ORIGINAL

STATE OF INDIANA

INDIANA UTILITY REGULATORY COMMISSION

JOINT PETITION O	F CITY OF EVANS	VILLE,)		
INDIANA AND JOHNSON CONTROLS, INC.		S, INC.	CAUSE NO. 44123	
FOR APPROVAL	OF A GUARAI	NTEED)		
PERFORMANCE	CONTRACT	AND)	APPROVED:	AUG 1 5 2012
ASSOCIATED FINANCING TERMS				WOR I 9 SOIS

ORDER OF THE COMMISSION

Presiding Officers: Larry S. Landis, Commissioner Jeffery A. Earl, Administrative Law Judge

On November 28, 2011, the City of Evansville, acting through its Water and Sewer Utility Board, ("Evansville") and Johnson Controls, Inc. ("JCI") (collectively "Joint Petitioners") filed a Joint Petition with the Indiana Utility Regulatory Commission ("Commission"), seeking approval and authorization as necessary for Evansville to enter into a guaranteed performance contract ("Contract") with JCI and to finance the assets and services to be provided by JCI.

Pursuant to notice and as provided in 170 IAC 1-1.1-15, the Commission held a Prehearing Conference and Preliminary Hearing at 9:30 a.m. on January 18, 2012, in Hearing Room 224, 101 West Washington Street, Indianapolis, Indiana. Proofs of the publication of the notices of the Prehearing Conference were incorporated into the record and placed in the official files of the Commission. Joint Petitioners and the Indiana Office of the Utility Consumer Counselor ("OUCC") appeared and participated at the Prehearing Conference. On January 25, 2012, the Commission issued a Prehearing Conference Order in this Cause, which established the procedural schedule.

On March 29, 2012, the OUCC filed a Notice of Request for Field Hearing, which contained the signatures of forty-five individuals who requested that a field hearing be held in Evansville to accept public comments on this case. On April 13, 2012, the Presiding Officers issued a Docket Entry, which indicated that the Evidentiary Hearing in this Cause would be streamed live over the internet. The Docket Entry also allowed members of the public to file written comments with the OUCC within fourteen days after the evidentiary hearing. On April 17, 2012, the OUCC filed the public comments it had received to that date.

Pursuant to notice published as required by law, the Commission convened an Evidentiary Hearing at 9:30 a.m. on April 19, 2012, in Hearing Room 222, 101 West Washington Street, Indianapolis, Indiana. Proofs of publication of the notice of the hearing were incorporated into the record and placed in the official files of the Commission. Joint Petitioners and the OUCC appeared, presented their respective cases-in-chief, and offered their witnesses for cross-examination. Joint Petitioner also presented its rebuttal evidence. No members of the public attended the hearing. On May 3, 2012, the OUCC filed additional written comments that it had received from members of the public after the hearing. All public comments submitted by the OUCC were admitted into the

official record of this Cause. On May 9, 2012, Joint Petitioners filed supplemental rebuttal testimony, responding to ratepayer comments.

Having considered the evidence presented in this proceeding and the applicable law and being duly advised, the Commission now finds:

