STATE OF INDIANA INDIANA UTILITY REGULATORY COMMISSION

PETITION	OF '	THE	CITY	OF)
EVANSVILLE	, I	INDIAN	ΙA,	FOR)
AUTHORITY	TO ISS	UE BO	NDS, NO	DTES,)
OR OTHER	R OBJ	LIGAT	IONS,	FOR)
AUTHORITY	TO INC	CREAS	E ITS R	ATES)
AND CHARG	ES FOR	WATI	ER SERV	VICE,)
AND FOR	APPR	OVAL	OF	NEW)
SCHEDULES	OF W.	ATER	RATES	AND)
CHARGES.)

CAUSE NO. 45073

IURC PETITIONER'S

HIBIT NO.

RESPONSE TO DOCKET ENTRY REQUEST DATED AUGUST 29, 2018

The City of Evansville, Indiana, by counsel, responds to the Commission's Docket Entry Request dated August 29, 2018 as follows:

Request No. 1: Mr. Patrick Keepes, in his rebuttal testimony at page 5, states that "Evansville is proposing to construct the new 6 MG clearwell in order to perform necessary maintenance and repairs on the existing 6.5 MG clearwell."

- Please identify the "necessary maintenance and repairs" that Evansville plans to a. perform.
- b. Mr. James Parks, in his testimony at page 19, notes certain repairs to the 6.5 MG clearwell that were identified in a 2011 inspection result. If your response to 1.a. above includes maintenance and repairs not identified in the 2011 inspection report, please explain what other evaluation or analysis Evansville has conducted to determine the additional maintenance and repairs needing to be made.

Response:

- Please see Evansville's responses to OUCC DR 3-1 and OUCC DR 11-2 attached a. hereto as Attachment DR1. The maintenance and repairs detailed in the 2011 inspection report are the only currently identified repairs that need to be made. The last inspection of the clearwell was completed seven years ago, and it was conducted by a diver (i.e., the clearwell was not drained). It is foreseeable that additional repairs will be identified upon a more thorough inspection when the clearwell has been temporarily removed from service and drained of water.
- h. Not applicable.

<u>Request No. 2:</u> Other than constructing a new 6MG clearwell or doing nothing, please identify and describe what other options Evansville considered for ensuring sufficient clearwell capacity while performing necessary maintenance and repair of its existing clearwell.

Response:

The question suggests that the only purpose for the new clearwell is so that the repairs discussed in Request No. 1 can be made. In fact, it is the repairs that need to be made to the clearwell that has exposed the larger problem with the clearwell, which is lack of redundancy. As explained in the Direct Testimony of Patrick Keepes at p. 9, lines 6-8, the purpose of constructing the new clearwell is to both "perform maintenance, inspections and repairs on the existing 6.5 million gallon clear well (that is over 50 years old) AND create redundancy in the system...." (emphasis added). The reason why repairs that were identified seven years ago have not been made is because Evansville does not have adequate redundancy for the clearwell, which means it cannot be taken off line even if the repairs may seem minor. With that as background, Evansville has not considered any other options for ensuring sufficient clearwell. Instead, and as detailed EWSU staff, in conjunction with their engineering consultants from HNTB, have identified construction of the 6MG clearwell as the optimal solution for creating this needed redundancy and resiliency in its system.

<u>Request No. 3</u>: Please indicate whether Evansville considered the addition of incremental clearwell and pumping capacity that would reduce the risks described on pages 6-9 of Mr. Keepes' rebuttal testimony and lower costs. If so, please explain what was considered and why it was rejected.

Response:

Evansville has not considered the addition of incremental clearwell and pumping capacity. However, this question again assumes that Evansville's only purpose for constructing the new 6.0 MG clearwell is to take the existing clearwell offline and make the necessary repairs to it. As detailed in Evansville's response to Docket Entry Request No. 2, this is not the sole purpose for Evansville constructing the clearwell. When the existing clearwell was inspected in 2011 and these necessary, albeit minor, repairs were identified by EWSU's consultant, EWSU staff began contemplating how it would go about making such repairs. Through this exercise, the much larger concern of overall system redundancy and resiliency was brought to light, as EWSU realized that in the event it was forced to take the 6.5 MG and high service pump numbers 8, 9 and 10 offline for any reason, Evansville would only have 2.0 MG clearwell capacity remaining and 4 pumps to service its entire system.

With only 2.0 MG of clearwell capacity and 4 pumps available to service its entire system, EWSU would likely not be able to meet necessary water quality standards and would be unable to provide requisite fire protection to its service territory. This concern became a

reality in 2014 when an extreme winter event caused many aged water mains to freeze and burst. The dramatic flow of water from multiple breaks caused water in the existing clearwell to fall to levels where Evansville was in great danger of not being able to provide fire protection and was in danger of losing pressure such that a system-wide boil water advisory would be required. Just at the time when Evansville brought this situation under control and was ready to return to normal operations without restrictions on usage, there was a massive chemical spill in the Elk River in West Virginia. This is a tributary to the Ohio River, which is Evansville's source of supply. The chemical spill occurred just upstream of the intake and treatment center of a large water utility in the state, and the water utility was ultimately forced to shut down its intake and issue "do not use" orders to all area residents. Other utilities upstream of Evansville (serving Cincinnati and Louisville) shut down their intake structures as a precaution, and Evansville customers were critical that Evansville was not doing the same. The reason Evansville could not was because of inadequate clearwell redundancy capacity.

As previously stated, the repairs needed to the existing clearwell are relatively minor and Evansville currently has the available funds to complete them. However, EWSU has not yet made these necessary repairs because Evansville does not have adequate redundancy in its overall system to take the 6.5 MG clearwell offline in order to make them. While the need to make these necessary repairs is increasing with each passing year, the real concern driving Evansville's need to construct the new clearwell is to create redundancy and resiliency in the overall system to address any one of the very real threats outlined in this Docket Entry response.

<u>Request No. 4:</u> Please indicate whether Evansville maintains a spreadsheet or database of capital project costs for work it has bid.

