

COMMONWEALTH OF KENTUCKY
BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

| | | |
|---|---|----------------------------|
| ELECTRONIC APPLICATION OF |) | |
| KENTUCKY UTILITIES COMPANY FOR |) | |
| APPROVAL OF ITS 2020 COMPLIANCE PLAN |) | CASE NO. 2020-00060 |
| FOR RECOVERY BY ENVIRONMENTAL |) | |
| SURCHARGE |) | |

RESPONSE OF
KENTUCKY UTILITIES COMPANY
TO COMMISSION STAFF'S SECOND REQUEST FOR INFORMATION
DATED JULY 31, 2020

FILED: AUGUST 14, 2020

VERIFICATION


COMMONWEALTH OF KENTUCKY)
)
COUNTY OF JEFFERSON)

The undersigned, **Daniel K. Arbough**, being duly sworn, deposes and says that he is Treasurer for Kentucky Utilities Company and Louisville Gas and Electric Company and an employee of LG&E and KU Services Company, and that he has personal knowledge of the matters set forth in the responses for which he is identified as the witness, and the answers contained therein are true and correct to the best of his information, knowledge and belief.



Daniel K. Arbough

Subscribed and sworn to before me, a Notary Public in and before said County and State, this 11th day of August 2020.



Notary Public (SEAL)
Notary Public, ID No. 603967

My Commission Expires:

7/11/2022

Kentucky Utilities Company
Response to Commission Staff's Second Request for Information
Dated July 31, 2020

Case No. 2020-00060

Question No. 1

Witness: Robert M. Conroy

- Q-1. Refer to the Direct Testimony of Robert M. Conroy (Conroy Testimony) at 10. Provide the S&P Global Market Intelligence report (RRA Report) of major rate case decisions in the first half of 2020.
- a. Explain whether KU agrees that the average return on equity (ROE) from the most recent RRA Report is lower than the one cited by KU for the 2019 ROE averages.
 - b. If 1.a. above is confirmed, explain whether KU agrees that ROE awards are trending downward and provide support for KU's position.
 - c. Confirm that the RRA reported ROE cited on page 10 of the Conroy Testimony is lower than the quarterly RRA report when KU was awarded an ROE of 9.725 percent in Case No. 2018-00294.²
- A-1.
- a. The July 22, 2020 RRA Report which covers the period January - June of 2020 is provided with this response.³ This report confirms that the representation in Mr. Conroy's direct testimony filed March 31, 2020 remains reasonable, i.e., that the 9.725% ROE approved for LG&E and KU ("the Companies") in their 2018 base rate cases continues to be reasonable when compared with the ROEs approved by other commissions for vertically integrated electric utilities. Specifically, the July 22, 2020 RRA Report shows that the average ROE for vertically integrated electric utilities during the first six months of 2020 averaged 9.67%, with the median being 9.70% (see page 9, Table 3 for vertically integrated electric utilities). These results demonstrate the continued reasonableness of using 9.725% for the ECR tariffs until the next change in base rates. The Companies intend to file applications in the near future requesting a change in base rates. For the reasons stated in the response to Question No. 2, the Companies believe that any change from 9.725% should come as a result of the ROE that will be set in those base rate cases based on a fully developed record with analyses of expert witnesses.

² Case No. 2018-00294, *Electronic Application of Kentucky Utilities Company for an Adjustment of its Electric Rates* (Ky. PSC Apr. 30, 2019).

³ See Attachment No.1 to this data response which shows the reported authorized ROEs from major rate case decisions from S&P Global Market Intelligence for the period January - June of 2020. (The attached RRA Reports include both the published report itself and the published tables that are hyperlinked in the reports.)

- b. The Companies do not agree that ROE awards for vertically integrated electric utilities such as LG&E and KU are trending down. ROE awards for vertically integrated electric utilities as reported by RRA remain reasonably comparable to the 9.725% ROE. Please see the response to part (a) above and part (c) below. Please also see the response to Question No. 2 for a discussion on the recent shifts of beta values for electric utilities.

- c. The Companies read the request for information as referencing the April 11, 2019 quarterly RRA Report and comparing it to the RRA Report cited on page 10 of the Conroy Direct Testimony. The April 11, 2019 RRA Report is attached to this response as Attachment 2. It covers the period January - March of 2019 which was just before the Commission issued its 9.725% decision in the Companies' last base rate cases on April 30, 2019.

For the three month period ending March 31, 2019, the April 11, 2019 RRA Report shows vertically integrated electric utilities were awarded a 9.72% average ROE and a 9.75% median ROE.⁴ These results are consistent with the 9.725% ROE approved by the Commission in the April 30, 2019 base rate case orders.

Finally, the Companies have also attached the January 31, 2020 RRA Report cited in Mr. Conroy's testimony as Attachment 3.

The average and median ROE reported in these three RRA reports from 2018 through June 2020 are shown in the following table:⁵

| Vertically Integrated Electric Utilities | | | |
|---|---------------------------|--------------------|-------------------|
| Time Period | Source | Average ROE | Median ROE |
| 2018 | July 22, 2020 RRA Report | 9.68% | 9.73% |
| 1/19 – 3/19 | April 11, 2019 RRA Report | 9.72% | 9.75% |
| 2019 | July 22, 2020 RRA Report | 9.73% | 9.73% |
| 1/20 – 6/20 | July 22, 2020 RRA Report | 9.67% | 9.70% |

As demonstrated in the table, depending on the time period, the RRA averages and medians for vertically integrated electric utilities are well within a range of reasonableness of the 9.725% ROE authorized for the Companies. The slight differences are immaterial, do not represent any sort of trend, and do not support any adjustment in this case.

⁴ See page 9, Table 3 for vertically integrated electric utilities in the April 11, 2019 RRA Report (Attachment 2).

⁵ The July 22, 2020 RRA Report shows ROEs for vertically integrated electric utilities for the first half of 2020. It also shows ROE data for calendar years 2018 and 2019. For 2019, the average ROE was 9.73% and the median was 9.73%. For 2018, the average was 9.68% and the median was 9.73% (see page 9, Table 3 of Attachment 1 for vertically integrated electric utilities).

July 22, 2020

spglobal.com/marketintelligence

RRA Regulatory Focus

Major Rate Case Decisions - January - June 2020

The equity returns authorized electric and gas utilities nationwide edged downward in the first half of 2020. Several rate case decisions have been delayed until later this year due to the health and economic crisis triggered by the coronavirus outbreak that brought the U.S. economy to a near halt. Based on data gathered by Regulatory Research Associates, a group within S&P Global Market Intelligence, the average return on equity authorized electric utilities was 9.55% in all rate cases decided in the first half of 2020, below the 9.65% average for cases in full year 2019. There were 27 electric ROE determinations in the first half of 2020, versus 47 in full year 2019.

Included in those authorizations is a decision by the [Maine Public Utilities Commission](#) ordering a management inefficiency adjustment that reduced [Central Maine Power Co.](#)'s ROE by 100 basis points to 8.25% due to imprudence associated with a new billing system. The PUC ordered that this downward ROE adjustment be lifted when the utility meets all performance benchmarks for all service quality metrics for at least 18 consecutive months beginning March 1, 2020, and formally demonstrates to the commission that the problems have been resolved. Calculation of the average electric ROE without the penalty results in a 9.58% ROE for the first half of 2020.

This data includes several limited-issue rider cases. Excluding these cases, the average authorized ROE was 9.47% in electric rate cases decided in the first half of 2020, versus 9.64% observed in full year 2019. The difference between the ROE averages including rider cases and those excluding the rider cases is driven by ROE premiums allowed in certain states for riders that address recovery of specific generation projects.

The average ROE authorized gas utilities was 9.40% in cases decided during the first half of 2020 versus 9.71% in full year 2019. There were 12 gas cases that included an ROE determination in the first six months of 2020 versus 32 in full year 2019.

The 2020 averages are hovering at the lowest levels ever witnessed in the industry, and with the recent rate cuts by the U.S. Federal Reserve and current pandemic induced recession, even lower authorized returns may be on the horizon.

Lisa Fontanella, CFA
Research Director

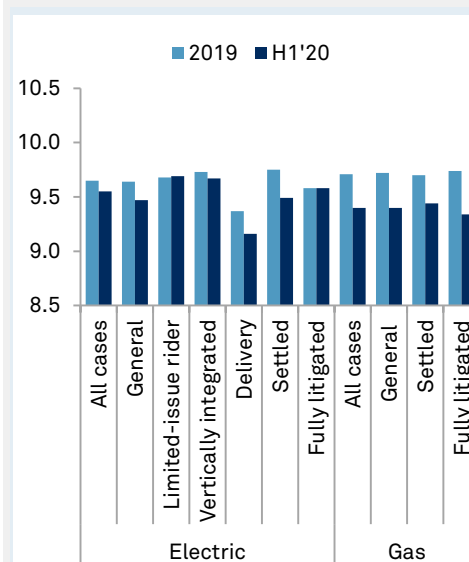
Sales & subscriptions
Sales_NorthAm@spglobal.com

Enquiries
support.mi@spglobal.com

For Detailed Data

Click [here](#) to see supporting data tables.

Average authorized return on equity (%) Dashboard

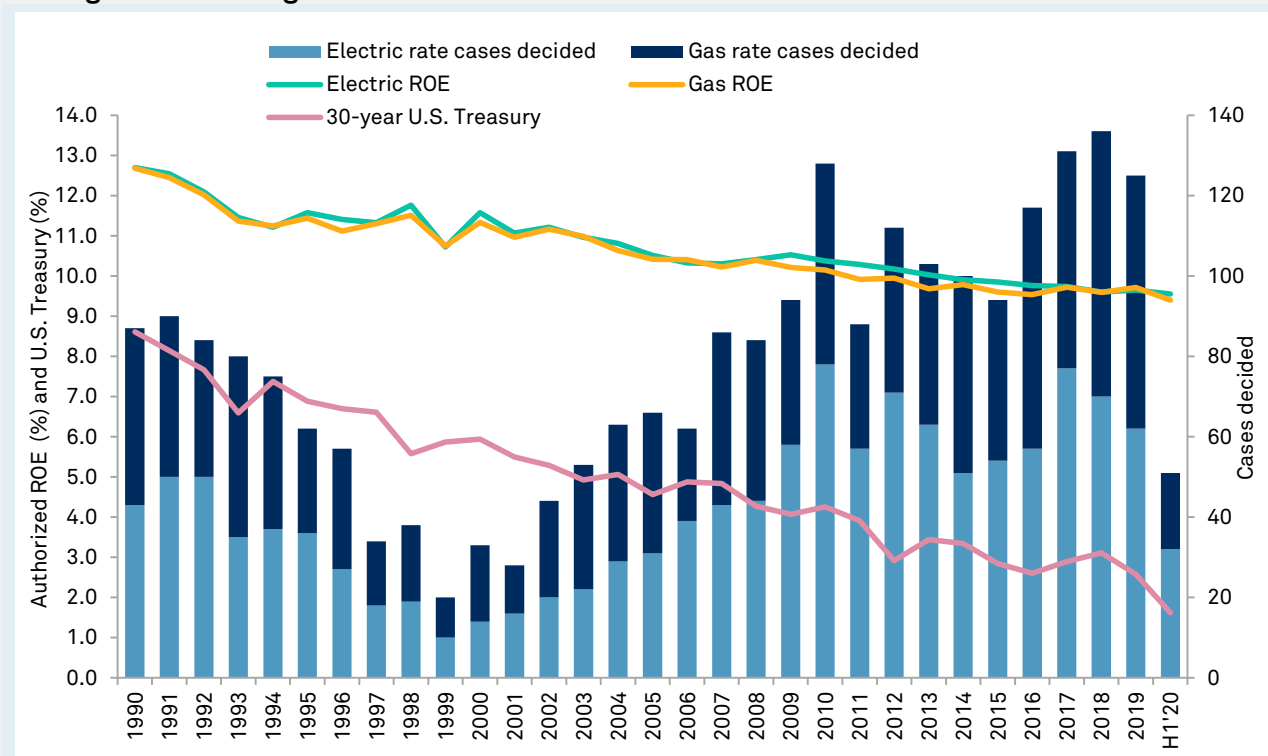


| Electric average | 2019 | H1'20 |
|-----------------------------|------|-------|
| All cases | 9.65 | 9.55 |
| General rate cases | 9.64 | 9.47 |
| Limited-issue rider cases | 9.68 | 9.69 |
| Vertically integrated cases | 9.73 | 9.67 |
| Delivery cases | 9.37 | 9.16 |
| Settled cases | 9.75 | 9.49 |
| Fully litigated cases | 9.58 | 9.58 |
| Gas average | 2019 | H1'20 |
| All cases | 9.71 | 9.40 |
| General rate cases | 9.72 | 9.40 |
| Settled cases | 9.70 | 9.44 |
| Fully litigated cases | 9.74 | 9.34 |
| U.S. Treasury | 2019 | H1'20 |
| 30-year bond yield | 2.58 | 1.62 |

Data compiled July 20, 2020.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Average electric and gas authorized ROEs and number of rate cases decided



Data compiled July 20, 2020.
 Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

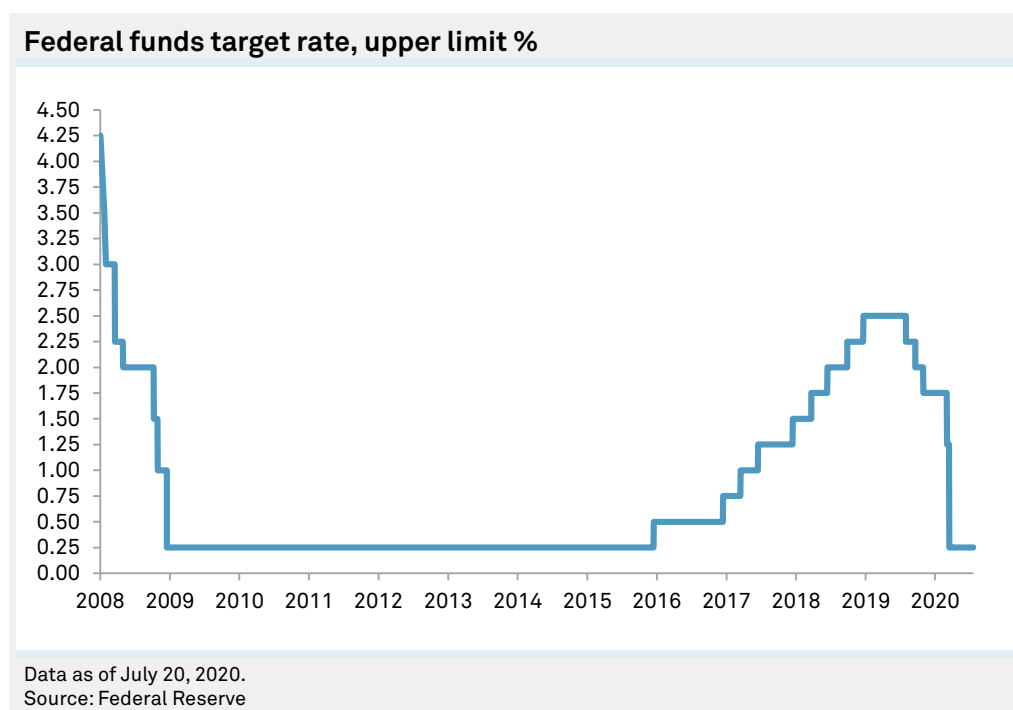
In the first six months of 2020, the median ROE authorized in all electric utility rate cases was 9.45%, versus 9.60% in full year 2019; for gas utilities, the metric was 9.42% in the first half of 2020, versus 9.70% in full year 2019.

From a longer-term perspective, interest rates, as measured by the 30-year U.S. Treasury bond yield, fell almost steadily from the early 1980s until 2015 or so, placing downward pressure on authorized ROEs. Even though the decline has been less dramatic in the period since 1990, average authorized ROEs fell below 10% for gas utilities in 2011 and for electric utilities in 2014.

Since 2010, rate case activity has been robust, with 100 or more cases adjudicated in eight of the last ten calendar years. This count includes electric and gas cases where no ROEs have been specified; however, withdrawn cases are not included. After reaching an almost 30-year high in 2018, when almost 140 cases were decided, rate case activity moderated somewhat in 2019, with about 125 electric and gas cases resolved. Currently, there are about 90 rate cases pending; however, the current state of affairs due to COVID-19 has caused some companies to postpone rate case filings that were planned for this year. This backlog, coupled with the need to address COVID-19 pandemic-related costs and lost revenue may usher in an even more robust level of rate case activity in 2021 and beyond,

Absent the pandemic, increased costs associated with environmental compliance, generation and delivery infrastructure upgrades and expansion, renewable generation mandates, storm and disaster recovery, cybersecurity and employee benefits have contributed to an active rate case agenda over the last decade.

Rising interest rates over the past several years also likely contributed to the increased rate case activity. Beginning in 2015, the Federal Reserve began to gradually raise the federal funds rate, increasing them several times, up to 2.50% in December 2018. However, with concerns of slowing growth, fears of a global recession and the impact of U.S.-China trade tensions negatively weighing on the U.S. economy, the Fed, after more than a decade without a cut, lowered rates three times in 2019, the last reduction of which brought the federal funds rate to a range of 1.50% to 1.75%. Citing the economic fallout from the coronavirus outbreak, the Fed delivered two emergency rate cuts thus far this year, the first in early March, which cut rates by 50 basis points to 1.00% to 1.25%, and a second in mid-March, which slashed rates another 100 basis points to the current range of 0-0.25%.



While changes in the federal funds rate do not move in lockstep with longer-term treasuries and authorized ROEs do not move in lockstep with interest rates, the expectation is that as interest rates change, authorized ROEs would also change in similar fashion. However, several factors impact the timing and magnitude of such a shift. Normal regulatory lag, i.e., the amount of time it takes for a utility to put together a rate case filing and tender it to the commission and then for the commission to process the case, would without any other influences delay a change in average authorized ROEs relative to interest rates.

It is also worth noting that while both interest rates and authorized ROEs have generally been declining since 1990, the gap between authorized ROEs and interest rates widened somewhat over this period, largely as a result of an often-unstated understanding by regulators that the drop in interest rates caused by Federal Reserve intervention was unusual.

Capital structure trends

To offset the negative cash flow impact of 2017 federal tax reform, many utilities sought higher common equity ratios, and the average authorized equity ratios adopted by utility commissions in 2019 were modestly higher than the levels observed in 2018 and 2017. However, in cases decided during the first half of 2020, the average authorized equity ratio for electric utilities fell to 48.61%. For full years 2019, 2018 and 2017, the average equity ratios authorized in electric utility cases were 49.94%, 49.02% and 48.90%, respectively. The average allowed equity ratio for gas utilities

nationwide in cases decided in the first six months of 2020 was slightly higher than the levels observed in earlier full year periods. For the first six months of 2020, the average was 53.12%, versus 51.75% in 2019, 50.12% in 2018 and 49.88% in 2017.

Taking a longer-term view, equity ratios have generally increased over the last 15 years — the average equity ratio approved in electric rate cases decided during 2004 was 46.96%, while the average for gas utilities was 45.81%. Many commissions began approving more equity-rich capital structures in the wake of the 2008 financial crisis.

A more granular look at ROE trends

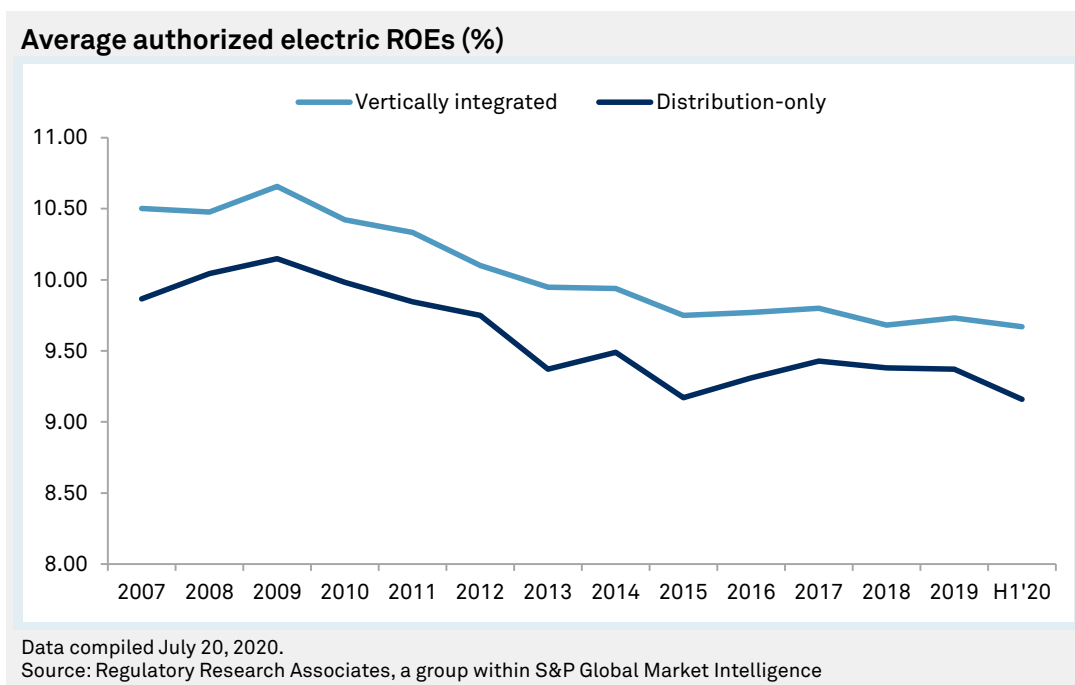
The discussion thus far has looked broadly at trends in authorized ROEs; the sections that follow provide a more granular view based upon the types of proceedings/decisions in which these ROEs were established.

RRA has observed that there can be significant differences between the average ROEs from one subcategory of cases to another.