- 1. <u>Commission Notice and Jurisdiction</u>. Due, legal, and timely notice of the hearing conducted by the Commission in this Cause was given as provided by law. The City of Evansville, acting through its Water and Sewer Utility Board, is a "municipally owned utility" as defined in Ind. Code § 8-1-2-1. Evansville's water utility is subject to the jurisdiction of this Commission in the manner and to the extent provided by the laws of the State of Indiana. Evansville's sewer utility is not subject to Commission jurisdiction. Evansville seeks approval pursuant to Ind. Code ch. 8-1.5-2 to issue debt to finance the Contract with JCI. Therefore, the Commission has jurisdiction over Evansville's water utility and the subject matter of this proceeding.
- 2. <u>Joint Petitioners' Characteristics.</u> Evansville is a municipality organized under the laws of the State of Indiana and located in Vanderburg County. Evansville owns, operates, manages, and controls a water utility for the production, treatment, and distribution of water to the public in the Evansville area. Evansville also owns, operates, manages, and maintains facilities for the collection, treatment, and disposal of wastewater generated by the public. JCI is engaged in the business of evaluating utility operations, identifying opportunities for energy and other savings, and implementing actions to realize those savings.
- 3. Relief Requested. Evansville and JCI entered into the Contract pursuant to Ind. Code ch. 36-1-12.5. Under the terms of the Contract, JCI will purchase and install approximately 63,000 new water meters and a data service and meter reading system. The Contract also includes a maintenance, testing, and replacement program. Joint Petitioners seek approval of the Contract to the extent necessary under Ind. Code ch. 8-1.5-2. Joint Petitioners assert that the Contract guarantees increased revenues and cost savings sufficient to pay for the cost of financing the Contract. Evansville seeks authorization pursuant to Ind. Code ch. 8-1.5-2 to issue debt to finance the construction of the project.
- 4. <u>Joint Petitioners' Evidence</u>. James A. Garrard, Interim Director of the Evansville Water and Sewer Utility, submitted evidence on behalf of Evansville. Mr. Garrard provided a history of the negotiations with JCI. The utility was approached by a vendor in 2009 for the purpose of soliciting serious interest in pursuing projects to increase efficiencies. In 2010, JCI approached Evansville on a similar basis, including installation of an automatic meter reading system. As a result of these discussions, Evansville issued a Request for Proposal. In response, Evansville received proposals from JCI and Energy System Group. Mr. Garrard formed a team to review the two proposals: that process took six months, and Evansville chose JCI as the appropriate vendor. Evansville then entered into a project development agreement with JCI, which permitted JCI to review the Evansville system and develop a final proposal. JCI made a thorough evaluation of the water and wastewater systems and submitted an initial proposed contract. Beginning in the summer of 2011, the parties commenced negotiations, which resulted in the approval of the Contract on November 15, 2011.

Mr. Garrard detailed Evansville's objectives in negotiations with JCI. The primary objective was to insure that the project would benefit Evansville's customers. Second, Evansville

wanted to insure that the projected cost savings were achievable. As part of Evansville's due diligence, it retained Umbaugh and Associates to analyze JCI's benefit calculations. Mr. Garrard testified that Evansville was certain, from an operational standpoint, that implementation of JCI's proposal would significantly increase the accuracy of Evansville's meters, which would result in increased revenues over the current metering system. In addition, the wireless network will allow for improved efficiency of Evansville utility's field crew, who will be able to receive real time work orders, field data, and GIS information.

Mr. Garrard testified why he believes the Contract is in the public interest and should be approved by the Commission. The Contract provides the utility the unique opportunity to reduce its costs for the benefit of its ratepayers. The annual projected benefits of the Contract to ratepayers are detailed in Schedule 2 of the Contract. Once the system is implemented, it will provide very accurate meter reading, which will enhance the utility's ability to recover appropriate revenues from its ratepayers. Under the new system, there will be no estimated bills. The system will also provide access for customers to track their usage online. Mr. Garrard opined that this feature will encourage customers to engage in conservation. The system will enable the utility to flag odd usage patterns. For example, if a customer's usage increased by an unusual percentage, the utility could investigate for leaks, which ultimately could save both the customers and the utility money.

The new system will also give field workers better information. Currently, field workers are required to take paper copies of maps showing service lines and work history when completing work projects. Under the new system, all of this information will be available electronically. Assignments of field work will also be done electronically, meaning field workers will not have to return to the shop before proceeding to the next job site. Evansville is in the process of implementing a new billing and work order/asset management system which will be enhanced by the physical structures to be completed under the Contract. In addition, Mr. Garrard believes that the new system will result in energy usage savings.

Mr. Garrard discussed Evansville's proposal to allocate the benefits and costs of the Contract between the water utility and the sewer utility. As detailed by Mr. Baldessari, Evansville allocated the cost of the new automated meters and the basic communication network equally to the two utilities. Where appropriate, specific costs were directly assigned to each system. Evansville closely compared the costs of the projects to the benefits estimated by JCI for each utility to ensure that each utility received a benefit from the project. Mr. Garrard opined that the allocation methodology was fair and appropriate.

Douglas L. Baldessari, a Certified Public Accountant with the firm of H. J. Umbaugh & Associates, testified regarding financing the Contract and the cost allocation between the water and sewer utilities. Evansville retained H.J. Umbaugh & Associates to provide advice on financing options and the loan repayment structure to finance the assets and services to be provided by JCI under the Contract. The firm's analysis was based on information that was detailed in the Contract or otherwise provided by JCI, and the study was summarized in an accounting report dated December 20, 2011.