Response:

Yes, Evansville does maintain a spreadsheet of capital projects for the work it has bid. Please see the spreadsheet attached as Attachment DR4 for capital project costs and other detailed information related to the 17 water main replacement projects Evansville has bid out to date. This information shown includes the project name, the bid amount, the engineer estimates, and the number of bidders.

<u>Request No. 5:</u> Please provide the dates, project names, bid amounts, and engineer estimates for all capital improvement plan work from 2017 to present that Evansville bid but did not award.

Response:

Evansville awarded all of the projects to the lowest responsive and responsible bidder.

<u>Request No. 6</u>: Please provide the dates, project names, original bid amounts, subsequent bid amounts, and engineer estimates for all capital improvement plan work from 2017 to present that Evansville re-bid.

Response:

Evansville did not rebid any of the projects listed on Attachment DR4. There were sufficient bidders on every project to assure a competitive price. For all projects but one, the engineer's estimate was within or above the range of the bids received. For the one project that the engineer's estimate was below the range of bids received, there were added complexities to the project that explained why the bids were higher.

<u>Request No. 7:</u> Please provide the calculation for the \$2,894,400 in estimated earnings reflected on Mr. Douglas Baldessari's Attachment DLB-2R, page 1 of 4.

Response:

Please see Evansville's response to OUCC DR 8-10 attached hereto as Attachment DR7.

<u>Request No. 8:</u> Please indicate whether Evansville has considered participating in the American Water Works Association "Only Tap Water Delivers" program that is designed to provide customers with a greater understanding of the value of water. Please explain why or why not.

Response:

Evansville has not specifically considered participating in AWWA's "Only Tap Water Delivers" program, primarily because Evansville does not have the internal staff resources such as a Public Information Officer or Marketing Specialist to oversee a full-scale "Only Tap Water Delivers" program.

In the past, Evansville has used TV, Radio and Print media interviews to communicate the importance of Evansville's water and sewer systems. However, Evansville is currently working with an outside Advertising Agency to create a new Utility newsletter to inform and educate Utility customers about a variety of topics, including the value of water. Please see a draft of the newsletter attached hereto as Attachment DR8. We will mail the future newsletter as a bill insert to Utility customers. In addition, the Utility will place the newsletter on the Utility's website. Evansville will use AWWA's "Only Tap Water Delivers" resources and tools for future newsletters.

Respectfully submitted,

By:

Nicholas K. Kile, Atty No. 15203-53 Hillary J. Close, Atty No. 25104-49 Lauren M. Box, Atty No. 32521-49 Barnes & Thornburg LLP 11 South Meridian Street Indianapolis, Indiana 46204 Kile Telephone: (317) 231-7768 Close Telephone: (317) 231-7785 Box Telephone: (317) 231-7785 Box Telephone: (317) 231-7289 Fax: (317) 231-7433 Kile Email: <u>nicholas.kile@btlaw.com</u> Close Email: <u>hillary.close@btlaw.com</u> Box Email: <u>lbox@btlaw.com</u>

Attorneys for Petitioner The City of Evansville, Indiana

CERTIFICATE OF SERVICE

The undersigned hereby certifies that a copy of the foregoing was served this 4th day of September, 2018 by electronic mail to:

Daniel M. LeVay Scott Franson Indiana Office of Utility Consumer Counselor PNC Center 115 West Washington Street, Suite 1500 South Indianapolis, Indiana 46204 <u>dlevay@oucc.in.gov</u> <u>sfranson@oucc.in.gov</u> <u>infomgt@oucc.in.gov</u>

- m. By

Lauren M. Box

DMS 13222585v1

OUCC DR 3-1

DATA REQUEST

City of Evansville Cause No. 45073

Information Requested:

On page 9 of Mr. Keepes testimony, he discusses the need for a second clear well, in part, to allow for the performance of "maintenance, inspection and repairs." Please describe in detail the type of maintenance, inspection and repairs that Evansville will be performing.

Information Provided:

As detailed in the attached document titled 6 Million Gallon Clearwell Inspection Report Dated May 2, 2011 (OUCC DR 3-1.pdf), the tank end and tank mid-way shell ladders are significantly deteriorated and are not compliant with current Occupational Health and Safety Administration (OSHA) regulations. Replacement of these shell ladders needs to be performed along with the installation of cable-type ladder safety and fall arrest systems. Other interior repairs and maintenance needed are the removal of mortars and overlays. After removal of these mortars and overlays, these surfaces along with existing cracks and honeycombed areas that have developed over the years would be power washed. Then, chemical grout injection would be performed on the cracks, honeycombed areas and rock pockets would be patched, and all of these areas would be filled and sealed to preserve and extend the life of the structure.

Attachment:

OUCC DR 3-1.pdf

Cause No. 45073 Attachment DR1 Page 1 of 19

Cause No. 45073 OUCC DR 3-1 Page 1 of 15 PITTSBURG TANK & TOWER CO., INC. P.O. Box 913 Henderson, KY 41419-0913 * TEL (270) 826-9000 * FAX (270) 827 4417 PAINT*REPAIR*DISMANTLE*INSPECT*TANKS RAISED, LOWERED AND MOVED*NEW & USED SINCE 1919



Evansville Water Utility 1931 Allens Lane Evansville, IN 47711 RE: Water Dept 6,000,000 Gallon UG.S.T. May 2, 2011 Roger Johnson, Project Manager (812) 421-2120 ext 2204 Job No. 311163

If you would like to speak with Patrick Heltsley concerning this report, call (270) 826-9000, Ext. 253. For additional copies of this report call (270) 826-9000 Ext. 253.

