

USING FINANCIAL, TECHNICAL AND MANAGERIAL CAPACITY MEASURES IN AN ASSISTANCE-ORIENTED APPROACH TO COMPARATIVE PERFORMANCE ASSESSMENT OF SMALL DRINKING WATER UTILITIES IN THE MIDWEST TECHNOLOGY ASSISTANCE CENTER (MTAC) REGION

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EXECUTIVE SUMMARY

Performance measurement has a long history in the evaluation of the quality and level of services provided by public and private utilities. The goal of this project is to provide a practical framework within which to develop and provide comparative performance measures that improve the financial, managerial, and technical capacity of small public and private drinking water utilities within the Midwest Technology Assistance Center Region. Our analysis included data from small public and private drinking water utilities regulated by state commissions in Indiana, Illinois, Missouri, Ohio, and Wisconsin.

The emphasis of environmental regulators of water utilities has been, rightly so, on the evaluation of water quality. This project goes beyond the compliance information on water utilities maintained by the EPA in their publicly available databases. We implement the EPA's capacity planning and development framework that is organized around three primary goals of financial capacity, managerial capacity, and technical capacity. Developing capacity and enhancing performance is a long-term activity. The larger and highest performing utilities are expected to regularly assess their operations and engage in ongoing improvement. In contrast, small water utilities frequently have neither the skills nor the resources to reliably provide service now and in the future. Some are not motivated to improve. This approach, as it is replicated and refined over time, should help state commissions foster better performance among small jurisdictional utilities. By identifying the best performing utilities and those approaching the best observed "performance frontier" the approach may facilitate improved performance.

The project implemented a highly compressed version of a complete performance evaluation that consisted of establishing a focus group of stakeholders with knowledge of and interest in water utilities. Water utilities are imbued with the public trust. That is why we deemed it essential to include economic and environmental regulators and representatives of water utility customers in this process. We engaged this expert group in order to obtain a comprehensive and face valid list of performance indicators. The process of developing indicators quickly highlighted the tensions and tradeoffs that exist in implementing performance evaluation systems. One of the primary tradeoffs that had to be addressed is between developing a comprehensive evaluation system and the data requirements burdens it imposes. The

workshop yielded, through a vigorous debate on the value of each of the proposed indicators, a set of measures that could be used as a starting point for this evaluation exercise. We obtained data and analyzed them and finally constructed performance indices, thus completing a full cycle of performance evaluation. Our analysis focused on those systems with 1000 service connections or fewer and considered them in two subsets: those with 500 or fewer customers and those with 500-1000 service connections. This grouping reflects the recommendation of the stakeholder group and a commonly held view that the smallest utilities are apt to have the most difficulty establishing and maintaining capacity.

Obtaining a set of indicators that have universal acceptance for water utility evaluation is not a straightforward exercise. One of the project's first useful products came out of the deliberations in the stakeholder workshop on developing performance indicators. Although it is an imperfect set and remains a work in progress, a lasting outcome of this workshop was a set of indicators that capture some aspects of the financial, technical, and managerial performance.

Data collection for these indicators highlighted a primary threat common to valid and reliable performance measurement. There is tremendous variability in the availability and quality of data between and within the states involved in this exercise. A complicating factor in data quality is that definitions of commonly used measures vary from one jurisdiction to another hence comparability of results becomes an issue.

It is a well-established fact that implementing an evaluation system that is acceptable to all stakeholders is a multi-phase, multi-year undertaking. With this project, we have begun this process for water utilities. At present, data quality is the primary obstacle to obtaining valid evaluations. As data quality improves through multiple implementations of the process we have followed in this project, we will be able to place greater confidence in the results. The first step in this confidence building exercise would be for the individual water utilities to establish that these measures do reflect their performance over time. Once the validity of these measures has been established, over time, for a specific water utility we can study the implication of the best practices analysis conducted here and begin to compare performance within and across regulatory jurisdictions.

In summary, using the capacity development requirements of the SDWA as our performance assessment framework, the project team implemented a multi-step process that:

1. constituted a panel of experts to identify suitable performance measures;
2. gathered data on these measures for a representative group of utilities (municipal. and investor-owned) regulated by state utilities commissions; and
3. analyzed data made available by commission staff in targeted states in an attempt to develop benchmarks based on identification of observed best practices.

The accompanying report illuminates our approach and presents our findings.