Mr. Baldessari stated that page 4 of the accounting report displays the scheduled project costs and funding for the assets and services to be provided by JCI. The total construction and non-construction costs of the Contract are \$51,313,432. To this amount, Mr. Baldessari added estimated issuance costs and capitalized interest, resulting in a total project cost of \$56,690,000. Mr.

Baldessari stated that Evansville anticipated financing the project with proceeds of a proposed installment contract or lease under Ind. Code ch. 36-1-12.5. The allocated project costs to the water utility, assuming installment contract financing, are \$18,425,000. Mr. Baldessari allocated 50% of the costs for the meters and the wireless data network required for the automated meter reading system to each utility. He said that the other asset costs were allocated directly based on the function of the assets.

Mr. Baldessari testified that the payments on the installment contract are anticipated to be made from the increased revenues and cost savings guaranteed by JCI. The accounting report assumes a total, estimated contract cost of \$56,690,000 financed over a term not to exceed 20 years from completion of construction at a maximum interest rate of 5%. The amortization of the installment contract for the water utility-allocated project cost was based on an assumed interest rate of 3.9%. Page 7 of the accounting report compares the water utility's allocated share of the guaranteed benefit with the estimated installment contract payments. According to the accounting report, the net guaranteed benefit for the water utility exceeds the installment contract payments by \$87,492.

Mr. Baldessari noted it is possible that Evansville could finance the costs of the project in some other manner. Although the installment contract financing was the preferred method, he said that due to the size of the project and possible market conditions, Evansville is also requesting approval to finance the Contract by means of revenue bonds, bond anticipation notes, installment purchase contracts, capital leases, or certificates of participation.

Mr. Baldessari stated that he analyzed the benefits guaranteed by JCI by conducting testing on a sample basis of JCI's guaranteed benefit calculations. He applied current utility costs, wage rates, payroll overhead rates, and water and sewer utility rates to the assumptions and calculations prepared by JCI. He concluded that the assumptions, studies, and calculations prepared and provided by JCI appeared to be reasonable.

Michael E. Popa, JCI's Area General Manager for Indiana, testified regarding JCI, its qualifications to perform the Contract, and how Evansville and its customers will benefit from the Contract. Since the mid-1970s, JCI has entered into more than 3,000 performance contracts of various types, including contracts with the cities of Anderson, Bedford, Indianapolis, Mt. Vernon, Princeton, and South Bend, Indiana. Mr. Popa highlighted JCI's extensive experience as a market leader in performance contracting and its overall financial strength as a Fortune 100 company with fiscal-year-2011 revenues exceeding \$44 billion. He also noted that JCI is a "qualified provider" under Indiana's performance contracting statute, Ind. Code §§ 36-1-2.5-3(a)(2) and 36-1-2.5-3(a)(3).

Mr. Popa stated that, as a result of the Contract, Evansville will receive a new state-of-theart advanced metering infrastructure system along with maintenance, testing, and replacement as needed for 20 years. The system includes more than 60,000 new advanced water meters, with registers and transmitters that allow them to be read remotely and on an automated basis. JCI will also provide administrative support to ensure integration of the new system with Evansville's billing and customer support activities. Mr. Popa said the Contract also contains significant benefits for Evansville's sewer utility operations. Regarding water customers, Mr. Popa highlighted a number of advantages over the current system. Presently a customer experiencing a water leak might go several months before the customer or the utility is aware of the leak. The new system, however, will be capable of detecting abnormal usage and automatically generating a service order for a technician to investigate. This feature is expected to allow the customer and the utility to identify and address leaks more quickly, reducing the amount of water wasted and the possibility of unusually large bills. The new meters will also be more accurate than Evansville's current meters. This increased accuracy will allow for a more equitable assignment of the utility's costs among its customers. The advanced technology will enable Evansville to eliminate estimated bills and offer more flexible billing options to its customers. Mr. Popa also discussed the potential for other public entities and individuals to access the new wireless and fiber technology infrastructure to be deployed as part of this Contract. Finally, JCI's performance guarantee obligates it to conduct testing by an independent third party of a predetermined number of new meters selected at random, using American Water Works Association ("AWWA") M6 guidelines.

Mr. Popa described the Contract's benefits as falling into two categories: measured benefits and non-measured benefits. Non-measured benefits include labor cost savings as employees currently assigned to read meters retire or are reassigned to other jobs in city government. Since the new water meters will automatically upload usage data via the wireless platform to the utility's system, manual reading of meters will no longer be necessary. Measured benefits include energy savings at the utility's treatment plants and additional billable revenues from the water utility's operations.