> Cause No. 45073 Attachment DR1 Page 2 of 19

Cause No. 45073 OUCC DR 3-1 Page 2 of 15

Evansville Water Utility 6,000,000 Gallon UG.S.T

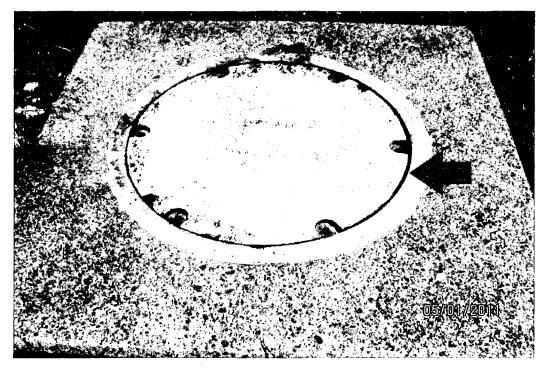


Photo shows the tank end access manway. Manway is a street manway with direct access to the water storage area and is allowing the ingress of waterborne contaminants into the watet sysyem. AWWA regulations require a 4" minimum curb and a 2" overlap cover above the roof. We recommend installing a 4" curb with a 2" overlap cover on the street ring.

Pittsburg Tank & Tower Inc.

Pittsburg Tank &

Cause No. 45073 Attachment DR1 Page 3 of 19

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Cause No. 45073 OUCC DR 3-1 Page 3 of 15

Evansville Water Utility 6,000,000 Gallon UG.S.T

SINCE 1919 Pittsburg Tank & Tower

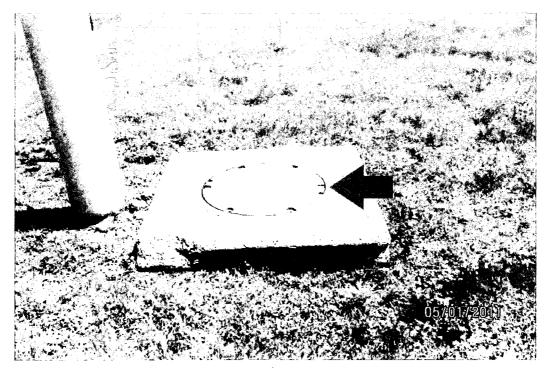


Photo shows the tank midway access manway. Manway is a street manway with direct access to the water storage area and is allowing the ingress of waterborne contaminants into the watet sysyem. AWWA regulations require a 4" minimum curb and a 2" overlap cover above the roof. We recommend installing a 4" curb with a 2" overlap cover on the street ring.

Pittsburg Tank & Tower Inc.

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Cause No. 45073 OUCC DR 3-1

Evansville Water Utility 6,000,000 Gallon UG.S.T





Tank end manway interior shell ladder in above photo is not equipped with non-skid rungs and is seriously deteriorated. We recommend installing an OSHA approved interior shell ladder complete with standoffs every 10' on centers and a cable type ladder safety device.

For adequate fall protection we have recommended a cable type fall arrest system.

Cause No. 45073 OUCC DR 3-1 Page 5 of 15

Evansville Water Utility 6,000,000 Gallon UG.S.T

SINCE 1919 Pittsburg Tank & Tower



Tank midway manway interior shell ladder in above photo is not equipped with non-skid rungs and is seriously deteriorated. We recommend installing an OSHA approved interior shell ladder complete with standoffs every 10' on centers and a cable type ladder safety device.

For adequate fall protection we have recommended a cable type fall arrest system.

Pittsburg Tank & Tower Inc.

May 2, 2011

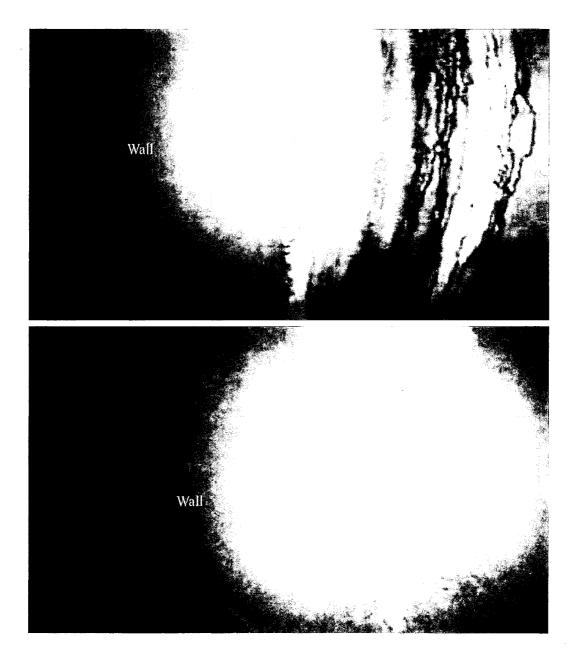
Cause No. 45073 Attachment DR1 Page 6 of 19

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Cause No. 45073 OUCC DR 3-1 Page 6 of 15

Evansville Water Utility 6,000,000 Gallon UG.S.T





Photos show the condition of the interior of the tank. We recommend removing all surface mortars or overlays, chiseling cracks and bug holes, pressure washing to clean surface area, cracks and holes, then repairing these areas (as well as rock pockets and honeycombing) with Krystol Bari-Cote. After repairs are made,apply a Kryton T1/T2 waterproof coating. All concrete preparations and product application will be performed to product specifications and will have a ten (10) yr. limited warranty.

Pittsburg Tank & Tower Inc.

May 2, 2011

Cause No. 45073 Attachment DR1 Page 7 of 19

Cause No. 45073 OUCC DR 3-1



Evansville Water Utility 6,000,000 Gallon UG.S.T



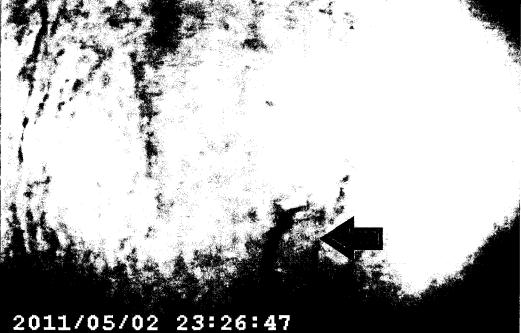


Photo shows sediment and debris in the tank. We recommend that cleaning be performed in order to more accurately determine the condition of the interior floor as well as prevent contamination issues associated with excessive sedimentation buildup. 7

