supported.

Centralizing all IT purchases allows volume purchasing to keep costs as low as possible. This aligns with best practices for technology procurements.

Recommendations

- ◆ Continue to require that all IT related purchases be made by the IS Division.
- ◆ Major technology procurements should be submitted to the IS Division Manager and then reviewed by the ITAC. This will ensure that standards and policies are met, and provide an avenue for communication on major IT projects.

8.4 Contract & Vendor Management

Best practices encourage a collaborative approach to proactively managing technology vendors and agreements. The software maintenance agreements are reviewed to meet the District's requirements. Copies of all maintenance agreements are maintained by the IS Division. The department using the core business application is responsible for ensuring that the support service levels and service delivery are being met. Insurance certificates are managed by purchasing.

Recommendations

- ◆ Review all maintenance agreements annually to confirm the agreements provide the appropriate level of service.
- ◆ Continue to maintain a centralized repository for all maintenance contracts within the IS Division. This method allows for the consolidation of like vendors, acquisition of volume discounts, and having a single point of contact for all

technology agreements within the District. This methodology also provides increased control over the total technology expenditure within the District.

- ◆ Generate a complete vendor contact list (inclusive of vendor summary information, vendor contacts, support numbers, department contacts, etc.) as part of the IS Division's IT documentation catalog.

8.5 Software License Management

The District maintains a Microsoft Enterprise Agreement (EA) for operating system, Office and Exchange applications and back office solutions. EA provides newer software versions at no additional cost.

The IS Division is responsible for application licenses. All software license and maintenance renewals go through the IS Division but in some cases funding comes from the responsible department.

Recommendations

- ◆ Review all maintenance and renewal costs and budget these items through the IS Division for a true cost of ownership.

8.6 IT Inventory Management

Inventories of the District's IT assets, servers, desktops, laptops and peripherals are maintained using internal tools (Excel / Access) manually. The IS Division uses this list to identify the hardware / equipment investment and supported technology systems. The lists include type, manufacturer, model, serial numbers, associated IP, person assigned to, date of purchase, maintenance level, and expected end of life. This list additionally identifies the equipment slated to be part of the 20% annual refreshment, based on oldest equipment being replaced first and then based on need.

Recommendations

- ◆ Maintain a complete inventory of all IT assets (software, hardware, infrastructure equipment, etc.) and manage the refreshment cycle.
- ◆ Leverage the current technology investment in Solarwinds by investigating its asset management module to automate the process of IT asset discovery, tracking, and reporting. If Solarwinds is not able to meet the Division IT asset inventory needs, other automated tools should be evaluated.

8.7 Technical Documentation & Procedures

Maintaining a current and accurate document repository for any technology organization is a challenge. Staff is required to "wear many hats" and operates primarily in a reactive mode. Some organizations may be able to perform with minimal documentation, as they appear to effectively and quickly communicate with one another. However, in the long run, all organizations are best served by ensuring appropriate focus is placed on the creation and maintenance of a formal IT documentation catalog.

The Division staff provided network diagrams, IT hardware / software standards, GIS completed activities log, multiple request forms to engage IS Services, IS staff job descriptions, along with other forms and checklists. IS staff additionally maintains a shared IT folder that acts as a knowledge base for the IS Division.

In addition, two Action Plan (AP) documents were provided for review. The APs define the actions, processes and procedures to follow to prevent and / or react to a cyber-attack to SCADA Security (AP-6) or IT Security (AP-7). A Disaster Recovery binder for the CIS (Utility System) documents emergency procedures.

NexLevel reviewed all the written documentation provided and an inventory of the documentation provided is included in “Attachment A – Documentation” of this report.

The District should allocate sufficient time to the IS Division resources to create adequate documentation to ensure that external technology professionals would be able to quickly understand and support the technical infrastructure and daily, monthly, annual IS duties in a reasonable, proficient manner, if necessary. This includes identifying the necessary IS Division processes and procedure documents to be created, and maintaining these in the IT documentation catalog.

Recommendations

- ◆ Validate the current IS Division documentation list and identify what is missing to assure Division continuity of processes and procedures in the absence of key resources.
- ◆ Complete the creation of the documents identified as missing and establish and complete the content of the Division IT documentation catalog.
- ◆ Centralize the IT documentation catalog and technical documentation for all aspects of the IS Division’s day-to-day operations. Personal folders, notes and instructions should be written in a consistent format and moved to a central repository.
- ◆ Assign on-going maintenance of the IT documentation catalog content to each IS Division staff member’s job description and use as a measureable objective in the employee’s annual performance review.
- ◆ Review the current documents and update:
 - SCADA Security (AP-6) or IT Security (AP-7) last revised June 29, 2004
 - WTS – Disaster Recovery Subscribers Guide last revised 2010

8.8 Policies

The IS Division provided NexLevel with its Communication and Use of Electronic Communication Devices Policy. The Policy covers District staff usage of telephones, voice mail, radios, pagers, computers, internet, and email usage. While the District-wide policy provides a foundation to build on, it needs to be updated to reflect the current environment, computing trends and changed procedures.

The District established a Virtual Private Network Acceptable Use Policy November 12, 2014 and has implemented the Policy for internal staff requiring remote access.

Additionally, VPN requests from external system consultants and vendors must follow the policy and sign the required authorization forms prior to being granted access.

A core component of technology best practices is the establishment and enforcement of policies. The following list identifies common technology policies that exist with best practice public agencies:

- Help Desk / Support Policy
- Document Retention Policy
- Equipment Acquisition Policy
- Equipment Sanitation/Disposal Policy
- Software License Maintenance Policy
- Green IT Policy
- Administrative Rights Policy
- Anti-Virus Policy
- Change Control - Freezes & Risk Evaluation Policy
- Data Security Policy
- Desktop Move/Add/Change Policy
- E-Mail Archiving and Retention Policy
- Inventory Policy
- IT Services Catalog Management Policy
- Mobile Device Acceptable Use Policy
- Password Policy
- Patch Management Policy
- Remote Access Policy
- Removable Media Acceptable Use Policy
- Social Media Policy
- System Backup/Recovery
- Technology Training Policy
- Wireless Access Point

Effective policies and procedures guide computer users in the use of technology to ensure a secure, reliable, and supportable environment.

Recommendations

- ◆ Engage the Information Technology Advisory Committee in the review of all existing IT policies to obtain input on potential gaps or shortcomings and identify what policies need to be added.
- ◆ Complete a joint review of current policies content and update as necessary.
- ◆ Complete the creation of newly identified policies.
- ◆ Distribute policies to District staff and consider requiring signatures to indicate that the policies have been reviewed during annual performance reviews.
- ◆ Set policy to complete post implementation evaluation reviews (PIER) three to six months after go-live of any technology related project. The review may identify needs for additional training, or support services to increase the value of the system and leverage the District's investment.

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Attachment A - Documentation

Table 6 presents the documentation provided by the IS Division during the completion of the IT Assessment.

Document	Purpose/Content
District Org Chart	Includes Departmental organizational chart with IS Division.
2014-15 IS Budget	Item detail budget for fiscal year and IS Projects identified.
Internet Access Request Form	Permission form for access to the Internet; date revised May 2, 2002.
LVMWD Network Layout	Diagram of LVMWD Network Layout including all remote locations and methods of connectivity, IPS, routers, DNS, and contact support numbers.
VLANS Diagram	Diagram of LVMWD headquarters VLANS and associated connections for servers, printers, routers, peripherals, firewall locations, etc.
Tapia Diagram	Diagram of remote Tapia location configuration and network setup with SCADA.
Rancho Diagram	Diagram of remote Rancho location configuration and network setup with SCADA.
Westlake Diagram	Diagram of remote Westlake location configuration and network setup with SCADA.
LV-2 Diagram	Diagram of remote LV-2 location configuration and network setup with SCADA.
Cornell Diagram	Diagram of remote Cornell location configuration and network setup with SCADA.
Stunt Road Diagram	Diagram of remote Stunt Road location configuration and network setup with SCADA.
Lift Station 1 Diagram	Diagram of remote Lift Station 1 location configuration and network setup with SCADA.

Document	Purpose/Content
Lift Station 2 Diagram	Diagram of remote Lift Station 2 location configuration and network setup with SCADA.
Proposed Network Physical Topology	Depiction of Building 7 and 8 configuration changes out for bid currently for this fiscal year updates.
AP 6 – SCADA Security	This document is the Action Plan to address a cyber-security attack on the SCADA network system.
AP 7 – IT Security	This document is the Action Plan to address a cyber-attack on the District intranet system.
Incident Checklist	This document is used to document an IT Incident and provides a checklist to follow when an incident is detected or reported.
Hardware / Software request Form	Form required for requests to acquire software / hardware (computers and peripherals), for changes, moves, etc. Requires Department Manager Approval.
Employee Change Form	This form is used for new employee adds, changes, terminations, etc. for network and system access...
JD Edwards User Form	This form is required to add and or remove an employee to the JD Edwards System. Requires Finance Manager Approval to complete.
VPN Remote Access Request	The form is used to grant VPN access to the LVMWD network and systems.
VPN Consultant Access Request	The form is used to grant VPN access to the LVMWD network and systems for a vendor / consultant.
Communications and Use of Communication Devices Policy	Policy for use of District supplied cell phones, radios, computers and the guidelines for email, intranet and internet usage.
VPN Acceptable Use Policy	This policy is directed to the LVMWD employees and must be followed and signed by the employee.
IS Standards	This document identifies the standards set forth and supported by the IS Division. The IS Division is responsible for purchasing of software, hardware and peripherals they are to support.

Document	Purpose/Content
Master/ Transaction File Change Form	This form is required if a master or transaction file change is requested.
Hardware Listing	This document contains an inventory of hardware supported by the IS Division. It includes serial numbers, IP Location, user, system supporting, Manufacturer, date purchased, maintenance support, etc.
PlanGraphics GIS Assessment	This document is a needs assessment conducted for GIS in 1995.
CIS Disaster Recovery Guide	Binder that contains pertinent informational instructions and contacts for the CIS Utility Billing software back-up and support.
Job Descriptions	IS Division Job Descriptions (IS Manager, SCADA System Specialist, GIS Technician, Computer Support Specialist, Systems Analyst)

Table 6 – Documentation Provided to NexLevel by the IS Division

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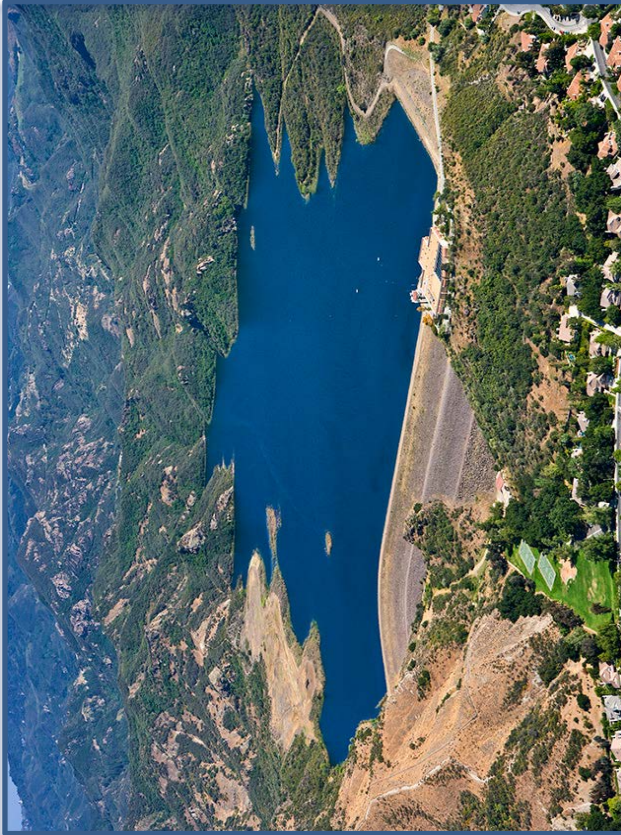
Attachment B – Application Inventory

An application inventory is presented in Table 7. The information was obtained from the IS Division and in meetings with the departments.

Application Name	Application Description	Primary Dept./Division
AMMS	Work Orders, Fleet Management	Facilities Maintenance
Adobe	Writer, Creative Suite, Illustrator	Various
Advanced Utility System	CIS Utility Billing and Management	Customer Service
AutoCAD	Drawing and Design	Engineering
Backup Exec 2012	Data Backup	Information Systems
CCTV	Video Capture (Remote)	Facilities and Operations
CallEmUp	Phone Call Out Services	Public Affairs / Communications
Custom Guide	Hosted Microsoft Training	Information Systems
Cybernetics	SAN Management	Information Systems
DoubleTake	Continuous replication software for CIS to disaster site	Customer Service
Cetova Reports	JD Edwards report creation tool	Finance
FileMaker Pro	Database - Non Supported	Admin Service Coordinator
GIS (ESRI/Arc View)	Geographic Information System tools	Information Systems
GPS – Track Vision	Vehicle / Location Monitoring	Facilities and Operations
HVAC / Fire	Building AC and Fire Control System	Facilities and Operations
Internet Explorer	Standard Web Browser	Information Systems
JD Edwards	Financials, HR and Payroll	Finance
Kronos	Timekeeping	Finance
LIMS / WIMS	Water laboratory data collection and reporting	Facilities and Operations
McAfee	Anti-Virus	Information Systems
Microsoft Desktop	Windows 2007	Information Systems
Microsoft Exchange	Outlook Email	Information Systems
Microsoft Lync	Microsoft Communications	Information Systems
Microsoft Office 2010, 2013	Access, Excel, PowerPoint, Word, Publisher, Outlook, OneNote	Information Systems
Movelt	FTP - File Transfer Protocol System	Information Systems
NEOGOV	Recruiting Application	Human Resources
Novus	Agenda Management System	Clerk of Board
Ovation	DCS system at Rancho	Facilities and Operations

PaloAlto	Firewall software	Information Systems
Performance Evaluation	Employee Annual Review System	Finance
PetroVan / Phoenix	Fuel Management	Facilities / Operations
RoboCall	Automated Call System	Customer Service
SCADA (Wonderware Intouch)	SCADA Water Management System	Facilities / Operations
Solarwinds	Remote Desktop	Information Systems
SwagIt	Board Meeting Video Service Provider	Clerk of Board
Target Solutions	On-line OSHA Training	Human Resources
UnTangle	SPAM and Filtering Software	Information Systems
Vision Internet	Public Web and Intranet site	Public Affairs
VUEBill	On-line Utility Payments	Customer Service

Table 7 - Las Virgenes Municipal Water District Application Inventory



Las Virgenes Municipal Water District

Information Systems Master Plan

May 2015

Prepared by:



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NexLevel Information Technology, Inc. assisted the Las Virgenes Municipal Water District in the development of this Information Systems Master Plan. The Plan is intended to be used as a roadmap to help ensure information technology effectively supports the District’s current and future needs.