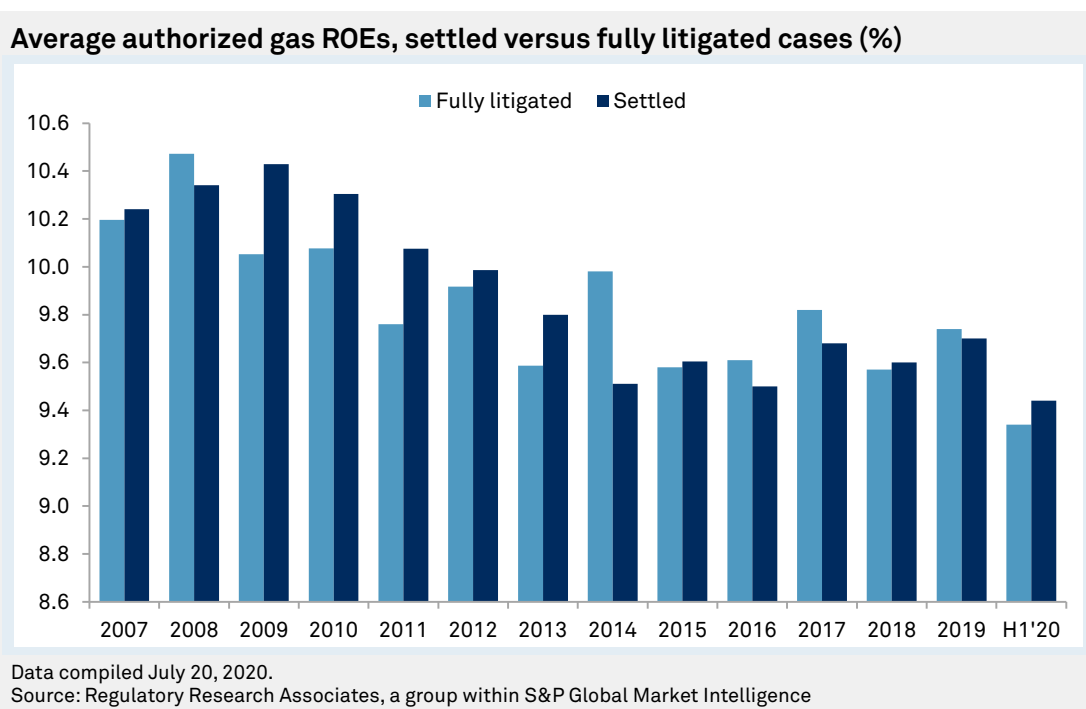
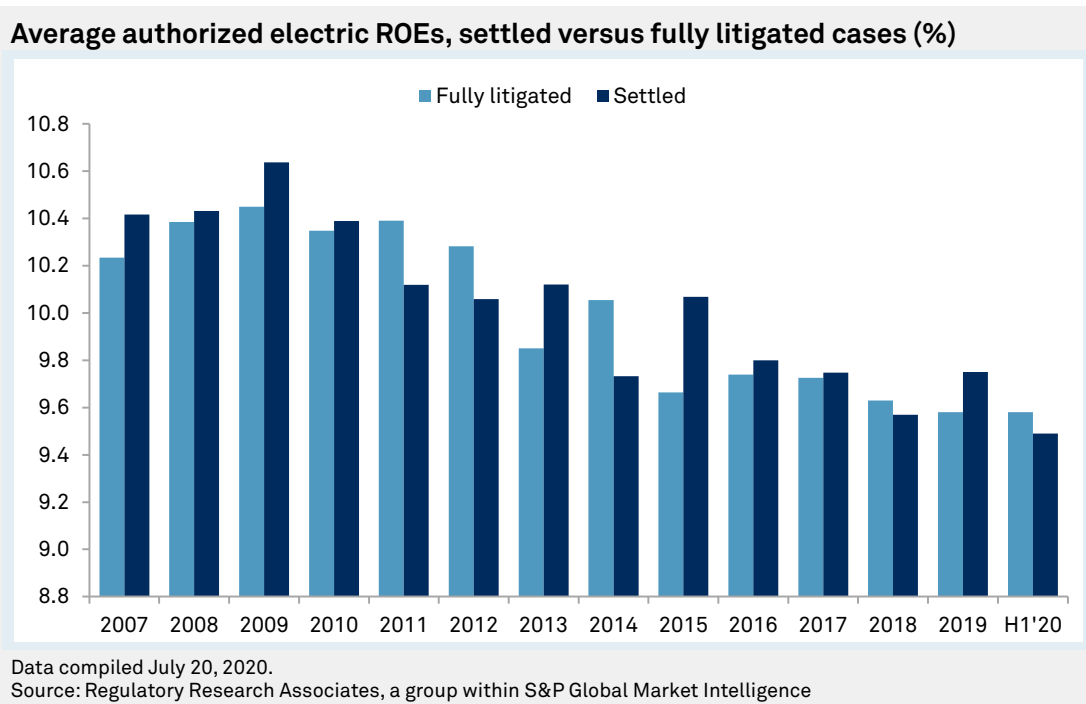
As a result of electric industry restructuring, certain states unbundled electric rates and implemented retail competition for generation. Commissions in those states now have jurisdiction only over the revenue requirement and return parameters for delivery operations.

Comparing electric vertically integrated cases versus delivery-only proceedings over the past several years, RRA finds that the annual average authorized ROEs in vertically integrated cases typically are about 30 to 65 basis points higher than in delivery-only cases, arguably reflecting the increased risk associated with ownership and operation of generation assets.

The industry average ROE for vertically integrated electric utilities was 9.67% in cases decided during the first six months of 2020, just below the 9.73% average level posted in full year 2019. For electric distribution-only utilities, the industry average ROE authorized in the first six months of 2020 was 9.16%, versus 9.37% in full year 2019. Included within the distribution returns for the first half of 2020 is the previously mentioned penalty ordered by the Maine PUC for Central Maine Power. Absent that 100 basis point penalty, a 9.31% average ROE is calculated for distribution only utilities in the first half of 2020.



Settlements have frequently been used to resolve rate cases over the last several years, and in many cases, these settlements are “black box” in nature and do not specify the ROE and other typical rate case parameters underlying the stipulated rate change. However, some states preclude this type of treatment, and settlements must specify these values, if not the specific adjustments from which these values were derived.



For both electric and gas cases, RRA has found no discernible pattern in the average authorized ROEs in cases that were settled versus those that were fully litigated. In some years, the average authorized ROE was higher for fully litigated cases, in others, it was higher for settled cases, and in a handful of years, the authorized ROE was similar for both fully litigated and settled cases.

Over the last several years, the annual average authorized ROEs in electric cases that involve limited-issue riders were typically meaningfully higher than those approved in general rate cases, driven primarily by the ROE premiums authorized in generation-related limited issue rider proceedings in Virginia. Limited-issue rider cases in which a separate ROE is determined have had limited use in the gas industry, as most of the gas riders rely on ROEs approved in a previous base rate case.

The following discussion focuses on the corresponding tables available [here](#).

Table 1 shows the average ROE authorized in major electric and gas rate decisions annually since 1990 and by quarter since 2016, followed by the number of observations in each period. **Table 2** indicates the composite electric and gas industry data for all major cases, summarized annually since 2004 and by quarter for the past six quarters.

Tables 3 and 4 provide comparisons since 2007 of average authorized ROEs for settled versus fully litigated cases, general rate cases versus limited-issue rider proceedings and vertically integrated cases versus delivery-only cases for electric and gas utilities, respectively.

The individual electric and gas cases decided in 2020 are listed in Table 5, with the decision date shown first, followed by the company name, the abbreviation for the state issuing the decision, the authorized rate of return, the ROE and the percentage of common equity in the adopted capital structure. Next, RRA indicates the month and year in which the adopted test year ended, whether the commission utilized an average or a year-end rate base and the amount of the permanent rate change authorized. The dollar amounts represent the permanent rate change ordered at the time decisions were rendered. Fuel adjustment clause rate changes are not reflected in this study.

The simple mean is utilized for the return averages. In addition, the average equity returns indicated in this report reflect the ROEs approved in cases that were decided during the specified time periods and are not necessarily representative of either the average currently authorized ROEs for utilities industrywide or the returns actually earned by the utilities.

Please note: In an effort to align data presented in this report with data available in S&P Global Market Intelligence's online database, earlier historical data provided in previous reports may not match historical data in this report due to certain differences in presentation, including the treatment of cases that were withdrawn or dismissed.

© 2020 S&P Global Market Intelligence. All rights reserved. Regulatory Research Associates is a group within S&P Global Market Intelligence, a division of S&P Global (NYSE:SPGI). Confidential Subject Matter. WARNING! This report contains copyrighted subject matter and confidential information owned solely by S&P Global Market Intelligence (SPGMI). Reproduction, distribution or use of this report in violation of this license constitutes copyright infringement in violation of federal and state law. SPGMI hereby provides consent to use the "email this story" feature to redistribute articles within the subscriber's company. Although the information in this report has been obtained from sources that SPGMI believes to be reliable, SPGMI does not guarantee its accuracy.

Table 1: ROEs authorized January 1990-June 2020

| Year | Period | Electric utilities | | | Gas utilities | | |
|-------------|------------------|--------------------|----------------|------------------------|-----------------|----------------|------------------------|
| | | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 1990 | Full year | 12.70 | 12.77 | 38 | 12.68 | 12.75 | 33 |
| 1991 | Full year | 12.54 | 12.50 | 42 | 12.45 | 12.50 | 31 |
| 1992 | Full year | 12.09 | 12.00 | 45 | 12.02 | 12.00 | 28 |
| 1993 | Full year | 11.46 | 11.50 | 28 | 11.37 | 11.50 | 40 |
| 1994 | Full year | 11.21 | 11.13 | 28 | 11.24 | 11.27 | 24 |
| 1995 | Full year | 11.58 | 11.45 | 28 | 11.44 | 11.30 | 13 |
| 1996 | Full year | 11.40 | 11.25 | 18 | 11.12 | 11.25 | 17 |
| 1997 | Full year | 11.33 | 11.58 | 10 | 11.30 | 11.25 | 12 |
| 1998 | Full year | 11.77 | 12.00 | 10 | 11.51 | 11.40 | 10 |
| 1999 | Full year | 10.72 | 10.75 | 6 | 10.74 | 10.65 | 6 |
| 2000 | Full year | 11.58 | 11.50 | 9 | 11.34 | 11.16 | 13 |
| 2001 | Full year | 11.07 | 11.00 | 15 | 10.96 | 11.00 | 5 |
| 2002 | Full year | 11.21 | 11.28 | 14 | 11.17 | 11.00 | 19 |
| 2003 | Full year | 10.96 | 10.75 | 20 | 10.99 | 11.00 | 25 |
| 2004 | Full year | 10.81 | 10.70 | 21 | 10.63 | 10.50 | 22 |
| 2005 | Full year | 10.51 | 10.35 | 24 | 10.41 | 10.40 | 26 |
| 2006 | Full year | 10.32 | 10.23 | 26 | 10.40 | 10.50 | 15 |
| 2007 | Full year | 10.30 | 10.20 | 38 | 10.22 | 10.20 | 35 |
| 2008 | Full year | 10.41 | 10.30 | 37 | 10.39 | 10.45 | 32 |
| 2009 | Full year | 10.52 | 10.50 | 40 | 10.22 | 10.26 | 30 |
| 2010 | Full year | 10.37 | 10.30 | 61 | 10.15 | 10.10 | 39 |
| 2011 | Full year | 10.29 | 10.17 | 42 | 9.92 | 10.03 | 16 |
| 2012 | Full year | 10.17 | 10.08 | 58 | 9.94 | 10.00 | 35 |
| 2013 | Full year | 10.03 | 9.95 | 49 | 9.68 | 9.72 | 21 |
| 2014 | Full year | 9.91 | 9.78 | 38 | 9.78 | 9.78 | 26 |
| 2015 | Full year | 9.85 | 9.65 | 30 | 9.60 | 9.68 | 16 |
| | 1st quarter | 10.29 | 10.50 | 9 | 9.48 | 9.50 | 6 |
| | 2nd quarter | 9.60 | 9.60 | 7 | 9.42 | 9.52 | 6 |
| | 3rd quarter | 9.76 | 9.80 | 8 | 9.47 | 9.50 | 4 |
| | 4th quarter | 9.57 | 9.58 | 18 | 9.68 | 9.73 | 10 |
| 2016 | Full year | 9.77 | 9.75 | 42 | 9.54 | 9.50 | 26 |
| | 1st quarter | 9.87 | 9.60 | 15 | 9.60 | 9.25 | 3 |
| | 2nd quarter | 9.63 | 9.50 | 14 | 9.47 | 9.60 | 7 |
| | 3rd quarter | 9.66 | 9.60 | 5 | 10.14 | 9.90 | 6 |
| | 4th quarter | 9.74 | 9.60 | 19 | 9.68 | 9.55 | 8 |
| 2017 | Full year | 9.74 | 9.60 | 53 | 9.72 | 9.60 | 24 |
| | 1st quarter | 9.75 | 9.90 | 13 | 9.68 | 9.80 | 6 |
| | 2nd quarter | 9.54 | 9.50 | 13 | 9.43 | 9.50 | 7 |
| | 3rd quarter | 9.67 | 9.70 | 11 | 9.69 | 9.60 | 13 |
| | 4th quarter | 9.42 | 9.50 | 11 | 9.53 | 9.60 | 14 |
| 2018 | Full year | 9.60 | 9.58 | 48 | 9.59 | 9.60 | 40 |
| | 1st quarter | 9.73 | 9.70 | 12 | 9.55 | 9.70 | 4 |
| | 2nd quarter | 9.58 | 9.50 | 12 | 9.73 | 9.73 | 3 |
| | 3rd quarter | 9.55 | 9.60 | 7 | 9.80 | 9.90 | 3 |
| | 4th quarter | 9.70 | 9.68 | 16 | 9.73 | 9.70 | 22 |
| 2019 | Full year | 9.65 | 9.60 | 47 | 9.71 | 9.70 | 32 |
| | 1st quarter | 9.58 | 9.50 | 19 | 9.35 | 9.40 | 9 |
| | 2nd quarter | 9.47 | 9.44 | 8 | 9.55 | 9.65 | 3 |
| 2020 | 1st half | 9.55 | 9.45 | 27 | 9.40 | 9.42 | 12 |

Data compiled July 20, 2020

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 2: Electric and gas utilities summary

| Electric utilities | | | | | | | | | | |
|--------------------|-------------|---------|------------------------|---------|------------------------|------------------------------------|------------------------|--------------------------|------------------------|--|
| Year | Period | ROR (%) | Number of observations | ROE (%) | Number of observations | Common equity to total capital (%) | Number of observations | Rate change amount (\$M) | Number of observations | |
| 2004 | Full year | 8.71 | 20 | 10.81 | 21 | 46.96 | 19 | 1,806.3 | 29 | |
| 2005 | Full year | 8.44 | 23 | 10.51 | 24 | 47.34 | 23 | 936.1 | 31 | |
| 2006 | Full year | 8.32 | 26 | 10.32 | 26 | 48.54 | 25 | 1,318.1 | 39 | |
| 2007 | Full year | 8.18 | 37 | 10.30 | 38 | 47.88 | 36 | 1,405.7 | 43 | |
| 2008 | Full year | 8.21 | 39 | 10.41 | 37 | 47.94 | 36 | 2,823.2 | 44 | |
| 2009 | Full year | 8.24 | 40 | 10.52 | 40 | 48.57 | 39 | 4,191.7 | 58 | |
| 2010 | Full year | 8.01 | 62 | 10.37 | 61 | 48.63 | 57 | 4,921.9 | 78 | |
| 2011 | Full year | 8.00 | 43 | 10.29 | 42 | 48.26 | 42 | 2,595.1 | 56 | |
| 2012 | Full year | 7.95 | 51 | 10.17 | 58 | 50.69 | 52 | 3,080.7 | 69 | |
| 2013 | Full year | 7.66 | 45 | 10.03 | 49 | 49.25 | 43 | 3,328.6 | 61 | |
| 2014 | Full year | 7.60 | 32 | 9.91 | 38 | 50.28 | 35 | 2,053.7 | 51 | |
| 2015 | Full year | 7.38 | 35 | 9.85 | 30 | 49.54 | 30 | 1,891.5 | 52 | |
| 2016 | Full year | 7.28 | 41 | 9.77 | 42 | 48.91 | 41 | 2,332.1 | 57 | |
| 2017 | Full year | 7.18 | 48 | 9.74 | 53 | 48.90 | 48 | 2,695.6 | 77 | |
| 2018 | Full year | 6.90 | 49 | 9.60 | 48 | 49.02 | 49 | 1,880.4 | 67 | |
| | 1st quarter | 7.03 | 12 | 9.73 | 12 | 49.51 | 10 | 83.5 | 15 | |
| | 2nd quarter | 6.91 | 9 | 9.58 | 12 | 50.95 | 7 | 62.9 | 16 | |
| | 3rd quarter | 7.24 | 7 | 9.55 | 7 | 51.41 | 7 | 262.7 | 10 | |
| | 4th quarter | 6.85 | 16 | 9.70 | 16 | 49.12 | 16 | 1,268.1 | 20 | |
| 2019 | Full year | 6.97 | 44 | 9.65 | 47 | 49.94 | 40 | 1,677.2 | 61 | |
| | 1st quarter | 6.82 | 20 | 9.58 | 19 | 48.72 | 21 | 683.8 | 21 | |
| | 2nd quarter | 6.74 | 7 | 9.47 | 8 | 48.27 | 7 | 422.3 | 10 | |
| 2020 | 1st half | 6.80 | 27 | 9.55 | 27 | 48.61 | 28 | 1,156.1 | 32 | |
| Gas utilities | | | | | | | | | | |
| 2004 | Full year | 8.51 | 23 | 10.63 | 22 | 45.81 | 22 | 306.0 | 33 | |
| 2005 | Full year | 8.24 | 29 | 10.41 | 26 | 48.40 | 24 | 465.4 | 35 | |
| 2006 | Full year | 8.44 | 17 | 10.40 | 15 | 47.24 | 16 | 392.5 | 23 | |
| 2007 | Full year | 8.11 | 31 | 10.22 | 35 | 48.47 | 28 | 645.3 | 43 | |
| 2008 | Full year | 8.49 | 33 | 10.39 | 32 | 50.35 | 32 | 700.0 | 40 | |
| 2009 | Full year | 8.15 | 29 | 10.22 | 30 | 48.49 | 29 | 438.6 | 36 | |
| 2010 | Full year | 7.99 | 40 | 10.15 | 39 | 48.70 | 40 | 776.5 | 50 | |
| 2011 | Full year | 8.09 | 18 | 9.92 | 16 | 52.49 | 14 | 367.0 | 31 | |
| 2012 | Full year | 7.98 | 30 | 9.94 | 35 | 51.13 | 32 | 264.0 | 41 | |
| 2013 | Full year | 7.43 | 21 | 9.68 | 21 | 50.60 | 20 | 498.7 | 40 | |
| 2014 | Full year | 7.65 | 27 | 9.78 | 26 | 51.11 | 28 | 544.2 | 48 | |
| 2015 | Full year | 7.34 | 16 | 9.60 | 16 | 49.93 | 16 | 494.1 | 40 | |
| 2016 | Full year | 7.08 | 28 | 9.54 | 26 | 50.06 | 26 | 1,263.8 | 59 | |
| 2017 | Full year | 7.26 | 24 | 9.72 | 24 | 49.88 | 24 | 410.7 | 54 | |
| 2018 | Full year | 7.00 | 45 | 9.59 | 40 | 50.12 | 44 | 939.1 | 66 | |
| | 1st quarter | 7.37 | 4 | 9.55 | 4 | 51.40 | 4 | 90.4 | 9 | |
| | 2nd quarter | 7.75 | 3 | 9.73 | 3 | 58.87 | 3 | 48.3 | 10 | |
| | 3rd quarter | 6.52 | 5 | 9.80 | 3 | 43.86 | 4 | 619.5 | 16 | |
| | 4th quarter | 7.20 | 21 | 9.73 | 22 | 52.33 | 20 | 697.2 | 28 | |
| 2019 | Full year | 7.17 | 33 | 9.71 | 32 | 51.75 | 31 | 1,455.3 | 63 | |
| | 1st quarter | 7.22 | 9 | 9.35 | 9 | 52.25 | 9 | 124.4 | 11 | |
| | 2nd quarter | 7.28 | 3 | 9.55 | 3 | 55.74 | 3 | 21.0 | 8 | |
| 2020 | 1st half | 7.23 | 12 | 9.40 | 12 | 53.12 | 12 | 146.4 | 19 | |

Data compiled July 20, 2020

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 3: Electric authorized ROEs: 2007-2020 Q2

| Settled versus fully litigated cases | | | | | | | | | |
|--------------------------------------|-----------------|----------------|------------------------|-----------------|----------------|------------------------|-----------------------|----------------|------------------------|
| Year | All cases | | | Settled cases | | | Fully litigated cases | | |
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.30 | 10.20 | 38 | 10.42 | 10.33 | 14 | 10.23 | 10.15 | 24 |
| 2008 | 10.41 | 10.30 | 37 | 10.43 | 10.25 | 17 | 10.39 | 10.54 | 20 |
| 2009 | 10.52 | 10.50 | 40 | 10.64 | 10.62 | 16 | 10.45 | 10.50 | 24 |
| 2010 | 10.37 | 10.30 | 61 | 10.39 | 10.30 | 34 | 10.35 | 10.10 | 27 |
| 2011 | 10.29 | 10.17 | 42 | 10.12 | 10.07 | 16 | 10.39 | 10.25 | 26 |
| 2012 | 10.17 | 10.08 | 58 | 10.06 | 10.00 | 29 | 10.28 | 10.25 | 29 |
| 2013 | 10.03 | 9.95 | 49 | 10.12 | 9.98 | 32 | 9.85 | 9.75 | 17 |
| 2014 | 9.91 | 9.78 | 38 | 9.73 | 9.75 | 17 | 10.05 | 9.83 | 21 |
| 2015 | 9.85 | 9.65 | 30 | 10.07 | 9.72 | 14 | 9.66 | 9.62 | 16 |
| 2016 | 9.77 | 9.75 | 42 | 9.80 | 9.85 | 17 | 9.74 | 9.60 | 25 |
| 2017 | 9.74 | 9.60 | 53 | 9.75 | 9.60 | 29 | 9.73 | 9.56 | 24 |
| 2018 | 9.60 | 9.58 | 48 | 9.57 | 9.63 | 26 | 9.63 | 9.53 | 22 |
| 2019 | 9.65 | 9.60 | 47 | 9.75 | 9.73 | 20 | 9.58 | 9.50 | 27 |
| H1'2020 | 9.55 | 9.45 | 27 | 9.49 | 9.45 | 11 | 9.58 | 9.56 | 16 |

| General rate cases versus limited-issue riders | | | | | | | | | |
|--|-----------------|----------------|------------------------|--------------------|----------------|------------------------|----------------------|----------------|------------------------|
| Year | All cases | | | General rate cases | | | Limited-issue riders | | |
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.30 | 10.20 | 38 | 10.32 | 10.23 | 36 | 9.90 | 9.90 | 1 |
| 2008 | 10.41 | 10.30 | 37 | 10.37 | 10.30 | 35 | 11.11 | 11.11 | 2 |
| 2009 | 10.52 | 10.50 | 40 | 10.52 | 10.50 | 38 | 10.55 | 10.55 | 2 |
| 2010 | 10.37 | 10.30 | 61 | 10.29 | 10.26 | 58 | 11.87 | 12.30 | 3 |
| 2011 | 10.29 | 10.17 | 42 | 10.19 | 10.14 | 40 | 12.30 | 12.30 | 2 |
| 2012 | 10.17 | 10.08 | 58 | 10.02 | 10.00 | 51 | 11.57 | 11.40 | 6 |
| 2013 | 10.03 | 9.95 | 49 | 9.82 | 9.82 | 40 | 11.34 | 11.40 | 7 |
| 2014 | 9.91 | 9.78 | 38 | 9.76 | 9.75 | 32 | 10.96 | 11.00 | 5 |
| 2015 | 9.85 | 9.65 | 30 | 9.60 | 9.53 | 23 | 10.87 | 11.00 | 6 |
| 2016 | 9.77 | 9.75 | 42 | 9.60 | 9.60 | 32 | 10.31 | 10.55 | 10 |
| 2017 | 9.74 | 9.60 | 53 | 9.68 | 9.60 | 42 | 10.01 | 9.95 | 10 |
| 2018 | 9.60 | 9.58 | 48 | 9.56 | 9.58 | 38 | 9.74 | 9.70 | 10 |
| 2019 | 9.65 | 9.60 | 47 | 9.64 | 9.65 | 33 | 9.68 | 9.31 | 14 |
| H1'2020 | 9.55 | 9.45 | 27 | 9.47 | 9.48 | 18 | 9.69 | 9.42 | 9 |

| Vertically integrated cases versus delivery-only cases | | | | | | | | | |
|--|-----------------|----------------|------------------------|-----------------------------|----------------|------------------------|---------------------|----------------|------------------------|
| Year | All cases | | | Vertically integrated cases | | | Delivery-only cases | | |
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.30 | 10.20 | 38 | 10.50 | 10.45 | 26 | 9.86 | 9.98 | 10 |
| 2008 | 10.41 | 10.30 | 37 | 10.48 | 10.47 | 26 | 10.04 | 10.25 | 9 |
| 2009 | 10.52 | 10.50 | 40 | 10.66 | 10.66 | 28 | 10.15 | 10.30 | 10 |
| 2010 | 10.37 | 10.30 | 61 | 10.42 | 10.40 | 41 | 9.98 | 10.00 | 17 |
| 2011 | 10.29 | 10.17 | 42 | 10.33 | 10.20 | 28 | 9.85 | 10.00 | 12 |
| 2012 | 10.17 | 10.08 | 58 | 10.10 | 10.20 | 39 | 9.75 | 9.73 | 12 |
| 2013 | 10.03 | 9.95 | 49 | 9.95 | 10.00 | 31 | 9.37 | 9.36 | 9 |
| 2014 | 9.91 | 9.78 | 38 | 9.94 | 9.90 | 19 | 9.49 | 9.55 | 13 |
| 2015 | 9.85 | 9.65 | 30 | 9.75 | 9.70 | 17 | 9.17 | 9.07 | 6 |
| 2016 | 9.77 | 9.75 | 42 | 9.77 | 9.78 | 20 | 9.31 | 9.33 | 12 |
| 2017 | 9.74 | 9.60 | 53 | 9.80 | 9.65 | 28 | 9.43 | 9.55 | 14 |
| 2018 | 9.60 | 9.58 | 48 | 9.68 | 9.73 | 23 | 9.38 | 9.50 | 15 |
| 2019 | 9.65 | 9.60 | 47 | 9.73 | 9.73 | 25 | 9.37 | 9.60 | 8 |
| H1'2020 | 9.55 | 9.45 | 27 | 9.67 | 9.70 | 11 | 9.16 | 9.40 | 7 |