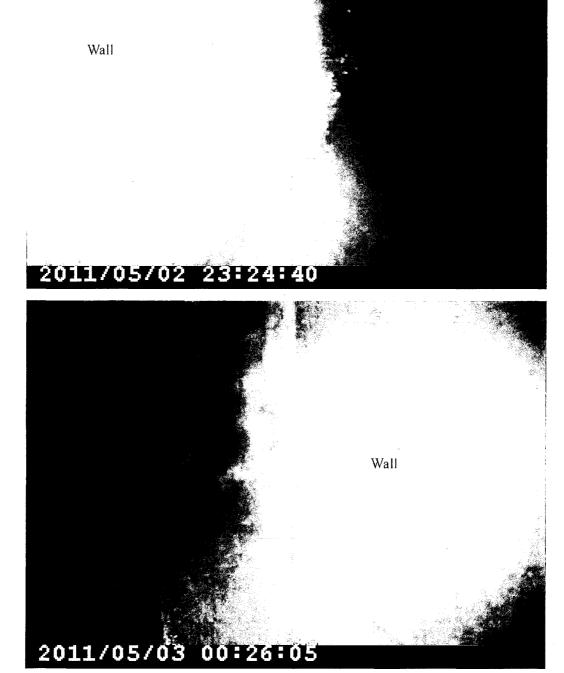
Pittsburg Tank & Tower Inc.

May 2, 2011

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Cause No. 45073 OUCC DR 3-1

Evansville Water Utility 6,000,000 Gallon UG.S.T



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Pittsburg Tank & Tower Inc.

Pittsburg Tank & Tower

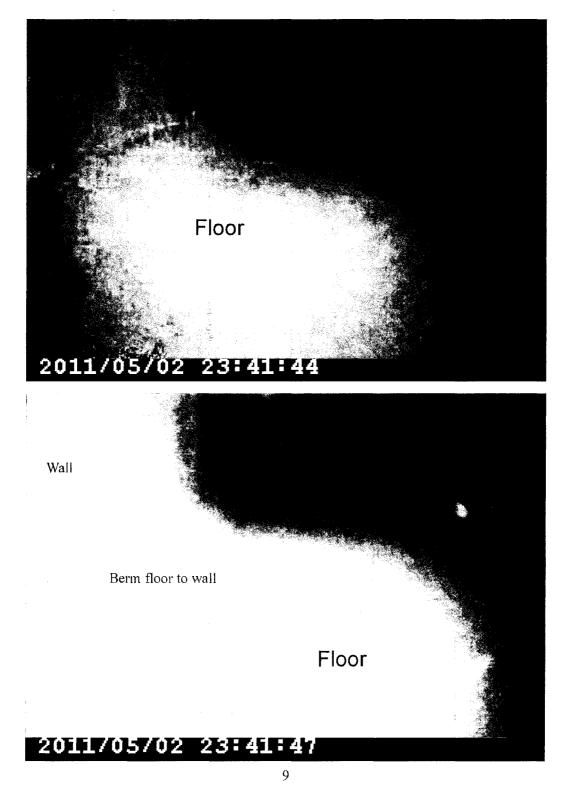
May 2, 2011

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Cause No. 45073 OUCC DR 3-1 Page 9 of 15



Evansville Water Utility 6,000,000 Gallon UG.S.T



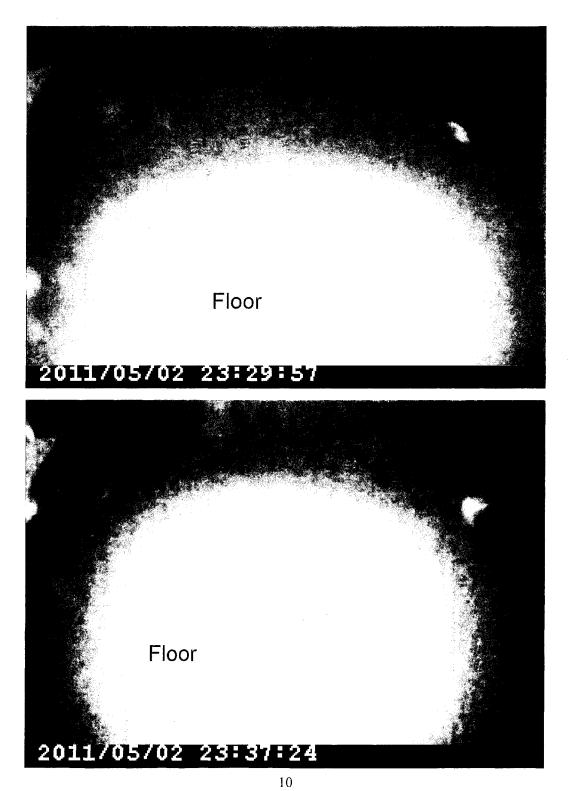
Pittsburg Tank & Tower Inc.

May 2, 2011

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Pittsburg Tank & To

Cause No. 45073 OUCC DR 3-1 Page 10 of 15 6,000,000 Gallon UG.S.T



Pittsburg Tank & Tower Inc.

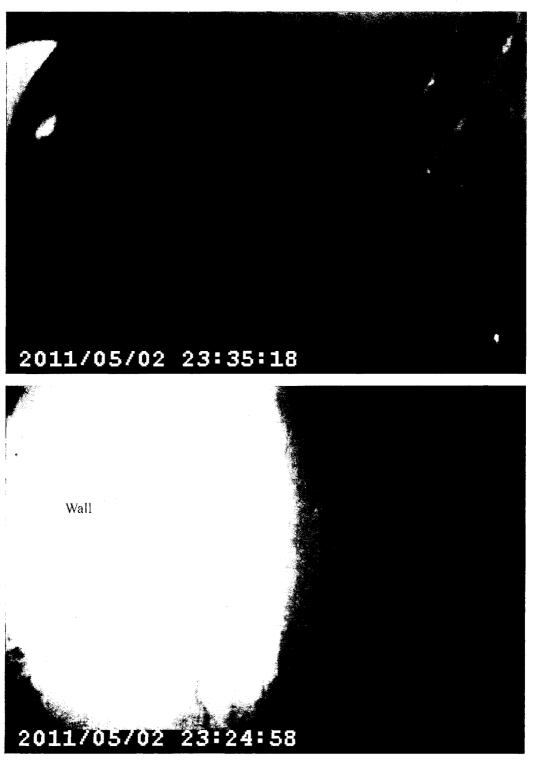
May 2, 2011

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SINCE - 1919 Pittsburg Tank & Tower