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1. Introduction and Overview

1.1 Introduction

This document, entitled Information Systems Master Plan (ISMP) Report, was developed for the Las Virgenes Municipal Water District (LVMWD) by NexLevel Information Technology, Inc. (NexLevel) as the culminating step in the development of an Information Systems Master Plan for the District.

1.2 Document Organization and Contents

This report contains the following sections:

- ◆ Section 1 – Introduction and Overview, provides information on the scope and objectives of the IS Master Planning effort, the methodology used in the development of the plan, and the organization and contents of the plan.
- ◆ Section 2 – Current Technology Environment, provides a high-level overview of LVMWD’s present technology environment, presenting a summary of the analysis and recommendations developed in the course of the assessment phase of the project including a summary of LVMWD’s current compliance with information technology best practices for governance, business technology applications, service delivery, infrastructure, security, and administration.
- ◆ Section 3 – Project Prioritization and Scheduling, describes the process that was used to develop the Master Plan projects, and provides timelines for the in process, new, and future projects identified by LVMWD’s stakeholders / executives, along with cost estimates for each project.
- ◆ Section 4 – Conclusion, provides an overall perspective of the process through which the ISMP was developed,

LVMWD’s next steps and opportunities, and the challenges being faced by local government organizations in the utilization of information technology to improve the delivery of services to internal staff and external customers.

- ◆ Section 5 – Appendices, contains additional information relevant to this report.

1.3 LVMWD Background

Las Virgenes Municipal Water District was formed in 1958 to ensure the delivery of safe, clean, dependable water and environmentally protective wastewater treatment services in a cost-effective manner. LVMWD’s 122 square mile service area provides services to the cities of Agoura Hills, Calabasas, Hidden Hills, Westlake Village and neighboring unincorporated areas of Los Angeles County.

LVMWD’s service area has no local source of drinking water; all supplies must be imported from Northern California through Metropolitan Water District of Southern California (MWD), one of the world’s largest water wholesalers. Originating in the high Sierras, the water is transported more than 400 miles through the State Water Project’s California Aqueduct entering the LVMWD service area at the east end of Calabasas. Water is then carried through the District in a system of more than 396 miles of water pipe. Reliable water service in this mountainous area is challenging, requiring 24 storage tanks and 24 pump stations to serve its customers.

Approximately 20 percent of the potable water served to LVMWD customers is reused in the community to irrigate highway greenery, golf courses, school grounds and other public and commercial landscapes. This recycled water is produced through extensive treatment of wastewater and is delivered through 66 miles of water lines, three storage tanks, two reservoirs and four pumping stations.

LVMWD provides wastewater (sewer) services to most residents throughout its service area in its treatment facility.

The final step in LVMWD's "full circle" of water reuse is biosolids composting. Solids remaining from the water reclamation process are treated to become a rich soil amendment. Similar to the product sold at garden stores, this high-grade soil amendment is distributed free for home use each Saturday morning.

Las Virgenes Municipal Water District is committed to providing the community with the highest quality water and wastewater services in the most cost-effective, reliable and environmentally sensitive manner. The ISMP is an additional tool for the District to support the District's commitments and goals.

1.4 Scope and Objectives of the ISMP

As shown in Figure 1, Technology Gap, the primary objective of the Information Systems Master Plan is to provide a roadmap that will help LVMWD to effectively allocate resources, time and dollars to close the gap between its current and future technology needs. As depicted in Figure 1, although user expectations increase over time, the capability of existing systems tends to actually decrease, thus further widening the gap. Other factors that contribute to the widening of the gap include staff reductions and challenges in the effective allocation of IS resources. The technology gap leads to what one technology research firm has described as "friction" between the users and the IS organization, and in the absence of effective IT Governance, this friction tends to worsen over time.

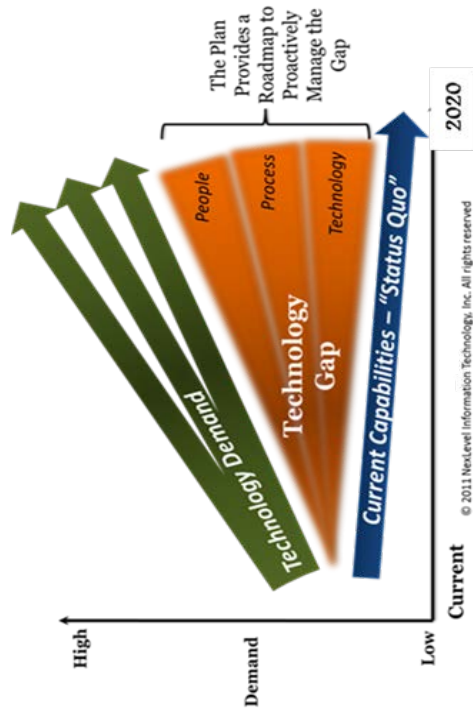


Figure 1 – Technology Gap

The objectives of the Information Systems Master Plan are to:

- ◆ Identify the steps that LVMWD should take to stabilize and improve its information systems, technology, infrastructure and its ability to deliver information services;
- ◆ Identify critical enterprise information technology initiatives and departmental information technology initiatives that are needed to realize operational efficiencies, to comply with regulatory and contractual requirements, and to meet public expectations;
- ◆ Create an information systems master schedule that maps the identified projects over the length of the Master Plan based on relevant parameters including priority, resources, user impacts, costs and risk;
- ◆ Provide recommendations for a governance structure and process for the continuing maintenance of the Master Plan objectives, priorities and schedule.

1-5 “Listen, Plan, Deliver,” Methodology

The methodology used by NexLevel to develop the Information Systems Master Plan is depicted in Figure 2, Master Planning Methodology. The methodology is composed of three basic phases:

- ◆ Listen – During which NexLevel works with the client to conduct a project kickoff meeting, configure and conduct the “Voice of the User Survey,” and conduct interviews with executives, identified department users, and IS Division management and staff resulting in a draft list of potential activities and projects.
- ◆ Plan – During which NexLevel works with the client to perform a detailed assessment of their current use of information systems and technology. This often includes evaluation of current IS Division practices against IT Best Practices. The resulting IT Assessment Report is structured to provide realistic and achievable recommendations for the client and the client’s IS organization to enable them to obtain greater value for their investment in information technology and/or realize improvements in the governance of information technology and the delivery of IS services.

A key work product from this phase is the development of a list of enterprise and departmental technology projects that is reviewed by District executives and IS management in a prioritization workshop facilitated by NexLevel to develop the schedule for the ISMP. The results of the strategic planning process and the prioritization workshop are documented within this plan.

- ◆ Deliver – During which NexLevel works with the client to take the results of the prioritization workshop to develop an Information Systems Master Plan.

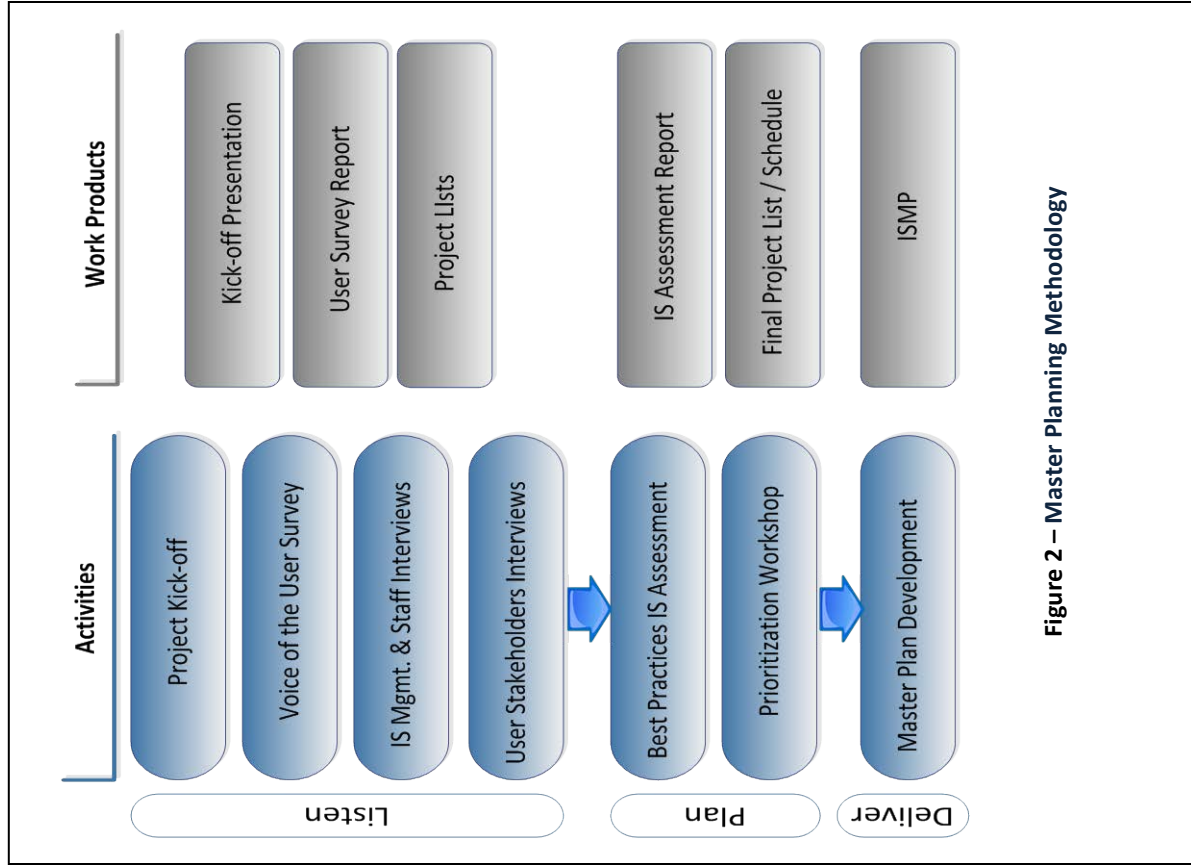


Figure 2 – Master Planning Methodology

2. Current Technology Environment

2.1 LVMWD Technology Assessment

As depicted in Figure 3, Components of a Technology Assessment, NexLevel evaluated LVMWD's present use of information technology through the utilization of several proven tools and methodologies including 1) an online survey of all users; 2) interviews with executives and key department users; 3) interviews with IS Division management and staff' and 4) a best practices assessment in which LVMWD's IS practices were compared to a set of peer best practices. The result of this analysis was a set of recommendations and identified actions for LVMWD to enable the District to improve the delivery of information technology services and to improve its return on investment (ROI) for its information

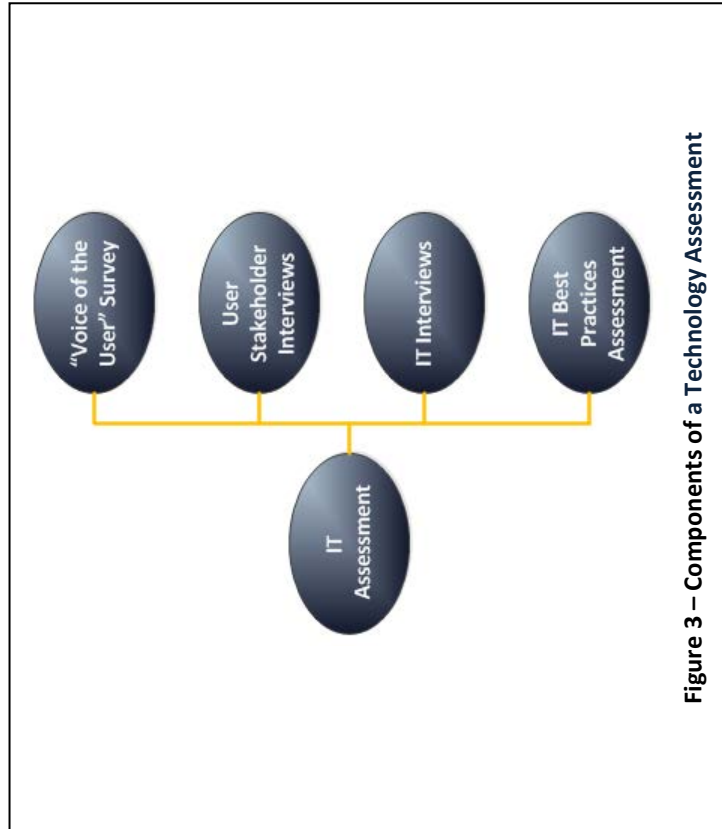


Figure 3 – Components of a Technology Assessment

technology expenditures. Each of these methodologies is briefly described below.

“Voice of the User” Survey

NexLevel utilized an online User Satisfaction Survey to gather information from District IS users regarding the use of technology in the performance of their assignments, potential barriers to full technology use, and their overall satisfaction with IS service delivery. The survey is composed of several types of questions including:

- ◆ Demographic questions that provide a profile for the respondents to the survey including their Department / Division and their role within it (Director, Manager/ Supervisor / Administrative / Support Staff / Operational / Field Staff / Other);
- ◆ Standard rated response questions that ask the user to provide a “rated” response of their satisfaction (Very Satisfied, Satisfied, Dissatisfied, or Very Dissatisfied) in a specific area. The responses to these questions are compared to the average percentage score for the same question for all surveys conducted by NexLevel for other public sector agencies, along with a “Best Practices Goal” which represents NexLevel’s collective experience with public sector agencies and indicates the range of user satisfaction that would be achieved by an effective IT organization;
- ◆ Open-Ended Questions, that permitted respondents to respond to survey questions in their own words.

