

**OSAGE BEACH / LAKE OZARK  
JOINT SEWER BOARD MEETING AGENDA  
February 21, 2017 @ 4:00 p.m.  
LAKE OZARK CITY HALL**

**1. CALL TO ORDER**

**2. ROLL CALL**

Mayor, Lake Ozark, Johnnie Franzeskos  
Mayor, Osage Beach, John Olivarri  
City Administrator, Osage Beach, Jeana Woods  
City Administrator, Lake Ozark, Dave Van Dee  
Alderman, Lake Ozark, Gerry Murawski  
Alderman, Osage Beach, Ron Schmitt  
Public Works Director, Osage Beach, Nick Edelman  
Public Works Director, Lake Ozark, Matt Michalik  
Resident Member, Mr. Gary Hamner

**3. MINUTES**

Regular Meeting; January 17, 2017

**PAGE NUMBERS**

**3-4**

**4. REPORTS**

Bill List	<b>5-14</b>
Revenue Budget Analysis	<b>15</b>
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Check Registers & Bank Statements	<b>21-24</b>
Alliance Report of Operations	<b>25-39</b>
Approval of Flow Chart	

**5. OLD BUSINESS:   None**

**6. NEW BUSINESS:**

- |  |           |
|--|-----------|
| A. Discussion and possible action on solicitation of bids for the purchase and installation of new tires for the sludge truck. | <b>40</b> |
| B. Discussion and possible action on solicitation for bids on the repair of the #3 RAS pump.                                   | <b>40</b> |

**7. ADDITIONAL DISCUSSION ITEMS**

**8. ADJOURNMENT**

THE NEXT MEETING WILL BE MARCH 21, 2017, 4:00 PM @ LAKE OZARK  
CITY HALL

LAKE OZARK-OSAGE BEACH  
JOINT SEWER BOARD  
Meeting Minutes-January 17, 2017

**CALL TO ORDER:**

Mayor Johnnie Franzeskos called the meeting to order at 4:00pm on Tuesday, January 17, 2017 at Lake Ozark City Hall.

Mayor Franzeskos requested a motion to amend the agenda to include under old business, discussion and possible action regarding the changes to the Oxidation Ditch Project. Motion was made by Mayor Olivarri to amend, seconded by City Administrator Woods.

**ROLL CALL:**

Mayor, City of Lake Ozark, Johnnie Franzeskos-Present  
Mayor, Osage Beach, John Olivarri-Present  
City Administrator, Osage Beach-Jenna Woods-Present  
City Administrator, City of Lake Ozark-Dave Van Dee-Present  
Alderman, Lake Ozark-Gerry Murawski-Present  
Public Works Director, Osage Beach, Nick Edelman-Absent  
Public Works Director, City of Lake Ozark-Matt Michalik-Absent  
Resident Member, Mr. Gary Hamner-Present

**MINUTES:**

Alderman Murawski made a motion to approve the meeting minutes of November 15, 2016, seconded by City Administrator Van Dee. Motion passed unanimously.

**REPORTS:**

Mayor Olivari made a motion to approve the Bills List, seconded City Administrator Woods, motion passed unanimously.

Alliance Report of Operations for November and December report noted the average daily incoming flow for November was 1.137 mgd & for December was .873 mgd. They had 1.2 inches in November and 0.8 inches in December of precipitation measured at the WWTP.

Operationally, the plant's discharge was excellent, with an effluent monthly average BOD and TSS of 2.0 mg/l and 2.3 mg/l respectively for November and 2.3 mg/l and 2.4 mg/l for December which represents a 98.8 + % or better removal.

JOINT SEWER BOARD  
BILL LIST  
FEBRUARY 21, 2017

OPERATING FUND BILLS PAID PRIOR TO BOARD MEETING:	\$ -
OPERATING FUND BILLS TO BE PAID:	\$ 33,174.06
EQUIPMENT REPLACEMENT FUND BILLS PAID PRIOR TO BOARD MEETING:	\$ -
EQUIPMENT REPLACEMENT FUND BILLS TO BE PAID:	\$ -
<b>TOTAL</b>	<b>\$ 33,174.06</b>

OPERATING FUND BILLS PAID PRIOR TO BOARD MEETING:

Account	Check	Paid To:	Description:	Amount:
				\$ -
				\$ -
<b>TOTAL</b>				<b>\$ -</b>

OPERATING FUND BILLS TO BE PAID:

Account	Check	Paid To:	Description:	Amount:
4185	3571	Ameren MO	Jan. Service	\$ 2,904.06
4000	3572	Equipment Replacement Fund	Payment into ER Fund	\$ 3,467.00
4170	3573	Alliance Water Resources, Inc.	Management Fee	\$ 25,935.82
4160	3574	Alliance Water Resources, Inc.	Hauled Waste	\$ 750.00
4150	3575	Alliance Water Resources, Inc.	Purcell Tire	\$ 117.18
				\$ -
				\$ -
				\$ -
<b>TOTAL</b>				<b>\$ 33,174.06</b>

EQUIPMENT REPLACEMENT FUND BILLS PAID PRIOR TO BOARD MEETING:

Account	Check	Paid To:	Description:	Amount:
				\$ -
				\$ -
<b>TOTAL</b>				<b>\$ -</b>

EQUIPMENT REPLACEMENT FUND BILLS TO BE PAID:

Account	Check	Paid To:	Description:	Amount:
				\$ -
				\$ -
<b>TOTAL</b>				<b>\$ -</b>



AmerenMissouri.com  
 1.877.426.3736  
 PO Box 790352 St. Louis, MO 63179-0352  
*for correspondence only*

**FOCUSED ENERGY. For life.**

**Electric Service Details** Service from 01/08/2017 - 02/07/2017 (29 days)

**Electric Meter Read**

METER NUMBER	SERVICE FROM - TO	NO. DAYS	USAGE TYPE	READING TYPE	CURRENT READING	PREVIOUS READING	READING DIFFERENCE	MULTIPLIER	USAGE
11673321	01/09 - 02/07	29	Total kWh	Actual	38952.0000	38660.0000	292.0000	160.0000	46720.0000
11673321	01/09 - 02/07	29	Peak kW	Actual	0.8120	0.0000	0.8120	160.0000	97.9200