Evansville Water Utility ^{Page 11 of 15} 6,000,000 Gallon UG.S.T



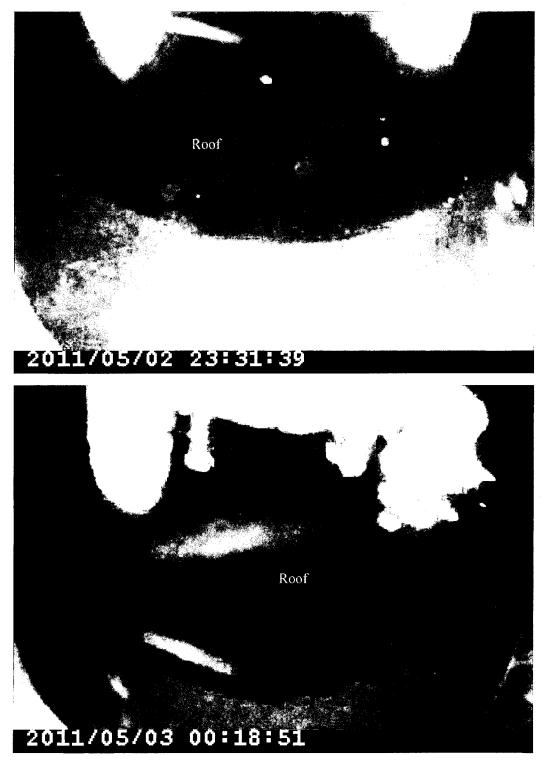
Pittsburg Tank & Tower Inc.

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Evansville Water Utility 6,000,000 Gallon UG.S.T





Pittsburg Tank & Tower Inc.

May 2, 2011

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	Cause No. 45073
	OUCC DR 3-1
DITTODUDC TANK & TOWED CO INC	Page 13 of 15
PITTSBURG TANK & TOWER CO., INC.	627
P.O. Box 913 Henderson, KY 41419-0913 * TEL (270) 826-9000 * FAX (270) 827 4417	Contraction of the second seco
PAINT*REPAIR*DISMANTLE*INSPECT*TANKS RAISED, LOWERED AND MOVED*NEW & USED	1919
UNDERGROUND STORAGE INSPECTION REPORT	
JOB NO: <u>311163</u> INSPECTOR: <u>Daniel Lindsey</u>	
TANK OWNER:Evansville Water Utility	
OWNER'S REPRESENTATIVE: <u>Roger Johnson</u> TITLE: Project Manag	ger
MAILING ADDRESS: 1931 Allens Lane	

PHYSICAL ADDRESS: 1931 Allens Lane

CITY/STATE: _____Evansville, IN ______ZIP: ____47711

COUNTY TANK IS LOCATED IN: Vanderburg

 TELEPHONE:
 (812) 421-2120 ext 2204
 FAX:
 (812) 421-2116

LOCATION OF TANK: Water Dept

Evansville Water Utility 1931 Allens Lane Evansville, IN 47711 May 2, 2011 Roger Johnson, Project Manager (812) 421-2120 ext 2204

ORIGINAL CONTRACT NO:	unavailable	YEAR BUILT: unavailable
ORIGINAL MANUFACTURER:	unavailable	_CAPACITY: 6,000,000 Gallon
DATE OF LAST INSPECTION:	unavailable	TYPE: Potable
LENGTH: <u>500' +</u>	WIDTH:	DEPTH:
TYPE CONSTRUCTION: WEL	DED: RIVETED:	
ACCOUNT EXECUTIVE:P	atrick Heltsley	

Cause No. 45073 OUCC DR 3-1 Page 14 of 15



PITTSBURG TANK & TOWER CO., INC.

P.O. Box 913 Henderson, KY 41419-0913 * TEL (270) 826-9000 * FAX (270) 827 4417 PAINT*REPAIR*DISMANTLE*INSPECT*TANKS RAISED, LOWERED AND MOVED*NEW & USED

UNDERGROUND STORAGE CODE UPDATES

Item	Deficiency	Not-Appli	cable NFPA 22 2008 Code Numbers as Applicable
Roof Manway(s)	X		AWWA D100-05, section 7.1: Shell manholes
Manway Davit(s)		X	AWWA D100-05, section 7.1: Shell manholes
Confined Space Entry Signs	Х		TSS Sec. 7 7.0.12 Safety OSHA 1910.146 (C) (2): Confined spaces
Shell to Roof Access Ladder		X	AWWA 7.4 Access 7.4.1 Ladders General, 7.4.2.1, 7.4.2.2, 7.4.2.4
Safety Climb Devices		X	AWWA 7.4 Access 7.4.1 Ladders General, 7.4.2.1, 7.4.2.2, 7.4.2.4
Standoffs on 10' Centers		X	AWWA 7.4 Access 7.4.1 Ladders General, 7.4.2.1, 7.4.2.2, 7.4.2.4,
Screen on Overflow		X	AWWA D100-05 section 7.3: Overflow
Interior Shell Ladder		X	AWWA 7.4 Access 7.4.1 Ladders General, 7.4.2.1, 7.4.2.2, 7.4.2.4,

Cause No. 45073 Attachment DR1 Page 15 of 19

Cause No. 45073 OUCC DR 3-1



PITTSBURG TANK & TOWER CO., INC. ^{Bage 15 of 15}

P.O. Box 913 Henderson, KY 41419-0913 * TEL (270) 826-9000 * FAX (270) 827 4417 PAINT*REPAIR*DISMANTLE*INSPECT*TANKS RAISED, LOWERED AND MOVED*NEW & USED

RECOMMENDATIONS

NUMBERS REFER TO REPORT PAGES

- 00. Install 30" x 30" manway at far end of tank. This will access to whole tank for cleanout purposes.
- 2. Install a 4" curb with a 2" overlap cover on the street ring
- 3. Install a 4" curb with a 2" overlap cover on the street ring
- 4. Install AWWA and OSHA approved shell ladder at end manway Install a cable type ladder safety climb device
- 5. Install AWWA and OSHA approved shell ladder at mid manway Install a cable type ladder safety climb device
- 6. INTERIOR PAINT SYSTEM: Remove all surface mortars or overlays, chisel cracks and holes, pressure wash to clean surface area, cracks and holes, then repair these areas (as well as rock pockets and honeycombing) with Krystol Bari-Cote. After repairs are made,apply a Kryton T1/T2 waterproof coating. All concrete preparations and product application will be performed to product specifications and will have a ten (10) yr. limited warranty.