Data compiled July 20, 2020

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 4: Gas authorized ROEs: 2007-2020 Q2

| Settled versus fully litigated cases | | | | | | | | | |
|--------------------------------------|-----------------|----------------|------------------------|-----------------|----------------|------------------------|-----------------------|----------------|------------------------|
| Year | All cases | | | Settled cases | | | Fully litigated cases | | |
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.22 | 10.20 | 35 | 10.24 | 10.18 | 22 | 10.20 | 10.40 | 13 |
| 2008 | 10.39 | 10.45 | 32 | 10.34 | 10.28 | 20 | 10.47 | 10.68 | 12 |
| 2009 | 10.22 | 10.26 | 30 | 10.43 | 10.40 | 13 | 10.05 | 10.15 | 17 |
| 2010 | 10.15 | 10.10 | 39 | 10.30 | 10.15 | 12 | 10.08 | 10.10 | 27 |
| 2011 | 9.92 | 10.03 | 16 | 10.08 | 10.08 | 8 | 9.76 | 9.80 | 8 |
| 2012 | 9.94 | 10.00 | 35 | 9.99 | 10.00 | 14 | 9.92 | 9.90 | 21 |
| 2013 | 9.68 | 9.72 | 21 | 9.80 | 9.80 | 9 | 9.59 | 9.60 | 12 |
| 2014 | 9.78 | 9.78 | 26 | 9.51 | 9.50 | 11 | 9.98 | 10.10 | 15 |
| 2015 | 9.60 | 9.68 | 16 | 9.60 | 9.60 | 11 | 9.58 | 9.80 | 5 |
| 2016 | 9.54 | 9.50 | 26 | 9.50 | 9.50 | 16 | 9.61 | 9.58 | 10 |
| 2017 | 9.72 | 9.60 | 24 | 9.68 | 9.60 | 17 | 9.82 | 9.50 | 7 |
| 2018 | 9.59 | 9.60 | 40 | 9.60 | 9.60 | 24 | 9.57 | 9.50 | 16 |
| 2019 | 9.71 | 9.70 | 32 | 9.70 | 9.70 | 20 | 9.74 | 9.72 | 12 |
| H1'2020 | 9.40 | 9.42 | 12 | 9.44 | 9.40 | 7 | 9.34 | 9.44 | 5 |

| General rate cases versus limited-issue riders | | | | | | | | | |
|--|-----------------|----------------|------------------------|--------------------|----------------|------------------------|----------------------|----------------|------------------------|
| Year | All cases | | | General rate cases | | | Limited-issue riders | | |
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.22 | 10.20 | 35 | 10.22 | 10.20 | 35 | — | — | 0 |
| 2008 | 10.39 | 10.45 | 32 | 10.39 | 10.45 | 32 | — | — | 0 |
| 2009 | 10.22 | 10.26 | 30 | 10.22 | 10.26 | 30 | — | — | 0 |
| 2010 | 10.15 | 10.10 | 39 | 10.15 | 10.10 | 39 | — | — | 0 |
| 2011 | 9.92 | 10.03 | 16 | 9.91 | 10.05 | 15 | 10.00 | 10.00 | 1 |
| 2012 | 9.94 | 10.00 | 35 | 9.93 | 10.00 | 34 | 10.40 | 10.40 | 1 |
| 2013 | 9.68 | 9.72 | 21 | 9.68 | 9.72 | 21 | — | — | 0 |
| 2014 | 9.78 | 9.78 | 26 | 9.78 | 9.78 | 26 | — | — | 0 |
| 2015 | 9.60 | 9.68 | 16 | 9.60 | 9.68 | 16 | — | — | 0 |
| 2016 | 9.54 | 9.50 | 26 | 9.53 | 9.50 | 25 | 9.70 | 9.70 | 1 |
| 2017 | 9.72 | 9.60 | 24 | 9.73 | 9.60 | 23 | 9.50 | 9.50 | 1 |
| 2018 | 9.59 | 9.60 | 40 | 9.59 | 9.60 | 39 | 9.50 | 9.50 | 1 |
| 2019 | 9.71 | 9.70 | 32 | 9.72 | 9.72 | 30 | 9.60 | 9.60 | 2 |
| H1'2020 | 9.40 | 9.42 | 12 | 9.40 | 9.42 | 12 | — | — | 0 |

Data compiled July 20, 2020

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence



Table 5: Electric and gas utility decisions

| Electric utility decisions | | | | | | | | | |
|----------------------------|--|-------|-------------|-------------|-------------------------------|-----------|-----------|-------------------------|----------------|
| Date | Company | State | ROR (%) | ROE (%) | Common equity as % of capital | Test year | Rate base | Rate change amount (\$) | Footnotes |
| 01/08/20 | Interstate Power and Light Co. | IA | 7.23 | 10.02 | 51.00 | 12/20 | Average | | 127.0 B, I |
| 01/16/20 | Consolidated Edison Co. of New York, Inc. | NY | 6.61 | 8.80 | 48.00 | 12/20 | Average | | 113.3 B, D, Z |
| 01/22/20 | Rockland Electric Co. | NJ | 7.11 | 9.50 | 48.32 | 9/19 | Year-end | | 12.0 B, D |
| 01/23/20 | Indiana Michigan Power Co. | MI | 6.08 | 9.86 | 46.56 | 12/20 | Average | | 36.4 B,* |
| 02/03/20 | Virginia Electric and Power Co. | VA | 6.84 | 9.20 | 51.17 | 3/21 | Average | | -6.3 LIR,1 |
| 02/03/20 | Virginia Electric and Power Co. | VA | 6.84 | 9.20 | 51.17 | 3/21 | Average | | 11.4 LIR,2 |
| 02/03/20 | Virginia Electric and Power Co. | VA | 7.35 | 10.20 | 51.17 | 3/21 | Average | | -20.3 LIR,3 |
| 02/03/20 | Virginia Electric and Power Co. | VA | 7.35 | 10.20 | 51.17 | 3/21 | Average | | 0.7 LIR,4 |
| 02/06/20 | PacifiCorp | CA | — | 10.00 | — | 12/19 | Average | | -5.8 |
| 02/11/20 | Public Service Co. of Colorado | CO | 6.97 | 9.30 | 55.61 | 8/19 | Average | | 280.5 5,6 |
| 02/14/20 | CenterPoint Energy Houston Electric, LLC | TX | 6.51 | 9.40 | 42.50 | 12/18 | Year-end | | 55.9 B, D,Hy |
| 02/18/20 | Virginia Electric and Power Co. | VA | 7.35 | 10.20 | 51.17 | 3/21 | Average | | -13.0 LIR,7 |
| 02/19/20 | Central Maine Power Co. | ME | 6.30 | 8.25 | 50.00 | 6/18 | Average | | 17.4 D,Hy,8 |
| 02/24/20 | Virginia Electric and Power Co. | NC | 7.20 | 9.75 | 52.00 | 12/18 | Year-end | | NA B, I,Hy,9 |
| 02/25/20 | Appalachian Power Co. | VA | 7.74 | 10.42 | 50.78 | 4/21 | Average | | -6.3 LIR,10 |
| 02/27/20 | AEP Texas Inc. | TX | 6.45 | 9.40 | 42.50 | 12/18 | Year-end | | 0.7 B, D,Hy |
| 02/28/20 | Oklahoma Gas and Electric Co. | AR | 5.33 | — | 37.92 | 3/20 | Year-end | | 5.2 B,11,* |
| 03/11/20 | Indiana Michigan Power Co. | IN | 5.61 | 9.70 | 37.55 | 12/20 | Year-end | | 77.1 Z,* |
| 03/17/20 | Mississippi Power Co. | MS | 7.57 | — | 53.00 | 12/20 | Year-end | | -16.7 B |
| 03/18/20 | Union Electric Co. | MO | — | — | — | 12/18 | — | | -32.0 B,12 |
| 03/20/20 | Virginia Electric and Power Co. | VA | 6.84 | 9.20 | 51.17 | 5/21 | Average | | 18.0 LIR,13 |
| 03/25/20 | Avista Corp. | WA | 7.21 | 9.40 | 48.50 | 12/18 | — | | 28.5 B |
| 2020 | 1st quarter: averages/total Observations | | 6.82 | 9.58 | 48.72 | | | | 683.8 |
| 04/06/20 | Kentucky Utilities Co. | VA | — | — | — | 12/18 | — | | 9.0 B |
| 04/07/20 | Northern States Power Co. - MN | MN | — | — | — | — | — | | — 14 |
| 04/13/20 | Virginia Electric and Power Co. | VA | 6.84 | 9.20 | 51.17 | 5/20 | Average | | 7.4 LIR,15 |
| 04/17/20 | Fitchburg Gas and Electric Light Co. | MA | 7.99 | 9.70 | 52.45 | 12/18 | Year-end | | 1.1 B, D |
| 04/27/20 | Duke Energy Kentucky, Inc. | KY | 6.41 | 9.25 | 48.23 | 3/21 | Average | | 24.1 |
| 05/08/20 | DTE Electric Co. | MI | 5.46 | 9.90 | 38.32 | 4/21 | Average | | 188.3 * |
| 05/20/20 | Southern Indiana Gas and Electric Co. | IN | — | — | — | 10/19 | Year-end | | 7.4 LIR,16 |
| 05/20/20 | Southwestern Public Service Co. | NM | 7.19 | 9.45 | 54.77 | 3/19 | Year-end | | 31.0 B |
| 05/21/20 | Appalachian Power Co. | VA | — | 9.42 | — | 6/21 | Year-end | | 4.0 LIR,17 |
| 06/26/20 | Appalachian Power Company | WV | — | — | — | 12/19 | — | | 50.1 B, LIR |
| 06/29/20 | Duke Energy Indiana, LLC | IN | 5.71 | 9.70 | 40.98 | 12/20 | Year-end | | 145.9 Z,* |
| 06/30/20 | Liberty Utilities (Granite State Electric) Corp. | NH | 7.60 | 9.10 | 52.00 | 12/18 | Year-end | | 4.2 B, D, Z, I |
| 2020 | 2nd quarter: averages/total Observations | | 6.74 | 9.47 | 48.27 | | | | 472.4 |
| 2020 | 1st half: averages/total Observations | | 7 | 8 | 7 | | | | 11 |
| 2020 | 1st half: averages/total Observations | | 6.80 | 9.55 | 48.61 | | | | 1,156.1 |
| 2020 | Observations | | 27 | 27 | 28 | | | | 32 |
| Gas utility decisions | | | | | | | | | |
| 01/15/20 | MDU Resources Group Inc. | WY | 7.08 | 9.35 | 51.25 | 12/18 | Year-end | | 0.8 B |
| 01/16/20 | Consolidated Edison Co. of New York, Inc. | NY | 6.61 | 8.80 | 48.00 | 12/20 | Average | | 83.9 B,Z |
| 01/24/20 | Roanoke Gas Co. | VA | 7.28 | 9.44 | 59.64 | 12/17 | Average | | 7.3 I |
| 01/29/20 | Indiana Gas Co., Inc. | IN | — | — | — | 6/19 | Year-end | | 1.8 LIR,16 |
| 01/29/20 | Southern Indiana Gas and Electric Co. | IN | — | — | — | 6/19 | Year-end | | 2.2 LIR,16 |
| 02/03/20 | Cascade Natural Gas Corp. | WA | 7.24 | 9.40 | 49.10 | 12/18 | — | | 6.5 B |
| 02/24/20 | Atmos Energy Corp. | KS | 7.03 | 9.10 | 56.32 | 3/19 | Year-end | | 3.1 |
| 02/25/20 | Questar Gas Co. | UT | 7.18 | 9.50 | 55.00 | 12/20 | Average | | 2.7 Z |
| 02/28/20 | Fitchburg Gas and Electric Light Co. | MA | 7.99 | 9.70 | 52.45 | 12/18 | Year-end | | 4.6 B,Z |
| 02/28/20 | Liberty Utilities (Energy/North Natural Gas) Corp. | NH | — | — | — | — | — | | — 14 |
| 03/25/20 | Avista Corp. | WA | 7.21 | 9.40 | 48.50 | 12/18 | — | | 8.0 B |
| 03/26/20 | Northern Utilities, Inc. | ME | 7.34 | 9.48 | 50.00 | 12/18 | Year-end | | 3.6 Hy |
| 2020 | 1st quarter: averages/total Observations | | 7.22 | 9.35 | 52.25 | | | | 124.4 |
| 04/21/20 | Atmos Energy Corporation | TX | 7.71 | 9.80 | 60.12 | — | — | | -0.3 B |
| 04/28/20 | Delta Natural Gas Co., Inc. | KY | — | — | — | 12/19 | Year-end | | 3.4 LIR,18 |
| 05/13/20 | Missouri Gas Energy | MO | — | — | — | 2/20 | — | | 5.6 B, LIR,19 |
| 05/13/20 | Spiral Missouri Inc. | MO | — | — | — | 2/20 | — | | 5.5 B, LIR,19 |
| 05/19/20 | Black Hills Colorado Gas, Inc. | CO | 6.76 | 9.20 | 50.15 | 6/18 | Average | | -2.3 |
| 06/16/20 | CenterPoint Energy Resources Corp. | TX | 7.38 | 9.65 | 56.95 | 6/19 | Year-end | | 4.0 B |
| 06/23/20 | Black Hills Kansas Gas Utility Co., LLC | KS | — | — | — | 1/20 | Year-end | | 1.6 LIR,20 |
| 06/24/20 | Northern Indiana Public Service Co. | IN | — | — | — | 12/19 | Year-end | | 4.5 LIR,16 |
| 2020 | 2nd quarter: averages/total Observations | | 7.28 | 9.55 | 55.74 | | | | 22.0 |
| 2020 | Observations | | 3 | 3 | 3 | | | | 8 |
| 2020 | 1st half: averages/total Observations | | 7.23 | 9.40 | 53.12 | | | | 146.4 |
| 2020 | Observations | | 12 | 12 | 12 | | | | 19 |

Data compiled July 20, 2020

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Footnotes

- A- Average.
- B- Order followed stipulation or settlement by the parties. Decision particulars not necessarily precedent-setting or specifically adopted by the regulatory body.
- D- Applies to electric delivery only.
- Hy Hypothetical capital structure adopted.
- I- Interim rates implemented prior to the issuance of final order, normally under bond and subject to refund.
- LIR Limited-issue rider proceeding.
- NA Not available at the time of publication.
- Z- Rate change implemented in multiple steps.
- * Capital structure includes cost-free items or tax credit balances at the overall rate of return.
- 1 Rate change was approved under Rider B, which is the mechanism through which the company recovers the costs associated with the conversion of the Altavista, Hopewell and Southampton power stations to burn biomass fuels.
- 2 Rate change was approved under Rider GV, which is the mechanism through which the company recovers its investment in the Greenville County generation facility.
- 3 Rate change was approved under Rider S, which is the mechanism through which the company recovers its investment in the Virginia City Hybrid Energy Center.
- 4 Rate change was approved under Rider W, which is the mechanism through which the company recovers its investment in the Warren County generation facility.
- 5 While the specified 2/1/20 date coincides with the date of the PUC's written order, the authorized base rate change coincides with a compliance filing submitted by the company on 2/18/20 and implemented on 2/25/20.
- 6 The company petitioned the PUC for a rehearing on 3/2/20. On 7/14/20, the PUC issued an order granting in part and denying in part reconsideration motions filed by the company, as well as other interventions in the proceeding. The order directs the company to submit compliance tariffs reflecting the decision within 30 days.
- 7 Rate change was approved under Rider R, which is the mechanism through which the company recovers its investment in the Bear Garden power plant.
- 8 Decision reflects date of written order issued on Feb. 19, 2020. The ROE authorized reflects a 100 basis point downward adjustment for poor service. The PUC ordered that this ROE disallowance be lifted when the utility meets all performance benchmarks for all service equality metrics for at least 18 consecutive months beginning March 1, 2020, and formally demonstrates to the commission that problems have been solved.
- 9 Company seeks reconsideration regarding coal ash cost recovery.
- 10 This case addresses the company's investment in the Dresden Generating Plant.
- 11 Rate change pursuant to company's formula rate plan.
- 12 The approved partial settlements were largely silent regarding traditional rate case parameters, including capital structure and rate base, but notes that the stipulated return on equity is in a range of 9.4% to 9.6%.
- 13 Reflects recovery of two utility-scale solar generation facilities, the 142-MW Colonial Trail West Solar Facility and the 96-MW AC Spring Grove 1 Solar Facility.
- 14 Case withdrawn.
- 15 Rate change approved under US-4, which is the mechanism through which the company will recover its investment in the roughly 100 megawatt utility-scale solar generation facility, Sadler Solar Facility, located in Greensville County, VA.
- 16 Case established the rates to be charged to customers under the company's compliance and system improvement adjustment mechanism, which includes both federally mandated pipeline-safety initiatives and projects that are permitted under the state's "transmission, distribution, and storage system improvement charge," or TDSIC, statute.
- 17 Rate change authorized authorized under company's energy efficiency rider.
- 18 Rate change authorized under the company's pipe replacement program rider.
- 19 Rate change authorized under the company's infrastructure system replacement surcharge rider.
- 20 Case involves company's gas system reliability surcharge.

RRA Regulatory Focus

Major Rate Case Decisions — January - March 2019

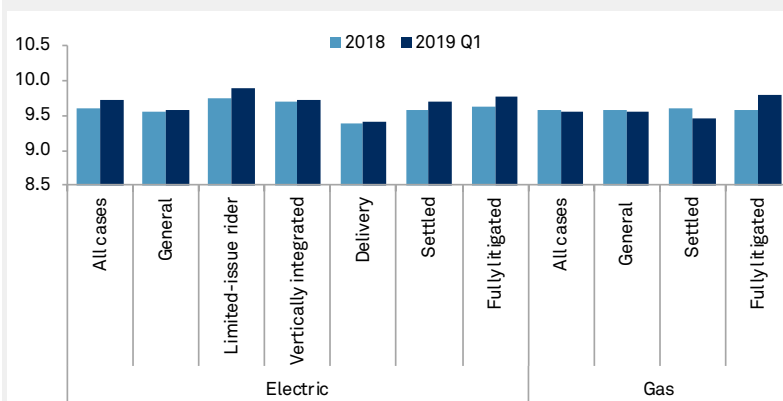
The average ROE authorized electric utilities was 9.73% in rate cases decided during the first quarter of 2019, somewhat above the 9.60% average for cases decided in calendar-2018. There were 12 electric ROE determinations in the first three months of 2019 versus 48 in the full year 2018. This data includes several limited-issue rider cases. Excluding these cases, the average authorized ROE was 9.57% in rate cases decided in the first quarter of 2019, largely in line with the 9.56% in full year 2018. The difference between the ROE averages including rider cases and those excluding the rider cases is largely driven by ROE premiums of up to 200 basis points approved by the Virginia State Corporation Commission in riders related to certain generation projects (see the [Virginia Commission Profile](#)).

The average ROE authorized gas utilities was 9.55% in the first quarter of 2019 versus 9.59% in full year 2018. There were only four gas cases that included an ROE determination in the first three months of 2019, versus 40 in 2018.

In the first three months of 2019, the median authorized ROE for all electric utilities was 9.7% versus 9.58% in full year 2018. For gas utilities, the median authorized ROE in the first three months of 2019 was 9.7% versus 9.6% in 2018.

From a longer-term perspective, interest rates, as measured by the 30-year U.S. Treasury bond yield, fell almost steadily from the early 1980s until 2015 or so, placing downward pressure on authorized ROEs. Even though the decline has been less dramatic in the period since 1990, average authorized ROEs fell below 10% for gas utilities in 2011 and for electric utilities in 2014.

