Sharing the Bounty!
Developments in Water

(Time: 1 hour)

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Revenue Decoupling

Revenue decoupling as an alternative ratemaking methodology, has been an issue for decades. In states like California, decoupling mechanisms such as the Electricity Revenue Adjustment Mechanisms (ERAM) and Sales Adjustment Mechanism (SAM) for gas companies have been used in the energy sector since the 1980s to address the energy conservation dilemma in the state. Since then decoupling mechanisms have also been applied in energy sectors across the country including states like Washington State, New York, Maine, Oregon, etc.

Water utilities have argued that water conservation programs have contributed to the decrease in revenues and profits for the water industry. With this, the California PUC, in the mid-2000s, embraced revenue decoupling in the water sector in order to address the disincentive associated with water conservation in the state through the use of the Revenue Adjustment Mechanism (RAM). RAM was introduced to promote water conservation programs in the state. Progressively, several other states have also advocated the decoupling of water rates as way to encourage water conservation and efficiency while simultaneously keeping water utilities financially sound. However, opponents of decoupling have argued that it reduces risk, focuses on revenues not costs, removes the incentive to increase sales, etc.

Pennsylvania House Bill 1326 (HB 1326):

HB1326 amends Title 66 (Public Utilities) of the Pennsylvania Consolidated Statutes, in rates and distribution systems, and provides for the valuation of acquired water and wastewater systems for ratemaking purposes. HB1326 was sponsored by Representative Robert W. Godshall, and was signed into law bill Governor Tom Wolf on April 14, 2016. The Act will take effect 60 days from April 14, 2016. The Act establishes a process for determining the fair market value of municipal water or wastewater utilities acquired by a public water or wastewater utility for ratemaking purposes. It involves a process in which the acquiring public utility and the selling utility may choose to have the value of the selling utility established through independent appraisals conducted by utility valuation experts. In this case, the fair market value of the selling utility, for post-ratemaking purposes, will be either the average of the two appraisals or the purchase price, whichever is less.

Troubled Water Companies:

Troubled water systems are systems that lack the management and funding to stand as viable systems. Many of these systems are small-to- medium sized systems in the state. Over the past few years, many of these systems were sold or taken over by larger jurisdictional companies and, in some cases, nearby non-jurisdictional water companies, such as municipalities or authorities. These regionalization efforts of the Commission have resulted in cost-effective solutions to this problem with associated benefits of economies of scale; service efficiencies and improved operations; and management and technology.

Regulating Lead in Water:

According to the Environmental Protection Agency (EPA), lead in water is regulated through the Lead and Copper Rule under the Safe Drinking Water Act. The EPA noted that lead and copper enter drinking water primarily through plumbing materials. More importantly, the EPA has indicated that exposure to lead and copper may cause health problems ranging from stomach distress to brain damage. The recent lead issues in Flint, Michigan, are a stark reminder of the chronic problem of lead not just in Flint but across the country. With Flint at the forefront of the issues associated with lead regulation, it is important to look beyond Flint in addressing this problem.

Aging Workforce in the Water Industry:

According to Black and Veatch's "2013 Strategic Directions in the U.S. Water Industry" report, aging workforce is among the top 10 issues facing water utilities. A similar report by the Water Research Foundation (WRF) also identified baby boomer retirements as a significant challenge facing the water sector. According to the WRF report, water utilities will lose 30 to 50 percent of their workforce within the next decade. With this in mind, it is important to take a broader look at what the industry is doing in preparation for and the recruitment of the next generation of workers. Succession planning in the areas of ascertaining the potential loss of institutional knowledge, employee development programs, industry career branding, and education support is critical.

Aging Infrastructure in the Water Industry:

Aging infrastructure is one of the paramount problems facing the water industry. This is because most of the water infrastructure dates back to the 1940s or earlier and are upgraded only on "as needed" basis. This means the millions of miles of the various sizes and types of buried pipes are old and crumbling and needs replaced. Several challenges, including funding, have been seen as mitigating factors to infrastructural upgrades/replacement in the water sector.

Advanced Metering Infrastructure (AMI):

Among the top 10 issues of concern in the 2013 Black and Veatch report was water loss due to leaks and other system failures; and water scarcity/conservation. Smart meters such as AMIs can be used to address some of these and other challenges such as revenue loss from the leaks, aging infrastructure, the need for greater bill accuracy, etc. AMI use in the water industry is growing and there is an increase in "smart-grid" investment in the water sector. However, cost of purchase and installation, utility leadership, and several other mitigating factors have made advanced metering optional rather than critical.

Reference Materials:

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