Crack chiseling repair in excess of 100 ft. will be done at a rate of \$45.00 per linear foot.

7. Perform cleanout of tank

BASED ON THE NUMBER OF ITEMS ACCEPTED, PRICES MAY VARY. All prices are in U.S. Dollars If union labor or prevailing wage is required add 20% For additional copies of this inspection report call (270) 826-9000 Ext. 253.

The inspection report and comments reflect the general condition of the tank. However, we can not guarantee that additional deficiencies may not become apparent during the cleaning, repair or paint process of the tank.

The handling, removal and/or disposal of hazardous or contaminated materials such as asbestos, lead, chemical or any like substance that requires special handling is not included in the price submitted for work herein. Paint prices do not include logo, lead abatement or containment.

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OUCC DR 11-2

DATA REQUEST

City of Evansville Cause No. 45073

Information Requested:

Reference Petitioner's Exhibit No. 2-R, Patrick R. Keepes Rebuttal testimony, page 7, lines 15 to 16 which estimates the clearwell maintenance period to be 8+ weeks. Please provide the following:

- a. All clearwell maintenance work tasks that would be completed.
- b. All reports, studies, evaluations and engineering documents that were prepared prior to Mr. Keepes' Rebuttal testimony identifying the clearwell maintenance work items that would be required.
- c. Whether clearwell maintenance would be performed around the clock, seven days per week or whether it would be performed under a normal work schedule of eight hours per day, five days per week. If Evansville has not identified a specific work schedule, so state.
- d. All reports, studies, engineering documents or scheduling analyses supporting Mr. Keepes testimony that clearwell maintenance would require 8+ weeks.

Information Provided:

- a. As detailed in 45073 Response to OUCC DR 3, the tank end and tank mid-way shell ladders are significantly deteriorated and are not compliant with current Occupational Health and Safety Administration (OSHA) regulations. Replacement of these shell ladders needs to be performed along with the installation of cable-type ladder safety and fall arrest systems. Other interior repairs and maintenance needed are the removal of mortars and overlays and, after removal of these mortars and overlays, these surfaces along with existing cracks and honeycombed areas that have developed over the years would be power washed. Then, chemical grout injection (or other appropriate repairs) would be performed on the cracks, honeycombed areas and rock pockets would be patched, and all of these areas would be filled and sealed to preserve and extend the life of the structure.
- b. See the attached and previously provided document titled 6 Million Gallon Clearwell Inspection Report Dated May 2, 2011 (OUCC DR 3-1.pdf).

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- c. The plans and specifications have not yet been developed for these repairs, but those documents and the eventual contract would be worded and structured to provide for extended working hours and days in order to minimize the out-of-service time for the clearwell.
 - Title Duration Step Description Isolate clearwell Close sluice gate and install plate 1 to 2 days 1 over upstream end of 60-inch influent pipe 2 Drain clearwell Utilize high service pumps down 2 to 3 days to 5' level then use portable pumps, dechlorinating and pumping to sanitary sewer 3 Clean clearwell Power wash all interior surfaces 1 to 2 weeks of clearwell; Pump accumulated water to sanitary sewer 4 Complete repairs Replace ladders 3 weeks Remove mortars and overlays Power wash surfaces with mortars and overlays removed Chemical grout injection(s) as needed (assume no more significant repairs are needed) Patch honeycombed areas and rock pockets Seal repairs Concurrently with clearwell repairs, the 60-inch influent would be inspected and needed repairs identified 5 Fill clearwell Completely fill clearwell for 2 to 3 days disinfection and water tightness test Disinfect clearwell 2 days 6 Two passing samples 24 hours
- d. Following is the estimated schedule:

		apart			
7	Water tightness test	Simultaneous test while disinfection occurs			
8	Return clearwell to service	Open sluice gate and remove plate from influent pipe	1 day		
	Adverse weather contingency	High river level	2 weeks		
	Additional repair contingency	More substantial repairs required for clearwell	1 week		
		Repairs needed for 60-inch influent pipe			
Total Duration		Approximately 8 weeks (with no contingencies or unforeseen circumstances)			