The survey analysis generally looks for areas where there are opportunities for improvement, as ratings lower than “Satisfied” often point to areas where IT service delivery can be improved.

Of the 114 District employees sent the survey, 92 employees participated – an 81% response rate. In LVMWD’s case, the “Overall Service Delivery” user satisfaction was 69.9%, compared to the “best practices standard” of 85% average and a peer comparison average of 80.1%.

The District’s survey results are consistent with the feedback and findings obtained during the department interviews. The survey indicates that District staff in general are satisfied with IS Division support services, and that IS staff are able to meet the user’s general day to day requests. The survey results point to several opportunities for IS service delivery improvement in the areas of leadership, project management and additional departmental application support.

The user responses to some of the open-ended questions provide additional insight into user needs and expectations. For example, when asked, “If you answered that you are not satisfied with the speed and reliability of your computer and the programs that you use, what issues have you experienced?”, a sample of responses are included below:

- ◆ The opening of files, data transfer, etc. is too slow. It's frustrating having to wait such a long time for processes to open. I'm satisfied with network speed in HQ but it's not fast in the other facilities;
- ◆ Speed of programs is an issue. Lack of training on some programs. Better departmental application specific support is needed;
- ◆ Ability to use a tablet instead of a laptop. Be able to access GIS and SCADA from outside / field locations easily and update;

- ◆ The JD Edwards software is overly cumbersome, unfortunately time-consuming, and very paper driven currently.

User Stakeholder Interviews

NexLevel conducted a series of individual and small group interviews with approximately 33 LVMWD executives, managers, and departmental staff with the objectives of identifying:

- ◆ Barriers to the effective use of technology;
- ◆ Anticipated future needs and priorities;
- ◆ Areas where existing automation and or equipment is not meeting the Department’s needs;
- ◆ IS service delivery satisfaction;
- ◆ Current and planned projects that should be factored into the Information Systems Master Plan.

Enterprise Priorities

The following items were identified as high-level needs and priorities for LVMWD including:

- ◆ The IS Division is not staffed nor organized to support full service delivery and value for the use of technology. This causes frustration with users and forces departments to become the default subject matter experts in order to support department technology needs;
- ◆ The IS Division should implement organizational modifications, reassign responsibilities; and address 24x7x365 support requirements to ensure that expected service levels for the Division are being met;
- ◆ The District should complete a comprehensive assessment of its core business applications to identify opportunities for

enhancement, leverage, training needs and possible replacement;

- ◆ Many application systems are siloed and make District-wide integration of data difficult. Many components of the District's IT environment were implemented over time without a well-articulated vision or strategic plan for how the District utilizes information technology to support its business and operational goals. Future consideration as to how those components align with the District's long-term objectives and how they should work together to support the District's needs for reporting and decision making should be reviewed.

Common User Concerns

Common themes identified in the course of the interviews included:

- ◆ The users communicated that the JD Edwards financial system meets the basic needs but has not been enhanced or updated to leverage the system further for paperless processing and workflow, additional modules usage, easier reporting and more functionality for HR and Purchasing;
- ◆ Most staff maintains hard copies of departmental records as there is no central electronic repository. There is an overall need for electronic document management;
- ◆ The need for additional training specific to departmental applications was also frequently cited;
- ◆ Applications not meeting the departments needs include the Performance Evaluation System and the Novus Agenda Management System.

Common Technology Concerns

Common themes identified in the course of the interviews included:

- ◆ Mobility needs for field staff;
- ◆ Bring Your Own Device (BYOD) policy needed and replacement of flip phones;
- ◆ The absence of a comprehensive plan for disaster recovery and business continuity. It was noted that some critical servers are not configured for fault-tolerance and high-availability.

IS Division Interviews

NexLevel met with each member of the District's IS Division, along with the Division Manager. These interviews validated what NexLevel gathered from the District's technology customers – that the IS Division is dedicated to providing a high level of customer service and support to District staff. The IS Division interviews also identified concerns regarding staffing levels and span of responsibility for the numerous applications being supported at the District.

Common Concerns

Common themes identified in the course of the IS interviews included:

- ◆ Many of the core applications are supported by department Subject Matter Experts (SME), and additional training should be provided for IS staff required to support these applications;
- ◆ Each IS position receives calls directly for support and the future implementation of a commercial off the shelf help desk system will assist in management of support calls and provide statistics as to services provided;
- ◆ Ability to provide 24x7x365 support services.

IS Best Practices Assessment

Best Practices Conformance and Maturity Level Model

As part of the development of the IT Assessment Report, NexLevel conducted a standard assessment to determine the degree to which the District's IT processes and procedures conform to best practices. The benefits to improving the degree of compliance with best practices include:

- ◆ Greater ability / agility to meet increased user needs for support and to meet increased public expectations for access to information and services;
- ◆ Deriving greater value (in areas such as increased effectiveness in the delivery of services to the user community) for investments in technology - this is measured as a higher return on investment (ROI);
- ◆ Greater ability to sustain, if not further improve on, the level of IT service provided to the user community.

Caveat Regarding Best Practices

A word of caution about best practices is appropriate. An IS organization need not meet or exceed every best practice in order to provide excellent customer service; however, a higher degree of conformity with best practices generally enables an IS organization to sustain service delivery levels over time and to successfully cope with external and internal factors that have the potential to disrupt its ability to deliver services. The best practices are heavily weighted towards the development and use of formalized rather than ad-hoc procedures and supporting documentation since these provide the basis for sustaining and improving services and service levels. If we were to compare two comparable IS organizations, providing the same services and service levels, and with the same degree of user satisfaction, the organization that has more

formalized processes and documentation will have a higher degree of compliance.

Compliance with Best Practices

NexLevel uses a comprehensive list of best practices that are categorized into six separate dimensions to evaluate the organization's compliance with best practices. The six dimensions include:

- ◆ **Technology Governance** – Practices related to the leadership and reporting structure of the IT organization, degree of management overview, and the consistent tracking of the delivery of technology services.
- ◆ **Service Delivery** – Practices related to coordinating the processes involved in providing customer support including training, help desk, and service delivery management, and the establishment of service level agreements (SLAs) and tracking of conformance with them.
- ◆ **Business Technology Applications** – Practices related to the management and support of the application information systems supporting business operations.
- ◆ **Infrastructure** – Practices related to acquisition, utilization, and maintenance of the technology equipment, operating systems, support software, and communications network services that are used.
- ◆ **Security** – Practices related to the effective use of policies and standards, user conduct, software tools (filtering, monitoring, etc.), and audits to validate that material and software resources are used only for their intended purposes.
- ◆ **Administration** – Practices related to the management of technology in terms of budgets, maintenance agreements, software licenses, and the development and maintenance of current and accurate documentation.

Based on the IT Assessment interviews, NexLevel determined whether the District was in compliance with the best practice (yes), not in compliance (no), or if there were other factors involved that prevented a yes or no answer (other). The results were then mapped to an IS organizational maturity model.

The model is based on five levels of IT organization maturity:

- ◆ **Frontier**, 0 to 20% compliance with best practices. The level of compliance is typically found in newly established IT support organizations.
- ◆ **Reactive**, 21 to 50% compliance with best practices. IT organizations with this level of compliance typically have well established support organizations and processes, but find that they are increasingly focused on “fighting fires” rather than planning.
- ◆ **Proactive**, 51 to 80% compliance with best practices. IT organizations at this level of compliance have many of the attributes of reactive organizations but have a greater focus on planning and innovation. Most public sector IT organizations tend to drift across the boundary between the reactive and proactive levels across best practice dimensions, doing better in some than others.
- ◆ **Service**, 81 to 90% compliance with best practices. IT organizations at this level of compliance generally excel across all of the best practice dimensions and provide an optimum balance between total cost of ownership and return on investment.
- ◆ **Value**, greater than 90% compliance with best practices. IT organizations at this level of compliance are typically associated with private-sector organizations that use information technology as a competitive differentiator.

The results of the assessment are provided in Table 1, Compliance with Best Practices by Dimension. The assessment indicated that LVMWD, similar to many public-sector organizations, is more compliant in some dimensions than others, with four of the dimensions (Business Technology Applications, Security, Infrastructure and Administration) being assessed as having 53% to 79% or greater compliance with best practices, and two of the dimensions being assessed as being just below at 48% compliant with best practices.

<u>Assessment Dimensions</u>	<u>Ranking</u>
Technology Governance	48%
Service Delivery	48%
Business Technology Applications	62%
Security	53%
Infrastructure	79%
Administration	62%

Table 1 – Compliance with Best Practices by Dimension

These results were then taken into account along with the information developed through the interviews and the user survey to provide a holistic picture of LVMWD’s compliance with best practices as presented in Figure 4, District Compliance with Best Practices.

- where the IS Division are the principal parties involved in the delivery of the services;
- NexLevel has plotted the results of the assessment for each of the best practice dimensions within the rings (the black target points) and then connected them together to depict where LVMWD is from an overall perspective.

Current State of Maturity

The current state of maturity for the LVMWD IS Division considers the rankings for all of the Assessment Dimensions, and averages these rankings to determine the overall compliance with best practices.

Typically, NexLevel recommends that organizations seek to achieve at least 65% compliance with best practices. This recommendation is based on NexLevel’s experience that organizations with higher levels of best practice compliance realize higher returns on their investment in technology (ROI), are better able to sustain service delivery levels, and are better able to respond to new requirements and public expectations.

Overall, LVMWD’s compliance with best practices is 55%, and its current state of maturity is considered a minimally “Proactive” organization.

Maturity Level	% of Best Practice Compliance
Frontier	Less than 20% Compliance
Reactive	21% to 50% Compliance
Proactive	51% to 80% Compliance
Services	81% to 90% Compliance
Value	More than 91% Compliance

LVMWD Current State 55% Average

↑

Table 2 – Current State of Maturity

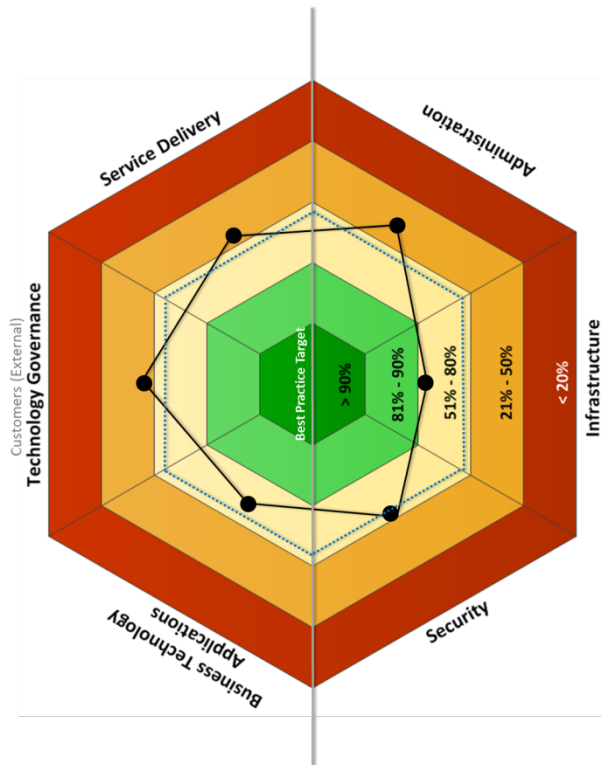


Figure 4 – District Compliance with Best Practices

In this diagram:

- Each of the rings represents a level in the best practice conformance model with the outer most (red) ring representing the Frontier level of organizational maturity (the lowest level of conformity with best practices) and the core of the diagram representing the Service and Value levels (the highest degree of conformity with best practices);
- NexLevel has segmented the hexagon into two halves. The upper half of the hexagon is composed of the best practice dimensions that involve participants other than LVMWD’s IS support groups, such as executive management and department subject matter experts; while the lower half of the hexagon is composed of the best practice categories

This result is based on an average of the dimension rankings shown in Table 1 – Compliance with Best Practices by Dimension for Technology Governance, Service Delivery, Business Technology Applications, Security, Infrastructure, and Administration. The District IS Division falls just above the Reactive Level.

The best practices are heavily weighted towards the development and use of formalized rather than ad-hoc procedures and supporting documentation since these provide the basis for sustaining and improving services and service levels.

The best practices assessment provides a benchmark of how well the IS Division present technology practices conform to best practices. The graphic presented in Figure 5 below provides an assessment of the gap between the District’s present conformance with best practices and a target level of conformance recommended by NexLevel.



Figure 5 – Progressive Growth in the Maturity of Processes and in the Capability of IT Organizations

General conclusions supported by this analysis include:

- ◆ LVMWD has done a good job, despite past budgetary constraints and staff resources, in attaining a reasonable degree of compliance with best practices and should be able to improve the degree of compliance with actions recommended within the IT Assessment;
- ◆ LVMWD is facing a number of challenges in its use of information technology (particularly with regard to core business applications and infrastructure) that will likely require additional investment in order to improve IT service delivery capabilities.

2.2 Consolidated Assessment Recommendations

The District performs effectively in many of the assessment dimensions. However, there are still opportunities for improvement, and because of ever changing technology and user needs, the District must continue to evolve technology management, services, and support activities to ensure a secure, reliable, and robust technology environment.

The recommendations developed in the course of the assessment identify challenges in the use of information technology and delivery of IS services, including:

Technology Governance

- ◆ Establish an Information Technology Advisory Committee (ITAC) that would meet quarterly and provide a forum for formal communications on IT endeavors and have a voice to oversee the District’s technology strategic direction.
- ◆ Restructure the IS Division by adding one full time position to the Division, reclassifying several current positions, and distributing responsibilities to more effectively deliver the expected services.