**Usage Summary**

Total kWh	46720.0000	Peak kW	97.9000
Total Billing Demand	100.0000	October Winter Base kW	155.5000
Winter Base Demand	97.9000	Base kWh Ratio	1.0000
Base kWh (HUD)	46720.0000	Seasonal kWh (HUD)	0.0000

**Rate 3M Large General Service**

DESCRIPTION	USAGE	UNIT	RATE	CHARGE
Seasonal Energy Charge	0.00	kWh	@ \$ 0.03800000	\$0.00
Demand Charge	100.00	kW	@ \$ 1.79000000	\$179.00
Base Energy Charge / Hours Used	14,685.00	kWh	@ \$ 0.06510000	\$955.98
Base Energy Charge / Hours Used	18,580.00	kWh	@ \$ 0.04830800	\$945.71
Base Energy Charge / Hours Used	12,455.00	kWh	@ \$ 0.03800000	\$473.29
Customer Charge				\$92.85
Fuel Adjustment Charge	46,720.00	kWh	@ \$ 0.00124000	\$57.93
Energy Efficiency Program Charge	46,720.00	kWh	@ \$ 0.00040000	\$18.69
Energy Efficiency Investment Charge	46,720.00	kWh	@ \$ 0.00206400	\$96.43
<b>Total Service Amount</b>				<b>\$2,819.89</b>
<b>Total Electric Charges</b>				<b>\$2,819.89</b>

**Payments Since Previous Statement**

DATE RECEIVED	AMOUNT
January 24, 2017	\$3,125.08

Questions? Contact Ameren Missouri at 1.877.426.3736 or visit AmerenMissouri.com.

Page 2 of 4

**Address Changes or Corrections**

Name \_\_\_\_\_  
 Address \_\_\_\_\_  
 City, State, Zip \_\_\_\_\_  
 Phone Number \_\_\_\_\_

**AmerenMissouri.com/WaysToPay**

ONLINE E CHECK	PHONE 866.268.3729	IN PERSON FIND A PAY STATION AT AMERENMISSOURI.COM PAYSTATION
ONLINE CREDIT CARD	MAIL STUB & CHECK	



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**Electric Service Details** Service from 01/08/2017 - 02/07/2017 (29 days)

**Electric Meter Read**

METER NUMBER	SERVICE FROM - TO	NO. DAYS	USAGE TYPE	READING TYPE	CURRENT READING	PREVIOUS READING	READING DIFFERENCE	MULTIPLIER	USAGE
88841275	01/09 - 02/07	29	Total kWh	Actual	14248.0800	14173.0000	75.0800	10.0000	760.0000
88841275	01/09 - 02/07	29	Peak kW	Actual	5.0800	0.0000	5.0800	10.0000	50.8000

**Usage Summary**

Total kWh	760.0000	Winter Base kWh	2760.0000
Current Base kWh	760.0000	Seasonal kWh	0.0000

**Rate 2M Sm Gen Svc - 3 Ph w/Dmd**

**Threshold - Peak Demand**

DESCRIPTION	USAGE	UNIT	RATE	CHARGE
Base Energy Charge	760.00	kWh	@ \$ 0.08060000	\$61.26
Seasonal Energy Charge	0.00	kWh	@ \$ 0.04650000	\$0.00
Customer Charge				\$20.43
Fuel Adjustment Charge	760.00	kWh	@ \$ 0.00124000	\$0.94
Energy Efficiency Program Charge	760.00	kWh	@ \$ 0.00020000	\$0.15
Energy Efficiency Investment Charge	760.00	kWh	@ \$ 0.00182800	\$1.39
<b>Total Service Amount</b>				<b>\$84.17</b>
<b>Total Electric Charges</b>				<b>\$84.17</b>

**Payments Since Previous Statement**

DATE RECEIVED	AMOUNT
January 24, 2017	\$198.53

Questions? Contact Ameren Missouri at 1.877.426.3736 or visit AmerenMissouri.com.

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 City, State, Zip \_\_\_\_\_  
 Phone Number \_\_\_\_\_

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**Alliance Water Resources, Inc.**

*Professional Water and Wastewater Operations*

208 South Keene Street  
Columbia, Missouri 66201  
(573) 874-8080 Fax (573) 443-0833

**INVOICE**

Invoice No: 7233

Invoice Date: 31-Jan-17

Customer No: 20220

Terms: 30 days

**SOLD TO:**

Lake Ozark/Osage Beach Joint Utility Board  
c/o Karri Bell  
City of Osage Beach  
1000 City Parkway  
Osage Beach, MO 65065

REFERENCE	DESCRIPTION	AMOUNT
	Hauled waste payments for the month of Jan-17 15 Hauled Waste Loads @ \$50.00 each	\$750.00
<b>TOTAL DUE</b>		<b>\$750.00</b>



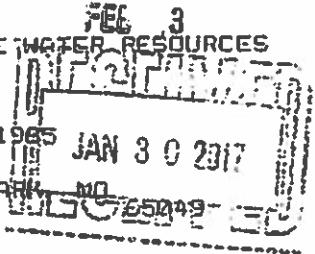
SEND PAYMENTS ONLY TO: PURCELL TIRE CO. P.O. BOX 50648 ST. LOUIS, MO 63150-0648

PURCELL TIRE AND SERVICE CENTER  
OSAGE BEACH, MO 65065  
573 348-4010

INVOICE #: 2002231  
TIME START PAGE 10:25:40  
TIME CLOSED: 10:26:37

NONSIG #: 000163267  
CUSTOMER: ALLIANCE WATER RESOURCE  
D/B/A LO/OB JOINT  
#3 ANDERSON RD

ACCT#: 2000441  
SHIP TO: ALLIANCE WATER RESOURCES



2000441 P O BOX 1985  
LAKE OZARKS MO 65049

PO BOX 1985  
LAKE OZARK, MO 65049

BUSINESS: 573/365-0455  
PRIMARY: 573/365-0455  
SALESMAN: 02016  
INVOICE DATE: 01/30/17  
PICKUP AT STORE: Y  
VEHICLE: 2016 SERVICE CALL  
LICENSE: XX  
TERMS: NET 10TH  
MILEAGE: 1