		Eñ	alheeris	San Start		MAC 22	Marine Marine		Antonio -
EWSU Project Number	Project Name,	Cost	gineer's struction stimate at %Design	Construction Contract/Amount,	No: of Bidders	Ĥiĝh Bid	'Bid Average	Bid Opening Date	BITAWEDIGE (C
W10961	Stringtown Road	\$	704,311	\$ 728,964	3	\$ 827,243	\$ 769,402	2/14/17	2/28/17
W11094	Hi-Rall Pedestrian Trail	\$	797,325	\$ 449,822	5	\$ 914,254	\$ 661,447	6/20/17	7/5/17
W11092	Western Terrace Phase II	\$	1,632,800	\$ 1,069,897	3	\$ 1,798,000	\$ 1,377,846	7/5/17	8/1/17
W11090	Lant Circle / Bayard Park	\$	1,239,035	\$ 1,254,309	3	5 1,472,360	\$ 1,375,318	7/18/17	8/1/17
W11077	Weinbach Ave, Lloyd to Pollack	\$	3,894,824	\$ 5,250,000	3	\$ 5,809,008	\$ 5,531,714	7/18/17	8/1/17
W10649	Keck Ave, Grand to Stringtown	\$	849,177	\$ 837,753	5	\$ 974,944	\$ 881,574	8/29/17	9/12/17
W11104	Heidelbach Ave, Morgan to Olmstead	\$	2,029,000	\$ 2,022,696	4	\$ 2,523,015	\$ 2,134,118	9/12/17	9/26/17
W11093	St James, Morgan to Keck	\$	392,045	\$ 295,740	5	\$ 492,112	\$ 374,502	11/14/17	11/28/17
W11097	Melody Hill, St. George Road, Twickingham to Oak Hill	\$	3,993,000	\$ 2,167,191	7	\$ 3,427,140	\$ 3,045,721	1/23/18	2/6/18
W10960	Kratzville Phase IV (West Mill Road) / Mohr Road	\$	1,375,830	\$ 562,656	5	\$ 1,229,793	\$ 779,480	2/20/18	3/6/18
W11108	Green River Road Phase VI, VII	\$	2,492,510	\$ 1,484,205	6	\$ 2,512,269	\$ 2,058,605	2/20/18	3/6/18
W11023	Walcott, West of Van Ness	\$	90,000	\$ 66,214	3	\$ 114,974	\$ 83,986	3/6/18	3/20/18
W11089	Vanderburgh Neighborhood Phase II	\$	546,000	\$ 407,805	4	\$ 572,939	\$ 489,437	5/1/18	5/15/18
W10942	Vanderburgh Neighborhood Phase I, Schaller Ln	\$	1,644,000	\$ 859,748	6	\$ 1,395,015	\$ 1,107,606	5/1/18	5/15/18
W11095	Lodge Ave, Walnut to Riverside	\$	5,400,000	\$ 3,989,513	4	\$ 6,063,556	\$ 4,547,029	6/12/18	6/26/18
W11122	Mt. Auburn Road, Optimist to Buchanan	\$	650,000	\$ 469,916	4	\$ 636,660	\$ 573,880	6/12/18	6/26/18
W77475	Chestnut Street, 4th to 2nd	\$	591,325	\$ 449,723	2	\$ 467,273	\$ 458,498	7/10/18	7/24/18

OUCC DR 8-10

DATA REQUEST

City of Evansville Cause No. 45073

Information Requested:

On page 15 of his rebuttal testimony, Mr. Baldessari estimates interest earnings of \$2.9 million. Please provide a copy of the calculation used to determine the \$2.9 million figure. If Excel was used, please provide a copy of the Excel worksheet, with formulas intact.

Information Provided:

See Attachment OUCC DR 8-10 for the calculation used to determine the estimated \$2.9 million in interest earnings.

Attachments:

OUCC DR 8-10.xlsx

Cause No. 45073 Attachment DR7.1 Page 1 of 1

at the 2018 Fall Festival!

Look for the Evansville Water & Sewer Utility's banner at the Fall Festival and see how we're helping festival booths safely dispose of fats, oils and grease!



Visit EWSU.com/FOG to learn how to become a FOG detective!

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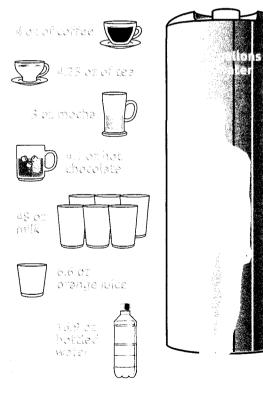
Plan Ahead: Christmas Tree Disposal

Christmas tree disposal is available to Evansville city residents beginning Wed, Jan 2, through Fri, Jan 11. Residents may dispose of five Christmas trees without decorations and cut in half, if possible. Place Christmas tree next to your trash and recycling cart for pickup on your normal scheduled day of service

CHOOSE TAP WATER

Choosing tap water helps you stay hydrated and saves you money.

With \$1. you can buy:



Evansville water and sewer utility

GET THE DROP!



A quarterly newsletter for giving your life a little boost.

Malcome to silit 7880 P 2007, o qualtoriy nowstatter Bloot Evansmue Materià Sanio (1958), deduated Lo kooping vou mbormor apone your local Unitlar and holimpu you learn more about one of it els most important losources ()

WATER!

...you'll find helpful tips for your home and family, fun facts about water and your world, and important information from EWSU. We hope you enjoy each and every issue and welcome your feedback.

Visit us at www.EWSU.com to learn more.

Did you know?





Cause No. 45073 Attachment DR8 Page 1 of 2

Winter Weather Prep THERMOSTAT: Set to Drain spigots. Close inside same temperature valve, then open spigot and PIPES IN ATTIC/CRAWL Winter is just around the corner-use day and night. allow water to drain. Keep SPACE/GARAGE: Use foam these tips to help prepare your home the outside valve open to pipe insulation or wrap and avoid freezing water lines. keep any remaining water pipes in heat tape. from bursting the pipe. Keep garage doors closed. POOLS & SPRINKLERS: Drain Disconnect, drain and water in supply lines according store garden hoses. to manufacturer directions. **KITCHEN/BATHROOM**: Open cabinets to allow warm air to circulate EXTERIOR WALLS THAT HAVE PIPES: Install extra insulation. In around plumbing. an emergency, 1/4'' of newspaper can provide a temporary fix.

ACROSS

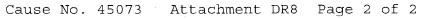
- 4. The Ohio River meets the Mississippi River in this state
- 7. About 97% of the earth's water is undrinkable
- 8. Waterfalls located on the border of the U.S. and Canada.
- 9. The average person uses _____ gallons of water each day.
- 10. The largest Great Lake in the U.S.
- 12. Water when it freezes.
- 13. 128 fl oz makes this.

DOWN

- 1. Water is comprised of the elements _________ and oxygen.
- 70% of the human _____is made up of water;
- 3. The _____ River is the longest river in the U.S.
- 5. San Francisco's famous Karl.
- 6. A slow-moving mass of ice.
- 9. Water will _____at 32 degrees F.
- 10. The gas state of water is called
- til. ____drops keep falling on my head.
- 14. An area filled with water and surrounded by land.

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All About Nater!