- ◆ Communicate known changes due to version upgrades and provide vendor conducted training on version enhancements as needed.
- ◆ Develop a formal cross training plan that addresses the single points of technology support at the District. (SCADA, AMMS, CIS, JD Edwards, etc.)
- ◆ Work with department SME's on core application training needs so that IT can adequately support when needs arise.
- ◆ Maintain an annual training budget for each IS Division staff member and identify specific training goals relative to job duties as part of staff performance goals. Suggested areas:
 - Virtualization Practices and Management
 - SCADA Operation Support / Administration Back-up
 - JD Edwards Support / Administration Back-up
 - AMMS Support / Administration Back-up
 - CIS Support / Administration Back-up
 - Microsoft Exchange Administration
- ◆ Proactively research District business technology provider webinars, local user groups and annual conferences and participate to stay current on supported technologies and available enhancements.
- ◆ Implement a more formal method to manage the IS Division's support requests and reporting of activities provided.
- ◆ Leverage the current Solarwinds investment to

- ◆ Invest in formal on-going training for the IS Division staff. IS resources should specifically focus their education to meet the needs of the District.
- ◆ Meet with departmental SME's and discuss departmental succession plans and coordinate on-going training from the application vendors as needed.
- ◆ Develop a service level agreement (SLA) to identify the responsibilities of the IS Division and the departmental supported applications. The SLA's should define the responsibility for application management and support, technical systems administration and hardware support.
- ◆ Consider the potential for outsourcing specific tasks that are currently completed by District IS staff (for example, deployment of desktop computer refreshment).
- ◆ Implement basic project management principles when involved in technology projects.
- ◆ IS Staff should keep the ITAC informed of IS involved technology projects.

Service Delivery

- ◆ Continue to communicate the opportunities for self-guided training offered and encourage participation by conducting department challenges.
- ◆ Regularly review the contacts made to District IS staff to identify the primary reasons for the calls and determine if additional training can reduce the call volume. (This is a manual process until an automated Help Desk system is implemented.)
- ◆ Annually reach out and survey the District user community to solicit training suggestions.

- ◆ additionally manage help desk requests.
- ◆ Follow up with users to ensure their satisfaction with the resolution of issues.
- ◆ Provide monthly activity reports of call tickets opened and closed for the month.
- ◆ Develop a service level policy to identify the District mission-critical technology that must be available 24/7/365 and may require IS support. The policy should define time commitments and escalation procedures.
- ◆ Work with the District Human Resources division to address after-hours employee requirements.
- ◆ Define the procedure for requesting after-hours support and identify the IS Division staff member(s) responsible for providing support.
- ◆ Publish and distribute to departments a monthly, after-hours schedule of IS Division support staff, and their contact information.
- ◆ Create an IS Division policy and service catalog with published service levels that can be used to manage user expectations. The service catalog should describe what the Help Desk supports and what the user can expect for the response. This would include describing the service levels in the maintenance agreements the District has with outside vendors and service providers.
- ◆ Obtain additional network management tools to assist with troubleshooting and data storage capacity management and error tracking, etc.
- ◆ Establish baseline metrics for servers including CPU utilization, memory and storage. Once established, the IS

ITEM 8A

- Division should evaluate the current environment against the baseline on a regular basis to identify issues or trends.
- ◆ Schedule regular IS Division service visits to District remote sites to proactively reach out to District staff.
 - ◆ Continue to use basic change management processes that ensure timely communication with users, effective planning and management of risks associated with changes being introduced.

Business Technology Applications

- ◆ Complete Core Business Application Assessments for JD Edwards, AMMS and the SCADA systems.
- ◆ Identify and implement a District Asset Management System.
- ◆ Focus on data consolidation and eliminate redundant capture of the same data multiple places, and further leverage current technology investments through interfaces.
- ◆ Identify and implement internal and external collaboration tools for large size, multi-participant projects.
- ◆ Procure and implement a formal electronic document management system.
- ◆ Continue with plans to replace the current performance evaluation system.
- ◆ Continue with the Kronos upgrade to address the java conflict issues and the additional needs identified by the District.
- ◆ Reevaluate the agenda management system (Novus) and

replace it if the District's needs are not able to be met with further configuration to the process and workflow.

Infrastructure

- ◆ Complete the SCADA Communications Network Project
 - ◆ Expand the wide area network to include all District facilities
 - ◆ Expand accessible Wi-Fi / Wireless to support future mobility needs and remote locations
 - ◆ Complete Building 7 & 8 network projects
 - ◆ Proactively monitoring Internet capacity in order to effectively plan for increased bandwidth when needed.
 - ◆ Engage the ITAC to review the current Communications and Usage Policy to address internet use.
 - ◆ Continue to support the Public Affairs operation in maintaining the District Intranet.
 - ◆ Continue to use the Virtual Private Network Acceptable Use Policy for granting remote network access through a properly enforced secure VPN
 - ◆ Ensure that requests for remote network access are directed to IS Division. When approved, the ITAC will be notified that remote access has been granted.
 - ◆ Routinely review the list of granted VPN access and validate if VPN account still being used or in-activate / remove account until confirmed.
 - ◆ Review current VPN RAS Server and client software to validate it meets security and remote access controls needed.
-
- ◆ Implement server virtualization technology when physical servers are due for replacement.
 - ◆ Schedule virtualization software training for IS staff and possibly contract services to support IS Division staff with the initial deployment.
 - ◆ Continue with planned SAN and server updates to replace old equipment and outdated server software on regular schedule.
 - ◆ Schedule routine administration for all District servers (IS and Non-IS supported) maintenance tasks.
 - ◆ Continue with the current technology hardware refreshment standard practices.
 - ◆ Contact users prior to completing refreshment of older equipment to validate their future requirement needs
 - ◆ Consider adding temporary labor to install new refreshment PC's as a project in order to complete the installations in a timely manner.
 - ◆ Maintain current Operating Systems and Microsoft Office versions.
 - ◆ Monitor the evolution of mobile computing devices (i.e. smartphones, tablets, etc.) and implement standards, training, and support as necessary to allow staff to leverage mobile technologies to improve day to day operations.
 - ◆ Establish a BYOD policy for mobile devices. Legal counsel should be sought in this process and include approval by the Information Technology Advisory Committee.
 - ◆ Evaluate the potential future mobile capabilities of the District's core business applications before launching

- ◆ Review and strengthen the process of distributing gate codes and look at ways to automate gate activity via a mobility app or cell phone.
- ◆ Implement data encryption on District hardware vulnerable to being stolen or lost to protect content from access by unauthorized individuals including mobile devices to prevent access to District information.
- ◆ Conduct periodic data recovery testing for core business applications managed internally and with third party recovery sites the District uses for back-up and redundancy.
- ◆ Regularly review who has local desktop administrative rights and enforce rules to limit local administrative rights.
- ◆ Continue to enforce a formal password policy designed to protect the organizational resources on the network by requiring strong passwords along with protection of these passwords, and establishing a minimum time between changes to passwords.
- ◆ Routinely test the ability to recover from all backup devices and third party disaster recovery vendors.
- ◆ Adopt a back-up / recovery policy to support the Business Continuity recommendations.
- ◆ Develop a Business Continuity Plan (BCP) to ensure adequate processes, procedures, and resources are available to support an orderly recovery of the District's technology and applications within a defined timeframe and in priority order necessary for restoring technology business applications, as deemed by the departments.
- ◆ Expand the current Disaster Recovery Plan (DRP) and schedule tests to ensure ability to support DRP of all

- mobile access projects.
- ◆ Assess the mobile computing needs for the following core businesses: AMMS (work orders), JD Edwards (approval processing), CIS (remote service completion such as disconnects), and GIS (as-builts, valve locations, etc.)
 - ◆ Encrypt laptop / mobile computers to prevent unauthorized access in the event the computer is stolen and further consider wipe technology.
 - ◆ Complete the data rack and cabling project upgrades as planned for in next fiscal year annual budget.
 - ◆ Evaluate and address the data center A/C issue to adequately prevent servers and other equipment from extreme heat vulnerabilities.
 - ◆ Address the data center overhead fire sprinklers to prevent potentially unrecoverable major problems from water damage if activated.

Security

- ◆ Conduct third party network penetration tests and address items that are identified to have a potential impact to the District.
- ◆ Verify procedures are in place to immediately notify the IS Division of employee separations in order that access to District network and telephone systems can be terminated. Also, verify the IS Division receives appropriate authorization to add new users to the network.
- ◆ Update the data center entrance access from key entry to a card / badge reader.

District servers and BCP.

- ◆ Assure that the DRP and BCP support the needs of the Emergency Operations Center (EOC).
- ◆ Designate permanent equipment to the EOC. At minimum an EOC crash cart should be established (laptop, printer, communication radio, charged cell phone, land line phone, etc.).
- ◆ Include GIS in the EOC to bolster the preparedness in case of emergency.
- ◆ Update the EOC Manual to reflect the Business Continuity requirements related to technology.
- ◆ Establish a policy for non-IS servers to complete mandatory updates and enforce with the responsible department to complete the necessary virus protection updates on department managed equipment.
- ◆ Continue to follow best practices for Virus and SPAM control by staying current on version releases.
- ◆ Investigate the implementation of a fully automated patch management system for deploying relevant patches, hotfixes, and security updates.
- ◆ Complete regularly scheduled server updates and patches. Follow best practice to test prior to applying to production servers.
- ◆ Routinely monitor the non-IS / department managed servers for current updates.
- ◆ Centralize log files to prevent overwriting.

Administration

- ◆ Migrate administrative duties when possible to support personnel in order to reduce the amount of time the IS Division Manager spends on routine, nontechnical functions.
- ◆ Continue the District's current refreshment (Desktop and Servers) practice and stay on schedule to replace old hardware.
- ◆ Centralize all technology expenditures to the IS Division. This will provide visibility of the District's total cost of technology. Opportunities may exist for reducing expenses through consolidation or discounts.
- ◆ As new IT projects are implemented, the necessary resources to support them internally or through 3rd party consultants should be identified and included in the total cost for implementation budgets and future support costs.
- ◆ Approval for projects identified in the Information Services Master Plan will require funding, and should be included in the IS Division budget.
- ◆ Continue to require all IT related purchases be made by the IS Division.
- ◆ Major technology procurements should be submitted to the IS Division Manager and then presented to the ITAC. This will ensure that standards and policies are met, and provide an avenue for communication on major IT projects.
- ◆ Review all maintenance agreements annually to confirm the agreements provide the appropriate level of service.
- ◆ Continue to maintain a centralized repository for all maintenance contracts within the IS Division. This method

allows for the consolidation of like vendors, acquisition of volume discounts, and having a single point of contact for all technology agreements within the District. This methodology also provides increased control over the total technology expenditure within the District.

- ◆ Generate a complete vendor contact list (inclusive of vendor summary information, vendor contacts, support numbers, department contacts, etc.) as part of the IS Division's IT documentation catalog.
- ◆ Review all maintenance and renewal costs and budget through the IS Division for a true cost of ownership of District technology expenditures.
- ◆ Maintain a complete inventory of all IT assets (software, hardware, infrastructure equipment, etc.) and manage the refreshment cycle.
- ◆ Leverage the current technology investment in Solarwinds by investigating its asset management module to automate the process of IT asset discovery, tracking, and reporting. If Solarwinds is not able to meet the Division IT asset inventory needs, other automated tools should be evaluated.
- ◆ Validate the current IS Division documentation list and identify what is missing to assure Division continuity of processes and procedures in the absence of key resources.
- ◆ Complete the creation of the documents identified as missing and establish and complete the content of the Division IT Documentation Catalog.
- ◆ Centralize the IT Documentation Catalog and all technical documentation for all aspects of the IS Division's day-to-day operations as identified above. Personal folders,

notes and instructions should be written in a consistent format and moved to a central repository.

- ◆ Assign on-going processes and procedures maintenance of the IT Documentation Catalog content to each IS Division staff member's job description and use as a measurable objective in the employee's annual performance review.
- ◆ Review the current documents and update:
 - SCADA Security (AP-6) or IT Security (AP-7) last revised June 29, 2004
 - WTS – Disaster Recovery Subscribers Guide last revised 2010
- ◆ Engage the Information Technology Advisory Committee in the review of all existing IT Policies to obtain input on potential gaps or shortcomings and identify what policies need to be added.
- ◆ Complete a joint review of current policies content and update.
- ◆ Complete the creation of newly identified policies.
- ◆ Distribute policies to District staff and consider requiring signatures to indicate that the policies have been reviewed and accepted during annual performance reviews.
- ◆ Set policy to complete post implementation evaluation reviews (PIER) three to six months after go-live of any technology related project. The review may identify needs for additional training, or support services to increase the value of the system and leverage the District's investment.

3. Project Prioritization and Scheduling

3.1 Introduction

NexLevel is committed to the concept that information technology needs, services provided, and priorities should be aligned with business needs and priorities. While there are a number of means to accomplishing this alignment, the most effective is to integrate business planning and technology planning within a common framework, and this is the basis for the project prioritization workshop where technology priorities are set by the organization's business stakeholders.