Mr. Popa emphasized that what JCI is guaranteeing is the performance of the meters, using AWWA M6 guidelines. The performance guarantee is straightforward and will be measured and reconciled annually. JCI will annually select a statistical sample set of meters that will be tested using an independent third party. The test results will be compared to the guaranteed accuracy value. If the accuracies in any year are at or above guaranteed values, the guarantee is deemed met. If the accuracies are less than those guaranteed by JCI, additional testing may be performed at JCI's expense and with Evansville's agreement to ensure that the statistical sample test set is a true representation of the actual population of meters. If other than guaranteed values of accuracy are measured, the annual accuracies will be inserted into the original modeling tool to determine benefit overages or shortfalls. If the amount of benefit is determined to be less than the guaranteed benefit, JCI will pay any shortfall to Evansville. To prevent a shortfall from continuing in subsequent years, JCI has the right, at its expense, to fix the problems that resulted in the shortfall. Mr. Popa explained that in the event of a problem, JCI will pay for the shortfall during the year in which it was identified and then fix the problem so that it will not recur.

Mr. Popa testified that Evansville's increased revenues (measured benefits) and its decreased expenses (non-measured benefits) will together exceed Evansville's cost to enter into the Contract. Finally, he noted that the performance contract statute contemplates payment for a water-related project on an installment basis over the lesser of 20 years or the life of the improvements, the life of which in this case is expected to be at least 20 years.

5. <u>OUCC's Evidence</u>. Jeffery A. Fish, Utility Analyst in the OUCC's Water/Wastewater Division, testified regarding the operational responsibilities associated with the water utility's portion of the Contract and the pros and cons of an advanced meter reading infrastructure ("AMI") system. Pursuant to the Contract, the water utility is specifically responsible

for many aspects of the meter change out process, including inspecting meter vaults (pits) and meter valves and repairing any existing deficiencies prior to JCI's meter installations. These responsibilities could create significant project-related costs. Mr. Fish also identified numerous other possible issues that could result in increased costs for the utility. Mr. Fish testified that Joint Petitioners have not indicated whether the utilities planned or budgeted for any of these associated costs.

Mr. Fish listed some positive aspects of using an AMI system. By implementing an AMI system, the utility will provide more accurate and timely billing to its customers with significantly reduced billing errors. The AMI meters will also make it possible to eliminate many of the typical field-service work orders. A well implemented AMI system will provide customer-service representatives a wealth of information to use in resolving customer concerns related to water service and billing. With good, quality training, an experienced customer-service representative can identify water-loss problems in the customer's home with the use of graphically-displayed images of water use based on hourly, daily, and monthly water meter readings, which in many cases can save the customer money by quickly identifying excess usage. AMI software also analyzes every meter account for changes in water consumption that might indicate a problem. Additional benefits of an AMI system include: reducing billing disputes; reducing meter read recheck requests; reducing the need to use resources to defend the accuracy of the billing process; replacing old and slow reading meters with more accurate meters; freeing up field staff to perform field-service orders in a more timely manner; reducing or eliminating any backlog of work orders; and installing the correct type of water meter for the application.

On the negative side, Mr. Fish noted that the purchase and installation of an AMI system tends to be cost prohibitive for many utilities. Once the system is purchased and installed, it will need to be maintained and AMI equipment requires a much higher level of technical expertise than typical, manually-read water meters. Thus, the utility will need to designate skilled staff for the maintenance of AMI metering equipment. Failure to maintain AMI systems could ultimately result in not being able to generate customer billings on time. Customer-Service representatives will need training on how to use and maintain files created by the AMI system in order to be proficient in its use. Mr. Fish opined that it is very important for the utility to have an overall commitment to using the AMI system as a resource for improving customer service and not just as a complex replacement for manually reading meters.

Mr. Fish said that, if the AMI system is properly implemented, the water utility will achieve a much higher level of metering service for its water customers, which could significantly improve customer service in certain aspects of the utility's operations. Mr. Fish recommended that the Commission require the water utility to provide status reports to the Commission and the OUCC. Initially, during implementation, the water utility should provide project reports at six-month intervals indicating how many project meters JCI has installed. When JCI reaches substantial completion, the water utility should provide copies of project reports annually as described in page 153 of the Contract. He recommended the water utility also provide notice to the Commission and the OUCC in the event that substantial deviation from the proposed project would require significant change orders or additional costs.