Authorized return on equity (%) Dashboard



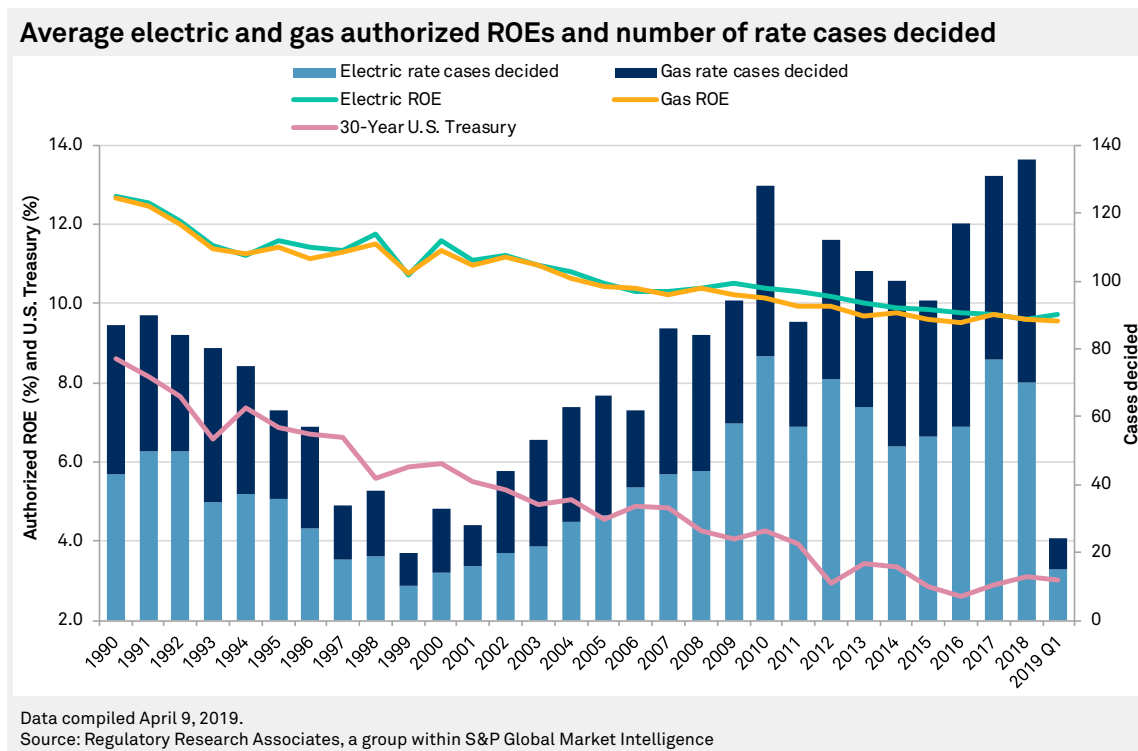
| | 2018 | Q1'19 | |
|-----------------------------|------|-------|---|
| Electric | | | |
| All cases | 9.60 | 9.73 | ▲ |
| General rate cases | 9.56 | 9.57 | ▲ |
| Limited-issue rider cases | 9.74 | 9.90 | ▲ |
| Vertically integrated cases | 9.70 | 9.72 | ▲ |
| Delivery cases | 9.38 | 9.42 | ▲ |
| Settled cases | 9.57 | 9.69 | ▲ |
| Fully litigated cases | 9.63 | 9.78 | ▲ |
| Gas | | | |
| All cases | 9.59 | 9.55 | ▼ |
| General rate cases | 9.59 | 9.55 | ▼ |
| Settled cases | 9.60 | 9.47 | ▼ |
| Fully litigated cases | 9.57 | 9.80 | ▲ |
| U.S. Treasury | | | |
| 30-year bond yield | 3.11 | 3.03 | ▼ |

Data compiled April 9, 2019.
 Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Lisa Fontanella, CFA
 Research Director

Sales & subscriptions
 Sales_NorthAm@spglobal.com

Enquiries
 support.mi@spglobal.com

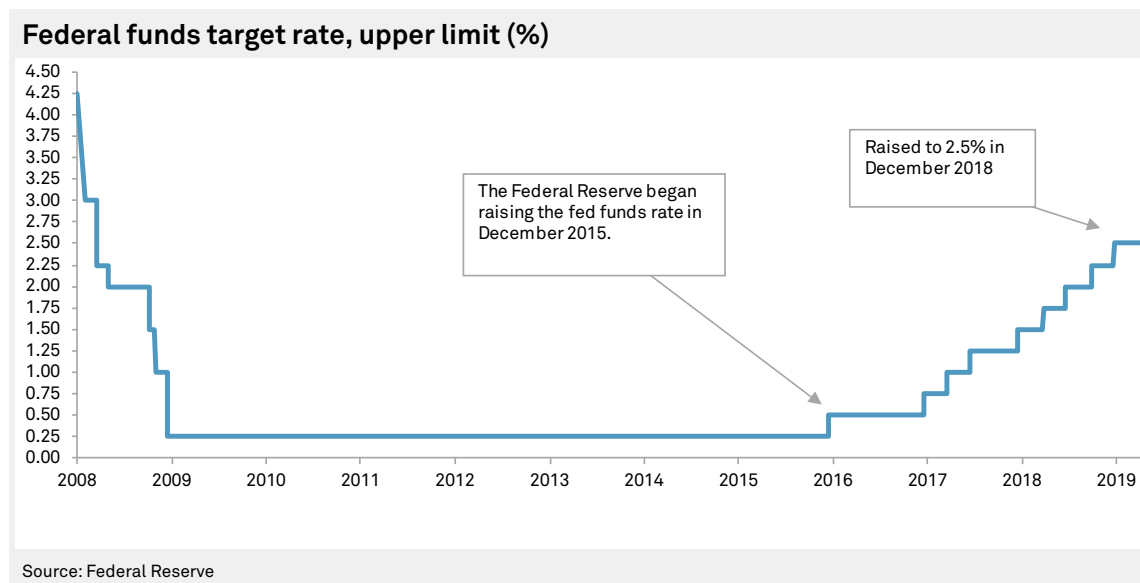


After brisk rate case activity in 2018, where almost 140 cases were decided, there were 24 electric and gas cases resolved in the first quarter of 2019. In fact, since 2010 rate case activity has been robust, with 100 or more cases adjudicated in seven of the last nine calendar years. This count includes electric and gas cases where no ROEs have been specified; however, withdrawn cases are not included.

Increased costs associated with environmental compliance, generation and delivery infrastructure upgrades and expansion, renewable generation mandates, storm and disaster recovery, cybersecurity and employee benefits argue for the continuation of an active rate case agenda over the next few years. In addition, the need to address the impacts of the 2017 federal tax reform has caused rate case agendas to be more active than previously expected.

In addition, rising interest rates could also contribute to increased rate case activity. In 2015, the Federal Reserve began to gradually raise the federal funds rate. Subsequent to that hike, the Federal Reserve has increased rates by 25 basis points eight times, with the most recent hike occurring in December 2018, bringing the federal funds rate to the range of 2.25% to 2.5%. Although additional increases were anticipated in 2019, recent commentary from the Federal Reserve indicates a willingness to remain “patient” about hikes in 2019 due to a slowdown in the global economy and low inflationary pressures.

While increases in the federal funds rate do not move in lockstep with longer-term treasuries and authorized ROEs do not move in lockstep with interest rates, the expectation is that as interest rates rise, authorized ROEs would also begin to rise. However, several factors impact the timing and magnitude of this anticipated shift. Normal regulatory lag, i.e., the amount of time it takes for a utility to put together a rate case filing and tender it to the commission and then for the commission to process the case, would without any other influences delay a rise in average authorized ROEs relative to interest rates.



Another consideration is that while authorized ROEs have fallen over time, the gap between authorized ROEs and interest rates has widened somewhat, largely as a result of an often-unstated understanding by regulators that the drop in interest rates caused by Federal Reserve intervention was unusual. Therefore, as interest rates rise, regulators may be content to allow the gap between interest rates and authorized ROEs to narrow to more “normal” ranges.

Capital structure trends

To offset the negative cash flow impact of federal tax reform, many utilities sought higher common equity ratios, and the average authorized equity ratios adopted by utility commissions in the first three months of 2019 were modestly higher than the levels observed in 2018 and 2017. The average authorized equity ratio for electric utility cases nationwide was 49.51% in the first three months of 2019, 49.02% in full year 2018 and 48.90% in 2017. The average allowed equity ratio for gas utilities nationwide was 51.40% in the first three months of 2019, 50.09% in 2018 and 49.88% in 2017.

The aforementioned averages include allowed equity ratios adopted by utility commissions in Arkansas, Florida, Indiana and Michigan — jurisdictions that authorize capital structures that include cost-free items or tax credit balances. Excluding these jurisdictions, the average authorized equity ratio for electric utilities nationwide was 50.86% for the first three months of 2019, 50.60% in cases decided during 2018 and 50.02% in 2017. For gas utilities, there were no determinations from the aforementioned states thus far in 2019, however, excluding these jurisdictions from prior years, the average allowed equity ratio was 51.47% in 2018 versus 51.13% in 2017.

Taking a longer-term view, equity ratios have generally increased over the last 15 years — the average equity ratio approved in electric rate cases decided during 2004 was 46.96%, while the average for gas utilities was 45.81%. Many commissions began approving more equity-rich capital structures in the wake of the 2008 financial crisis.

A more granular look at ROE trends

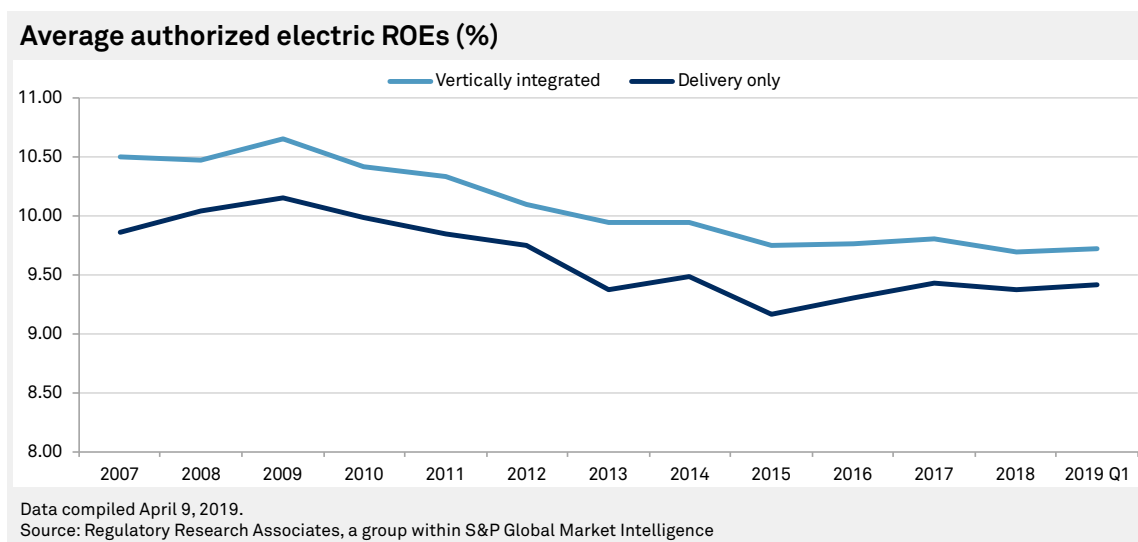
The discussion thus far has looked broadly at trends in authorized ROEs; the sections that follow provide a more granular view based upon the types of proceedings/decisions in which these ROEs were established.

Regulatory Research Associates, a group within S&P Global Market Intelligence, has observed that there can be significant differences between the ROE averages from one subcategory of cases to another.

As a result of electric industry restructuring, certain states unbundled electric rates and implemented retail competition for generation. Commissions in those states now have jurisdiction only over the revenue requirement and return parameters for delivery operations.

Comparing electric vertically integrated cases versus delivery-only proceedings over the past 12 years, RRA finds that the annual average authorized ROEs in vertically integrated cases typically are about 30 to 65 basis points higher than in delivery-only cases, arguably reflecting the increased risk associated with ownership and operation of generation assets.

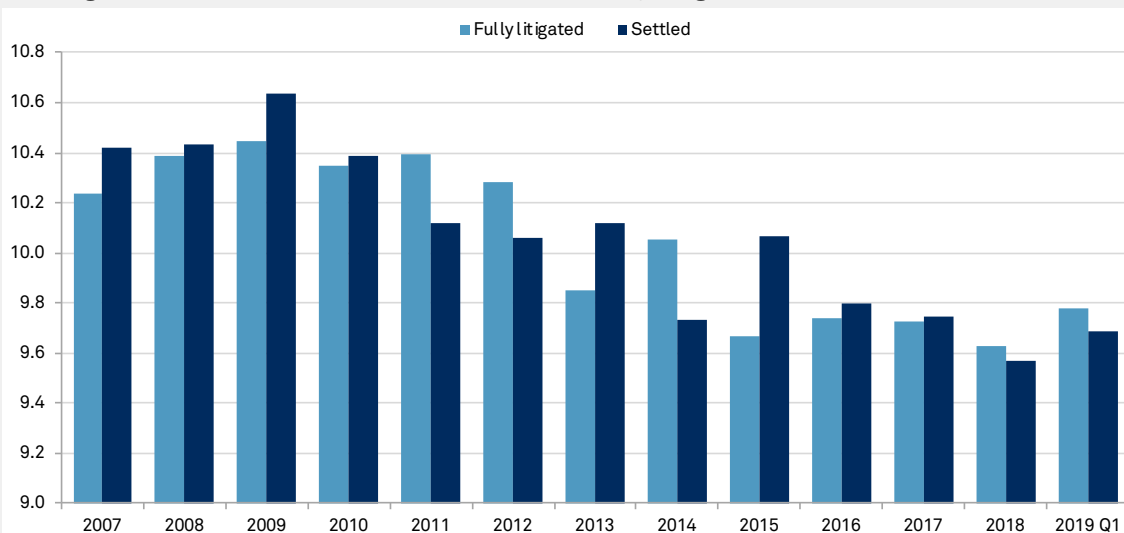
The industry average ROE for vertically integrated electric utilities was 9.72%, based on rate cases concluded for the first quarter of 2019, versus 9.70% in full year 2018. For electric distribution-only utilities, the industry average ROE authorized in the first quarter of 2019 was 9.42% versus 9.38% in full year 2018.



Settlements have frequently been used to resolve rate cases over the last several years, and in many cases, these settlements are “black box” in nature and do not specify the ROE and other typical rate case parameters underlying the stipulated rate change. However, some states preclude this type of treatment, and so, settlements must specify these values if not the specific adjustments from which these values were derived.

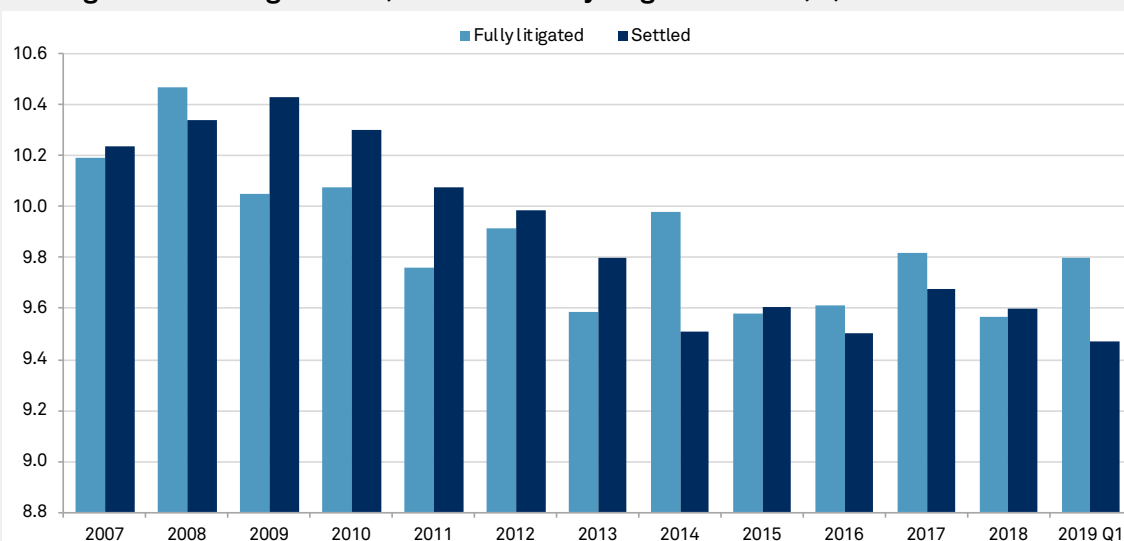
For both electric and gas cases, RRA has found no discernible pattern in the average authorized ROEs in cases that were settled versus those that were fully litigated. In some years, the average authorized ROE was higher for fully litigated cases, in others, it was higher for settled cases, and in a handful of years, the authorized ROE was similar for both fully litigated and settled cases.

Average authorized electric ROEs, settled vs. fully litigated cases (%)



Data compiled April 9, 2019.
 Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Average authorized gas ROEs, settled vs. fully litigated cases (%)



Data compiled April 9, 2019.
 Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Over the last several years, the annual average authorized ROEs in electric cases that involve limited-issue riders were typically meaningfully higher than those approved in general rate cases, driven by the ROE premiums authorized in Virginia. Limited-issue rider cases in which a separate ROE is determined have had limited use in the gas industry, as most of the gas riders rely on ROEs approved in a previous base rate case.

The following discussion focuses on the corresponding tables available [here](#).

Table 1 shows the average ROE authorized in major electric and gas rate decisions annually since 1990 and by quarter since 2015, followed by the number of observations in each period. Table 2 indicates the composite electric and gas industry data for all major cases, summarized annually since 2004 and by quarter for the past five quarters.

Included in Tables 3 and 4 of the spreadsheet are comparisons since 2007 of average authorized ROEs for settled versus fully litigated cases, general rate cases versus limited issue rider proceedings and vertically integrated cases versus delivery-only cases for electric and gas utilities, respectively.

The individual electric and gas cases decided in 2019 are listed in Table 5 of the spreadsheet, with the decision date shown first, followed by the company name, the abbreviation for the state issuing the decision, the authorized rate of return, the ROE and the percentage of common equity in the adopted capital structure. Next, RRA indicates the month and year in which the adopted test year ended, whether the commission utilized an average or a year-end rate base and the amount of the permanent rate change authorized. The dollar amounts represent the permanent rate change ordered at the time decisions were rendered. Fuel adjustment clause rate changes are not reflected in this study.

The simple mean is utilized for the return averages. In addition, the average equity returns indicated in this report reflect the ROEs approved in cases that were decided during the specified time periods and are not necessarily representative of either the average currently authorized ROEs for utilities industrywide or the returns actually earned by the utilities.

Please note: In an effort to align data presented in this report with data available in S&P Global Market Intelligence's online database, earlier historical data provided in previous reports may not match historical data in this report due to certain differences in presentation, including the treatment of cases that were withdrawn or dismissed.

Subsequent to our publication of our year-end 2018 report, the New Mexico Public Regulation Commission issued a revised decision in an electric rate case decision, the outcome of which impacted several of our electric return determinations in 2018. The instant report reflects the newly revised numbers.

© 2019 S&P Global Market Intelligence. All rights reserved. Regulatory Research Associates is a group within S&P Global Market Intelligence, a division of S&P Global (NYSE:SPGI). Confidential Subject Matter. WARNING! This report contains copyrighted subject matter and confidential information owned solely by S&P Global Market Intelligence (SPGMI). Reproduction, distribution or use of this report in violation of this license constitutes copyright infringement in violation of federal and state law. SPGMI hereby provides consent to use the "email this story" feature to redistribute articles within the subscriber's company. Although the information in this report has been obtained from sources that SPGMI believes to be reliable, SPGMI does not guarantee its accuracy.

S&P Global
Market Intelligence

Source: S&P Global Market Intelligence

Table 1: ROEs authorized January 1990-March 2019

| Year | Period | Electric utilities | | | Gas utilities | | |
|------|------------------|--------------------|----------------|------------------------|-----------------|----------------|------------------------|
| | | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 1990 | Full year | 12.70 | 12.77 | 38 | 12.68 | 12.75 | 33 |
| 1991 | Full year | 12.54 | 12.50 | 42 | 12.45 | 12.50 | 31 |
| 1992 | Full year | 12.09 | 12.00 | 45 | 12.02 | 12.00 | 28 |
| 1993 | Full year | 11.46 | 11.50 | 28 | 11.37 | 11.50 | 40 |
| 1994 | Full year | 11.21 | 11.13 | 28 | 11.24 | 11.27 | 24 |
| 1995 | Full year | 11.58 | 11.45 | 28 | 11.44 | 11.30 | 13 |
| 1996 | Full year | 11.40 | 11.25 | 18 | 11.12 | 11.25 | 17 |
| 1997 | Full year | 11.33 | 11.58 | 10 | 11.30 | 11.25 | 12 |
| 1998 | Full year | 11.77 | 12.00 | 10 | 11.51 | 11.40 | 10 |
| 1999 | Full year | 10.72 | 10.75 | 6 | 10.74 | 10.65 | 6 |
| 2000 | Full year | 11.58 | 11.50 | 9 | 11.34 | 11.16 | 13 |
| 2001 | Full year | 11.07 | 11.00 | 15 | 10.96 | 11.00 | 5 |
| 2002 | Full year | 11.21 | 11.28 | 14 | 11.17 | 11.00 | 19 |
| 2003 | Full year | 10.96 | 10.75 | 20 | 10.99 | 11.00 | 25 |
| 2004 | Full year | 10.81 | 10.70 | 21 | 10.63 | 10.50 | 22 |
| 2005 | Full year | 10.51 | 10.35 | 24 | 10.41 | 10.40 | 26 |
| 2006 | Full year | 10.32 | 10.23 | 26 | 10.40 | 10.50 | 15 |
| 2007 | Full year | 10.30 | 10.20 | 38 | 10.22 | 10.20 | 35 |
| 2008 | Full year | 10.41 | 10.30 | 37 | 10.39 | 10.45 | 32 |
| 2009 | Full year | 10.52 | 10.50 | 40 | 10.22 | 10.26 | 30 |
| 2010 | Full year | 10.37 | 10.30 | 61 | 10.15 | 10.10 | 39 |
| 2011 | Full year | 10.29 | 10.17 | 42 | 9.92 | 10.03 | 16 |
| 2012 | Full year | 10.17 | 10.08 | 58 | 9.94 | 10.00 | 35 |
| 2013 | Full year | 10.03 | 9.95 | 49 | 9.68 | 9.72 | 21 |
| 2014 | Full year | 9.91 | 9.78 | 38 | 9.78 | 9.78 | 26 |
| 2015 | 1st quarter | 10.37 | 9.83 | 9 | 9.47 | 9.05 | 3 |
| | 2nd quarter | 9.73 | 9.60 | 7 | 9.43 | 9.50 | 3 |
| | 3rd quarter | 9.40 | 9.40 | 2 | 9.75 | 9.75 | 1 |
| | 4th quarter | 9.62 | 9.55 | 12 | 9.68 | 9.75 | 9 |
| | Full year | 9.85 | 9.65 | 30 | 9.60 | 9.68 | 16 |
| 2016 | 1st quarter | 10.29 | 10.50 | 9 | 9.48 | 9.50 | 6 |
| | 2nd quarter | 9.60 | 9.60 | 7 | 9.42 | 9.52 | 6 |
| | 3rd quarter | 9.76 | 9.80 | 8 | 9.47 | 9.50 | 4 |
| | 4th quarter | 9.57 | 9.58 | 18 | 9.68 | 9.73 | 10 |
| | Full year | 9.77 | 9.75 | 42 | 9.54 | 9.50 | 26 |
| 2017 | 1st quarter | 9.87 | 9.60 | 15 | 9.60 | 9.25 | 3 |
| | 2nd quarter | 9.63 | 9.50 | 14 | 9.47 | 9.60 | 7 |
| | 3rd quarter | 9.66 | 9.60 | 5 | 10.14 | 9.90 | 6 |
| | 4th quarter | 9.74 | 9.60 | 19 | 9.68 | 9.55 | 8 |
| | Full year | 9.74 | 9.60 | 53 | 9.72 | 9.60 | 24 |
| 2018 | 1st quarter | 9.75 | 9.90 | 13 | 9.68 | 9.80 | 6 |
| | 2nd quarter | 9.54 | 9.50 | 13 | 9.43 | 9.50 | 7 |
| | 3rd quarter | 9.67 | 9.70 | 11 | 9.69 | 9.60 | 13 |
| | 4th quarter | 9.42 | 9.50 | 11 | 9.53 | 9.60 | 14 |
| | Full year | 9.60 | 9.58 | 48 | 9.59 | 9.60 | 40 |
| 2019 | 1st quarter | 9.73 | 9.70 | 12 | 9.55 | 9.70 | 4 |

Data compiled April 9, 2019.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Source: S&P Global Market Intelligence