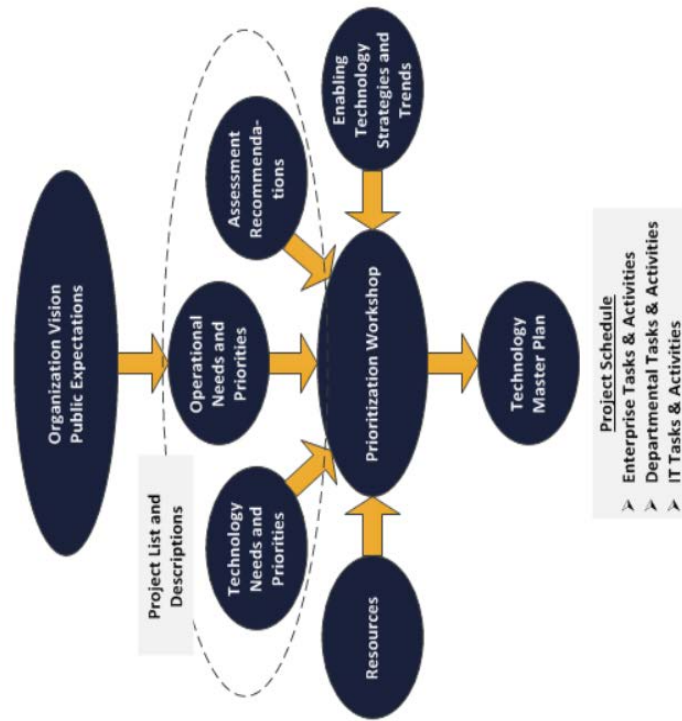


Figure 6 – Planning and Prioritization Process (Source: NexLevel)

Figure 6, Planning and Prioritization Process, depicts the methodology that was used in the development of the project schedule that is the core of the Information Systems Master Plan. As depicted in Figure 6, the contributions to the prioritization process included:

- ◆ The organization vision (business direction and priorities) and public expectations;
- ◆ The technology / operations needs and priorities that were identified by LVMWD's stakeholders and Assessment recommendations, resulting Projects in Section 3.2;
- ◆ Resources most commonly come to mind (staff resource availability is often a critical limiting component in planning technology projects); project funding, particularly the ability to provide stable funding for information technology over the course of the Information Systems Master Plan, is similarly critical;
- ◆ Enabling technology strategies and trends such as the integration of operational and technology planning, resource management, electronic document / content management, user-centric service delivery, and strategic sourcing, that can facilitate the achievement of LVMWD's priorities, are discussed in Section 3.3, Enabling Strategies.

The project schedule that was developed in the prioritization workshop is provided in Section 3.4, Project Prioritization Workshop. The project schedule was developed in an open and collaborative manner with LVMWD's stakeholders and identifies:

- ◆ Strategic enterprise and departmental projects: High-priority IT initiatives that were identified by District stakeholders and that benefit the operation of the District as a whole;

- ◆ IT tasks and activities: Initiatives based on the recommendations provided in the LVMWD IT Assessment Report that provide the foundation for the delivery of the services required to realize the enterprise and departmental tasks and activities.

3.2 Projects

The identified projects are described in the following two tables. In Table 3, Project List Costs and Level of Effort, provides summary information for each proposed project including:

- ◆ The project's name and the department owner;
- ◆ The status of the project (currently In Process or New);
- ◆ The relative level of effort (High, Medium, or Low);
- ◆ The estimated range of cost (Low to High) in \$000's;
- ◆ The departments that would be impacted by the project (i.e., the departments that would use the information contained in the system, either directly or through an interface or export).

In Table 4, Project List Descriptions and Benefits, each project listed in Table 3 has been described in more detail and includes:

- ◆ The project's name and the department owner;
- ◆ The status of the project (In Process or New order);
- ◆ A more detailed description of the project proposed;
- ◆ The project benefits.

Table 3 - Project List Costs and Level of Effort (Estimated range of cost (Low to High) in \$000's)

Project Title	Department Owner (Project Sponsor)	Level of Effort	Total Cost to Implement - Low Range	Total Cost to Implement - High Range	Impacted Departments
In Process Projects					
Automated Meter Reading ¹	CS	H	\$ 500	\$ 750	CS / IS / Finance
Budget Based Billing	CS / IS / Finance	H	\$ 75	\$ 100	CS / IS / Finance
Building 7 and 8 Technology Upgrades	IS	H	\$ 50	\$ 75	IS
Data Center Upgrades	IS	M	\$ 100	\$ 150	IS
SCADA System Communication Upgrades	Facilities / IS	H	\$ 1,400	\$ 1,450	IS / Operations
Tapia PLC Replacement	Facilities / IS	H	\$ 250	\$ 300	IS / Operations
Subtotal - In Process Projects			\$ 2,375	\$ 2,825	

New Projects					
AMMS PIER	Facilities / IS	M	\$ 75	\$ 100	Facilities / Finance
Agenda Management	Clerk of the Board	M	\$ 50	\$ 75	All Departments
Audio / Video Conferencing Project	IS / Clerk of the Board	M	\$ 10	\$ 25	All Departments
BYOD (Bring Your Own Device) Plan	IS	M	\$ 5	\$ 10	All Departments
Customer Information System Application PIER / Upgrade	CS / IS	M	\$ 75	\$ 100	Customer Service / IS

¹ This estimate reflects the IS portion of this project.

Customer Portal	CS / IS	M	\$	25	\$	50	Customer Service / IS
Project Title	Department Owner (Project Sponsor)	Level of Effort	Total Cost to Implement - Low Range	Total Cost to Implement - High Range	Impacted Departments		
New Projects (Continued)							
Dashboards	IS	H	\$ 50	\$ 75	Executives		
Disaster Recovery and Business Continuity Plans	IS	H	\$ 100	\$ 150	All Departments		
EOC - Dedicated Equipment Crash Cart	IS	L	\$ 10	\$ 25	IS		
Electronic Document Management System	Clerk of the Board	H	\$ 100	\$ 150	All Departments		
Energy Management	General Manager	M	\$ 50	\$ 75	All Departments		
Facility Access Control Evaluation	Facilities	M	\$ 25	\$ 50	All Departments		
GIS Roadmap	IS	M	\$ 50	\$ 75	All Departments		
Governance (Information Technology Advisory Committee)	IS	L	\$ -	\$ 5	All Departments		
Helpdesk Tracking System	IS	M	\$ 10	\$ 15	All Departments		
JD Edwards PIER / ERP Assessment	Finance	H	\$ 175	\$ 200	All Departments		
Mobility Plan / Wireless Coverage Project	IS	M	\$ 75	\$ 100	All Departments		
Network Security Assessment	IS	H	\$ 100	\$ 150	IS		
Performance Evaluation Software	HR / IS	M	\$ 10	\$ 15	All Departments		
SCADA PIER	Facilities / IS	H	\$ 150	\$ 200	IS / Operations / Facilities		
Subtotal - New Projects			\$ 1,145	\$ 1,645			
Total - In Process and New Projects			\$ 3,520	\$ 4,470			

Table 4 – Project List Descriptions and Benefits

LVMWD "In Process" Projects (Alpha Order)	
1 Automated Meter Reading Department Owner: CS Status: In Process	<p>Description: Automated meter reading (AMR) has advanced from collecting and reporting consumption to include advanced metering infrastructure (AMI). AMI measures consumption by time of day. While this timely information helps consumers control their consumption and identify possible leak detection, the amount of data collected is significantly increased compared to a bimonthly meter read. Benefits from an AMI investment should be extended throughout the organization to include billing, customer service, operations and maintenance, engineering and conservation benefits. AMI requires significant capital investment and operational changes. The first phase will require consultant services to identify how the District will move forward with AMR/AMI, with consideration of the capital costs, conversion, back-up meter reads methodology and public awareness.</p> <p>Benefits: Provides an increased and detailed consumption of information for customers and the District; potential increase in water conservation efforts.</p>
2 Budget Based Billing Department Owners: CS / Finance / IS Status: In Process	<p>Description: Water budget billing establishes a billing rate structure that provides each customer with a water budget designed to meet their indoor and outdoor water needs. Those who are efficient pay the lowest cost. Customers who are inefficient pay more, which gives them an incentive to help manage limited water resources. This project is to determine the technology and processes required to implement water budget billing to replace the current tiered rate structure. The project will also introduce a portal to provide customers with their account information on the District's web site.</p> <p>Benefits: Potential reduction in water consumption.</p>
3 Building 7 and 8 Upgrades Department Owner: IS Status: In Process	<p>Description: Complete backend network infrastructure updates to buildings 7 and 8 to support VOIP implementation.</p> <p>Benefits: Improves the District's IS infrastructure.</p>

LVMWD “In Process” Projects	
(Alpha Order)	
4	<p style="text-align: center;">Data Center Upgrades Department Owner: IS Status: In Process</p> <p>Description: Complete data center evaluation and identify options to be included in upgrade. Under consideration is additional protection of equipment, hardware and to address cabling management, air conditioning improvements, moving and reconfiguration of the equipment in self-contained seismic racks, address overhead sprinklers with other fire protection option, add secure, traceable entry to data center, and a redundant UPS (uninterruptible power supply) system.</p> <p>Benefits: Reduces potential points of failure in the data center and improves the District's technology infrastructure.</p>
5	<p style="text-align: center;">SCADA System Communication Upgrades Department Owner: Facilities / IS Status: In Process</p> <p>Description: This project is to complete the migration of the existing communication system from a serial radio network to an Ethernet based radio network.</p> <p>Benefits: Provides redundant data paths from uninterrupted communications.</p>
6	<p style="text-align: center;">Tapia PLC Replacement Department Owner: Facilities / IS Status: In Process</p> <p>Description: Programmable logic controller (PLC) replacements are needed for District facilities (Including Tapia Water Reclamation, lift stations, water system, etc.). The project will require a new control panel(s), testing and support for SCADA and PLC programming and a possible move from Modicom to Rockwell.</p> <p>Benefits: Improved reliability, maintainability and performance.</p>
LVMWD “New” Projects	
(Alpha Order)	
1	<p style="text-align: center;">AMMS PIER Department Owner: Facilities / IS Status: New</p> <p>Description: The AMMS system supports work orders, fleet management and inventory. Additional features are desired including mobile access for field staff, integration with the JD Edwards financial system, and an interface to the Kronos payroll timekeeping system. The post implementation evaluation review (PIER) would validate system usage and determine if additional features and functionality can be leveraged to receive a higher return on investment (ROI). The latest release offers a web-based / hosted solution for evaluation.</p> <p>Benefits: The PIER may identify opportunities to improve business processes, further automate transactions, identify opportunities for advanced training, and identify benefits through increased integration with other systems.</p>

(Alpha Order)

LVMWD “New” Projects

2	<p>Agenda Management Department Owner: Clerk of the Board Status: New</p>	<p>Description: Novus supports agenda creation with workflow routing for review and approvals. However, the workflow is problematic which results in disruption when the agenda is due for publication. Novus includes a minute’s module, but it is difficult to navigate and isn’t used. A reliable and user friendly solution is desired to support agenda management. Benefits: To provide a stable and simple agenda management solution that meets the District’s requirements.</p>
3	<p>Audio / Video Conferencing Project Department Owner: IS / Clerk of the Board Status: New</p>	<p>Description: This project is to evaluate the current board room video conferencing and audio visual system to identify the potential for upgrading the current equipment. Opportunities to connect the remote sites via video and audio should be reviewed. As an interim solution, the District could consider WebEx, GoToMeeting, etc. Benefits: Provide improved ability to conduct video meetings and conference calls.</p>
4	<p>BYOD (Bring Your Own Device) Plan Department Owner: IS Status: New</p>	<p>Description: This project is to implement a plan with adopted policies for District staff to use their own devices for District business. An important task is to develop a comprehensive policy to address all issues associated with utilizing a personal device for District business including security, after hours work, reimbursement for use, etc. and may require legal review. Benefits: Increased productivity due to employee familiarity with personal device; increased convenience by carrying only one mobile device.</p>
5	<p>Customer Information System Application PIER / Upgrade Department Owners: CS / IS Status: New</p>	<p>Description: This project is to complete a Post Implementation Evaluation Review (PIER) of the current Customer Information system (CIS) applications functionality and identify additional customer focused features for future implementation (i.e. e-billing, e-portals for monitoring, etc.). Following the PIER, plan and complete an upgrade of the Customer Information System. The upgrade, though department driven, will require assistance from IS staff. Benefits: Remaining current on the CIS system releases ensures on-going support under the maintenance agreement and provides the latest features and functionality of the Customer Information System.</p>

LVMWD “New” Projects

(Alpha Order)

6	<p>Customer Portal Department Owners: Executives / IS Status: New</p>	<p>Description: Expand the customer portal to provide customers with the ability to view their current and historic billing data online. The portal will be a phased presentation of data based on new budget based billing rates and data collection through enhanced capture of usage using AMI technology. Benefits: Provide easy to use customer portal for the public to monitor billing data and future real time usage activity.</p>
7	<p>Dashboards Department Owners: Executives / IS Status: New</p>	<p>Description: Implement management dashboards that provide key performance indicators and other operational metrics for the executive staff. During the AMMS and JD Edwards PIER projects, desired data analytics should be identified for future dashboard distribution. Key Performance Indicators (KPIs) could include current sales compared to historic data, budget comparisons, web site statistics, leak awareness, etc. Benefits: Provide easy to use tools for executives to monitor organizational activity at a high level with the ability to drill down when additional information is needed.</p>
8	<p>Disaster Recovery and Business Continuity Plans Department Owners: All / IS Status: New</p>	<p>Description: Create and implement an IT business continuity and disaster recovery plan. Review current third party redundancy sites and retain or identify alternative provider. This will ensure timely recovery of core applications in the event of an unplanned event or outage that is based on business and operational imperatives. Includes periodic updates / tests to validate success in the time of need. Benefits: Access to core systems in the event of a disaster is pivotal for District functionality and to maintain applications that support the safety of the public.</p>
9	<p>EOC - Crash Cart Department Owner: IS Status: New</p>	<p>Description: This project is to fund and purchase technology equipment necessary to establish a dedicated EOC (emergency operations center) crash cart. The crash cart should include a minimum number of permanent computers / laptops, printer, hot spot connectivity, telephones and equipment necessary to ensure the District staff has the ability to communicate electronically in the event that the EOC is activated in response to an unplanned event. Benefits: Ensures required technology is available at all times and does not rely solely on staff arriving with equipment.</p>

(Alpha Order)