Edward R. Kaufman, CRRA, a Senior Analyst with the OUCC, discussed guaranteed performance contracts and how they may fit into the regulatory process. First, Mr. Kaufman explained why guaranteed performance contracts do not cleanly fit into the regulatory process.

Petitioner plans to use increased revenues and decreased operating expenses to pay for the loan used to finance the project. But this assumption falls apart when a utility seeks a subsequent rate increase because the proposed loan would be included in future revenue requirements. Therefore, the proposed loan should be treated just like any other municipal request for financing authority. Mr. Kaufman pointed out that Petitioner did not know the precise terms of its proposed financing. Mr. Kaufman testified that the Commission and the OUCC should not be required to evaluate any financing arrangement for reasonableness where the basic terms are not yet definitively established.

Mr. Kaufman argued that the estimated savings of only \$87,492 from the Contract were quite small when compared to the total costs of approximately \$28.9 million – less than 0.3% of the estimated debt service. Mr. Kaufman said that even a very small change in the estimated interest rate (5 basis points) would turn the proposed Contract from an estimated net gain to an estimated net loss. In addition, the Contract depends upon many assumptions. Should these assumptions not occur, the Contract's estimated benefits could be overstated. For example, the Contract assumes a 2.8% inflation rate. But using an assumed rate of inflation of 2.7%, the estimated benefits turn from an estimated gain into a loss. In addition, Mr. Kaufman noted that the estimated benefits from the Contract will occur over 22.5 years. Mr. Kaufman questioned if this was significant, because the benefits of Guaranteed Performance Contracts are supposed to be measured over no more than 20 years.

Mr. Kaufman also discussed the Contract's estimated revenues from small meters. Mr. Kaufman said that the Contract's analysis tested a meter that contained an anomalous reading. This anomaly caused the analysis to understate the current meter accuracy of small meters and overstate the benefits that would be derived from replacing the residential meters. Excluding the anomalous meter from the sample would reduce the estimated savings of the Contract by more than \$500,000. Mr. Kaufman also pointed out a similar concern with the 2-inch meters that caused the estimated benefits of the Contract to be overstated. Mr. Kaufman explained that according to page 130 of the Contract approximately \$41.9 million or 50% of the estimated benefits will be derived from replacing or repairing Evansville's largest meters.

Mr. Kaufman concluded that strictly from a financial point of view, the estimated savings and enhanced revenues rely on many assumptions. The estimated benefits of the Contract are so relatively small that if any of the assumptions do not occur as projected, the total costs may outweigh the benefit of the increased revenues and decreased savings. However, Mr. Kaufman also concluded that the reasonableness of the projects should not necessarily depend on the projects generating the increased revenues to pay for the Contract. The key question to ask is whether the proposed projects are prudent. In other words, do they provide an operational benefit at a reasonable cost? If the answer is in the affirmative, the financing may be approved.

Mr. Kaufman recommended that Evansville be authorized to issue debt at an interest rate of 3.9% over 22 years (interest only for the first two years). Within ten business days after Evansville closes on its proposed loan, it should be required to provide to the Commission and the OUCC the actual terms of any financing agreement it signs to pay for the costs of its proposed project. Mr. Kaufman also recommended the Commission not authorize Evansville to issue debt using alternative financing mechanisms, such as those described generally by Mr. Baldessari on pages 5 and 6 of his testimony. If Evansville wishes to issue debt on terms that are different than those presented by Mr. Baldessari on page 6 of his accounting report, then it should be required to seek Commission authority once the precise terms of the proposed loan arrangements are known.

Finally, he recommended that a decrease or an increase in interest rates of no more than 25 basis points in procuring the loan should not require additional Commission authority.

6. <u>Joint Petitioners' Rebuttal Testimony</u>. Mr. Baldessari submitted rebuttal testimony on behalf of Evansville. He disagreed with Mr. Kaufman's statement that the water utility's anticipated funding source for the project is based on an unfounded premise. He agreed with Mr. Kaufman that increased revenues from more accurate billing and decreased operating costs resulting from more efficient operations will initially fund the project and that these increased revenues and decreased costs will eventually be reflected in the water utility's basic rates. However, Mr. Baldessari said the ratemaking process does not end there. He opined that the water utility must in the same case include a new revenue requirement element to service the debt associated with the project. Mr. Baldessari stated that if the pro forma annual debt service revenue requirements as reflected on page 6 of Exhibit DLB-1 are not included in the revised basic rates and charges, there can be no project. In Mr. Baldessari's opinion, the service of the debt for the project is and will be predicated on sound ratemaking principles that result in the benefits of the project resting with the customers.