Table 2: Electric and gas utilities summary table

Electric utilities

| | Period | ROR (%) | Number of observations | ROE (%) | Number of observations | Common equity to total capital (%) | Number of observations | Rate change amount (\$M) | Number of observations |
|------|-------------|---------|------------------------|---------|------------------------|------------------------------------|------------------------|--------------------------|------------------------|
| 2004 | Full year | 8.71 | 20 | 10.81 | 21 | 46.96 | 19 | 1,806.3 | 29 |
| 2005 | Full year | 8.44 | 23 | 10.51 | 24 | 47.34 | 23 | 936.1 | 31 |
| 2006 | Full year | 8.32 | 26 | 10.32 | 26 | 48.54 | 25 | 1,318.1 | 39 |
| 2007 | Full year | 8.18 | 37 | 10.30 | 38 | 47.88 | 36 | 1,405.7 | 43 |
| 2008 | Full year | 8.21 | 39 | 10.41 | 37 | 47.94 | 36 | 2,823.2 | 44 |
| 2009 | Full year | 8.24 | 40 | 10.52 | 40 | 48.57 | 39 | 4,191.7 | 58 |
| 2010 | Full year | 8.01 | 62 | 10.37 | 61 | 48.63 | 57 | 4,921.9 | 78 |
| 2011 | Full year | 8.00 | 43 | 10.29 | 42 | 48.26 | 42 | 2,595.1 | 56 |
| 2012 | Full year | 7.95 | 51 | 10.17 | 58 | 50.69 | 52 | 3,080.7 | 69 |
| 2013 | Full year | 7.66 | 45 | 10.03 | 49 | 49.25 | 43 | 3,328.6 | 61 |
| 2014 | Full year | 7.60 | 32 | 9.91 | 38 | 50.28 | 35 | 2,053.7 | 51 |
| 2015 | Full year | 7.38 | 35 | 9.85 | 30 | 49.54 | 30 | 1,891.5 | 52 |
| 2016 | Full year | 7.28 | 41 | 9.77 | 42 | 48.91 | 41 | 2,332.1 | 57 |
| 2017 | Full year | 7.18 | 48 | 9.74 | 53 | 48.90 | 48 | 2,695.6 | 77 |
| | 1st quarter | 6.89 | 13 | 9.75 | 13 | 48.89 | 13 | 592.6 | 14 |
| | 2nd quarter | 6.78 | 13 | 9.54 | 13 | 47.94 | 13 | 372.4 | 18 |
| | 3rd quarter | 7.14 | 11 | 9.63 | 11 | 51.42 | 11 | 272.4 | 13 |
| | 4th quarter | 6.81 | 12 | 9.42 | 11 | 48.12 | 12 | 643.0 | 22 |
| 2018 | Full year | 6.90 | 49 | 9.60 | 48 | 49.02 | 49 | 1,876.0 | 67 |
| 2019 | 1st quarter | 7.03 | 12 | 9.73 | 12 | 49.51 | 10 | 83.5 | 15 |

Gas utilities

| | Period | ROR (%) | Number of observations | ROE (%) | Number of observations | Common equity to total capital (%) | Number of observations | Rate change amount (\$M) | Number of observations |
|------|-------------|---------|------------------------|---------|------------------------|------------------------------------|------------------------|--------------------------|------------------------|
| 2004 | Full year | 8.51 | 23 | 10.63 | 22 | 45.81 | 22 | 306.0 | 33 |
| 2005 | Full year | 8.24 | 29 | 10.41 | 26 | 48.40 | 24 | 465.4 | 35 |
| 2006 | Full year | 8.44 | 17 | 10.40 | 15 | 47.24 | 16 | 392.5 | 23 |
| 2007 | Full year | 8.11 | 31 | 10.22 | 35 | 48.47 | 28 | 645.3 | 43 |
| 2008 | Full year | 8.49 | 33 | 10.39 | 32 | 50.35 | 32 | 700.0 | 40 |
| 2009 | Full year | 8.15 | 29 | 10.22 | 30 | 48.49 | 29 | 438.6 | 36 |
| 2010 | Full year | 7.99 | 40 | 10.15 | 39 | 48.70 | 40 | 776.5 | 50 |
| 2011 | Full year | 8.09 | 18 | 9.92 | 16 | 52.49 | 14 | 367.0 | 31 |
| 2012 | Full year | 7.98 | 30 | 9.94 | 35 | 51.13 | 32 | 264.0 | 41 |
| 2013 | Full year | 7.43 | 21 | 9.68 | 21 | 50.60 | 20 | 498.7 | 40 |
| 2014 | Full year | 7.65 | 27 | 9.78 | 26 | 51.11 | 28 | 544.2 | 48 |
| 2015 | Full year | 7.34 | 16 | 9.60 | 16 | 49.93 | 16 | 494.1 | 40 |
| 2016 | Full year | 7.08 | 28 | 9.54 | 26 | 50.06 | 26 | 1,263.8 | 59 |
| 2017 | Full year | 7.26 | 24 | 9.72 | 24 | 49.88 | 24 | 410.7 | 54 |
| | 1st quarter | 7.14 | 5 | 9.68 | 6 | 51.05 | 6 | 198.0 | 9 |
| | 2nd quarter | 7.08 | 7 | 9.43 | 7 | 50.83 | 6 | 73.8 | 11 |
| | 3rd quarter | 6.86 | 15 | 9.69 | 13 | 48.55 | 15 | 280.8 | 22 |
| | 4th quarter | 7.04 | 17 | 9.53 | 14 | 50.89 | 16 | 386.0 | 24 |
| 2018 | Full year | 7.00 | 44 | 9.59 | 40 | 50.09 | 43 | 938.6 | 66 |
| 2019 | 1st quarter | 7.37 | 4 | 9.55 | 4 | 51.40 | 4 | 90.4 | 9 |

Data compiled April 9, 2019.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

S&P Global

Market Intelligence

Source: S&P Global Market Intelligence

Table 3: Electric authorized ROEs: 2007-2019 Q1

Settled versus fully litigated cases

| Year | All cases | | | Settled cases | | | Fully litigated cases | | |
|---------|-----------------|----------------|------------------------|-----------------|----------------|------------------------|-----------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.30 | 10.20 | 38 | 10.42 | 10.33 | 14 | 10.23 | 10.15 | 24 |
| 2008 | 10.41 | 10.30 | 37 | 10.43 | 10.25 | 17 | 10.39 | 10.54 | 20 |
| 2009 | 10.52 | 10.50 | 40 | 10.64 | 10.62 | 16 | 10.45 | 10.50 | 24 |
| 2010 | 10.37 | 10.30 | 61 | 10.39 | 10.30 | 34 | 10.35 | 10.10 | 27 |
| 2011 | 10.29 | 10.17 | 42 | 10.12 | 10.07 | 16 | 10.39 | 10.25 | 26 |
| 2012 | 10.17 | 10.08 | 58 | 10.06 | 10.00 | 29 | 10.28 | 10.25 | 29 |
| 2013 | 10.03 | 9.95 | 49 | 10.12 | 9.98 | 32 | 9.85 | 9.75 | 17 |
| 2014 | 9.91 | 9.78 | 38 | 9.73 | 9.75 | 17 | 10.05 | 9.83 | 21 |
| 2015 | 9.85 | 9.65 | 30 | 10.07 | 9.72 | 14 | 9.66 | 9.62 | 16 |
| 2016 | 9.77 | 9.75 | 42 | 9.80 | 9.85 | 17 | 9.74 | 9.60 | 25 |
| 2017 | 9.74 | 9.60 | 53 | 9.75 | 9.60 | 29 | 9.73 | 9.56 | 24 |
| 2018 | 9.60 | 9.58 | 48 | 9.57 | 9.63 | 26 | 9.63 | 9.53 | 22 |
| 2019 Q1 | 9.73 | 9.70 | 12 | 9.69 | 9.68 | 6 | 9.78 | 9.93 | 6 |

General rate cases versus limited-issue riders

| Year | All cases | | | General rate cases | | | Limited-issue riders | | |
|---------|-----------------|----------------|------------------------|--------------------|----------------|------------------------|----------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.30 | 10.20 | 38 | 10.32 | 10.23 | 36 | 9.90 | 9.90 | 1 |
| 2008 | 10.41 | 10.30 | 37 | 10.37 | 10.30 | 35 | 11.11 | 11.11 | 2 |
| 2009 | 10.52 | 10.50 | 40 | 10.52 | 10.50 | 38 | 10.55 | 10.55 | 2 |
| 2010 | 10.37 | 10.30 | 61 | 10.29 | 10.26 | 58 | 11.87 | 12.30 | 3 |
| 2011 | 10.29 | 10.17 | 42 | 10.19 | 10.14 | 40 | 12.30 | 12.30 | 2 |
| 2012 | 10.17 | 10.08 | 58 | 10.02 | 10.00 | 51 | 11.57 | 11.40 | 6 |
| 2013 | 10.03 | 9.95 | 49 | 9.82 | 9.82 | 40 | 11.34 | 11.40 | 7 |
| 2014 | 9.91 | 9.78 | 38 | 9.76 | 9.75 | 32 | 10.96 | 11.00 | 5 |
| 2015 | 9.85 | 9.65 | 30 | 9.60 | 9.53 | 23 | 10.87 | 11.00 | 6 |
| 2016 | 9.77 | 9.75 | 42 | 9.60 | 9.60 | 32 | 10.31 | 10.55 | 10 |
| 2017 | 9.74 | 9.60 | 53 | 9.68 | 9.60 | 42 | 10.01 | 9.95 | 10 |
| 2018 | 9.60 | 9.58 | 48 | 9.56 | 9.58 | 38 | 9.74 | 9.70 | 10 |
| 2019 Q1 | 9.73 | 9.70 | 12 | 9.57 | 9.63 | 6 | 9.90 | 10.20 | 6 |

Vertically integrated cases versus delivery-only cases

| Year | All cases | | | Vertically integrated cases | | | Delivery-only cases | | |
|---------|-----------------|----------------|------------------------|-----------------------------|----------------|------------------------|---------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.30 | 10.20 | 38 | 10.50 | 10.45 | 26 | 9.86 | 9.98 | 10 |
| 2008 | 10.41 | 10.30 | 37 | 10.48 | 10.47 | 26 | 10.04 | 10.25 | 9 |
| 2009 | 10.52 | 10.50 | 40 | 10.66 | 10.66 | 28 | 10.15 | 10.30 | 10 |
| 2010 | 10.37 | 10.30 | 61 | 10.42 | 10.40 | 41 | 9.98 | 10.00 | 17 |
| 2011 | 10.29 | 10.17 | 42 | 10.33 | 10.20 | 28 | 9.85 | 10.00 | 12 |
| 2012 | 10.17 | 10.08 | 58 | 10.10 | 10.20 | 39 | 9.75 | 9.73 | 12 |
| 2013 | 10.03 | 9.95 | 49 | 9.95 | 10.00 | 31 | 9.37 | 9.36 | 9 |
| 2014 | 9.91 | 9.78 | 38 | 9.94 | 9.90 | 19 | 9.49 | 9.55 | 13 |
| 2015 | 9.85 | 9.65 | 30 | 9.75 | 9.70 | 17 | 9.17 | 9.07 | 6 |
| 2016 | 9.77 | 9.75 | 42 | 9.77 | 9.78 | 20 | 9.31 | 9.33 | 12 |
| 2017 | 9.74 | 9.60 | 53 | 9.80 | 9.65 | 28 | 9.43 | 9.55 | 14 |
| 2018 | 9.60 | 9.58 | 48 | 9.70 | 9.75 | 22 | 9.38 | 9.43 | 16 |
| 2019 Q1 | 9.73 | 9.70 | 12 | 9.72 | 9.75 | 3 | 9.42 | 9.60 | 3 |

Data compiled April 9, 2019.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

S&P Global

Market Intelligence

Source: S&P Global Market Intelligence

Table 4: Gas average authorized ROEs: 2007-2019 Q1

Settled versus fully litigated cases

| Year | All cases | | | Settled cases | | | Fully litigated cases | | |
|---------|-----------------|----------------|------------------------|-----------------|----------------|------------------------|-----------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of Observations |
| 2007 | 10.22 | 10.20 | 35 | 10.24 | 10.18 | 22 | 10.20 | 10.40 | 13 |
| 2008 | 10.39 | 10.45 | 32 | 10.34 | 10.28 | 20 | 10.47 | 10.68 | 12 |
| 2009 | 10.22 | 10.26 | 30 | 10.43 | 10.40 | 13 | 10.05 | 10.15 | 17 |
| 2010 | 10.15 | 10.10 | 39 | 10.30 | 10.15 | 12 | 10.08 | 10.10 | 27 |
| 2011 | 9.92 | 10.03 | 16 | 10.08 | 10.08 | 8 | 9.76 | 9.80 | 8 |
| 2012 | 9.94 | 10.00 | 35 | 9.99 | 10.00 | 14 | 9.92 | 9.90 | 21 |
| 2013 | 9.68 | 9.72 | 21 | 9.80 | 9.80 | 9 | 9.59 | 9.60 | 12 |
| 2014 | 9.78 | 9.78 | 26 | 9.51 | 9.50 | 11 | 9.98 | 10.10 | 15 |
| 2015 | 9.60 | 9.68 | 16 | 9.60 | 9.60 | 11 | 9.58 | 9.80 | 5 |
| 2016 | 9.54 | 9.50 | 26 | 9.50 | 9.50 | 16 | 9.61 | 9.58 | 10 |
| 2017 | 9.72 | 9.60 | 24 | 9.68 | 9.60 | 17 | 9.82 | 9.50 | 7 |
| 2018 | 9.59 | 9.60 | 40 | 9.60 | 9.60 | 24 | 9.57 | 9.50 | 16 |
| 2019 Q1 | 9.55 | 9.70 | 4 | 9.47 | 9.70 | 3 | 9.80 | 9.80 | 1 |

General rate cases versus limited-issue riders

| Year | All cases | | | General rate cases | | | Limited-issue riders | | |
|---------|-----------------|----------------|------------------------|--------------------|----------------|------------------------|----------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.22 | 10.20 | 35 | 10.22 | 10.20 | 35 | — | — | 0 |
| 2008 | 10.39 | 10.45 | 32 | 10.39 | 10.45 | 32 | — | — | 0 |
| 2009 | 10.22 | 10.26 | 30 | 10.22 | 10.26 | 30 | — | — | 0 |
| 2010 | 10.15 | 10.10 | 39 | 10.15 | 10.10 | 39 | — | — | 0 |
| 2011 | 9.92 | 10.03 | 16 | 9.91 | 10.05 | 15 | 10.00 | 10.00 | 1 |
| 2012 | 9.94 | 10.00 | 35 | 9.93 | 10.00 | 34 | 10.40 | 10.40 | 1 |
| 2013 | 9.68 | 9.72 | 21 | 9.68 | 9.72 | 21 | — | — | 0 |
| 2014 | 9.78 | 9.78 | 26 | 9.78 | 9.78 | 26 | — | — | 0 |
| 2015 | 9.60 | 9.68 | 16 | 9.60 | 9.68 | 16 | — | — | 0 |
| 2016 | 9.54 | 9.50 | 26 | 9.53 | 9.50 | 25 | 9.70 | 9.70 | 1 |
| 2017 | 9.72 | 9.60 | 24 | 9.73 | 9.60 | 23 | 9.50 | 9.50 | 1 |
| 2018 | 9.59 | 9.60 | 40 | 9.59 | 9.60 | 39 | 9.50 | 9.50 | 1 |
| 2019 Q1 | 9.55 | 9.70 | 4 | 9.55 | 9.70 | 4 | — | — | 0 |

Data compiled April 9, 2019.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

S&P Global

Market Intelligence

Source: S&P Global Market Intelligence

Table 5: Electric and gas utility decisions

Electric utility decisions

| Date | Company | State | ROR (%) | ROE (%) | Common equity as % of capital | Test year | Rate base | Rate change amount (\$) | Footnotes |
|-------------|-------------------------------------|-------|-------------|-------------|-------------------------------|-----------|-----------|-------------------------|-----------|
| 1/2/19 | Appalachian Power Company | VA | 7.76 | 10.40 | — | 2/20 | Average | 7.2 | B, LIR,1 |
| 1/2/19 | Monongahela Power Company | WV | — | — | — | 6/18 | — | -100.9 | B, LIR,2 |
| 1/9/19 | Consumers Energy Company | MI | — | 10.00 | — | 12/19 | Average | -24.0 | B |
| 2/21/19 | Puget Sound Energy, Inc. | WA | — | — | — | 6/18 | Year-end | 0.0 | B,3 |
| 2/27/19 | Virginia Electric and Power Company | VA | 6.87 | 9.20 | 51.37 | 3/20 | — | -4.0 | LIR,4 |
| 2/27/19 | Virginia Electric and Power Company | VA | 6.87 | 9.20 | 51.37 | 3/20 | Average | 38.4 | LIR,5 |
| 2/27/19 | Virginia Electric and Power Company | VA | 7.38 | 10.20 | 51.37 | 3/20 | Average | -8.6 | LIR,6 |
| 2/27/19 | Virginia Electric and Power Company | VA | 7.38 | 10.20 | 51.37 | 3/20 | Average | -3.5 | LIR,7 |
| 2/27/19 | Virginia Electric and Power Company | VA | 7.38 | 10.20 | 51.37 | 3/20 | Average | -4.3 | LIR,8 |
| 2/27/19 | Appalachian Power Company | WV | 7.28 | 9.75 | 50.16 | 12/17 | Average | 44.2 | B |
| 3/6/19 | Oklahoma Gas and Electric Company | AR | 5.27 | — | 37.31 | 3/20 | Year-end | 3.3 | B,9,* |
| 3/13/19 | Atlantic City Electric Company | NJ | 7.08 | 9.60 | 49.94 | 12/18 | Year-end | 70.0 | B, D |
| 3/14/19 | Orange and Rockland Utilities, Inc. | NY | 6.97 | 9.00 | 48.00 | 12/19 | Average | 13.4 | B, D, Z |
| 3/14/19 | Public Service Company of Oklahoma | OK | 6.97 | 9.40 | — | 3/18 | — | 46.0 | B |
| 3/22/19 | Potomac Edison Company | MD | 7.15 | 9.65 | 52.82 | 6/18 | Average | 6.2 | D |
| 2019 | 1st quarter: averages/total | | 7.03 | 9.73 | 49.51 | | | 83.5 | |
| | Observations | | 12 | 12 | 10 | | | 15 | |

Gas utility decisions

| Date | Company | State | ROR (%) | ROE (%) | Common equity as % of capital | Test year | Rate base | Rate change amount (\$) | Footnotes |
|-------------|---|-------|-------------|-------------|-------------------------------|-----------|-----------|-------------------------|-----------|
| 1/4/19 | Baltimore Gas and Electric Company | MD | 7.09 | 9.80 | 52.85 | 7/18 | Average | 64.9 | |
| 1/8/19 | Oklahoma Natural Gas Company | OK | — | — | — | 12/17 | — | -5.9 | B,10 |
| 1/18/19 | Berkshire Gas Company | MA | 8.33 | 9.70 | 54.00 | 12/17 | — | 2.4 | B |
| 1/29/19 | Indiana Gas Company, Inc. | IN | — | — | — | 6/18 | Year-end | -13.1 | LIR,11 |
| 1/29/19 | Southern Indiana Gas and Electric Company | IN | — | — | — | 6/18 | Year-end | -0.8 | LIR,11 |
| 2/5/19 | Kansas Gas Service Company, Inc. | KS | — | — | — | 12/17 | — | 21.5 | B |
| 2/21/19 | Puget Sound Energy, Inc. | WA | — | — | — | 6/18 | Year-end | 21.5 | B,3 |
| 3/14/19 | Orange and Rockland Utilities, Inc. | NY | 6.97 | 9.00 | 48.00 | 12/19 | Average | -7.5 | B, Z |
| 3/27/19 | Duke Energy Kentucky, Inc. | KY | 7.07 | 9.70 | 50.76 | 3/20 | Average | 7.4 | B |
| 2019 | 1st quarter: averages/total | | 7.37 | 9.55 | 51.40 | | | 90.4 | |
| | Observations | | 4 | 4 | 4 | | | 9 | |

Data compiled April 9, 2019.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Footnotes

A- Average

| | |
|-------|---|
| B- | Order followed stipulation or settlement by the parties. Decision particulars not necessarily precedent-setting or specifically adopted by the regulatory body. |
| CWIP- | Construction work in progress |
| D- | Applies to electric delivery only |
| DCt | Date certain rate base valuation |
| E- | Estimated |
| F- | Return on fair value rate base |
| Hy- | Hypothetical capital structure utilized |
| I- | Interim rates implemented prior to the issuance of final order, normally under bond and subject to refund. |
| LIR | Limited-issue rider proceeding |
| M- | "Make-whole" rate change based on return on equity or overall return authorized in previous case. |
| R- | Revised |
| Te- | Temporary rates implemented prior to the issuance of final order. |
| Tr- | Applies to transmission service |
| U- | Double leverage capital structure utilized. |
| YE- | Year-end |
| Z- | Rate change implemented in multiple steps. |
| * | Capital structure includes cost-free items or tax credit balances at the overall rate of return. |
| 1 | This case addresses the company's investment in the Dresden Generating Plant. |
| 2 | Relates to company's expanded net energy cost proceeding. |
| 3 | Rates were established under an expedited rate filing. |
| 4 | Rate change was approved under Rider B, which is the mechanism through which the company recovers the costs associated with the conversion of the Altavista, Hopewell and Southampton power stations to burn biomass fuels. |
| 5 | Rate change was approved under Rider GV, which is the mechanism through which the company recovers its investment in the Greenville County generation facility. |
| 6 | Rate change was approved under Rider R, which is the mechanism through which the company recovers its investment in the Bear Garden power plant. |
| 7 | Rate change was approved under Rider S, which is the mechanism through which the company recovers its investment in the Virginia City Hybrid Energy Center. |
| 8 | Rate change was approved under Rider W, which is the mechanism through which the company recovers its investment in the Warren County generation facility. |
| 9 | Rate change pursuant to company's formula rate plan. |
| 10 | Rate change pursuant to company's performance-based regulation plan. |
| 11 | Case established the rates to be charged to customers under the company's compliance and system improvement adjustment, or CSIA, mechanism, which includes both federally mandated pipeline-safety initiatives and projects that are permitted under the state's TDSIC statute. |

January 31, 2020

spglobal.com/marketintelligence

RRA Regulatory Focus

Major Rate Case Decisions - January - December 2019

Despite a declining interest rate environment, the equity returns authorized electric and gas utilities nationwide ticked up modestly in 2019. Based on data gathered by Regulatory Research Associates, a group within S&P Global Market Intelligence, the average return on equity authorized electric utilities was 9.65% in rate cases decided in 2019, somewhat above the 9.60% average for cases in 2018. There were 47 electric ROE determinations in 2019, versus 48 in 2018. Even so, the average is still hovering around the lowest levels witnessed in the industry, and with the recent rate cuts by the U.S. Federal Reserve, lower authorized returns may be on the horizon.

This data includes several limited-issue rider cases. Excluding these cases, the average authorized ROE was 9.64% in electric rate cases decided in 2019, largely in line with the 9.56% average observed in 2018. The difference between the ROE averages including rider cases and those excluding the rider cases is driven by ROE premiums allowed in certain states for riders that address recovery of specific generation projects.

The average ROE authorized gas utilities crept up to 9.71% for cases decided during 2019, versus 9.59% in 2018. There were 32 gas cases that included an ROE determination in 2019, versus 40 in 2018.

In 2019, the median ROE authorized in all electric utility rate cases was 9.60%, versus 9.58% in 2018; for gas utilities, the metric was 9.70%, versus 9.60% in 2018.

From a longer-term perspective, interest rates, as measured by the 30-year U.S. Treasury bond yield, fell almost steadily from the early 1980s until 2015 or so, placing downward pressure on authorized ROEs. Even though the decline has been less dramatic in the period since 1990, average authorized ROEs fell below 10% for gas utilities in 2011 and for electric utilities in 2014.

After reaching an almost 30-year high in 2018, when almost 140 cases were decided, rate case activity moderated somewhat in 2019, with about 125 electric and gas cases resolved. Since 2010, rate case activity has been robust, with 100 or more cases adjudicated in eight of the last ten calendar years. This count includes electric and gas cases where no ROEs have been specified; however, withdrawn cases are not included.