LVMWD “New” Projects

<p>10</p>	<p>Electronic Document Management System <i>Department Owner: Clerk of the Board</i> <i>Status: New</i></p>	<p>Description: This project is to procure and implement an electronic document management (EDMS) system that provides a single repository for vital documents for the District. The initial implementation will include agendas, minutes, resolutions and ordinances that have already been digitized. In addition, the current Library Management application should be evaluated for inclusion to leverage the selected EDMS further. The District manually maintains the LVMWD Code documents and as part of the project determines if the EDM can be leveraged or a third party vendor used to manage the yearly code updates. Benefits: Ability to more easily locate and manage records and documents.</p>
<p>11</p>	<p>Energy Management <i>Department Owner: GM</i> <i>Status: Future</i></p>	<p>Description: This project is to identify ways the District can adopt energy conservation management practices to help strengthen the bottom line by implementing real and lasting conservation improvements that optimize energy usage and reduce power consumption. Benefits: Positions the District as a socially responsible organization by adopting conservation practices while reducing expenses.</p>
<p>12</p>	<p>Facility Access Control Evaluation <i>Department Owner: Facilities</i> <i>Status: New</i></p>	<p>Description: This project is to first evaluate the District's facilities and then standardize and implement a common centralized system for access. Desired features include the ability for staff to grant access to specific District facilities (i.e. yard, tank site) to a vendor through wireless controllers to avoid having to travel to the location. The system should record entry to and exit from District facilities. Benefits: Provide a safe, secure and documented access system and reduce staff travel time required to provide access to remote facilities.</p>

LVMWD "New" Projects	
(Alpha Order)	
13	<p style="text-align: center;">GIS Roadmap <i>Department Owner: IS</i> <i>Status: New</i></p> <p>Description: The GIS system provides District information geographically, i.e. fire flow, political boundaries, maps, fire hydrants, pipelines, as-builts, etc. GIS will support customer landscape information that is needed to support budget based billing. There are opportunities for integration with the CIS system, enhancements through web development, capturing underground equipment with latitude / longitude identification when maintenance is performed. This project will review and prioritize GIS development activity and will coincide with the CIS Upgrade Project. Benefits: Ensure the District obtains optimum benefits from GIS to support business requirements.</p>
14	<p style="text-align: center;">Governance (Information Technology Advisory Committee) <i>Department Owner: IS</i> <i>Status: New</i></p> <p>Description: Establish an Information Technology Advisory Committee (ITAC) that would meet regularly to provide a forum for formal communication on IS activity and oversee the District's strategic plan implementation. ITAC should include participation from executive leadership, department and user representation. Benefits: Provides the organization with established processes for the acquisition and implementation of technology. Improves communication about technology projects, provides for organization-wide input into technology decisions, and establishes the process for prioritization of technology needs for current and future technology objectives. Includes development of formal policies relating to technology (i.e. social media; BYOD, approval for web page changes, etc.)</p>
15	<p style="text-align: center;">Helpdesk Tracking System <i>Department Owner: IS</i> <i>Status: New</i></p> <p>Description: Implement a more formal method to manage the IS Division's support requests and reporting of activities provided. Leverage the current Solarwinds investment to additionally manage Help Desk requests, or procure a new solution. Benefits: Provides activity reports of call tickets opened and closed and assists in additional support activities.</p>

(Alpha Order)

LVMWD "New" Projects

16	<p>JD Edwards Post Implementation Evaluation Review (PIER) / ERP Assessment <i>Department Owner: Finance</i> <i>Status: New</i></p>	<p>Description: The JD Edwards system supports financial, payroll and human resources activities at the District. Desired enhancements include the ability to accept electronic invoices from vendors, electronic capture of paper documents, an employee portal for pay advice, the ability to track invoice approval status and complete financial processing via forms and electronic workflow. A post implementation evaluation review (PIER) would include a review of the District's use of the JD Edwards applications to help identify if and how the system can better meet all the District's requirements. Additional areas for review may Contract / Insurance Management, Bid Management, Fixed Assets, Budgeting, evaluation of the HR module to ensure alignment with current processes and Investment Management Software. Based on the outcome of the PIER, the District may elect to begin exploring replacement of the JD Edwards system or further leverage the system through ERP System Improvements, enhancements and or with additional modules.</p> <p>Benefits: Provides a tactical approach to evaluate the ability of the JD Edwards system and provide a roadmap for the future.</p>
17	<p>Mobility Plan / Wireless Coverage Project <i>Department Owner: IS</i> <i>Status: New</i></p>	<p>Description: This project will identify the mobility needs and budget for the software and hardware (laptop, iPad or other mobile devices) to support secure remote access to District applications, GIS, as-builts and email for staff that work in the field. Mobile access will require wireless connectivity District-wide and the project will include a full assessment of the current wireless network within the plants, facilities and field locations to identify wireless connectivity issues. The assessment should identify the best technology / hardware to use for mobile communication as remote access becomes a strategic focus for the District.</p> <p>Benefits: Increased efficiency in facilities; implementation / expansion of mobility projects for field workers. Provides efficiency and productivity to District staff; real-time completion of work in the field.</p>

(Alpha Order) LVMWD "New" Projects	
18	<p style="text-align: center;">Network Security Assessment <i>Department Owner: IS</i> <i>Status: New</i></p> <p>Description: This project will complete a comprehensive security assessment of the District's communication networks utilizing a qualified IT security consultant. At a minimum, the assessment should include network penetration testing, system accessibility and protections, existing infrastructure configuration, physical security, and data backup and storage protocol. The assessment would provide a comprehensive report of findings and recommendations and should be followed by remediation of any identified security issues. Benefits: Improved security of District data and network environment.</p>
19	<p style="text-align: center;">Performance Evaluation Software <i>Department Owner: HR / IS</i> <i>Status: New</i></p> <p>Description: The District's employee performance evaluation software is at end-of-life and is no longer supported by the vendor. This project will identify a new solution to support employee performance appraisals. The implementation will require an assessment of the current appraisal processes, templates, procedures and what future requirements are necessary to meet the District needs. Benefits: Vendor supported performance appraisal system.</p>
20	<p style="text-align: center;">SCADA PIER <i>Department Owner: IS</i> <i>Status: New</i></p> <p>Description: This project is to conduct a SCADA PIER (Post Implementation Review Evaluation) and prepare a future SCADA Master Plan that focuses on maintaining a current and stable SCADA environment. The assessment should look at the future network infrastructure requirements, software solution and versioning, physical hardware replacement, system configuration, hand held devices, physical and system security, big data analytics, and additional remote access requirements in the future. Benefits: This plan will address the long-term support and leveraging of the SCADA system to provide enhanced ability to manage facility operations and capture data for reporting.</p>

investment in technology and in ensuring that the organization has a sustainable funding model for information technology.

One of the paradigm shifts related to the adoption of higher levels of governance is related to viewing technology costs in terms of programs (i.e., looking at all costs related to the use of a technology including initial capital / acquisition costs, support costs, enhancement costs and replacement costs) over its lifespan rather than in terms of individual projects. The development and maintenance of program costs for technology is a key component in the development of sustainable funding plans.

➔ **Electronic Document / Content Management**

Electronic Document / Content Management Systems are enabling technologies that make workers more effective by reducing their need to perform non-value added document-related tasks and minimizing their dependence on paper documents. For LVMWD, a comprehensive approach to document and content management can provide significant benefits.

➔ **Organizational Change Management**

Increasingly, organizations find that organizational change management (OCM) is a critical component in obtaining long-term benefits from projects intended to improve operations and in minimizing their impact on operations. OCM provides a methodological framework for managing the effects of the implementation of new business processes, changes in organizational structure, or changes in culture (including changes in focus and change in performance metrics).

Although OCM has its roots in the private sector, it has become more visible in the public sector where senior executives have fewer tools (such as bonuses and other incentives) to get line managers and staff to buy into change and remain committed to the change

3.3 Enabling Strategies

During the development, execution, and maintenance of the Information Systems Master Plan, organizations should consider industry trends and enabling strategies. These strategies should be at the forefront throughout the planning process, as they can serve to enable the District to continually improve its ability to deliver IS services more effectively and get more value (i.e., quality and productivity) from existing staff resources and external service providers. Enabling strategies include the following:

➔ **Integration of Operational and Technology Planning**

Planning documents often speak to the need to align technology plans and directions with business or operational needs and priorities – generally this implies a two-step process in which operational plans are developed and then technology plans are crafted to support them. NexLevel believes that this process is not as effective as it could be since the transformative impact of technology should be considered in the course of developing business plans, not afterwards. Industry best practices and research confirm that organizations that integrate business and technology planning in a common framework achieve better results than those that do not.

➔ **Resource Management**

The governance of the use of technology has multiple levels. At the simplest level, governance is generally concerned with promoting the coordination of information technology priorities, directions, and objectives across the organization to prevent silo projects that are undertaken without full consideration of organization-wide processes or existing investments. At more complex levels, governance becomes concerned with the long-term allocation of IS Division and departmental resources (budget, staff resources, and technology resources) to obtain higher returns on the organization's

despite any challenges / obstacles that may be experienced during the implementation process. OCM places a focus on improving communication, setting expectations, and working to minimize the impact of misinformation. This has proven to be particularly critical in dealing with represented classes of employees. The implementation of effective OCM capabilities is a critical factor in enabling organizations to maximize the value that they receive from the implementation of enterprise systems.

➤ **Project Management**

Consistent with the recommendations identified in the assessment, NexLevel believes that following proven project methodology processes will provide significant benefits to the District. Particularly with regard to initiating IS related projects requiring resources, hardware, support services, maintenance, implementation, etc. Maintaining the Master Plan Project Schedule (provided in Figure 7 - LVMWD Project Estimated Schedule), and tracking progress for the technology governance committee will require an adopted methodology.

➤ **Mobile Computing and the “Consumerization” of IS**

Collectively, these trends represent a significant opportunity to improve the effectiveness and timeliness of service to the public; however, they are also vexing for enterprise IT planners since users need access to enterprise information and services from portable devices that are subject to loss and damage using public networks that are not secure, and they are increasingly doing so with devices of their own choosing, adding complexity (and thus cost) to the process of mobile device management and potentially exposing the enterprise to cyber-attacks.

Nonetheless, mobile computing is a “game changer” in the public sector, enabling information to be entered or updated on a real time basis and eliminating the need to capture information on paper or offline and then enter or upload the information in the office, and providing real-time information when it is most needed (i.e., in responding to incidents and emergencies).

3.4 Project Prioritization Workshop

As a part of NexLevel’s IT strategic planning methodology, we utilize a workshop setting to facilitate the prioritization of the various IT related projects identified during the user interviews and through the user survey tool. The Project Prioritization Workshop provides an opportunity for District executives to review proposed projects and determine the order of priority in which they should be implemented.

The District’s Prioritization Workshop was conducted on March 31, 2015. District participants included the entire LVMWD Executive Team, along with the IS Division Manager; (David Pedersen - General Manager, Carlos Reyes - Director of Resource Conservation & Public Outreach, David Lippman - Director of Facilities and Operations, Donald Patterson - Director of Finance and Administration, and Harold Matthews - Information Systems Manager).

The agenda included:

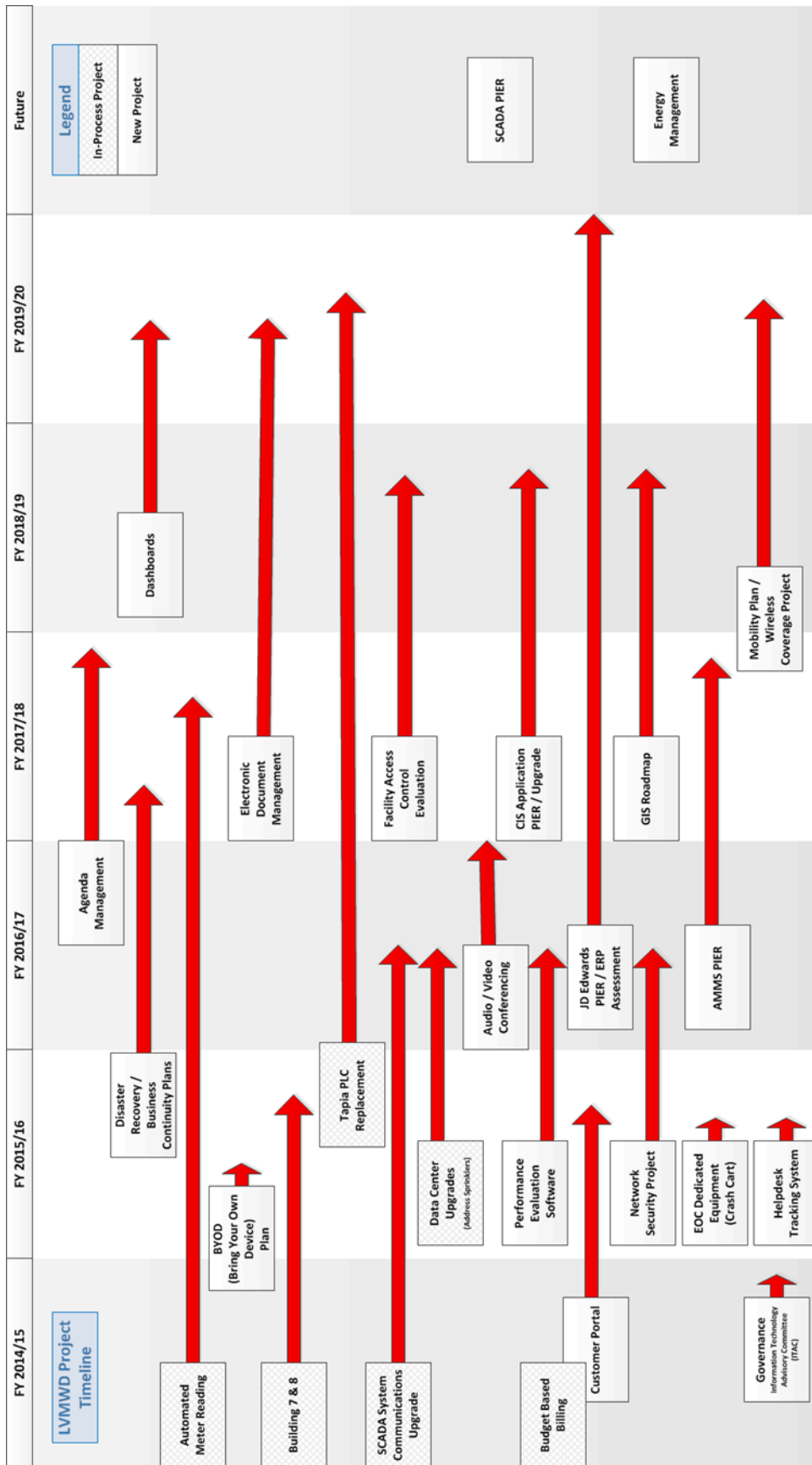
- ◆ Briefing the participants on the methodology to be used and the “ground rules” for the workshop including:
 - That the participants were all working from a common framework;
 - That each participant would have the opportunity to voice their opinions, and that the group will openly consider each other’s concerns and suggestions;

- That the participants would actively support the group's decisions as the best possible at this time;
- That the participants were prepared and committed to working together.
- ◆ Reviewing and prioritizing the projects identified in the project list (Table 3) and any new projects identified in the course of the workshop;
- ◆ The prioritization process is guided by a number of key factors including: need / business value, dependencies on other projects, and the availability of the resources needed to complete the project;
- ◆ Establishing the high-level timeline that is the basis for the Information Systems Master Plan Roadmap, using NexLevel's "Blue Wall" methodology which facilitates the collaborative development of the project timeline on a project by project basis;
- ◆ Reviewing the next steps.