VENDOR REQ: CUSTOMER: 2000441 VENDOR: 001 DOC#: 2002167 TRANS CODE: B  
ALLIANCE WATER RESOU GOODYEAR GOVERNMENT AND LOCAL  
VENDOR CUSTOMER: 0009960 NONSIG:  
VEHICLE TYPE: TK TRUCK

PRODUCT	MECHANIC	QUANTITY	PRICE	F.E.T.	EXTENSION
A2 SMALL FLAT RATE 046122	2027	1	80.00		80.00
FUEL SURCHARGE FUEL		1.00	10.00		10.00
SUPER SINGLE SCRAP DISPOSAL 046356000		1	20.00		20.00
SHOP MATERIALS 093200			9.05		8.05

GL Acct#: 6702-20 \$59.62 1220-26 \$59.03

Signature: *Larry Hutchcraft*

Date: 1/30/17

MERCHANDISE: 28.05  
LABOR: 90.00  
SALES TAX: 0.60  
INVOICE TOTAL: 118.65

GOVERNMENT 118.65

\*\*\*\*\*THANK YOU FOR STOPPING BY YOUR LOCAL PURCELL TIRE AND AUTO CENTER\*\*\*\*\*  
\*\*\*\*\*TIRE & SERVICE NETWORK NATION-WIDE WARRANTY 1-800-426-0733\*\*\*\*\*  
F/S/E FED/STATE/INDIAN S  
ULTIMATE TAX CERTIFICAT Y  
P.O. NUMBER GARY  
GS/AN # 1 G9999999

Customer Signature : \_\_\_\_\_

Printed Name: \_\_\_\_\_



**MONTH-TO-DATE AND YEAR-TO-DATE  
REVENUE/BUDGET ANALYSIS**

Account Number	Account Name	1/31/2017				Percent YTD
		2015 Actual	2016 Actual	2017 Budget	2016 Actual as of 1/31/2017	
3020	Osage Beach	477,172.03	475,802.57	473,000.00	39,978.35	8%
3010	Lake Ozark	72,827.98	74,197.42	77,000.00	5,854.98	8%
3100	Interest	54.79	368.52	200.00	53.46	27%
3060	Waste Haulers' Fee	32,400.00	33,460.00	35,000.00	1,500.00	4%
<b>Total Operating Fund</b>		<b>582,454.80</b>	<b>583,828.51</b>	<b>585,200.00</b>	<b>47,386.79</b>	<b>8%</b>
<b>E/R Fund Income</b>		<b>2,188.83</b>	<b>2,847.67</b>	<b>1,500.00</b>	<b>59.08</b>	<b>4%</b>
<b>TOTAL INCOME</b>		<b>584,643.63</b>	<b>586,676.18</b>	<b>586,700.00</b>	<b>47,445.87</b>	<b>8%</b>

**MONTH-TO-DATE AND YEAR-TO-DATE  
EXPENDITURE/BUDGET ANALYSIS  
1/31/2017**

Account Number	Account Name	2015 Actual	2016 Actual	2017 Budget	2016 Actual as of 1/31/2017	2016 January Expenses	Percent YTD
4000	Equipment Replace Fund	41,606.04	41,606.04	41,604.00	3,467.17	3,467.17	8%
4010	ERF Repayment	0.00	0.00	0.00	0.00	0.00	0%
4020	*Maintenance & Repair	33,878.90	18,735.50	28,000.00	107,945.95	107,945.95	386%
4140	Insurance	16,306.00	16,977.00	17,500.00	0.00	0.00	0%
4150	***Vehicle Repair/Maint	1,508.78	951.93	8,000.00	246.44	246.44	3%
4160	Haulers Fees to Contractor	8,000.00	8,000.00	8,000.00	0.00	0.00	0%
4170	Contract Management	296,233.08	303,638.88	312,750.00	25,935.82	25,935.82	8%
4185	Electric	76,751.19	72,637.17	77,000.00	3,323.61	3,323.61	4%
4190	Bank Charges	0.00	14.85	0.00	0.00	0.00	0%
4200	Audit	2,000.00	2,158.50	2,200.00	0.00	0.00	0%
4220	Professional Service	2,369.99	9,193.09	0.00	0.00	0.00	0%
4240	Capital Purchases	0.00	0.00	150,000.00	0.00	0.00	0%
	Totals	478,653.98	473,912.96	645,054.00	140,918.99	140,918.99	22%

\*\*E/R Expenses

1,869.72	7,980.42	26,500.00	0.00	0.00	0.00	0%
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**TOTAL EXPENSES**

480,523.70	481,893.38	671,554.00	140,918.99	140,918.99	140,918.99	21%
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**\*\*Equipment & Replacement**

Normal E/R	10,000.00
Replace impellers for RAS pumps	7,500.00
Rebuild Arm Support Clarifier #2	5,000.00
Replace doors	4,000.00
	<u>26,500.00</u>

**\*\*\*Vehicle Repair/Maint**

Vehicle Maintenance	3,000.00
Tires for Sludge Truck	5,000.00
	<u>8,000.00</u>

**\*Maintenance & Repair**

Auto Dialer Yrly Software Fee	500.00
Effluent Testing for Permit Renewal	1,500.00
Normal Maintenance	8,000.00
UV Spare Parts	8,000.00
Rock for Road	2,000.00
Strip and refinish tile in Admin Bldg	1,000.00
Paint RAS room/pipe gallery & valve pits at	7,000.00
	<u>28,000.00</u>

**2016 Budget**

#1 Aeration Basin grit removal

107,249.88 X

**OPERATING FUND INCOME AND EXPENSE SUMMARY  
1/1/2017**

Beginning Balance	289,116.83
Income - Osage Beach	39,978.35
Income - Lake Ozark	5,854.98
Income - Other	-
Income - Waste Haulers' Fees	1,500.00
Interest - Checking	53.46
Income - CD Interest	-
Transfers From E/R Fund	-
Transfers to E/R fund	(3,467.17)
Expenses	(137,451.82)
 Ending Fund Balance	 <b>195,584.63</b>
 Central Bank - NOW Acct.	 45,230.71
First Bank of the Lake - Money Mkt.	100,265.70
CD St. Elizabeth, 3/17 #400886	50,088.22
Outstanding Checks:	-
Deposit in Transit:	-
	<b>195,584.63</b>