Lisa Fontanella, CFA
Research Director

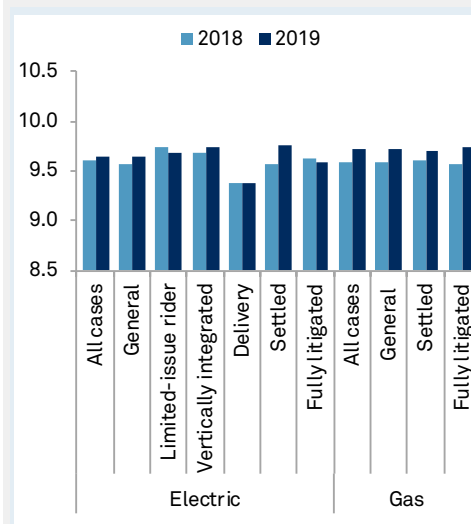
Sales & subscriptions
Sales_NorthAm@spglobal.com

Enquiries
support.mi@spglobal.com

For Detailed Data

Click [here](#) to see supporting data tables.

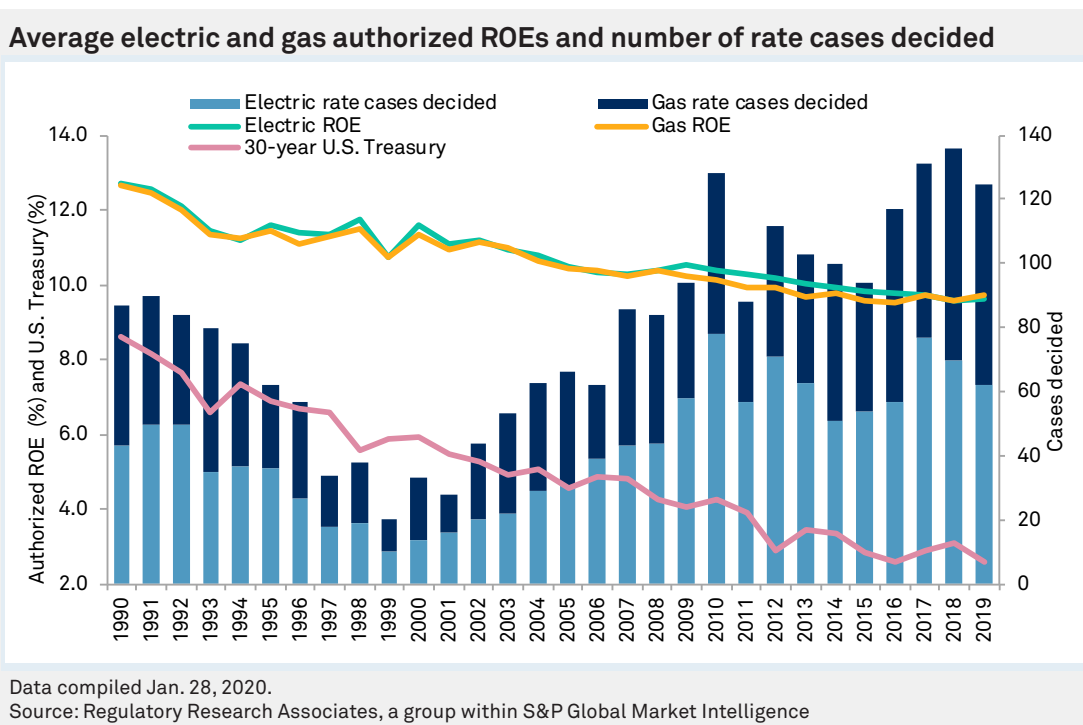
Average authorized return on equity (%) Dashboard



| Electric average | 2018 | 2019 | |
|-----------------------------|------|------|---|
| All cases | 9.60 | 9.65 | ▲ |
| General rate cases | 9.56 | 9.64 | ▲ |
| Limited-issue rider cases | 9.74 | 9.68 | ▼ |
| Vertically integrated cases | 9.68 | 9.73 | ▲ |
| Delivery cases | 9.38 | 9.37 | ▼ |
| Settled cases | 9.57 | 9.75 | ▲ |
| Fully litigated cases | 9.63 | 9.58 | ▼ |
| Gas average | 2018 | 2019 | |
| All cases | 9.59 | 9.71 | ▲ |
| General rate cases | 9.59 | 9.72 | ▲ |
| Settled cases | 9.60 | 9.70 | ▲ |
| Fully litigated cases | 9.57 | 9.74 | ▲ |
| U.S. Treasury | 2018 | 2019 | |
| 30-year bond yield | 3.11 | 2.58 | ▼ |

Data compiled Jan. 28, 2020.

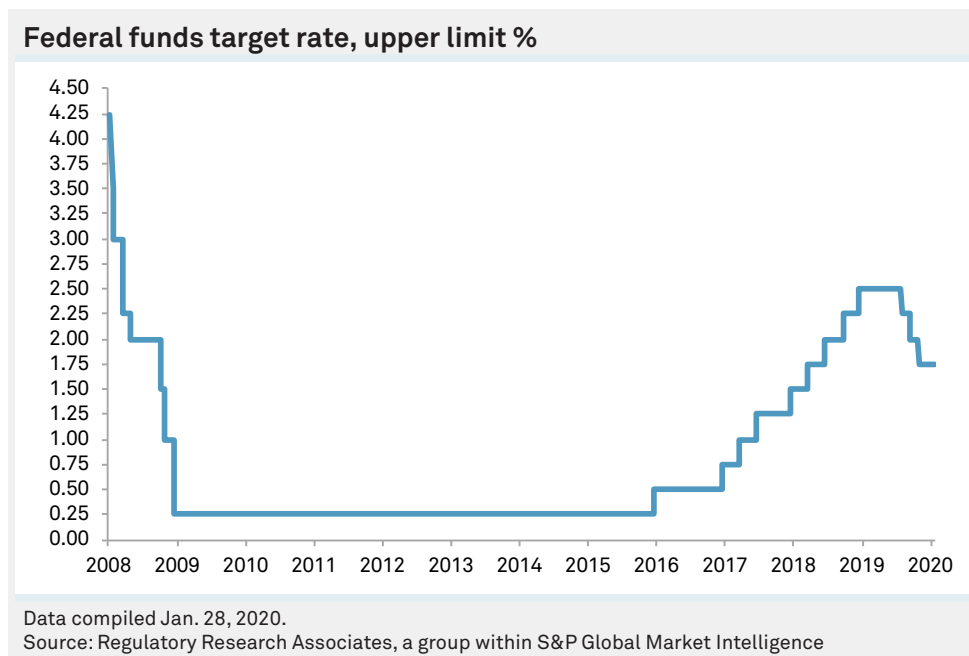
Source: Regulatory Research Associates, a group within S&P Global Market Intelligence



Increased costs associated with environmental compliance, generation and delivery infrastructure upgrades and expansion, renewable generation mandates, storm and disaster recovery, cybersecurity and employee benefits have contributed to an active rate case agenda over the last decade. RRA expects this trend to continue for the foreseeable future in light of the utilities' robust capital spending plans. In the last couple of years, the need to address the impacts of the 2017 federal tax reform has also caused rate case agendas to be more active than previously expected.

Rising interest rates over the past several years also likely contributed to the increased rate case activity. In 2015, the Federal Reserve began to gradually raise the federal funds rate. The Fed increased rates by 25 basis points nine times, with the last hike occurring in December 2018. However, with concerns of slowing growth, fears of a global recession and the impact of U.S.-China trade tensions negatively weighing on the U.S. economy, the Fed, after more than a decade without a cut, lowered rates three times last year; the new target range is now 1.50% to 1.75%.

While increases in the federal funds rate do not move in lockstep with longer-term treasuries and authorized ROEs do not move in lockstep with interest rates, the expectation is that as interest rates change, authorized ROEs would also begin to change in similar fashion. However, several factors impact the timing and magnitude of this anticipated shift. Normal regulatory lag, i.e., the amount of time it takes for a utility to put together a rate case filing and tender it to the commission and then for the commission to process the case, would without any other influences delay a change in average authorized ROEs relative to interest rates.



It is also worth noting that while both interest rates and authorized ROEs have generally been declining since 1990, the gap between authorized ROEs and interest rates widened somewhat over this period, largely as a result of an often-unstated understanding by regulators that the drop in interest rates caused by Federal Reserve intervention was unusual.

Capital structure trends

To offset the negative cash flow impact of federal tax reform, many utilities sought higher common equity ratios, and the average authorized equity ratios adopted by utility commissions in 2019 were modestly higher than the levels observed in 2018 and 2017. The average authorized equity ratio for electric utility cases nationwide was 49.94% in 2019, 49.02% in 2018 and 48.90% in 2017. The average allowed equity ratio for gas utilities nationwide was 51.75% in 2019, 50.09% in 2018 and 49.88% in 2017.

The aforementioned averages include allowed equity ratios adopted by utility commissions in Arkansas, Florida, Indiana and Michigan — jurisdictions that typically authorize capital structures that include cost-free items or tax credit balances. Excluding those occurrences, the average authorized equity ratio for electric utilities nationwide was 51.55% in 2019, 50.60% in cases decided during 2018 and 50.02% in 2017. For gas utilities, excluding these occurrences, the average authorized equity ratio was 52.76% in 2019, 51.47% in cases decided in 2018 and 51.13% in 2017.

Taking a longer-term view, equity ratios have generally increased over the last 15 years — the average equity ratio approved in electric rate cases decided during 2004 was 46.96%, while the average for gas utilities was 45.81%. Many commissions began approving more equity-rich capital structures in the wake of the 2008 financial crisis.

A more granular look at ROE trends

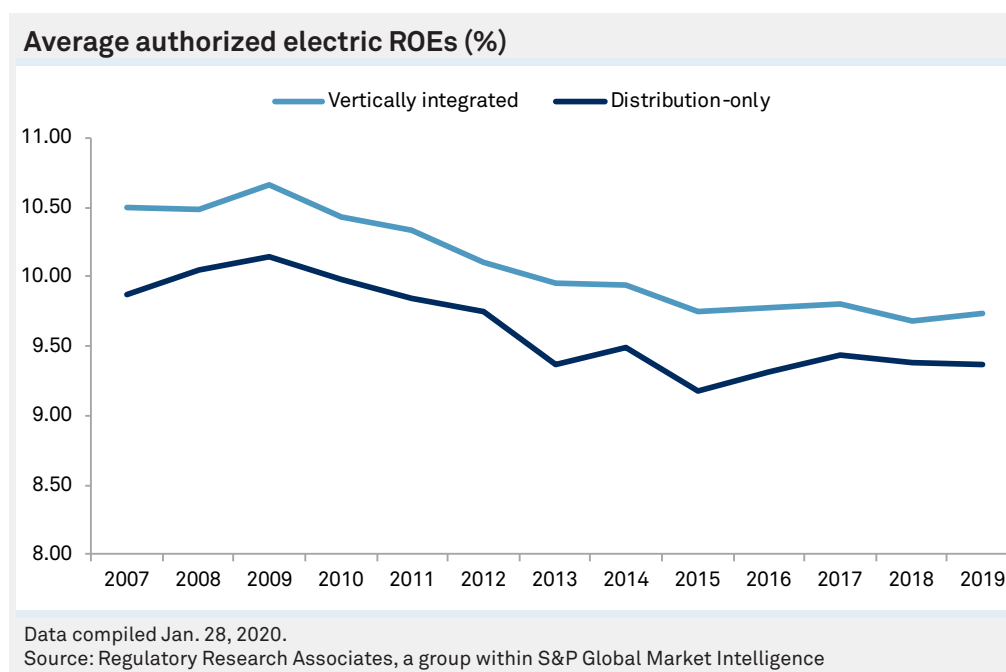
The discussion thus far has looked broadly at trends in authorized ROEs; the sections that follow provide a more granular view based upon the types of proceedings/decisions in which these ROEs were established.

RRA has observed that there can be significant differences between the average ROEs from one subcategory of cases to another.

As a result of electric industry restructuring, certain states unbundled electric rates and implemented retail competition for generation. Commissions in those states now have jurisdiction only over the revenue requirement and return parameters for delivery operations.

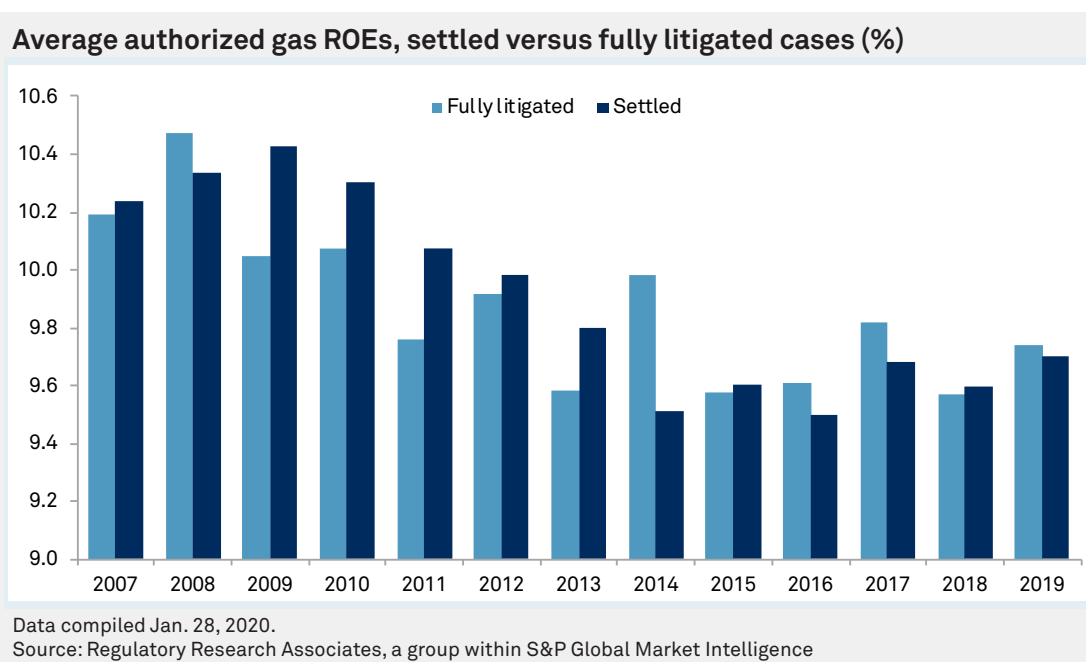
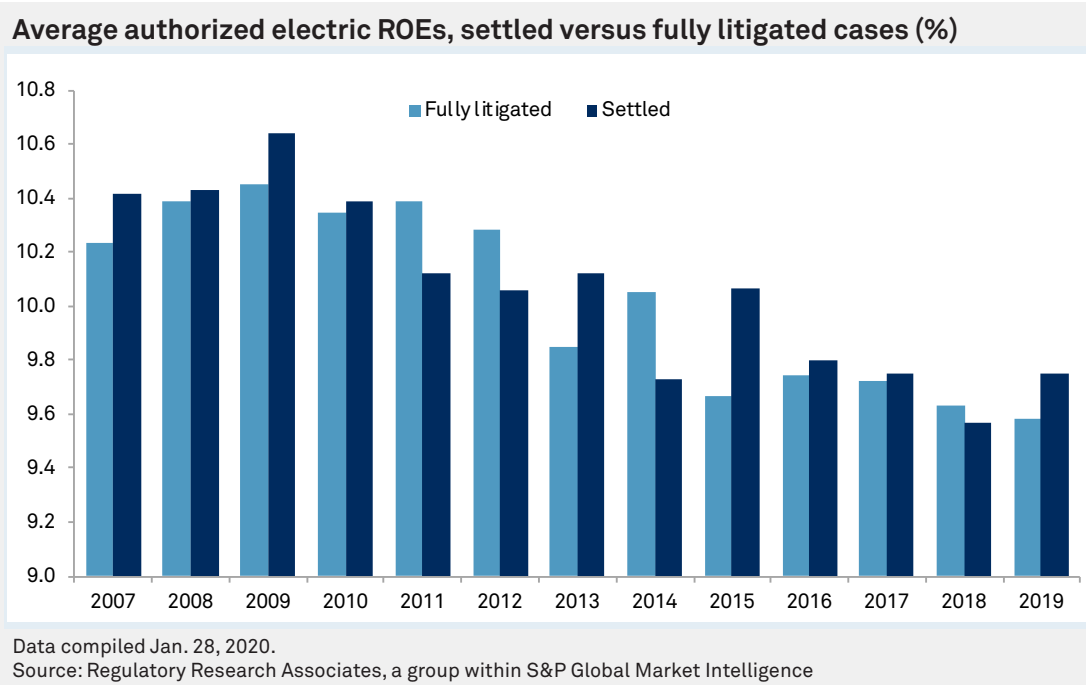
Comparing electric vertically integrated cases versus delivery-only proceedings over the past 12 years, RRA finds that the annual average authorized ROEs in vertically integrated cases typically are about 30 to 65 basis points higher than in delivery-only cases, arguably reflecting the increased risk associated with ownership and operation of generation assets.

The industry average ROE for vertically integrated electric utilities was 9.73% for rate cases concluded in 2019, versus 9.68% in 2018. For electric distribution-only utilities, the industry average ROE authorized in 2019 was 9.37%, versus 9.38% in 2018.



Settlements have frequently been used to resolve rate cases over the last several years, and in many cases, these settlements are “black box” in nature and do not specify the ROE and other typical rate case parameters underlying the stipulated rate change. However, some states preclude this type of treatment, and settlements must specify these values, if not the specific adjustments from which these values were derived.

For both electric and gas cases, RRA has found no discernible pattern in the average authorized ROEs in cases that were settled versus those that were fully litigated. In some years, the average authorized ROE was higher for fully litigated cases, in others, it was higher for settled cases, and in a handful of years, the authorized ROE was similar for both fully litigated and settled cases.



Over the last several years, the annual average authorized ROEs in electric cases that involve limited-issue riders were typically meaningfully higher than those approved in general rate cases, driven by the ROE premiums authorized in Virginia. Limited-issue rider cases in which a separate ROE is determined have had limited use in the gas industry, as most of the gas riders rely on ROEs approved in a previous base rate case.

The following discussion focuses on the corresponding tables available [here](#).

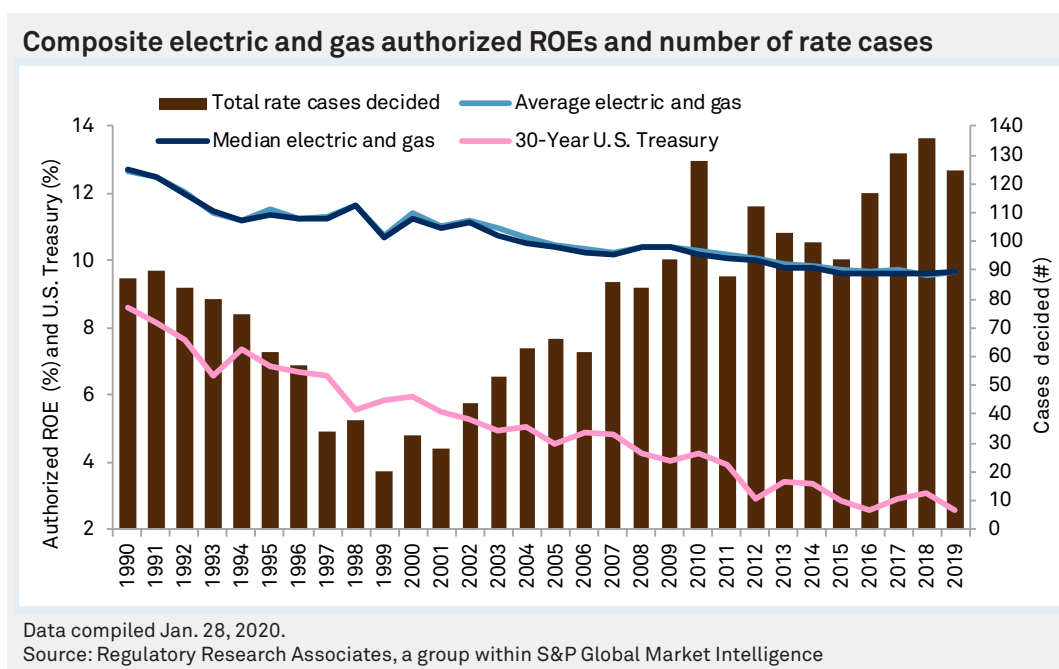
Table 1 shows the average ROE authorized in major electric and gas rate decisions annually since 1990 and by quarter since 2015, followed by the number of observations in each period. Table 2 indicates the composite electric and gas industry data for all major cases, summarized annually since 2004 and by quarter for the past six quarters.

Included in **Tables 3 and 4** are comparisons since 2007 of average authorized ROEs for settled versus fully litigated cases, general rate cases versus limited-issue rider proceedings and vertically integrated cases versus delivery-only cases for electric and gas utilities, respectively.

The individual electric and gas cases decided in 2019 are listed in **Table 5**, with the decision date shown first, followed by the company name, the abbreviation for the state issuing the decision, the authorized rate of return, the ROE and the percentage of common equity in the adopted capital structure. Next, RRA indicates the month and year in which the adopted test year ended, whether the commission utilized an average or a year-end rate base and the amount of the permanent rate change authorized. The dollar amounts represent the permanent rate change ordered at the time decisions were rendered. Fuel adjustment clause rate changes are not reflected in this study.

The simple mean is utilized for the return averages. In addition, the average equity returns indicated in this report reflect the ROEs approved in cases that were decided during the specified time periods and are not necessarily representative of either the average currently authorized ROEs for utilities industrywide or the returns actually earned by the utilities.

Table 6 and the graph below track the average and median equity return authorized for all electric and gas rate cases combined by year for the last 30 years. As the table indicates, since 1990, authorized ROEs have generally trended downward, reflecting the significant decline in interest rates and capital costs that has occurred over this time frame. The combined average and median equity returns authorized for electric and gas utilities in each of the years 1990 through 2019 and the number of observations for each year are presented in the accompanying chart.



Please note: In an effort to align data presented in this report with data available in S&P Global Market Intelligence's online database, earlier historical data provided in previous reports may not match historical data in this report due to certain differences in presentation, including the treatment of cases that were withdrawn or dismissed.

Subsequent to the publication of our year-end 2018 report, the New Mexico Public Regulation Commission issued a revised decision in an electric rate case decision, the outcome of which impacted several of our electric ROE statistics for 2018. The instant report reflects the revised numbers.

© 2020 S&P Global Market Intelligence. All rights reserved. Regulatory Research Associates is a group within S&P Global Market Intelligence, a division of S&P Global (NYSE:SPGI). Confidential Subject Matter. WARNING! This report contains copyrighted subject matter and confidential information owned solely by S&P Global Market Intelligence (SPGMI). Reproduction, distribution or use of this report in violation of this license constitutes copyright infringement in violation of federal and state law. SPGMI hereby provides consent to use the "email this story" feature to redistribute articles within the subscriber's company. Although the information in this report has been obtained from sources that SPGMI believes to be reliable, SPGMI does not guarantee its accuracy.