In response to Mr. Kaufman's concern that the Contract was already executed before filing with the Commission, Mr. Baldessari did not believe this concern was valid. He stated that executing a contract before filing in no way impedes regulatory review. He noted that the agreement is contingent on Commission approval. In his opinion, this situation is no different than the Waterworks District adopting bond resolutions before seeking approval from the Commission for future issuance of long-term bonds.

Mr. Baldessari also disagreed with Mr. Kaufman's recommendation of not allowing alternative financing mechanisms. Evansville initially requested financing flexibility in order to obtain the best pricing and terms and conditions reasonably possible. Evansville intends to keep the Commission and the OUCC fully informed of the financing alternative ultimately utilized by filing a report detailing the pricing and the terms and conditions of the financing, which cannot be determined until closing.

Mr. Baldessari also said that that Evansville now had more clarification on the financing of the project. Based on current market conditions, Evansville will not be able to obtain a 20-year installment loan from a bank to finance the project. Instead, Evansville plans to finance the Contract with an installment payment contract pursuant to which the payment stream of the Contract will be fractionalized and marketed as a Certificate of Participation ("COP") bond issue. The payment obligations by Evansville under the contract will be secured by a stream of water and sewer utility revenues corresponding to the benefits of the project. The COP bond issue will be structured with a 22-year maturity schedule, with 2 years interest only and will likely include a junior sewer revenue pledge. Evansville is requesting Commission authorization for a COP bond issue since it appears to be the most economically advantageous financing alternative. Once the issue is closed, Evansville will file a report with the Commission and the OUCC detailing the pricing and the terms and conditions.

Rebutting Mr. Fish's concerns about potential additional operational costs for Evansville under the Contract, Mr. Popa described the turn-key nature of the equipment and services to be provided to the utility by JCI, including a suite of communications products, installation, and data management services. He also stated that Mr. Fish's speculation that Evansville may find it

necessary to inspect each meter vault and valve was unlikely and would be both unprecedented and unnecessary. Typically, a utility inspects one or a few samples per meter route, perhaps using a larger sample at the beginning of the project. Once the utility has confirmed its confidence in the correctness of JCI's installations, it can rely on random-sample testing as a sufficient quality-control check. Mr. Popa also testified that Mr. Fish's concern regarding Evansville's maintenance of a two-day stock of pit lids with transmitter holes is unfounded because JCI will not be replacing Evansville's pit lids. Rather, it plans to utilize Evansville's existing pit lids.

Mr. Fish identified a host of potential additional costs associated with this project that might diminish the projected savings. Mr. Popa responded that most of these, such as an isolation valve not functioning properly and faulty plumbing hindering a meter's replacement, reflect potential liability already present in Evansville's metering/distribution network. He also cited JCI's extensive due diligence, which included pulling 200 of Evansville's existing small meters and testing and repairing some 400 of its large meters, as a basis for confidence that the potential for unexpected additional expenses was minimal. He described additional funds available to Evansville, including: the \$1 million contingency fund provided by the Contract; \$300,000 in proceeds Evansville is expected to receive from the salvage of its existing meters; \$140,000 anticipated from the local electric utility as a result of its demand-side management program; and any state and federal grants for which this project appears to qualify. Mr. Popa committed JCI to providing project status reports to both the OUCC and the Commission every six months until all of the meters called for under the Contract have been installed.

Responding to Mr. Kaufman's concerns about the Joint Petitioner's incorporation of a 2.8% rate of inflation as part of their estimated savings calculations, Mr. Popa noted that the historical rate of inflation according to the federal Consumer Price Index from 1913 to 2012 is 3.35%, which supports his assertion that using 2.8% was appropriately conservative. Mr. Popa also responded to Mr. Kaufman's critical scrutiny of the parties' baseline calculations for different meter classes by describing JCI's conservative approach based on extensive experience, including detailed testing protocols, leading to an appropriate starting point for measuring guaranteed savings.