Figure 7 - LVMWD Project Prioritization Following Workshop depicts the results of the collective efforts of the stakeholders participating in the workshop. As shown, projects were plotted by the participants along a timeline that began in FY 2014/2015 and continued through FY 2019/2020.

The projects estimated timeline to complete is indicated by an associated arrow. The timelines for each project's should be evaluated annually. Projects that could not be placed in a timeframe by the participants were scheduled for "Future."

Figure 7 - LVMWD Project Prioritization Following Workshop



4. Conclusion

In closing, the results of the IT Assessment demonstrate that the IS Division management and staff are dedicated, have the best interests of the District at heart and strive to provide quality technical support services. The District core technology foundation is strong and serves the staff and public well on a day to day basis. Departments are supportive, and are interested in working with the IS Division to further enhance their future technology requirements. NexLevel would like to emphasize several areas that have emerged in the course of developing the Information Systems Master Plan for LVMWD.

The first area concerns technology governance. Information Systems Master Plans are often likened to roadmaps in that they chart the optimal route for an organization from where they are today (“the current state”) to where they need to be (“the target state”); however, there are other similarities as well. Just like any trip, the destination may change as may the interim stops along the way, and as anyone who has travelled with family knows, there are often those who question, “Do we really have to go?”, “Are we there yet?” and “Can we get there faster?”

These questions are all too familiar to organizations that are working to transition their technology environments to an enhanced state, and underscore the critical role that technology governance, coupled with well-defined and measurable objectives, plays in the transformation of technology environments.

Governance needs to play a larger role as the Information Systems Master Plan progresses and this is why having a strong commitment to the continuing governance of technology is so critical to success. Just as in any trip, priorities may change and obstacles may be encountered, and technology governance is needed to make informed decisions as to how best to allocate resources and to overcome obstacles. Critics often complain that technology

governance stifles organizational agility; however, the reality is that the opposite is true: it enables organizational agility by allowing organizations to allocate their technology resources to the most critical projects and to keep technology objectives aligned with district business objectives and priorities.

Governance is the key factor that transforms an Information Systems Master Plan from being “shelf ware” to a tool to drive organizational effectiveness. The ISMP recommends for the establishment of a technology governance structure. NexLevel recommends that the District establish an Information Technology Advisory Committee and remain committed to technology governance.

The second thought relates to the nature of information technology and the establishment of the foundation for the effective use of the LVMWD core business applications implemented by the District.

Figure 8, Technology Expenditures and Return on Investment, depicts the relationships between the components of an organization’s information technology infrastructure, the organizations cumulative total cost of ownership (TCO) for information technology and its return on investment (ROI) for those expenditures.

Lastly, effective leverage and organization of the IS Division's technology resources is critical to the successful implementation of the Information Systems Master Plan. As noted in the IT Assessment, the IS Division lacks adequate resources to provide the level of services expected by the organization. Numerous technology applications are in use within the District departments that support core business activities. The IS Division must be able to support all technology in use, including application end users and system administration, and this is not a realistic expectation with the current level of resources allocated to the IS Division.

While the IS Division personnel have an overall disposition to provide a high level of service to the District staff they support, limited resources present challenges in meeting all the demands. The current IS Division staffing provides primarily reactive service delivery to District customers, providing little or no capacity for technology planning, documentation, future visioning, or active collaboration with District executives and users in advance of technology needs. Completing the recommended reorganization of the IS Division positions and adding an additional resource will assure the District is able to properly meet the goal and objectives of the ISMP.

The District's technology structure, including the size of the network, number and complexity of applications, and sophistication of its users, has grown significantly. NexLevel's observation is that both IS and District management has made significant efforts to maintain and improve the District's technology structure. While the creation of the ISMP represents the first step, we believe that implementation of the recommendations contained in this Information Systems Master Plan will help the District improve service delivery to its internal customers and the public, along with potentially achieving operational efficiencies and associated cost savings.

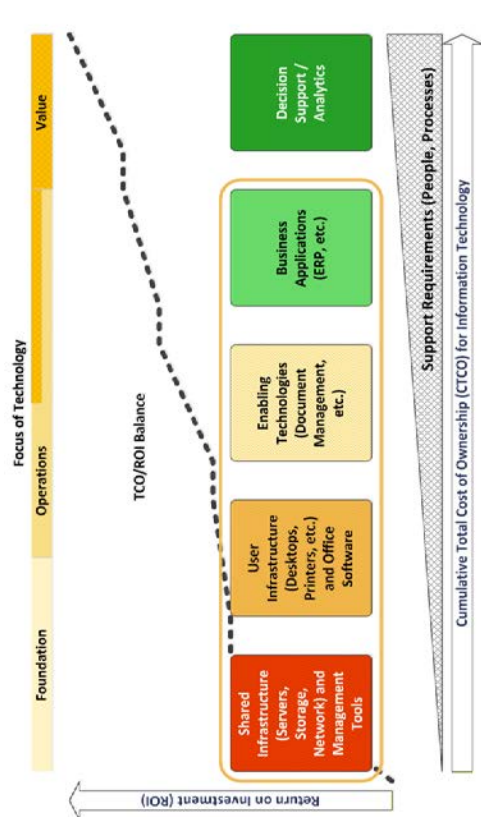


Figure 8 – Technology Expenditures and Return on Investment

The implementation of any enterprise software suite (and the ability for an organization to realize its benefits) is dependent on the successful implementation and support of all of the supporting components of the information technology infrastructure including the shared infrastructure (servers, storage devices, etc.), user infrastructure (desktops, etc.), and enabling technologies.

Weaknesses in any of these supporting components can significantly impede the effectiveness of a business application (such as an ERP software suite) by reducing availability, performance, and reliability. Not fully implementing a product's modules may cause users to resort to the use of ad-hoc databases and spreadsheets. These "shadow IT" applications defeat the basic reasons for implementing an integrated business suite in the first place and further reduce the organization's ROI while introducing significant security and data consistency issues. It is very important for LVMWD to look at its technology environment in a holistic manner and ensure that the foundation core business applications remain solid.

5. Appendices

Appendix A – Interview List

# Sessions Completed	Participants	Totals
1	Finance: Joseph Lillio – Finance Manager Mike Hamilton – Financial Analyst Jennifer Chen – Senior Accountant Gretchen Bullock - Buyer	4
2	Facilities Maintenance: Darrell Johnson – Facilities Maint. Supervisor	1
3	Communications and Conservations: Jeff Reinhardt – Public Affairs / Comm. Manager	1
4	HR & Finance Admin: Sherri Panalgua – HR Manager Mary Northrop - Secretary	2
5	Engineering: Eric Maple – Associate Engineer Eric Schlageter – Associate Engineer	2
6	Resource Conservation & Public Outreach: Carlos Reyes - Director	1
7	Facilities & Operations: David Lippman - Director	1
8	Reclamation & Lab: Ed Cuaresma – Chief Water Reclamation Plant Ops. Wayne Wink – Plant Operator Robert Robins – Compost Operations Supervisor Brad Glassman – Lab Supervisor	4
9	Facilities & Operations: Doug Anders – Admin Services Coordinator	1
10	Water Production & Treatment: Ken Reed – Water Production & Treatment Supervisor	1

# Sessions Completed	Participants	Totals
11	Water Systems & Facilities: Larry Miller – Water System/Facilities Manager	1
12	Engineering: John Zhao – Principal Engineer	1
13	Reclamation: Brett Dingman – Water Reclamation Manager	1
14	Electrical & Instrumentation: Jim Korkosz - Electrical & Instrumentation Supervisor	1
15	Finance and Administration: Don Patterson - Director	1
16	General Manager David Pedersen – GM	1
17	IS - Manager Harold Matthews – IS Manager	1
18	IS – GIS Gary Fields – GIS Technician	1
19	IS – Computer Support Dawn Calvin – Computer Support Specialist	1
20	IS – Analyst Andrew Spear – Systems Analyst	1
21	IS – SCADA Mike McIntyre – SCADA System Specialist	1
22	Customer Service (CS): Carol Palma - Customer Service Manager Dion Agnew – CS Operations Supervisor Gary Weston – CS Programs Supervisor	3
23	Executive Office: Daryl Betancur – Executive Assist. & Clerk of the Board	1
23 Sessions		33 Total Participants



June 9, 2015 LVMWD Regular Board Meeting

TO: Board of Directors

FROM: Finance & Administration

Subject: Update of Las Virgenes Municipal Water District Code: Session No. 8

SUMMARY:

Over the past year, the Board held seven sessions to review and modernize the Las Virgenes Municipal Water District Code (Code). The primary purpose of the extensive review was to modernize the language, address any inconsistencies and ensure that the provisions continue to meet the needs of the District. During the course of the review process, staff and the Board identified seven issues that warranted additional discussion and review prior to considering adoption of an updated version of the Code. This item provides an opportunity for a more thorough discussion of those seven issues.

RECOMMENDATION(S):

Consider seven policy issues identified during the course of the review process for the Las Virgenes Municipal Water District Code and provide staff with feedback.

FISCAL IMPACT:

No

ITEM BUDGETED:

No

FINANCIAL IMPACT:

There is no financial impact associated with this item.

DISCUSSION:

Following is a summary of the seven policy issues that were identified during the course of the review process for the Las Virgenes Municipal Water District Code. Staff has provided additional information on each issue along with a recommendation. Attached is a red-lined version of the applicable Code sections reflecting the proposed revisions.

1. Campaign Contribution Limits (Section 2.201) – On June 24, 2014, staff proposed that the Code update incorporate provisions adopted by the Board for reporting campaign contributions pursuant to Resolution No. 4-90-2041. The Resolution was adopted in 1990 and required reporting of campaign contributions of \$50 or more to the County. However, staff recently learned that the County rejected reports from directors that reflected contribution amounts of less than \$100, which is the current statutory threshold for reporting. As a result, staff proposes that the Board consider repealing Resolution No. 4-90-2041 and report campaign contributions based on the applicable statutory threshold, currently \$100, for consistency purposes. As such, no language would be required in the Code pertaining to reporting of campaign contributions.

2. Expenses for Directors-elect Attending Events and Discouragement of Outgoing Directors from Attending Events (Section 2.206) – On June 24, 2014, some members of the Board expressed a desire to explicitly

provide for newly-elected directors to attend events at the District's expense when the events would facilitate their knowledge of the District's functions. Additionally, there was an interest in potentially prohibiting directors who were not re-elected from incurring additional District expenses for such events. The following proposed change to Section 2.206 would implement this policy:

(d) Directors, other than directors who have not been reelected to office, and including directors-elect, may attend general meetings and educational seminars conducted by Association of California Water Agencies (ACWA), the California Association of Sanitation Agencies (CASA), Public Officials for Water and Environmental Reform (POWER) and the Association of Water Agencies of Ventura County (AWA).

3. Use of Personal Communications Devices by Directors during Board Meetings (Section 2.211) – Also on June 24, 2014, during discussions related to the Board's Code of Conduct, several Board Members expressed a potential concern with the use of personal communication devices by directors during meetings with respect to compliance with the Ralph M. Brown Act. In response to this concern, the following new Code section is proposed:

(e) Directors shall not use electronic devices to communicate with other directors or the audience during board meetings.

4. Dollar Limit Threshold for Purchases (Section 2-4.406) – During the Board's review of Section 2-5.403 on March 10, 2015, District Legal Counsel proposed increasing the formal bid limit for works of improvement to \$35,000 to match current State law. Staff proposes to extend this increased limit to goods and services, not just works of improvement, for consistency purposes. The District has historically maintained identical limits for works of improvement and goods and services; continuing to do so provides consistent limits that are transparent, easy to understand and simple to manage. To accomplish this change, staff proposes to modify Section 2-5-406 (b) and (c) to reflect \$35,000 in place of \$25,000.

5. Treasurer's Bond (Section 2-5.301) – During review of the Code, a question arose as to the need and purpose of the required \$50,000 Treasurer's Bond. A Treasurer's Bond helps to ensure the public that an elected official will honestly and faithfully fulfill his obligations and provides additional protection to the District for theft and malfeasance. The face value of the bond matches the current self-insured retention for the District's insurance coverage. As written, the Code provides for the bond premium to be paid by the District. Staff recommends retaining the existing language and policy unchanged.