S&P Global

Market Intelligence

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 1: ROEs authorized January 1990-December 2019

| Year | Period | Electric utilities | | | Gas utilities | | |
|-------------|------------------|--------------------|----------------|------------------------|-----------------|----------------|------------------------|
| | | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observations |
| 1990 | Full year | 12.70 | 12.77 | 38 | 12.68 | 12.75 | 33 |
| 1991 | Full year | 12.54 | 12.50 | 42 | 12.45 | 12.50 | 31 |
| 1992 | Full year | 12.09 | 12.00 | 45 | 12.02 | 12.00 | 28 |
| 1993 | Full year | 11.46 | 11.50 | 28 | 11.37 | 11.50 | 40 |
| 1994 | Full year | 11.21 | 11.13 | 28 | 11.24 | 11.27 | 24 |
| 1995 | Full year | 11.58 | 11.45 | 28 | 11.44 | 11.30 | 13 |
| 1996 | Full year | 11.40 | 11.25 | 18 | 11.12 | 11.25 | 17 |
| 1997 | Full year | 11.33 | 11.58 | 10 | 11.30 | 11.25 | 12 |
| 1998 | Full year | 11.77 | 12.00 | 10 | 11.51 | 11.40 | 10 |
| 1999 | Full year | 10.72 | 10.75 | 6 | 10.74 | 10.65 | 6 |
| 2000 | Full year | 11.58 | 11.50 | 9 | 11.34 | 11.16 | 13 |
| 2001 | Full year | 11.07 | 11.00 | 15 | 10.96 | 11.00 | 5 |
| 2002 | Full year | 11.21 | 11.28 | 14 | 11.17 | 11.00 | 19 |
| 2003 | Full year | 10.96 | 10.75 | 20 | 10.99 | 11.00 | 25 |
| 2004 | Full year | 10.81 | 10.70 | 21 | 10.63 | 10.50 | 22 |
| 2005 | Full year | 10.51 | 10.35 | 24 | 10.41 | 10.40 | 26 |
| 2006 | Full year | 10.32 | 10.23 | 26 | 10.40 | 10.50 | 15 |
| 2007 | Full year | 10.30 | 10.20 | 38 | 10.22 | 10.20 | 35 |
| 2008 | Full year | 10.41 | 10.30 | 37 | 10.39 | 10.45 | 32 |
| 2009 | Full year | 10.52 | 10.50 | 40 | 10.22 | 10.26 | 30 |
| 2010 | Full year | 10.37 | 10.30 | 61 | 10.15 | 10.10 | 39 |
| 2011 | Full year | 10.29 | 10.17 | 42 | 9.92 | 10.03 | 16 |
| 2012 | Full year | 10.17 | 10.08 | 58 | 9.94 | 10.00 | 35 |
| 2013 | Full year | 10.03 | 9.95 | 49 | 9.68 | 9.72 | 21 |
| 2014 | Full year | 9.91 | 9.78 | 38 | 9.78 | 9.78 | 26 |
| | 1st quarter | 10.37 | 9.83 | 9 | 9.47 | 9.05 | 3 |
| | 2nd quarter | 9.73 | 9.60 | 7 | 9.43 | 9.50 | 3 |
| | 3rd quarter | 9.40 | 9.40 | 2 | 9.75 | 9.75 | 1 |
| | 4th quarter | 9.62 | 9.55 | 12 | 9.68 | 9.75 | 9 |
| 2015 | Full year | 9.85 | 9.65 | 30 | 9.60 | 9.68 | 16 |
| | 1st quarter | 10.29 | 10.50 | 9 | 9.48 | 9.50 | 6 |
| | 2nd quarter | 9.60 | 9.60 | 7 | 9.42 | 9.52 | 6 |
| | 3rd quarter | 9.76 | 9.80 | 8 | 9.47 | 9.50 | 4 |
| | 4th quarter | 9.57 | 9.58 | 18 | 9.68 | 9.73 | 10 |
| 2016 | Full year | 9.77 | 9.75 | 42 | 9.54 | 9.50 | 26 |
| | 1st quarter | 9.87 | 9.60 | 15 | 9.60 | 9.25 | 3 |
| | 2nd quarter | 9.63 | 9.50 | 14 | 9.47 | 9.60 | 7 |
| | 3rd quarter | 9.66 | 9.60 | 5 | 10.14 | 9.90 | 6 |
| | 4th quarter | 9.74 | 9.60 | 19 | 9.68 | 9.55 | 8 |
| 2017 | Full year | 9.74 | 9.60 | 53 | 9.72 | 9.60 | 24 |
| | 1st quarter | 9.75 | 9.90 | 13 | 9.68 | 9.80 | 6 |
| | 2nd quarter | 9.54 | 9.50 | 13 | 9.43 | 9.50 | 7 |
| | 3rd quarter | 9.67 | 9.70 | 11 | 9.69 | 9.60 | 13 |
| | 4th quarter | 9.42 | 9.50 | 11 | 9.53 | 9.60 | 14 |
| 2018 | Full year | 9.60 | 9.58 | 48 | 9.59 | 9.60 | 40 |
| | 1st quarter | 9.73 | 9.70 | 12 | 9.55 | 9.70 | 4 |
| | 2nd quarter | 9.58 | 9.50 | 12 | 9.73 | 9.73 | 3 |
| | 3rd quarter | 9.55 | 9.60 | 7 | 9.80 | 9.90 | 3 |
| | 4th quarter | 9.70 | 9.68 | 16 | 9.73 | 9.70 | 22 |
| 2019 | Full year | 9.65 | 9.60 | 47 | 9.71 | 9.70 | 32 |

Data compiled Jan. 29, 2020.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 2: Electric and gas utilities summary

| Electric utilities | | | | | | | | | | |
|--------------------|-------------|---------|------------------------|---------|------------------------|------------------------------------|------------------------|--------------------------|------------------------|--|
| Year | Period | ROR (%) | Number of observations | ROE (%) | Number of observations | Common equity to total capital (%) | Number of observations | Rate change amount (\$M) | Number of observations | |
| 2004 | Full year | 8.71 | 20 | 10.81 | 21 | 46.96 | 19 | 1,806.3 | 29 | |
| 2005 | Full year | 8.44 | 23 | 10.51 | 24 | 47.34 | 23 | 936.1 | 31 | |
| 2006 | Full year | 8.32 | 26 | 10.32 | 26 | 48.54 | 25 | 1,318.1 | 39 | |
| 2007 | Full year | 8.18 | 37 | 10.30 | 38 | 47.88 | 36 | 1,405.7 | 43 | |
| 2008 | Full year | 8.21 | 39 | 10.41 | 37 | 47.94 | 36 | 2,823.2 | 44 | |
| 2009 | Full year | 8.24 | 40 | 10.52 | 40 | 48.57 | 39 | 4,191.7 | 58 | |
| 2010 | Full year | 8.01 | 62 | 10.37 | 61 | 48.63 | 57 | 4,921.9 | 78 | |
| 2011 | Full year | 8.00 | 43 | 10.29 | 42 | 48.26 | 42 | 2,595.1 | 56 | |
| 2012 | Full year | 7.95 | 51 | 10.17 | 58 | 50.69 | 52 | 3,080.7 | 69 | |
| 2013 | Full year | 7.66 | 45 | 10.03 | 49 | 49.25 | 43 | 3,328.6 | 61 | |
| 2014 | Full year | 7.60 | 32 | 9.91 | 38 | 50.28 | 35 | 2,053.7 | 51 | |
| 2015 | Full year | 7.38 | 35 | 9.85 | 30 | 49.54 | 30 | 1,891.5 | 52 | |
| 2016 | Full year | 7.28 | 41 | 9.77 | 42 | 48.91 | 41 | 2,332.1 | 57 | |
| 2017 | Full year | 7.18 | 48 | 9.74 | 53 | 48.90 | 48 | 2,695.6 | 77 | |
| | 1st quarter | 6.89 | 13 | 9.75 | 13 | 48.89 | 13 | 592.6 | 14 | |
| | 2nd quarter | 6.78 | 13 | 9.54 | 13 | 47.94 | 13 | 372.4 | 18 | |
| | 3rd quarter | 7.14 | 11 | 9.67 | 11 | 51.42 | 11 | 272.4 | 13 | |
| | 4th quarter | 6.81 | 12 | 9.42 | 11 | 48.12 | 12 | 643.0 | 22 | |
| 2018 | Full year | 6.90 | 49 | 9.60 | 48 | 49.02 | 49 | 1,880.4 | 67 | |
| | 1st quarter | 7.03 | 12 | 9.73 | 12 | 49.51 | 10 | 83.5 | 15 | |
| | 2nd quarter | 6.91 | 9 | 9.58 | 12 | 50.95 | 7 | 62.9 | 16 | |
| | 3rd quarter | 7.24 | 7 | 9.55 | 7 | 51.41 | 7 | 262.7 | 10 | |
| | 4th quarter | 6.85 | 16 | 9.70 | 16 | 49.12 | 16 | 1,409.8 | 19 | |
| 2019 | Full year | 6.97 | 44 | 9.65 | 47 | 49.94 | 40 | 1,818.9 | 60 | |
| Gas utilities | | | | | | | | | | |
| Year | Period | ROR (%) | Number of observations | ROE (%) | Number of observations | Common equity to total capital (%) | Number of observations | Rate change amount (\$M) | Number of observations | |
| 2004 | Full year | 8.51 | 23 | 10.63 | 22 | 45.81 | 22 | 306.0 | 33 | |
| 2005 | Full year | 8.24 | 29 | 10.41 | 26 | 48.40 | 24 | 465.4 | 35 | |
| 2006 | Full year | 8.44 | 17 | 10.40 | 15 | 47.24 | 16 | 392.5 | 23 | |
| 2007 | Full year | 8.11 | 31 | 10.22 | 35 | 48.47 | 28 | 645.3 | 43 | |
| 2008 | Full year | 8.49 | 33 | 10.39 | 32 | 50.35 | 32 | 700.0 | 40 | |
| 2009 | Full year | 8.15 | 29 | 10.22 | 30 | 48.49 | 29 | 438.6 | 36 | |
| 2010 | Full year | 7.99 | 40 | 10.15 | 39 | 48.70 | 40 | 776.5 | 50 | |
| 2011 | Full year | 8.09 | 18 | 9.92 | 16 | 52.49 | 14 | 367.0 | 31 | |
| 2012 | Full year | 7.98 | 30 | 9.94 | 35 | 51.13 | 32 | 264.0 | 41 | |
| 2013 | Full year | 7.43 | 21 | 9.68 | 21 | 50.60 | 20 | 498.7 | 40 | |
| 2014 | Full year | 7.65 | 27 | 9.78 | 26 | 51.11 | 28 | 544.2 | 48 | |
| 2015 | Full year | 7.34 | 16 | 9.60 | 16 | 49.93 | 16 | 494.1 | 40 | |
| 2016 | Full year | 7.08 | 28 | 9.54 | 26 | 50.06 | 26 | 1,263.8 | 59 | |
| 2017 | Full year | 7.26 | 24 | 9.72 | 24 | 49.88 | 24 | 410.7 | 54 | |
| | 1st quarter | 7.14 | 5 | 9.68 | 6 | 51.05 | 6 | 198.0 | 9 | |
| | 2nd quarter | 7.08 | 7 | 9.43 | 7 | 50.83 | 6 | 73.8 | 11 | |
| | 3rd quarter | 6.86 | 15 | 9.69 | 13 | 48.55 | 15 | 280.8 | 22 | |
| | 4th quarter | 7.04 | 17 | 9.53 | 14 | 50.89 | 16 | 386.5 | 24 | |
| 2018 | Full year | 7.00 | 44 | 9.59 | 40 | 50.09 | 43 | 939.1 | 66 | |
| | 1st quarter | 7.37 | 4 | 9.55 | 4 | 51.40 | 4 | 90.4 | 9 | |
| | 2nd quarter | 7.75 | 3 | 9.73 | 3 | 58.87 | 3 | 47.6 | 9 | |
| | 3rd quarter | 6.52 | 5 | 9.80 | 3 | 43.86 | 4 | 619.6 | 16 | |
| | 4th quarter | 7.20 | 21 | 9.73 | 22 | 52.33 | 20 | 699.3 | 27 | |
| 2019 | Full year | 7.17 | 33 | 9.71 | 32 | 51.75 | 31 | 1,456.8 | 61 | |

Data compiled Jan. 29, 2020.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 3: Electric authorized ROEs: 2007-2019

Settled versus fully litigated cases

| Year | All cases | | | Settled cases | | | Fully litigated cases | | |
|------|-----------------|----------------|----------------------|-----------------|----------------|----------------------|-----------------------|----------------|----------------------|
| | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observatio |
| 2007 | 10.30 | 10.20 | 38 | 10.42 | 10.33 | 14 | 10.23 | 10.15 | 24 |
| 2008 | 10.41 | 10.30 | 37 | 10.43 | 10.25 | 17 | 10.39 | 10.54 | 20 |
| 2009 | 10.52 | 10.50 | 40 | 10.64 | 10.62 | 16 | 10.45 | 10.50 | 24 |
| 2010 | 10.37 | 10.30 | 61 | 10.39 | 10.30 | 34 | 10.35 | 10.10 | 27 |
| 2011 | 10.29 | 10.17 | 42 | 10.12 | 10.07 | 16 | 10.39 | 10.25 | 26 |
| 2012 | 10.17 | 10.08 | 58 | 10.06 | 10.00 | 29 | 10.28 | 10.25 | 29 |
| 2013 | 10.03 | 9.95 | 49 | 10.12 | 9.98 | 32 | 9.85 | 9.75 | 17 |
| 2014 | 9.91 | 9.78 | 38 | 9.73 | 9.75 | 17 | 10.05 | 9.83 | 21 |
| 2015 | 9.85 | 9.65 | 30 | 10.07 | 9.72 | 14 | 9.66 | 9.62 | 16 |
| 2016 | 9.77 | 9.75 | 42 | 9.80 | 9.85 | 17 | 9.74 | 9.60 | 25 |
| 2017 | 9.74 | 9.60 | 53 | 9.75 | 9.60 | 29 | 9.73 | 9.56 | 24 |
| 2018 | 9.60 | 9.58 | 48 | 9.57 | 9.63 | 26 | 9.63 | 9.53 | 22 |
| 2019 | 9.65 | 9.60 | 47 | 9.75 | 9.73 | 20 | 9.58 | 9.50 | 27 |

General rate cases versus limited-issue riders

| Year | All cases | | | General rate cases | | | Limited-issue riders | | |
|------|-----------------|----------------|----------------------|--------------------|----------------|----------------------|----------------------|----------------|----------------------|
| | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observatio |
| 2007 | 10.30 | 10.20 | 38 | 10.32 | 10.23 | 36 | 9.90 | 9.90 | 1 |
| 2008 | 10.41 | 10.30 | 37 | 10.37 | 10.30 | 35 | 11.11 | 11.11 | 2 |
| 2009 | 10.52 | 10.50 | 40 | 10.52 | 10.50 | 38 | 10.55 | 10.55 | 2 |
| 2010 | 10.37 | 10.30 | 61 | 10.29 | 10.26 | 58 | 11.87 | 12.30 | 3 |
| 2011 | 10.29 | 10.17 | 42 | 10.19 | 10.14 | 40 | 12.30 | 12.30 | 2 |
| 2012 | 10.17 | 10.08 | 58 | 10.02 | 10.00 | 51 | 11.57 | 11.40 | 6 |
| 2013 | 10.03 | 9.95 | 49 | 9.82 | 9.82 | 40 | 11.34 | 11.40 | 7 |
| 2014 | 9.91 | 9.78 | 38 | 9.76 | 9.75 | 32 | 10.96 | 11.00 | 5 |
| 2015 | 9.85 | 9.65 | 30 | 9.60 | 9.53 | 23 | 10.87 | 11.00 | 6 |
| 2016 | 9.77 | 9.75 | 42 | 9.60 | 9.60 | 32 | 10.31 | 10.55 | 10 |
| 2017 | 9.74 | 9.60 | 53 | 9.68 | 9.60 | 42 | 10.01 | 9.95 | 10 |
| 2018 | 9.60 | 9.58 | 48 | 9.56 | 9.58 | 38 | 9.74 | 9.70 | 10 |
| 2019 | 9.65 | 9.60 | 47 | 9.64 | 9.65 | 33 | 9.68 | 9.31 | 14 |

Vertically integrated cases versus delivery-only cases

| Year | All cases | | | Vertically integrated cases | | | Delivery-only cases | | |
|------|-----------------|----------------|----------------------|-----------------------------|----------------|----------------------|---------------------|----------------|----------------------|
| | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observatio |
| 2007 | 10.30 | 10.20 | 38 | 10.50 | 10.45 | 26 | 9.86 | 9.98 | 10 |
| 2008 | 10.41 | 10.30 | 37 | 10.48 | 10.47 | 26 | 10.04 | 10.25 | 9 |
| 2009 | 10.52 | 10.50 | 40 | 10.66 | 10.66 | 28 | 10.15 | 10.30 | 10 |
| 2010 | 10.37 | 10.30 | 61 | 10.42 | 10.40 | 41 | 9.98 | 10.00 | 17 |
| 2011 | 10.29 | 10.17 | 42 | 10.33 | 10.20 | 28 | 9.85 | 10.00 | 12 |
| 2012 | 10.17 | 10.08 | 58 | 10.10 | 10.20 | 39 | 9.75 | 9.73 | 12 |
| 2013 | 10.03 | 9.95 | 49 | 9.95 | 10.00 | 31 | 9.37 | 9.36 | 9 |
| 2014 | 9.91 | 9.78 | 38 | 9.94 | 9.90 | 19 | 9.49 | 9.55 | 13 |
| 2015 | 9.85 | 9.65 | 30 | 9.75 | 9.70 | 17 | 9.17 | 9.07 | 6 |
| 2016 | 9.77 | 9.75 | 42 | 9.77 | 9.78 | 20 | 9.31 | 9.33 | 12 |
| 2017 | 9.74 | 9.60 | 53 | 9.80 | 9.65 | 28 | 9.43 | 9.55 | 14 |
| 2018 | 9.60 | 9.58 | 48 | 9.68 | 9.73 | 23 | 9.38 | 9.50 | 15 |
| 2019 | 9.65 | 9.60 | 47 | 9.73 | 9.73 | 25 | 9.37 | 9.60 | 8 |

Data compiled Jan. 29, 2020.

S&P Global
Market Intelligence

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

**Table 4: Gas average authorized ROEs:
2007-2019**

Settled versus fully litigated cases

| Year | All cases | | | Settled cases | | | Fully litigated cases | | |
|------|-----------------|----------------|------------------------|-----------------|----------------|----------------------|-----------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.22 | 10.20 | 35 | 10.24 | 10.18 | 22 | 10.20 | 10.40 | 13 |
| 2008 | 10.39 | 10.45 | 32 | 10.34 | 10.28 | 20 | 10.47 | 10.68 | 12 |
| 2009 | 10.22 | 10.26 | 30 | 10.43 | 10.40 | 13 | 10.05 | 10.15 | 17 |
| 2010 | 10.15 | 10.10 | 39 | 10.30 | 10.15 | 12 | 10.08 | 10.10 | 27 |
| 2011 | 9.92 | 10.03 | 16 | 10.08 | 10.08 | 8 | 9.76 | 9.80 | 8 |
| 2012 | 9.94 | 10.00 | 35 | 9.99 | 10.00 | 14 | 9.92 | 9.90 | 21 |
| 2013 | 9.68 | 9.72 | 21 | 9.80 | 9.80 | 9 | 9.59 | 9.60 | 12 |
| 2014 | 9.78 | 9.78 | 26 | 9.51 | 9.50 | 11 | 9.98 | 10.10 | 15 |
| 2015 | 9.60 | 9.68 | 16 | 9.60 | 9.60 | 11 | 9.58 | 9.80 | 5 |
| 2016 | 9.54 | 9.50 | 26 | 9.50 | 9.50 | 16 | 9.61 | 9.58 | 10 |
| 2017 | 9.72 | 9.60 | 24 | 9.68 | 9.60 | 17 | 9.82 | 9.50 | 7 |
| 2018 | 9.59 | 9.60 | 40 | 9.60 | 9.60 | 24 | 9.57 | 9.50 | 16 |
| 2019 | 9.71 | 9.70 | 32 | 9.70 | 9.70 | 20 | 9.74 | 9.72 | 12 |

General rate cases versus limited-issue riders

| Year | All cases | | | General rate cases | | | Limited-issue riders | | |
|------|-----------------|----------------|------------------------|--------------------|----------------|----------------------|----------------------|----------------|------------------------|
| | Average ROE (%) | Median ROE (%) | Number of observations | Average ROE (%) | Median ROE (%) | Number of observatio | Average ROE (%) | Median ROE (%) | Number of observations |
| 2007 | 10.22 | 10.20 | 35 | 10.22 | 10.20 | 35 | — | — | 0 |
| 2008 | 10.39 | 10.45 | 32 | 10.39 | 10.45 | 32 | — | — | 0 |
| 2009 | 10.22 | 10.26 | 30 | 10.22 | 10.26 | 30 | — | — | 0 |
| 2010 | 10.15 | 10.10 | 39 | 10.15 | 10.10 | 39 | — | — | 0 |
| 2011 | 9.92 | 10.03 | 16 | 9.91 | 10.05 | 15 | 10.00 | 10.00 | 1 |
| 2012 | 9.94 | 10.00 | 35 | 9.93 | 10.00 | 34 | 10.40 | 10.40 | 1 |
| 2013 | 9.68 | 9.72 | 21 | 9.68 | 9.72 | 21 | — | — | 0 |
| 2014 | 9.78 | 9.78 | 26 | 9.78 | 9.78 | 26 | — | — | 0 |
| 2015 | 9.60 | 9.68 | 16 | 9.60 | 9.68 | 16 | — | — | 0 |
| 2016 | 9.54 | 9.50 | 26 | 9.53 | 9.50 | 25 | 9.70 | 9.70 | 1 |
| 2017 | 9.72 | 9.60 | 24 | 9.73 | 9.60 | 23 | 9.50 | 9.50 | 1 |
| 2018 | 9.59 | 9.60 | 40 | 9.59 | 9.60 | 39 | 9.50 | 9.50 | 1 |
| 2019 | 9.71 | 9.70 | 32 | 9.72 | 9.72 | 30 | 9.60 | 9.60 | 2 |

Data compiled Jan. 29, 2020.