**EQUIPMENT REPLACEMENT FUND INCOME AND EXPENSE SUMMARY  
1/1/2017**

Beginning Balance	487,257.52
Interest - Checking	59.08
Income - CD Interest	-
Transfers From E/R Fund	3,467.17
Transfers to E/R Fund	-
Income - Miscellaneous	-
Expenses	-
 Ending Fund Balance	 <b>490,783.77</b>
 First Bank of the Lake - Money Mkt.	 137,530.02
CD Providence Bank, 10/17 #1268880	201,566.60
CD First Bank of the Lake, 01/17 #101318429	101,598.93
CD St. Elizabeth, 3/17 #485431	50,088.22
Deposit in Transit	-
Outstanding Checks:	-
	<b>490,783.77</b>

Operating Fund  
**CHECK REGISTER - JOINT SEWER BOARD OPERATION FUND**

					<b>87,030.06</b>
	reconciled balance 8/31/16				
3545	Ameren MO	X	8,627.17	-	78,402.89
3546	Equipment Replacement Fund	X	3,467.17		74,935.72
3547	Alliance Water Resources, Inc.	X	25,303.24		49,632.48
3548	Alliance Water Resources, Inc.	X	280.28		49,352.20
3549	Lake Sun Leader	X	236.25		49,115.95
3550	Mission Communications LLC	X	407.40		48,708.55
	Deposit LO	X	-	5,928.14	54,636.69
	Deposit OB	X		39,905.20	94,541.89
	Deposit	X		3,820.00	98,361.89
	Interest	X		3.13	98,365.02
	reconciled balance 9/30/16				<b>98,365.02</b>
3551	Ameren MO	X	5,459.98	-	92,905.04
3552	Equipment Replacement Fund	X	3,467.17		89,437.87
3553	Alliance Water Resources, Inc.	X	25,303.24		64,134.63
3554	Alliance Water Resources, Inc.	X	327.00		63,807.63
3555	Roemer's Heavy Equip & Truck	X	1,355.27		62,452.36
	St Of Missouri Vendor Pay	X	-	40.00	62,492.36
	Deposit LO	X	-	6,244.96	68,737.32
	Deposit OB	X		39,588.37	108,325.69
	Deposit	X		3,020.00	111,345.69
	Interest	X		3.55	111,349.24
	reconciled balance 10/31/16				<b>111,349.24</b>
3556	Ameren MO	X	4,737.16	-	106,612.08
3557	Equipment Replacement Fund	X	3,467.17		103,144.91
3558	Alliance Water Resources, Inc.	X	25,303.24		77,841.67
3559	Alliance Water Resources, Inc.	X	530.20		77,311.47
3560	Lake Sun Leader	X	236.25		77,075.22
	Deposit LO	X	-	5,947.10	83,022.32
	Deposit OB	X		39,886.23	122,908.55
	Deposit	X		1,100.00	124,008.55
	Interest	X		3.97	124,012.52
	reconciled balance 11/30/16				<b>124,012.52</b>
3561	Ameren MO	X	3,902.63	-	120,109.89
3562	Equipment Replacement Fund	X	3,467.17		116,642.72
3563	Alliance Water Resources, Inc.	X	25,303.24		91,339.48
3564	Alliance Water Resources, Inc.	X	550.33		90,789.15
	Deposit LO	X	-	5,596.60	96,385.75
	Deposit OB	X		40,236.73	136,622.48
	Deposit	X		2,180.00	138,802.48
	Interest	X		4.59	138,807.07
	reconciled balance 12/31/16				<b>138,807.07</b>
3565	Ameren MO	X	3,323.61	-	135,483.46
3566	Equipment Replacement Fund	X	3,467.17		132,016.29
3567	Alliance Water Resources, Inc.	X	25,935.82		106,080.47
3568	VOID	X	-		106,080.47
3569	Hunt Vac Services	X	107,249.88		(1,169.41)
3570	Alliance Water Resources, Inc.	X	942.51		(2,111.92)
	Deposit LO	X	-	5,854.98	3,743.06
	Deposit OB	X		39,978.35	43,721.41
	Deposit	X		1,500.00	45,221.41
	Interest	X		9.30	45,230.71
	reconciled balance 1/31/17				<b>45,230.71</b>

JSB - CHECK REGISTERS 2017

**CHECK REGISTER - JOINT SEWER BOARD EQUIPMENT REPLACEMENT FUND**

			-	<b>224,977.14</b>
	reconciled balance 8/31/16			
	Interest	X	92.84	225,069.98
	Deposit	X	3,467.17	228,537.15
	reconciled balance 9/30/16		-	<b>228,537.15</b>
	Interest	X	97.43	228,634.58
	Deposit	X	3,467.17	232,101.75
1017	Progress Environmental	X	5,000.00	227,101.75
	reconciled balance 10/31/16		-	<b>227,101.75</b>
	Interest	X	93.95	227,195.70
	Deposit	X	3,467.17	230,662.87
	reconciled balance 11/30/16		-	<b>230,662.87</b>
	Interest	X	95.27	230,758.14
	Deposit	X	3,467.17	234,225.31
	reconciled balance 12/31/16		-	<b>234,225.31</b>
	Interest	X	103.24	234,328.55
	Deposit	X	3,467.17	237,795.72
	reconciled balance 1/31/17		-	<b>237,795.72</b>

**OPERATING  
DIVISIONS**



- Atchison County
- Bonne Terre
- Boonville
- Bowling Green
- Buchanan County #1
- Cameron
- Cape Girardeau
- Carroll County #1
- Clay County
- Craig
- East Central Missouri  
Water & Sewer  
Authority
- Elsberry
- Fayette
- Franklin County #1
- Franklin County #3
- Henry County  
Water Company
- Henry County #3
- Kimberling City
- Lake Ozark/  
Osage Beach
- Lincoln County #1
- Neosho
- Nevada
- Parkville
- Phelps County #2
- Platte County #C-1
- Proctor & Gamble
- Ralls County #1
- Russellville
- Sedalia
- St Charles County #2
- St Genevieve
- Versailles
  
- Maquoketa
- Tipton
  
- South Fulton

**REPORT OF OPERATIONS**

**LAKE OZARK/OSAGE BEACH  
Joint Wastewater Treatment Plant No. 1**

**Month of January 2017**

Submitted by Alliance Water Resources, Inc. for the

February 2017

Joint Sewer Board Meeting

## **WASTEHAULERS**

The plant received 15 loads of septage during the month totaling 27,500 gallons.