7. Commission Discussions and Findings. In City of Princeton, Cause No. 43538, 2009 Ind. PUC LEXIS 52 (IURC Feb. 11, 2009), the Commission addressed a similar guaranteed performance contract involving JCI. The Commission found that the contract could potentially provide cost savings to utility customers without having an impact on rates. The Commission approved the contract on an interim basis to the extent Commission approval was required. Ultimately, the Commission concluded that although guaranteed performance contracts are not subject to Commission approval, the City of Princeton was required to seek Commission approval under Ind. Code § 8-1.5-2-19 of the financing required to pay for the contract. Consistent with our decision in *Princeton*, we find that although the Contract between Evansville and JCI is not subject to Commission approval under Ind. Code ch. 8-1.5-2, Evansville's request for authorization to issue debt to finance the Contract is governed by Ind. Code § 8-1.5-2-19.

A municipality may not issue bonds, notes, or other obligations that are payable more than twelve months after their execution without Commission approval. Ind. Code § 8-1.5-2-19(a). The Commission uses a two-prong standard to review proposed debt issuance. *See City of Richmond*, Cause No. 43375, 2008 Ind. PUC LEXIS 124, at *15 (IURC Feb. 27, 2008); *City of Evansville*, Cause No. 43190, 2007 Ind. PUC LEXIS 280, at *8 (IURC Sept. 26, 2007). First, we consider whether the proposed capital improvements are reasonably necessary for the provision of adequate

and efficient utility service. *Id.* Second, we determine whether the proposed debt issuance is a reasonable method for financing the necessary capital improvements. *Id.*

Often, the Commission considers requests for authority to issue debt under Ind. Code § 8-1.5-2-19 coincidentally with a request to set new rates and charges. See, e.g., North Lawrence Water Authority, Cause No. 43716, 2010 Ind. PUC LEXIS 273 (IURC Aug. 11, 2010); City of Petersburg, Cause No. 43757, 2010 Ind. PUC LEXIS 160 (IURC May 11, 2010). In those cases, the debt service expenses are incorporated into the calculation of the utility's new rates and charges. When, as here, a utility requests authorization to issue debt under Ind. Code § 8-1.5-2-19 without a concurrent request to set new rates and charges, the statute provides a standard for the Commission's determination that the proposed debt issuance is reasonable. See City of South Bend, Cause No. 43711, 2009 Ind. PUC LEXIS 293, at *7 (IURC Aug. 5, 2009); City of Fort Wayne, Cause No. 42724, 2004 Ind. PUC LEXIS 468, at *8 (IURC Dec. 29, 2004). Ind. Code § 8-1.5-2-19(b) requires a utility to demonstrate that it rates and charges "will provide sufficient funds for the operation, maintenance, and depreciation of the utility, and to pay the principal and interest of the proposed bond issue, together with a surplus or margin of at least ten percent (10%) in excess" (Emphasis added).

Evansville has failed to meet the requirement of Ind. Code § 8-1.5-2-19(b). Mr. Baldessari estimated the total cost of the project would be \$56,690,000. The water utility's portion of the debt service to finance the project is \$28,918,425. Joint Petitioners claim the water utility will be able to pay its portion of the debt service solely with the money it receives from increased revenues, savings, or guarantee payments from JCI. Mr. Baldessari estimated that the water utility's portion of the guaranteed Contract benefits will exceed the financing cost by \$87,492.

The Bench questioned both Mr. Garrard and Mr. Baldessari in detail about the availability of additional funds with which Evansville could pay for the project. Mr. Garrard testified that Evansville's goal is to not use any other utility revenues to pay for the project—rather, it plans to use only the additional revenues and savings achieved under the Contract. Mr. Garrard also testified that the water utility does not currently have enough revenues to meet its expenses and that it has a pending rate case before the Commission.

Mr. Baldessari testified that the proposed financing includes \$1.5 million to cover the first two years of debt service payments. Mr. Baldessari clarified that the funds available to the water utility to pay the debt service comprise the guaranteed revenues and savings under the Contract, plus the \$1.5 million included in the financing, minus any measurement and verification expenses that might be incurred. Mr. Baldessari agreed the total of the funds available to Evansville are sufficient to meet the debt service requirements plus a cushion of five percent (5%).