CAUSE NO. 45073 ATTACHMENT 7.2

EVANSVILLE (INDIANA) WATERWORKS DISTRICT

SCHEDULE OF ESTIMATED DRAW DOWNS ON BONDS

\$111,175,000 Principal Amount of 2018A SRF Bonds (Per Utility Management & Consulting Engineers)

Account:	Proposed Project	
Plus Bond issue	\$111,175,000	
Plus interest income rounded		\$2,240,900 **
Less amount drawndown from BAN	-	
Less debt service reserve amount	(7,731,800)	
Less capitalized interest	-	
Less allowance for issuance costs	(677,800)	
Net bond issue to be drawndown	\$102,765,400	
Monthly construction cash drawdown*	\$2,854,600	

* Assumes a 36 month construction period.
** Assumes earned ratably over the construction period.

<u>Month</u>	Estimated Draw downs	Running Total	1.50% Interest	Semiannual Interest Income	Annual Interest Income
November **	\$2,854,600	\$99,910,800	\$0		
December	2,854,600	97,056,200	121,300	\$239,100	\$239,100
January, 2019	2,854,600	94,201,600	117,800	\$239,100	\$259,100
February	2,854,600	91,347,000	114,200		
March	2,854,600	88,492,400	110,600		
April	2,854,600	85,637,800	107,000		
May	2,854,600	82,783,200	103,500		
June	2,854,600	79,928,600	99,900	653,000	
July	2,854,600	77,074,000	96,300	055,000	
August	2,854,600	74,219,400	92,800		
September	2,854,600	71,364,800	89,200		
October	2,854,600	68,510,200	85,600		
November	2,854,600	65,655,600	82,100		
December	2,854,600	62,801,000	78,500	524,500	1,177,500
January, 2020	2,854,600	59,946,400	74,900	524,500	1,177,500
February	2,854,600	57,091,800	71,400		
March	2,854,600	54,237,200	67,800		
April	2,854,600	51,382,600	64,200		
May	2,854,600	48,528,000	60,700		
June	2,854,600	45,673,400	57,100	396,100	
July	2,854,600	42,818,800	53,500	390,100	
August	2,854,600	39,964,200	50,000		
September	2,854,600	39,904,200	46,400		
October	2,854,600	34,255,000	40,400		
November	2,854,600	31,400,400	39,300		
December	2,854,600	28,545,800	35,700	267,700	663,800
			32,100	207,700	005,800
January, 2021 February	2,854,600 2,854,600	25,691,200 22,836,600	28,500		
March	2,854,600	19,982,000	25,000		
	2,854,600	17,127,400	23,000		
April	2,854,600	14,272,800	17,800		
May		11,418,200	14,300	139,100	
June July	2,854,600 2,854,600	8,563,600	14,300	139,100	
5		, ,	,		
August September	2,854,600	5,709,000	7,100 3,600		
October	2,854,600	2,854,400 0	3,600	21,400	160,500
	2,854,400	U		21,400	100,000
Totals	\$102,765,400		\$2,123,100	\$2,240,900	\$2,240,900

EVANSVILLE (INDIANA) WATERWORKS DISTRICT

SCHEDULE OF ESTIMATED DRAW DOWNS ON BONDS \$36,180,000 Principal Amount of 2018B Open Market Bonds (Per Utility Management & Consulting Engineers)

Account:	Proposed Project	
Plus Bond issue	\$36,180,000	
Plus interest income rounded		\$653,500 **
Less amount drawndown from BAN	-	
Less debt service reserve amount	(2,679,900)	
Less underwriter's discount	(542,700)	
Less allowance for issuance costs	(726,300)	
Less capitalized interest	(1,371,800)	
Net bond issue to be drawndown	\$30,859,300	
Monthly construction cash drawdown*	\$857,200	

* Assumes a 36 month construction period.

** Assumes earned ratably over the construction period.

Month	Estimated Draw downs	Running Total	1.50% Interest	Semiannual Interest Income	Annual Interest Income
5 1 ++	8855 200	#30.003.100	6 0	¢۵	# 0
December ** January, 2019	\$857,200 857,200	\$30,002,100 29,144,900	\$0 36,400	\$0	\$0
2.7	857,200	28,287,700	35,400		
February March	857,200	27,430,500	33,400		
	837,200		33,200		
April	857,200	26,573,300 25,716,100	32,100		
May	857,200	24,858,900	31,100	202,500	
June	857,200		30,000	202,500	
July	857,200	24,001,700 23,144,500	28,900		
August	857,200	22,287,300	28,900		
September October	857,200	21,430,100	26,800		
November	857,200	20,572,900	25,700		
December	857,200	19,715,700	24,600	163,900	366,400
January, 2020	857,200	18,858,500	23,600	103,900	300,400
February	857,200	18,001,300	22,500		
March	857,200	17,144,100	22,300		
April	857,200	16,286,900	20,400		
May	857,200	15,429,700	19,300		
June	857,200	14,572,500	18,200	125,400	
			17,100	125,400	
July	857,200	13,715,300	,		
August	857,200	12,858,100	16,100		
September	857,200	12,000,900	15,000		
October	857,200	11,143,700	13,900		
November	857,200	10,286,500	12,900	06 000	212 200
December	857,200	9,429,300	11,800 10,700	86,800	212,200
January, 2021	857,200	8,572,100	,		
February	857,200	7,714,900	9,600		
March	857,200	6,857,700	8,600		
April	857,200	6,000,500	7,500		
May	857,200	5,143,300	6,400	10 200	
June	857,200	4,286,100	5,400	48,200	
July	857,200	3,428,900	4,300		
August	857,200	2,571,700	3,200		
September	857,200	1,714,500	2,100		
October	857,200	857,300	1,100	10,500	60.000
November	857,300	0	0	10,700	58,900
Totals	\$30,859,300		\$637,500	\$637,500	\$637,500

EVANSVILLE (INDIANA) WATERWORKS DISTRICT

SCHEDULE OF INTERST EARNINGS ON CAPITALIZED INTEREST \$36,180,000 Principal Amount of 2018B Open Market Bonds

Month	Estimated Draw downs	Running Total		1.50% Interest	Interest Income
Beginning balance #1 June, 2019		\$733,800 733,800	*	\$6,400	
Beginning balance #2 January, 2020		\$638,100 638,100	*	\$9,600	
Totals				\$16,000	

*Interest payments as of July 1, 2019 and January 1, 2020.