## **WWTP OPERATIONS**

- Decanting digesters and wasting weekly.
- Normal operations.
- Oxidation ditch #1 is not in service yet, due to weather not permitting us to get in and sandblast and paint the ditch drain valves.

## **WWTP MAINTENANCE AND REPAIR**

- Performed routine maintenance throughout the month as per Antero Maintenance Data Management schedule. (New version of Operator 10 Software)
- We installed a new impeller on RAS pump #3 along with a new wear ring. After installing the wear ring we had to adjust the impeller jack bolts to get the correct gap/tolerance between the impeller and wear ring, then the mechanical seal started leaking, so we will have to get it repaired before putting it back in service.
- We got the UV Banks pulled, cleaned and stored in the UV room for the non-disinfection season.
- We had a couple flats on the sludge truck this past month and had spares to install to keep us going until we get the new ones.

## **SAFETY**

- We conducted our monthly routine Safety Meeting on Personal Protective Equipment on the 24<sup>th</sup> of January.

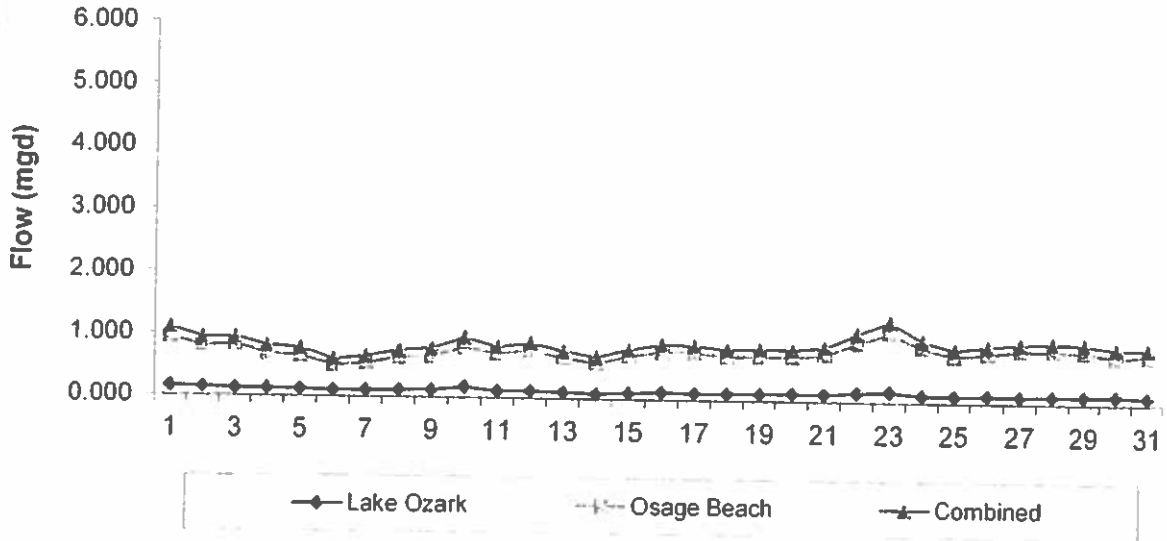
## **REGULATORY AGENCY, INSPECTION AND REPORTS**

- We filled out the EDMR on MDNR's website on the 7<sup>th</sup> of February.
- We got the annual form S sludge report completed and mailed certified to MDNR on 20<sup>th</sup> of January and they received it on the 25<sup>th</sup>. We also filled out the required online EPA Sewage Sludge (Biosolids) Annual Report on the 26<sup>th</sup> of January.

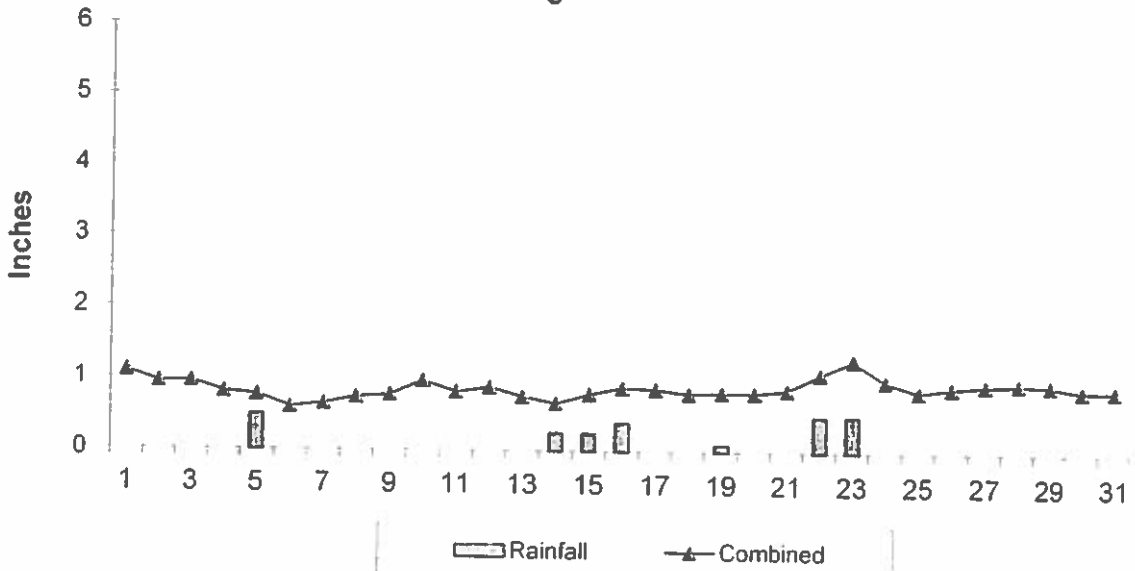
## **MISCELLANEOUS AND RECOMMENDATIONS**