In addition, Mr. Kaufmann raised several issues with Joint Petitioner's calculations that could shift the result of the contract from a net savings to a net loss. For example, changing the interest rate by as little as 5 basis points or the inflation rate from 2.8% to 2.7% results in a net loss. Mr. Kaufman also pointed out that the sample of meters tested during the contract analysis contained one meter that was clearly anomalous compared to the others in the sample. Excluding this single meter from the sample reduced the estimated savings under the Contract by more than \$500,000, alone sufficient to produce a net loss..

The Commission's own analysis of Joint Petitioner's savings calculations also raised concerns. Mr. Popa explained that the statistical sampling and determination of the average accuracy of Evansville's meters was performed in accordance with the standards issued by the AWWA. The AWWA M6 guidelines provide specific steps that should be followed in implementing a sample testing program. Am. Water Works Assoc., *Manual of Water Supply Practices—M6* 60 (4th ed. 1999). The first two steps are to determine the desired confidence level and to select an appropriate sample size for that confidence level. *Id*.

Given the state of technology of water meters, the Commission expects the confidence interval to be very high, in the range of 95% to 99%. In this circumstance, a confidence level at the high end of that range is appropriate because the results of the statistical analysis directly impact the calculation of savings upon which the utility's ability to pay for the project in turn depends. Mr. Popa testified that JCI used a sample size of 67 residential meters; however, Joint Petitioners provided no evidence indicating how it arrived at that number or supporting its reasonableness. Considering the relatively high standard deviation of the data in Joint Petitioner's Schedule 2A and the expected high confidence level, we have serious doubts about the sufficiency of the sample size used in JCI's statistical analysis and in the reliability of JCI's calculation of savings.

Joint Petitioners presented no evidence of any additional sources of funds to pay the debt service on a bond issue to fund the contract. Setting aside the concerns detailed above and accepting all of Joint Petitioner's calculations, the Commission finds that Evansville has still not met the burden of showing it has sufficient funds to pay the debt service on the bond issue plus a cushion of ten percent (10%). Therefore, we cannot approve Evansville's request for financing, because it does not meet the requirements of Ind. Code § 8-1.5-2-19(b).

Because Evansville has failed to prove its debt issuance is reasonable, we do not make any findings regarding the reasonableness of the Contract and accompanying projects. However, our review of the scope of work to be performed under the Contract, and especially the creation of a wireless broadband network in Evansville raises two serious concerns, which appear to have been accorded little if any consideration by Joint Petitioners. Mr. Garrard testified that the primary purpose of the network is to read meters and to provide real-time data to work crews in the field. Mr. Garrard also explained that one of the ancillary benefits of the network is that Evansville would have the ability to make access available to the public. First, we remind Evansville that offering wireless broadband service to the public will require the issuance of a Certificate of Territorial Authority by the Commission under Ind. Code ch. 8-1-32.5.

Second, both Mr. Baldessari and Mr. Garrard testified in response to bench questions that money received from water and sewer rates would be used to pay for the portion of the wireless broadband network that would provide service to the public. Mr. Baldessari testified that cost to build the wireless network related to meter reading would be split evenly between the water and sewer utilities, and the sewer utility would pay for the cost of building the enhanced Wi-Fi network. The Bench asked Mr. Garrard specifically whether Evansville was asking its ratepayers to subsidize a public network with ratepayer funds. Mr. Garrard replied, "Well, in part, I think that's right. I mean, the ratepayer funds are going to fund the network." We strongly caution Evansville that any future requests for approval of financing for this project must demonstrate that ratepayer funds will not be used to impermissibly subsidize a public Wi-Fi broadband network.

IT IS THEREFORE ORDERED BY THE INDIANA UTILITY REGULATORY COMMISSION that:

- 1. The City of Evansville's request to issue debt to finance the costs associated with the Guaranteed Performance Contract is denied.
- 2. In accordance with Ind. Code § 8-1-2-70, Petitioner shall pay the following itemized charges within twenty (20) days from the date of this Order to the Secretary of the Commission:

Commission Charges	\$ 7,218.45
OUCC Charges	\$ 7,140.71
Legal Advertising Charges	<u>\$ 137.77</u>

TOTAL

\$14,496.93

3. This Order shall be effective on and after the date of its approval.

ATTERHOLT, BENNETT, LANDIS, MAYS AND ZIEGNER CONCUR:

APPROVED:

AUG 1 5 2012

I hereby certify that the above is a true and correct copy of the Order as approved.

Brenda A. Howe

Secretary to the Commission