6. General Manager Authority to Settle Claims (Section 2-6.310) – On March 10, 2015, during discussions related to the settlement of claims, there was discussion related to the appropriate level of delegated authority for the General Manager to settle claims. The discussion revolved around providing the General Manager with sufficient authority to settle claims that would be heard in small claims court. As such, the settlement authority of the General Manager as specified in Section 2-6.310 would be increased from the current \$2,500 to \$10,000, which is the maximum amount of claim that can be heard in small claims court.

7. Public Agency Exemption for Capacity Fees (Section 3-2.206(e)) – The District's current Code includes an exemption for government agencies from payment of capacity fees when the fees are for connection of a tax-exempt parcel. On September 9, 2015, the Board discussed whether the exemption should be maintained for all public agencies. At the time, there did not appear to be consensus on how the item should be handled. District Legal Counsel noted that the provision was originally adopted in response to the San Marcos Decision, which dealt with an exemption for specified educational facilities. Staff considered the possibility of narrowing the exemption to strictly match that called for as a result of the San Marcos Decision. However, after careful consideration, staff recommends that the Board maintain the current policy unchanged to prevent negatively impacting local governmental agencies.

Next Step

Staff plans to present to the Board a complete draft of the updated Code for adoption on June 23, 2015.

GOALS:

Ensure Effective Utilization of the Public's Assets and Money

Prepared By: Donald Patterson, Director of Finance and Administration

ATTACHMENTS:

[Updated Code Sections - Proposed](#)

LV ADMINISTRATIVE CODE UPDATES PER 4/21/15 MEETING

Section numbers are from new code.

2.206 COMPENSATION

(a) Each Director shall be paid \$200.00 for each day's attendance ("per diem compensation") at meetings of the Board, and for each day's service rendered as director by request of the Board, not exceeding a total of ten (10) days in any calendar month. A Director shall be compensated for no more than one authorized meeting per day even if more than one meeting is attended in one day.

(b) Each representative of the District on the Board of Directors of the Metropolitan Water District of Southern California shall be paid \$200.00 for each day's attendance at meetings of the Board of Directors of the Metropolitan Water District of Southern California or committees thereof, and for each day's service rendered as director, not exceeding a total of ten (10) additional days in any calendar month. The representative shall be compensated for no more than one meeting per day even if more than one meeting is attended in one day.

(c) On the first Board meeting in January of each year, compensation to each Director and each representative of the District on the Metropolitan Water District of Southern California Board of Directors may be increased prospectively up to a maximum of five percent (5%), upon approval by the Board each calendar year following the operative date of the last adjustment.

(d) Directors, other than directors who have not been reelected to office, and including directors-elect, may attend general meetings and educational seminars conducted by Association of California Water Agencies (ACWA), the California Association of Sanitation Agencies (CASA), Public Officials for Water and Environmental Reform (POWER) and the Association of Water Agencies of Ventura County (AWA). Directors are also authorized to attend various other meetings and committee meetings if appointed to serve by the board as the board's delegate/committee member. Directors may request, verbally or in writing, the board to authorize attendance at meetings and seminars conducted by other organizations on subjects related to district operations. At least annually, the board shall determine the meetings for which directors shall be

compensated.

(e) Directors shall submit claims for meeting compensation. The Secretary of the Board shall authorize payment for meetings and service and shall report such payments at a regular meeting following the month of submittal at which time the Board may ratify or disapprove payment of the claim(s).

(f) Directors shall be entitled to per diem compensation for actual travel associated with authorized meetings or educational seminars as follows:

(1) For travel outside California, up to one day prior to the start of the event and one day following conclusion of the event;

(2) For travel in California but outside Los Angeles, Orange and Ventura Counties, up to one day prior to the start of the event or one day following conclusion of the event; or

(3) For travel in Los Angeles, Orange and Ventura Counties, per diem compensation is not normally provided for travel except under extenuating circumstances as approved by the Board.

2.211 RULES OF CONDUCT

(a) The affirmative vote of at least three Directors is necessary for the Board to take action. The Board shall take action by motion, resolution or ordinance. The vote, including abstentions, shall be recorded in the minutes.

(b) Except as otherwise required by law, and unless waived, proceedings of the Board shall be conducted in accordance with the latest edition of Robert's Rules of Order. Advisory bodies shall adopt rules of order appropriate to their work.

(c) If a group or groups of persons willfully interrupts the meeting so as to make orderly conduct unfeasible and order cannot be restored by the removal of individuals who are interrupting the meeting, the Board may order the meeting room cleared and continue in closed session. The Board may establish a procedure for readmitting individuals not responsible for willfully disturbing the orderly conduct of the meeting.

(d) The Board shall not prohibit public criticism of the policies, procedures,

programs or services of the District or of the acts or decisions of the Board. However, no privilege or protection is conferred for expression beyond that otherwise provided by law.

(e) Directors shall not use electronic devices to communicate with other directors or the audience during board meetings.

2-5.405 PROFESSIONAL SERVICES

(a) The District shall procure professional services, such as legal, medical, engineering, architectural, financial, human resources, labor relations, and educational, in accordance with the procedures recommended by the ethics of the discipline involved.

(b) If the professional service is estimated to cost less than ~~\$25,000~~35,000, and it is included in the current year budget, the General Manager may enter into contracts with qualified professionals without prior Board approval.

(c) If the professional service is estimated to cost ~~\$25,000~~35,000 or more, or it is not included in the current year budget, the General Manager may request proposals from qualified professionals only with prior Board approval.

2-5.406 GOODS AND SERVICES

(a) The District shall procure goods and services, other than works of improvement and professional services, as mentioned above, pursuant to this section.

(b) Goods and services included in the current year budget and estimated to cost less than ~~\$25,000~~35,000, shall be purchased without further board action following informal bidding procedures.

(c) Goods and services included in the current year budget and estimated to cost ~~\$25,000~~35,000 or more shall be purchased by the formal bidding process. The General Manager may solicit formal bids for these items only with prior board approval.

2-6.310 CLAIMS UNDER \$~~2500~~10,000

The General Manager may allow compromise or settle a claim against the district if the amount to be paid pursuant to such allowance, compromise or settlement does not exceed \$~~2500~~10,000. The General Manager shall advise the Board when there has been allowance, settlement or compromise on such claim.



THE METROPOLITAN WATER DISTRICT
OF SOUTHERN CALIFORNIA

MWD MEETING AGENDA

Regular Board Meeting

June 9, 2015

12:00 p.m. – Board Room

Tuesday, June 9, 2015 Meeting Schedule		
7:00-8:00 a.m.	Rm. 2-413	Dirs. Computer Training
9:00 a.m.	Rm. 2-145	L&C
10:30 a.m.	Rm. 2-456	OP&T
12:00 p.m.	Board Room	Board Meeting

MWD Headquarters Building • 700 N. Alameda Street • Los Angeles, CA 90012

1. Call to Order

- (a) Invocation
- (b) Pledge of Allegiance: Vice Chair Gloria Gray

2. Roll Call

3. Determination of a Quorum

4. Opportunity for members of the public to address the Board on matters within the Board's jurisdiction. (As required by Gov. Code § 54954.3(a))

5. OTHER MATTERS

- A. Approval of the Minutes of the Meeting for May 12, 2015. (A copy has been mailed to each Director)
Any additions, corrections, or omissions
- B. Report on Directors' events attended at Metropolitan expense for month of May

- C. Induction of new Director Stephen J. Faessel, from City of Anaheim
 - (a) Receive credentials
 - (b) Report on credentials by General Counsel
 - (c) File credentials
 - (d) Administer Oath of Office
 - (e) File Oath
- D. Approve preparation of a Commendatory Resolution for former Director Thomas Evans
- E. Approve committee assignments
- F. Chairman's Monthly Activity Report

6. DEPARTMENT HEADS' REPORTS

- A. General Manager's summary of Metropolitan's activities for the month of May
- B. General Counsel's summary of Legal Department activities for the month of May
- C. General Auditor's summary of activities for the month of May
- D. Ethics Officer's summary of activities for the month of May

7. CONSENT CALENDAR ITEMS — ACTION

- 7-1** Approve up to \$1.168 million to purchase insurance coverage for Metropolitan's Property & Casualty Insurance Program. (F&I)

Recommendation:

Option #2:

Adopt the CEQA determination that the proposed action is not defined as a project and is not subject to CEQA, and approve up to \$1.168 million to renew the expiring excess liability and specialty insurance policies, and change the Excess Workers' Compensation coverage limit from \$50 million to statutory limits.

- 7-2** Appropriate \$650,000; and authorize construction of copper sulfate storage facilities at Lake Mathews and Lake Skinner (Approp. 15441). (E&O)

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed action is categorically exempt from CEQA, and

- a. Appropriate \$650,000; and**
- b. Authorize construction of copper sulfate storage facilities at Lake Mathews and Lake Skinner.**

- 7-3** Appropriate \$1.9 million; and authorize design to complete lining repairs on the Etiwanda Pipeline (Approp. 15441). (E&O)

Recommendation:

Option #1:

Certify that the Final EIR has been completed in compliance with CEQA and the State CEQA Guidelines; certify that the Board has reviewed and considered the information presented in the Final EIR; certify that the Final EIR reflects Metropolitan' independent judgment and analysis; adopt the Findings, SOC, and MMRP; and

- a. Appropriate \$1.9 million; and**
- b. Authorize design to complete the lining repairs on the Etiwanda Pipeline.**

- 7-4** Approve amendments to the Metropolitan Water District Administrative Code to conform to current laws and practices and make corrections. (L&C)

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed action is not defined as a project and is not subject to CEQA, and approve amendments to the Administrative Code set forth in Attachment 2 to the board letter to reflect the changes recommended in the letter.

- 7-5** Approve amendments to Metropolitan Water District Administrative Code to revise the Department Head Evaluation process and timeline. (OP&T)

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed action is not defined as a project and is not subject to CEQA, and approve amendments to the Administrative Code set forth in Attachments 1 and 2 to the board letter to reflect the changes recommended in the letter.

(END OF CONSENT CALENDAR)

8. OTHER BOARD ITEMS — ACTION

- 8-1** Annual approval of Metropolitan's Statement of Investment Policy and delegation of authority to the Treasurer to invest Metropolitan's funds. (F&I)

Staff Recommendation:

Adopt the CEQA determination that the proposed action is not subject to CEQA, and

- a. Approve the Statement of Investment Policy; and**
- b. Delegate authority to invest to the Treasurer for fiscal year 2015/16.**

- 8-2** Approve and authorize execution and distribution of the Official Statement in connection with the issuance of the Special Variable Rate, Water Revenue Refunding Bonds 2015 Series 1 and 2015 Series A-2, and authorize the payment of cost of issuance from bond proceeds. (F&I)

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed action is not defined as a project and is not subject to CEQA, and

- a. Approve the draft Official Statement substantially in the form attached to the board letter;**
- b. Authorize the General Manager to finalize, with changes approved by the General Manager and General Counsel, and execute the Official Statement;**
- c. Authorize distribution of the Official Statement in connection with marketing of the bonds; and**
- d. Authorize payment of costs of issuance of bonds as operations and maintenance expenses in the manner set forth in the board letter.**

- 8-3** Authorize payments of up to \$3.15 million for participation in the State Water Contractors, Inc. and the State Water Project Contractors Authority for fiscal year 2015/16. (WP&S) **(Two-thirds vote required)**

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed actions are not defined as a project and are not subject to CEQA and, by two-thirds vote,

- a. Authorize the General Manager to make payment of \$2.38 million to the State Water Contractors; and**
- b. Authorize the General Manager to make payment of up to \$760,859 to the State Water Project Contractors Authority.**

- 8-4** Appropriate \$3,530,802 for final payment to Southern California Edison for the 66 kV incoming electrical service at the F. E. Weymouth Water Treatment Plant (Approp. 15369). (E&O)

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed action is not subject to the provisions of CEQA, and appropriate \$3,530,802 for the Weymouth Incoming Electrical Service.

- 8-5** Appropriate \$12,670,000; and award \$10,534,920 contract to Kana Engineering Group, Inc. to construct a solar power plant at the F. E. Weymouth Water Treatment Plant (Approp. 15391). (E&O)

Recommendation:

Option #1:

Adopt the CEQA determination that the proposed action has been previously addressed and that no further environmental analysis or documentation is required, and

- a. Appropriate \$12.67 million; and**
- b. Award \$10,534,920 contract to Kana Engineering Group, Inc. for construction of the La Verne Solar Power Plant.**

- 8-6** Adopt Mitigated Negative Declaration for planned upgrades to Palos Verdes Reservoir. (E&O)

Recommendation:

Option #1:

Adopt the Mitigated Negative Declaration for planned upgrades to Palos Verdes Reservoir.

- 8-7 Express support for AB 888 (Bloom, D-Santa Monica) – Waste Management: Plastic Microbeads; and express support for H.R. 1321 (Pallone, D-NJ) – Microbead-Free Waters Act of 2015, (C&L) **(To be mailed separately)**

- 8-8 Express support for H.R. 1278 (Capps, D-CA) – Water System Adaptation Grants. (C&L) **(To be mailed separately)**

9. BOARD INFORMATION ITEMS

None

10. FUTURE AGENDA ITEMS

11. ADJOURNMENT

NOTE: At the discretion of the Board, all items appearing on this agenda and all committee agendas, whether or not expressly listed for action, may be deliberated and may be subject to action by the Board.

Each agenda item with a committee designation will be considered and a recommendation may be made by one or more committees prior to consideration and final action by the full Board of Directors. The committee designation appears in parentheses at the end of the description of the agenda item e.g., (E&O, F&I). Committee agendas may be obtained from the Board Executive Secretary.

Writings relating to open session agenda items distributed to Directors less than 72 hours prior to a regular meeting are available for public inspection at Metropolitan's Headquarters Building and on Metropolitan's Web site <http://www.mwdh2o.com>.

Requests for a disability related modification or accommodation, including auxiliary aids or services, in order to attend or participate in a meeting should be made to the Board Executive Secretary in advance of the meeting to ensure availability of the requested service or accommodation

ITEM 10A