- We solicited bids for the purchase & installation of new tires for the sludge truck. (see attached bid summary)
- We solicited bids for the repair of the #3 RAS pump. (see attached bid summary)

Daily Flow  
Figure 1

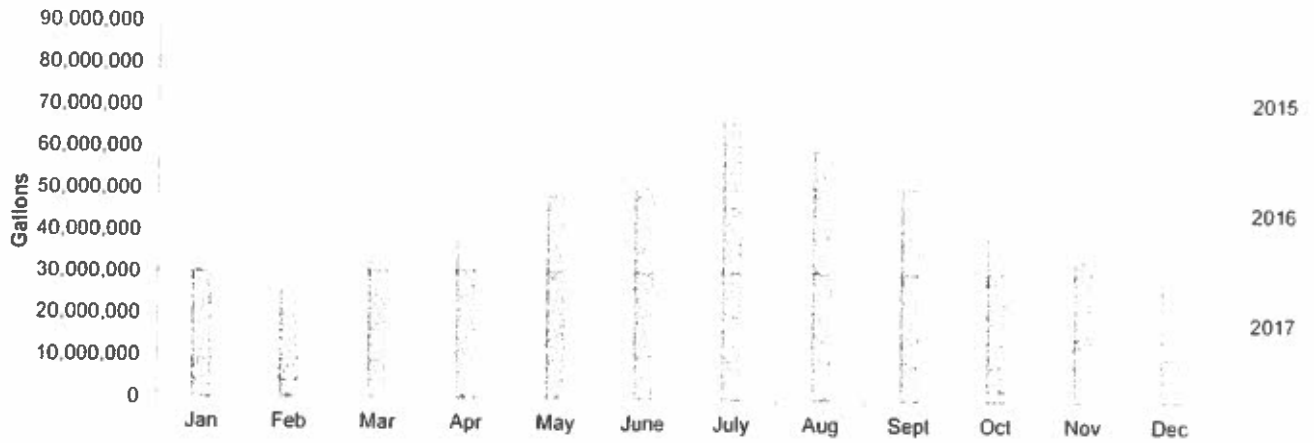


Effect of Rainfall on Flow  
Figure 2

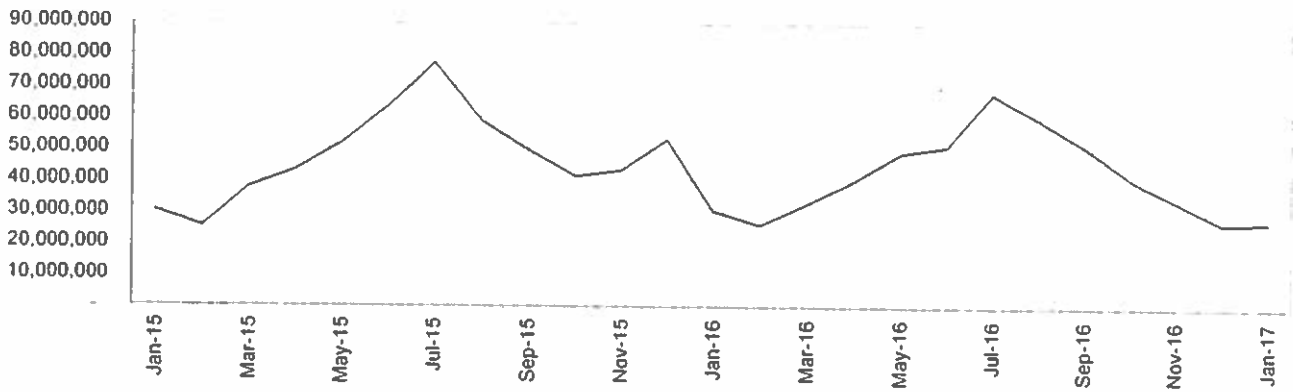




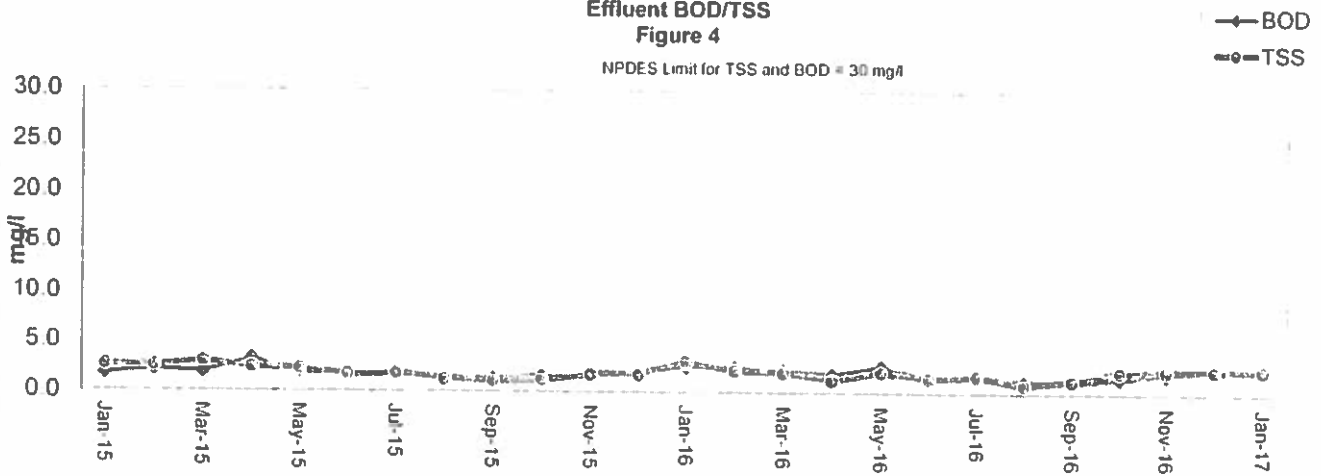
Monthly Influent Flow  
Figure 3A

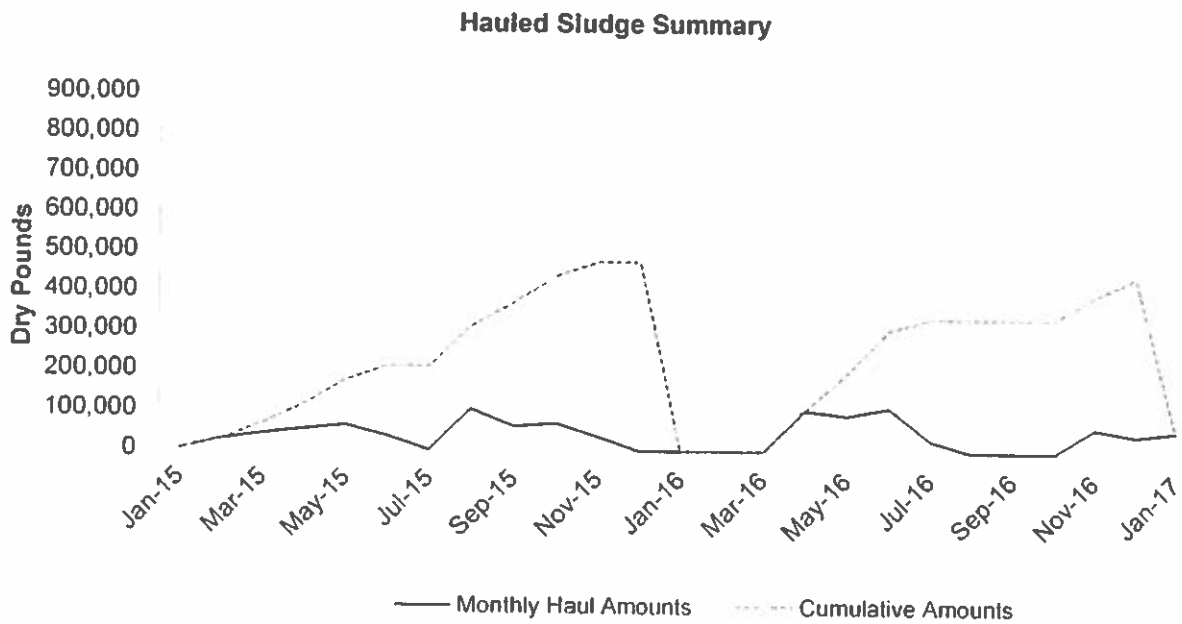
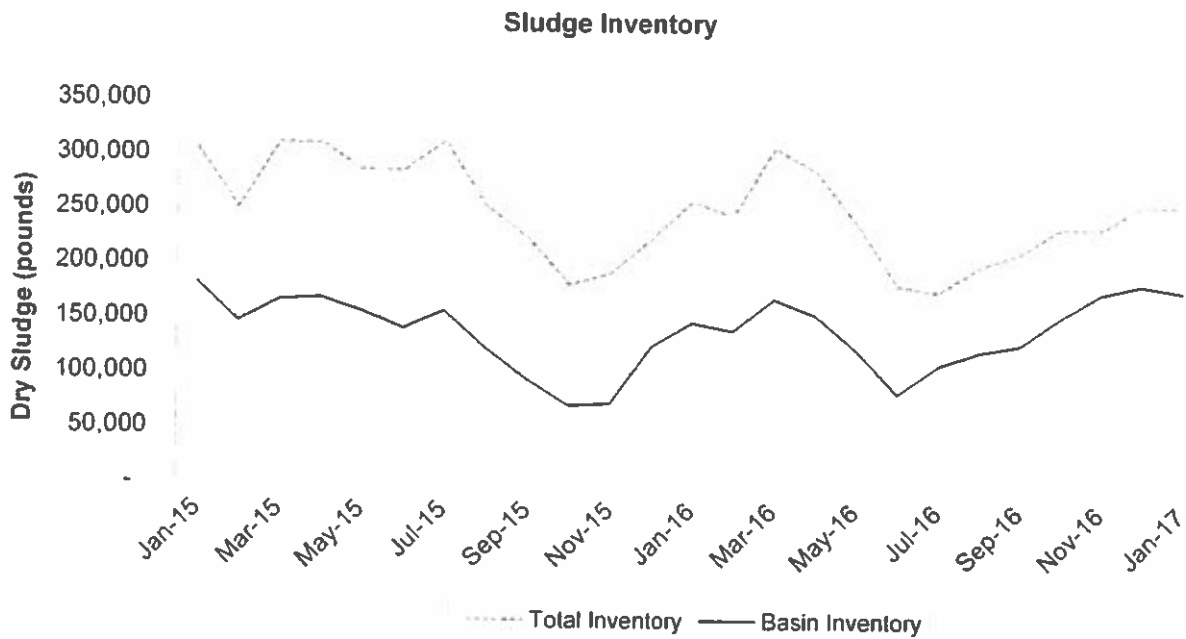


Monthly Influent Flow  
Figure 3B



Effluent BOD/TSS  
Figure 4







**MISSOURI DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF ENVIRONMENTAL QUALITY  
Discharge Monitoring Report For Municipal Wastewater Treatment Plants**

NAME OF FACILITY					LOCATION ADDRESS & CITY								COUNTY/REGION	
Lake of the Ozarks Regional WWTP #1					#3 Anderson Road								Miller/SWRO	
MONTH/YEAR		PERMIT NUMBER			OUTFALL NUMBER		TYPE TREATMENT FACILITY							
Jan-17		MO-0103241			#001		Oxidation Ditch/UV/Sludge Holding-sludge is land applied							
INFLUENT					EFFLUENT							% Removal		
DATE	pH UNITS	BOD mg/L	TSS mg/L	TEMP °C	FLOW MGD	pH UNITS	BOD mg/L	TSS mg/L	Ammonia as N mg/l	DO mg/L	E. coli COLFRM #/100 ML	TEMP °C	BOD mg/L	TSS mg/L
1	7.5			11.6	1.632	7.9				6.4		10.2		
2	7.5			13.0	1.491	7.8				6.0		11.8		
3	7.5			13.1	1.408	7.9				6.4		12.0		
4	7.3			12.8	1.390	7.9				5.4		10.4		
5	7.3			11.6	1.414	7.9			0.29	5.6		9.7		
6	7.4	210	208	10.7	1.357	7.8	1.9	2.9		6.4		8.0	99.1	98.6
7	7.2			11.6	1.401	7.9				6.8		8.4		
8	7.4			11.7	1.540	7.9				7.5		8.0		
9	7.4			11.8	1.545	7.8				6.9		7.8		
10	7.5			13.2	1.379	7.8				6.8		9.9		
11	7.5			11.3	1.317	7.8				7.0		10.3		
12	7.5			12.8	1.404	7.9			0.05	6.5		11.0		
13	7.2	260	250	12.1	1.413	7.9	1.9	1.3		6.4		10.0	99.3	99.5
14	7.6			10.6	1.329	7.9				8.1		9.2		
15	7.6			10.7	1.452	7.8				7.3		9.6		
16	7.5			12.0	1.548	7.8				6.8		10.1		
17	7.4			11.5	1.455	7.8				7.2		10.6		
18	7.5			11.4	1.424	7.8				6.8		10.7		
19	7.4			13.1	1.386	7.9			0.04	6.4		11.6		
20	7.5	193	210	12.5	1.383	7.9	2.2	1.5		7.3		11.9	98.9	99.3
21	7.5			12.5	1.338	7.9				6.7		11.7		
22	7.5			13.1	1.623	7.9				6.3		12.7		
23	7.5			13.5	1.946	8.0				7.0		12.4		
24	7.5			11.4	1.427	7.9				6.9		11.1		
25	7.5			11.8	1.421	7.9				6.5		11.4		
26	7.5			11.9	1.496	8.0			0.05	7.0		10.4		
27	7.4	207	218	11.7	1.618	7.9	3.5	3.4		6.7		9.7	98.3	98.4
28	7.6			11.9	1.624	7.8				6.7		9.8		
29	7.4			11.4	1.564	7.8				6.8		10.0		
30	7.4			11.9	1.445	7.9				6.5		10.5		
31	7.5			12.3	1.377	7.9				6.8		10.5		
Total					45.547									
Avg		218	222	12.0	1.469		2.4	2.3	0.11	6.7	0.0	10.4	98.9	99.0
Min	7.2	193	208	10.6	1.317	7.8	1.9	1.3	0.04	5.4	0.0	7.8	98.3	98.4
Max	7.6	260	250	13.5	1.946	8.0	3.5	3.4	0.29	8.1	0.0	12.7	99.3	99.5

**OPERATIONAL CONTROLS/LABORATORY TEST REQUIRED FOR "ACTIVATED SLUDGE" PROCESSES**

DATE	SLUDGE DISP. LBS. DRY WEIGHT	#1 Aeration Basin, O-Ditch, Etc.				#2 Aeration Basin, O-Ditch, Etc.				*Weather Conditions		
		MIXED LIQUOR				MIXED LIQUOR				* Ambient Temp °F	*RAIN inches	Time
		* DO mg/l	** MLSS mg/l	*Settleability		* DO mg/l	** MLSS mg/l	*Settleability				
				*30 min ml	Temp °C			*30 min ml	Temp °C			
1		0.0	-	0	0	1.7	4,420	490	10	26	0	7 30
2		0.0	-	0	0	2.0	3,990	380	11.9	44	0	7 30
3		0.0	-	0	0	1.6	4,750	520	12.2	46	0	7 30
4		0.0	-	0	0	1.3	4,720	510	10.2	18	0	7 30
5		0.0	-	0	0	1.8	5,070	520	9.1	21	0.5	7 30
6		0.0	-	0	0	3.1	4,900	600	7.7	13	0	7 30
7		0.0	-	0	0	4.2	4,360	600	7.6	7	0	7 30
8		0.0	-	0	0	3.7	4,360	480	8.2	17	0	7 30
9	3,610	0.0	-	0	0	3.1	4,590	540	8.4	23	0	7 30
10	7,961	0.0	-	0	0	2.2	5,020	560	10.8	56	0	7 30
11	6,789	0.0	-	0	0	3.2	4,460	510	10.3	45	0	7 30
12	7,036	0.0	-	0	0	3.1	4,670	530	11	36	0	7 30
13		0.0	-	0	0	2.5	4,920	520	9.9	30	0	7 30
14		0.0	-	0	0	4.9	4,900	580	8.8	34	0.25	7 30
15		0.0	-	0	0	2.7	4,730	570	9.6	36	0.25	7 30
16		0.0	-	0	0	2.8	4,840	570	10.3	43	0.4	7 30
17		0.0	-	0	0	2.5	4,360	470	10.8	42	0	7 30
18	6,943	0.0	-	0	0	1.9	4,610	550	10.6	41	0	7 30
19		0.0	-	0	0	2.4	4,600	630	12.1	47	0.1	7 30
20		0.0	-	0	0	1.5	4,980	660	12.1	48	0	7 30
21		0.0	-	0	0	1.8	4,890	590	12	44	0	7 30
22		0.0	-	0	0	1.4	4,900	520	12.9	49	0.5	7 30
23	7,406	0.0	-	0	0	3.0	4,950	600	12.9	42	0.5	7 30
24	2,160	0.0	-	0	0	1.8	5,480	630	10.7	31	0	7 30
25	8,147	0.0	-	0	0	1.6	4,790	630	11.1	43	0	7 30
26	2,901	0.0	-	0	0	4.5	5,000	630	9.9	33	0	7 30
27		0.0	-	0	0	2.3	4,980	680	10	29	0	7 30
28		0.0	-	0	0	1.9	5,360	730	9.9	33	0	7 30
29		0.0	-	0	0	2.3	5,310	780	10.3	39	0	7 30
30		0.0	-	0	0	1.8	5,430	750	10.3	31	0	7 30
31	3,796	0.0	-	0	0	2.0	5,080	720	10.4	36	0	7 30

COMMENTS

TESTS PERFORMED BY (PRINT) John Hornback	SIGNATURE <i>John Hornback</i>	PHONE # (573)365-0455	DATE 2/7/2017
REPORT APPROVED BY (PRINT) Gary Hutchcraft	SIGNATURE <i>Gary Hutchcraft</i>	PHONE # (573)365-0455	DATE 2/7/2017

\*Required Daily (Monday - Friday)

\*\*Required 1/week