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 5: Electric and gas utility decisions

Electric utility decisions

| Date | Company | State | ROR (%) | ROE (%) | Common equity as % of capital | Test year | Rate base | Rate change amount (\$) | Footnotes |
|-------------|---|-------|-------------|-------------|-------------------------------|-----------|-----------|-------------------------|-----------|
| 01/02/19 | Appalachian Power Co. | VA | 7.76 | 10.40 | — | 2/20 | Average | 7.2 B, LIR,1 | |
| 01/02/19 | Monongahela Power Co. | WV | — | — | — | 6/18 | — | -100.9 B, LIR,2 | |
| 01/09/19 | Consumers Energy Co. | MI | — | 10.00 | — | 12/19 | Average | -24.0 B | |
| 02/21/19 | Puget Sound Energy Inc. | WA | — | — | — | 6/18 | Year-end | 0.0 B,3 | |
| 02/27/19 | Virginia Electric and Power Co. | VA | 6.87 | 9.20 | 51.37 | 3/20 | — | -4.0 LIR,4 | |
| 02/27/19 | Virginia Electric and Power Co. | VA | 6.87 | 9.20 | 51.37 | 3/20 | Average | 38.4 LIR,5 | |
| 02/27/19 | Virginia Electric and Power Co. | VA | 7.38 | 10.20 | 51.37 | 3/20 | Average | -8.6 LIR,6 | |
| 02/27/19 | Virginia Electric and Power Co. | VA | 7.38 | 10.20 | 51.37 | 3/20 | Average | -3.5 LIR,7 | |
| 02/27/19 | Virginia Electric and Power Co. | VA | 7.38 | 10.20 | 51.37 | 3/20 | Average | -4.3 LIR,8 | |
| 02/27/19 | Appalachian Power Co. | WV | 7.28 | 9.75 | 50.16 | 12/17 | Average | 44.2 B | |
| 03/06/19 | Oklahoma Gas and Electric Co. | AR | 5.27 | — | 37.31 | 3/20 | Year-end | 3.3 B,*,9 | |
| 03/13/19 | Atlantic City Electric Co. | NJ | 7.08 | 9.60 | 49.94 | 12/18 | Year-end | 70.0 B, D | |
| 03/14/19 | Orange and Rockland Utilities Inc. | NY | 6.97 | 9.00 | 48.00 | 12/19 | Average | 13.4 B, D, Z | |
| 03/14/19 | Public Service Co. of Oklahoma | OK | 6.97 | 9.40 | — | 3/18 | — | 46.0 B | |
| 03/22/19 | Potomac Edison Co. | MD | 7.15 | 9.65 | 52.82 | 6/18 | Average | 6.2 D | |
| 2019 | 1st quarter: averages/total Observations | | 7.03 | 9.73 | 49.51 | | | 83.5 | 15 |
| 04/02/19 | Duke Energy Florida LLC | FL | — | 10.50 | — | — | — | 29.2 B, LIR,10 | |
| 04/15/19 | Virginia Electric and Power Co. | VA | 6.87 | 9.20 | 51.37 | 2/20 | Average | 10.4 LIR,11 | |
| 04/23/19 | Emera Maine | ME | — | — | — | — | — | — D,12 | |
| 04/30/19 | Kentucky Utilities Co. | KY | — | 9.73 | — | 4/20 | — | 55.9 B | |
| 04/30/19 | Louisville Gas and Electric Co. | KY | — | 9.73 | — | 4/20 | — | 2.1 B | |
| 05/01/19 | Duke Energy Carolinas LLC | SC | 7.16 | 9.50 | 53.00 | 12/17 | Year-end | 106.9 | |
| 05/02/19 | DTE Electric Co. | MI | 5.48 | 10.00 | 37.94 | 4/20 | Average | 273.3 * | |
| 05/02/19 | Appalachian Power Co. | VA | — | 9.42 | — | 6/20 | — | 0.0 LIR,13 | |
| 05/02/19 | Virginia Electric and Power Co. | VA | 6.87 | 9.20 | 51.37 | 6/20 | — | 17.9 LIR,14 | |
| 05/08/19 | Duke Energy Progress LLC | SC | 6.99 | 9.50 | 53.00 | 12/17 | Year-end | 41.5 | |
| 05/14/19 | Otter Tail Power Co. | SD | 7.09 | 8.75 | 52.92 | 12/17 | Average | 4.8 I | |
| 05/16/19 | Southern California Edison Co. | CA | 7.43 | — | — | 12/18 | Average | -523.0 Z | |
| 05/16/19 | Maui Electric Co. Ltd. | HI | 7.43 | 9.50 | 57.02 | 12/18 | Average | 12.2 I | |
| 05/23/19 | Upper Peninsula Power Co. | MI | 6.91 | 9.90 | — | 12/19 | Average | 1.8 B | |
| 05/29/19 | Southern Indiana Gas and Electric Co. | IN | — | — | — | 10/18 | Year-end | 4.1 LIR,15 | |
| 06/12/19 | Northern Indiana Public Service Co. | IN | — | — | — | 11/18 | Year-end | 16.7 LIR,15 | |
| 06/18/19 | MDU Resources Group Inc. | MT | — | — | — | 12/17 | — | 9.3 B, I,Z | |
| 2019 | 2nd quarter: averages/total Observations | | 6.91 | 9.58 | 50.95 | | | 62.9 | 16 |
| 07/03/19 | Virginia Electric and Power Co. | VA | 7.39 | 10.20 | 51.37 | 8/20 | Average | 3.1 LIR,16 | |
| 07/03/19 | Virginia Electric and Power Co. | VA | 6.87 | 9.20 | 51.37 | 8/20 | Average | 1.8 LIR,17 | |
| 07/30/19 | Empire District Electric Co. | KS | — | — | — | — | — | 0.0 B | |
| 08/05/19 | Virginia Electric and Power Co. | VA | 6.81 | 9.20 | 51.17 | 10/20 | — | 104.3 LIR,18 | |
| 08/12/19 | Potomac Electric Power Co. | MD | 7.45 | 9.60 | 50.46 | 1/19 | Average | 10.3 D | |
| 08/29/19 | Green Mountain Power Corp. | VT | 6.85 | 9.06 | 49.46 | 9/20 | Average | 16.7 Z | |
| 09/04/19 | Northern States Power Co. - WI | WI | 7.74 | 10.00 | 52.52 | 12/20 | Average | 0.7 Z | |
| 09/19/19 | Oklahoma Gas and Electric Co. | OK | — | — | — | 9/18 | — | 0.0 B | |
| 09/26/19 | San Diego Gas & Electric Co. | CA | — | — | — | 12/19 | Average | 35.7 Z | |
| 09/30/19 | Massachusetts Electric Co. | MA | 7.56 | 9.60 | 53.49 | 12/17 | Year-end | 90.1 D, Z | |
| 2019 | 3rd quarter: averages/total Observations | | 7.24 | 9.55 | 51.41 | | | 262.7 | 10 |
| 10/08/19 | Duke Energy Indiana LLC | IN | — | — | — | 12/18 | Year-end | 23.5 LIR,15 | |
| 10/31/19 | Wisconsin Electric Power Co. | WI | 7.49 | 10.00 | 54.46 | 12/20 | — | 81.3 B | |
| 10/31/19 | Wisconsin Public Service Corp. | WI | 7.22 | 10.00 | 51.96 | 12/20 | — | 38.6 B | |
| 11/01/19 | Virginia Electric and Power Co. | VA | 6.83 | 9.20 | 51.17 | 1/21 | Average | -18.0 LIR,19 | |
| 11/07/19 | Entergy New Orleans LLC | LA | 7.09 | 9.35 | 50.00 | 12/18 | Year-end | 124.9 20,21 | |
| 11/27/19 | Southern Indiana Gas and Electric Co. | IN | — | — | — | 4/19 | Year-end | 7.2 LIR,15 | |
| 11/29/19 | Avista Corp. | ID | 7.35 | 9.50 | 50.00 | 12/18 | Year-end | -7.2 B | |
| 12/04/19 | Commonwealth Edison Co. | IL | 6.51 | 8.91 | 47.97 | 12/18 | Year-end | -3.1 D | |
| 12/04/19 | Northern Indiana Public Service Co. | IN | 6.52 | 9.75 | 47.86 | 12/19 | Year-end | 42.7 B, Z,* | |
| 12/13/19 | Entergy Arkansas LLC | AR | 5.23 | — | 36.49 | 12/20 | Average | 10.1 B,*,9 | |
| 12/16/19 | Ameren Illinois Co. | IL | 6.71 | 8.91 | 50.00 | 12/18 | Year-end | -3.0 D | |
| 12/17/19 | Georgia Power Co. | GA | — | 10.50 | 56.00 | — | — | 909.0 Z | |
| 12/17/19 | Baltimore Gas and Electric Co. | MD | 6.94 | 9.70 | — | 7/19 | — | 25.0 B, D,22 | |
| 12/18/19 | Northern Indiana Public Service Co. | IN | — | — | — | 6/19 | Year-end | 44.8 LIR,15 | |
| 12/19/19 | Pacific Gas and Electric Co. | CA | 7.81 | 10.25 | 52.00 | 12/20 | — | 46.0 23 | |
| 12/19/19 | San Diego Gas & Electric Co. | CA | 7.55 | 10.20 | 52.00 | 12/20 | — | — 23 | |
| 12/19/19 | Southern California Edison Co. | CA | 7.68 | 10.30 | 52.00 | 12/20 | — | — 23.0 | |
| 12/19/19 | NSTAR Electric Co. | MA | — | — | — | — | — | 33.6 D,24 | |
| 10/29/19 | NorthWestern Corp. | MT | 6.92 | 9.65 | 49.38 | — | — | 6.5 B, I | |
| 12/20/19 | Southwestern Electric Power Co. | AR | 4.93 | 9.45 | 33.71 | 12/18 | Year-end | 52.8 B,* | |
| 12/24/19 | Sierra Pacific Power Co. | NV | 6.75 | 9.50 | 50.92 | — | — | -5.0 B | |
| 2019 | 4th quarter: averages/total Observations | | 6.85 | 9.70 | 49.12 | | | 1,409.8 | 19 |
| 2019 | Averages/total Observations | | 6.97 | 9.65 | 49.94 | | | 1,818.9 | 60 |

Gas utility decisions

| Date | Company | State | ROR (%) | ROE (%) | Common equity as % of capital | Test year | Rate base | Rate change amount (\$) | Footnotes |
|-------------|---|-------|-------------|-------------|-------------------------------|-----------|-----------|-------------------------|-----------|
| 01/04/19 | Baltimore Gas and Electric Co. | MD | 7.09 | 9.80 | 52.85 | 7/18 | Average | 64.9 | |
| 01/08/19 | Oklahoma Natural Gas Co. | OK | — | — | — | 12/17 | — | -5.9 B,24 | |
| 01/18/19 | Berkshire Gas Co. | MA | 8.33 | 9.70 | 54.00 | 12/17 | — | 2.4 B | |
| 01/29/19 | Indiana Gas Co. Inc. | IN | — | — | — | 6/18 | Year-end | -13.1 LIR,25 | |
| 01/29/19 | Southern Indiana Gas and Electric Co. | IN | — | — | — | 6/18 | Year-end | -0.8 LIR,25 | |
| 02/05/19 | Kansas Gas Service Co. Inc. | KS | — | — | — | 12/17 | — | 21.5 B | |
| 02/21/19 | Puget Sound Energy Inc. | WA | — | — | — | 6/18 | Year-end | 21.5 B,3 | |
| 03/14/19 | Orange and Rockland Utilities Inc. | NY | 6.97 | 9.00 | 48.00 | 12/19 | Average | -7.5 B, Z | |
| 03/27/19 | Duke Energy Kentucky Inc. | KY | 7.07 | 9.70 | 50.76 | 3/20 | Average | 7.4 B | |
| 2019 | 1st quarter: averages/total Observations | | 7.37 | 9.55 | 51.40 | | | 90.4 | 9 |
| 04/23/19 | Atmos Energy Corp. | KS | — | — | — | 12/18 | — | 1.6 LIR,26 | |
| 04/30/19 | Delta Natural Gas Co. Inc. | KY | — | — | — | 12/18 | Year-end | 2.7 LIR,27 | |
| 04/30/19 | Louisville Gas and Electric Co. | KY | — | 9.73 | — | 4/20 | — | 18.6 B | |

| | | | | | | | | | |
|------------------------------------|---------------------------------------|----|-------------|-------------|--------------|-------|--------------|----------------|-----------|
| 05/03/19 | Missouri Gas Energy | MO | — | — | — | 11/18 | — | 6.8 | LIR,28 |
| 05/03/19 | Spire Missouri Inc. | MO | — | — | — | 11/18 | — | 6.4 | LIR,28 |
| 05/07/19 | Atmos Energy Corp. | KY | 7.49 | 9.65 | 58.06 | 3/20 | Average | -0.3 | |
| 05/20/19 | Atmos Energy Corp. | TN | 7.79 | — | 58.38 | 5/20 | Average | 0.0 | B,29 |
| 05/21/19 | Atmos Energy Corp. | TX | 7.97 | 9.80 | 60.18 | 12/17 | Year-end | 2.2 | B |
| 06/12/19 | Columbia Gas of Virginia Inc. | VA | — | — | — | 12/17 | — | 9.5 | B, 1,30 |
| 2nd quarter: averages/total | | | 7.75 | 9.73 | 58.87 | | | 47.6 | |
| Observations | | | 3 | 3 | 3 | | | 9 | |
| 07/17/19 | New Mexico Gas Co. Inc. | NM | — | — | — | 9/17 | — | 2.5 | B, Z |
| 07/28/19 | Indiana Gas Co. Inc. | IN | — | — | — | 12/18 | — | 10.4 | LIR,25 |
| 07/29/19 | Southern Indiana Gas and Electric Co. | IN | — | — | — | 12/18 | — | 4.1 | LIR,25 |
| 08/20/19 | Oklahoma Natural Gas Co. | OK | — | — | — | 12/18 | — | -28.2 | B |
| 08/21/19 | Union Electric Co. | MO | — | — | — | 6/18 | — | -1.0 | B, I |
| 08/23/19 | CenterPoint Energy Resources Corp. | AR | 4.68 | — | 32.38 | 9/20 | Year-end | 7.3 | B,*,9 |
| 08/28/19 | Vectren Energy Delivery of Ohio Inc. | OH | 7.48 | — | — | 9/18 | Date Certain | 22.7 | B |
| 08/29/19 | CenterPoint Energy Resources Corp. | OK | — | — | — | 12/18 | Year-end | 1.9 | 24 |
| 08/29/19 | Virginia Natural Gas Inc. | VA | 6.86 | 9.50 | 48.74 | 8/20 | Average | 4.9 | LIR,31 |
| 09/04/19 | Northern States Power Co. - WI | WI | 7.74 | 10 | 52.52 | 12/20 | Average | 1.1 | B,Z |
| 09/12/19 | Pacific Gas and Electric Co. | CA | — | — | — | 12/19 | Average | 31.3 | Z |
| 09/19/19 | UGI Utilities Inc. | PA | — | — | — | 9/20 | — | 30.0 | B,32 |
| 09/24/19 | Atmos Energy Corp. | KY | — | — | — | 9/20 | Year-end | 2.9 | LIR,27 |
| 09/26/19 | San Diego Gas & Electric Co. | CA | — | — | — | 12/19 | Average | 71.7 | Z |
| 09/26/19 | Southern California Gas Co. | CA | — | — | — | 12/19 | Average | 314.4 | Z |
| 09/26/19 | Consumers Energy Co. | MI | 5.84 | 9.90 | 41.78 | 9/20 | Average | 143.5 | * |
| 3rd quarter: averages/total | | | 6.52 | 9.80 | 43.86 | | | 619.6 | |
| Observations | | | 5 | 3 | 4 | | | 16 | |
| 10/02/19 | Northern Illinois Gas Co. | IL | 7.20 | 9.73 | 54.20 | 9/20 | Average | 167.7 | |
| 10/03/19 | Peoples Natural Gas Co. LLC | PA | — | — | — | 10/20 | — | 59.5 | B |
| 10/08/19 | Avista Corp. | OR | 7.24 | 9.40 | 50.00 | 12/20 | Year-end | 3.6 | B |
| 10/15/19 | Washington Gas Light Co. | MD | 7.42 | 9.70 | 53.50 | 3/19 | — | 27.0 | B,22 |
| 10/16/19 | Northern Indiana Public Service Co. | IN | — | — | — | 4/19 | Year-end | 7.3 | LIR,15 |
| 10/21/19 | Northwest Natural Gas Co. | WA | 7.16 | 9.40 | 49.00 | 9/18 | Average | 5.1 | B |
| 10/30/19 | Missouri Gas Energy | MO | — | — | — | 5/19 | Year-end | 4.0 | B, LIR,28 |
| 10/30/19 | Spire Missouri Inc. | MO | — | — | — | 5/19 | Year-end | 4.8 | B, LIR,28 |
| 10/31/19 | Piedmont Natural Gas Co. Inc. | NC | 7.14 | 9.70 | 52.00 | 12/18 | Year-end | 82.8 | B |
| 10/31/19 | Wisconsin Electric Power Co. | WI | 7.49 | 10.00 | 54.46 | 12/20 | — | 15.7 | B |
| 10/31/19 | Wisconsin Gas LLC | WI | 7.32 | 10.20 | 52.02 | 12/20 | — | 1.6 | B |
| 10/31/19 | Wisconsin Public Service Corp. | WI | 7.22 | 10.00 | 51.96 | 12/20 | — | 9.6 | B |
| 11/07/19 | Entergy New Orleans LLC | LA | 7.09 | 9.35 | 50.00 | 12/18 | Year-end | -3.3 | 20,21 |
| 11/13/19 | Elizabethtown Gas Co. | NJ | 7.13 | 9.60 | 51.50 | 8/19 | Year-end | 34.0 | B |
| 11/13/19 | New Jersey Natural Gas Co. | NJ | 6.95 | 9.60 | 54.00 | 8/19 | Year-end | 62.2 | B |
| 11/21/19 | Kansas Gas Service Co. Inc. | KS | — | — | — | 6/19 | Year-end | 4.2 | LIR,26 |
| 11/26/19 | Washington Gas Light Co. | VA | — | — | — | 12/20 | Average | 12.4 | LIR,31 |
| 12/06/19 | SEMCO Energy, Inc. | MI | — | 9.87 | 54.00 | 12/20 | — | 19.9 | B |
| 12/06/19 | Columbia Gas of Virginia Inc. | VA | 6.68 | 9.70 | — | 12/20 | Average | 6.1 | LIR,31 |
| 12/11/19 | Black Hills Gas Distribution LLC | WY | 6.98 | 9.40 | 50.23 | 12/18 | Year-end | 13.2 | B |
| 12/17/19 | Baltimore Gas and Electric Co. | MD | 6.97 | 9.75 | — | 7/19 | — | 54.0 | B |
| 12/18/19 | Interstate Power and Light Co. | IA | 7.02 | 9.60 | 51.00 | 12/20 | Average | 11.8 | B |
| 12/18/19 | Columbia Gas of Maryland Inc. | MD | 7.26 | 9.60 | 52.90 | 6/19 | Average | 1.0 | 33 |
| 12/19/19 | San Diego Gas & Electric Co. | CA | 7.55 | 10.20 | 52.00 | 12/20 | — | — | 23 |
| 12/19/19 | Southern California Gas Co. | CA | 7.30 | 10.05 | 52.00 | 12/20 | — | — | 23 |
| 12/19/19 | Atlanta Gas Light Co. | GA | — | 10.25 | 56.00 | 7/20 | Average | 65.3 | |
| 12/20/19 | Columbia Gas of Kentucky Inc. | KY | 7.62 | — | 52.42 | 12/20 | Year-end | 4.2 | LIR,34 |
| 12/20/19 | Washington Gas Light Co. | VA | 7.22 | 9.20 | 53.48 | 12/19 | Average | 13.2 | I |
| 12/26/19 | Mountaineer Gas Co. | WV | 7.24 | 9.75 | — | 12/18 | Average | 12.4 | B |
| 4th quarter: averages/total | | | 7.20 | 9.73 | 52.33 | | | 699.3 | |
| Observations | | | 21 | 22 | 20 | | | 27 | |
| 2019 Averages/total | | | 7.17 | 9.71 | 51.75 | | | 1,456.8 | |
| Observations | | | 33 | 32 | 31 | | | 61 | |

Data compiled Jan. 29, 2020.

Footnotes

- A- Average.
- B- Order followed stipulation or settlement by the parties. Decision particulars not necessarily precedent-setting or specifically adopted by the regulatory body.
- D- Applies to electric delivery only.
- I- Interim rates implemented prior to the issuance of final order, normally under bond and subject to refund.
- LIR Limited-issue rider proceeding.
- Z- Rate change implemented in multiple steps.
- * Capital structure includes cost-free items or tax credit balances at the overall rate of return.
- 1 This case addresses the company's investment in the Dresden Generating Plant.
- 2 Relates to company's expanded net energy cost proceeding.
- 3 Rates were established under an expedited rate filing.
- 4 Rate change was approved under Rider B, which is the mechanism through which the company recovers the costs associated with the conversion of the Altavista,
- 5 Rate change was approved under Rider GV, which is the mechanism through which the company recovers its investment in the Greensville County generation facility.
- 6 Rate change was approved under Rider R, which is the mechanism through which the company recovers its investment in the Bear Garden power plant.
- 7 Rate change was approved under Rider S, which is the mechanism through which the company recovers its investment in the Virginia City Hybrid Energy Center.
- 8 Rate change was approved under Rider W, which is the mechanism through which the company recovers its investment in the Warren County generation facility.
- 9 Rate change pursuant to company's formula rate plan.
- 10 Reflects recovery of two solar projects, a 74.9-MW facility in Hamilton County, Fla., and a 74.9-MW facility in Columbia County, Fla.
- 11 Reflects recovery of two utility-scale solar generation facilities, the 142-MW Colonial Trail West Solar Facility and the 98-MW AC Spring Grove 1 Solar Facility.
- 12 Rate case withdrawn at company request.
- 13 Modest revenue requirement increase authorized under company's energy efficiency rider.
- 14 Rate change was approved under Rider DSM, which is the mechanism through which the company is permitted to collect a cash return on demand-side management
- 15 Case involves company's transmission, distribution and storage system improvement charge rate adjustment mechanism.
- 16 Rate change was approved under Rider BW, which is the mechanism through which the company recovers its investment in the Brunswick County Power Station.
- 17 Rate change was approved under Rider US-2, which is the mechanism through which the company recovers its investment in three utility-scale solar facilities: Scott Solar, Whitehouse Solar, and Woodland Solar.
- 18 Rate change was approved under Rider E, which is the mechanism through which the company recovers costs to comply with state and federal environmental regulations.
- 19 Rate change was approved under Rider U, which is the mechanism through which the company recovers its investment in projects to underground certain "at risk" distribution facilities.
- 20 The authorized ROE and equity percentage of capital were explicitly stated in the 11/7/19 order, but the company submitted compliance filings on 12/9/19 specifying the other rate case parameters shown for this case. The city council has not yet acted on the compliance filings.
- 21 On 12/6/19, the company appealed the 11/7/19 decision to the Civil District Court for the Parish of New Orleans.
- 22 Settlement and order state that the return metrics "set no precedent, and have no broader applicability."
- 23 Case involved only the determination of cost-of-capital parameters.
- 24 Rate change pursuant to company's performance-based regulation plan.
- 25 Case established the rates to be charged to customers under the company's compliance and system improvement adjustment mechanism.
- 26 Case involves company's gas system reliability surcharge.
- 27 Case involves the company's pipe replacement program rider.
- 28 Case involves the company's infrastructure system replacement surcharge rider.
- 29 Rate change under company's annual rate mechanism.
- 30 While settlement is silent with respect to the ROE underlying the rate increase, a 9.7% ROE is to be used for future non-base-rate revenue requirement changes and for the annual earnings test.
- 31 Rate change was approved under company's rider pertaining to investment made under Virginia Steps to Advance Virginia Energy infrastructure program.
- 32 Consolidated rate case for UGI Utilities' gas division, UGI Central Penn Gas and UGI Penn Natural Gas.
- 33 Approved increase estimated.
- 34 Case involves company's accelerated main replacement program rider.

S&P Global
Market Intelligence

Source: Regulatory Research Associates, a group within S&P Global Market Intelligence

Table 6: Composite electric and gas annual authorized ROEs: 1990-2019

| Year | Average ROE (%) | Median ROE (%) | No. of Observations | Year | Average ROE (%) | Median ROE (%) | No. of Observations |
|------|-----------------|----------------|---------------------|------|-----------------|----------------|---------------------|
| 1990 | 12.69 | 12.75 | 71 | 2005 | 10.46 | 10.40 | 50 |
| 1991 | 12.50 | 12.50 | 73 | 2006 | 10.35 | 10.25 | 41 |
| 1992 | 12.06 | 12.00 | 73 | 2007 | 10.26 | 10.20 | 73 |
| 1993 | 11.40 | 11.50 | 68 | 2008 | 10.40 | 10.39 | 69 |
| 1994 | 11.23 | 11.22 | 52 | 2009 | 10.39 | 10.43 | 70 |
| 1995 | 11.53 | 11.38 | 41 | 2010 | 10.28 | 10.22 | 100 |
| 1996 | 11.26 | 11.25 | 35 | 2011 | 10.19 | 10.10 | 58 |
| 1997 | 11.31 | 11.28 | 22 | 2012 | 10.09 | 10.00 | 93 |
| 1998 | 11.64 | 11.65 | 20 | 2013 | 9.92 | 9.80 | 70 |
| 1999 | 10.73 | 10.70 | 12 | 2014 | 9.86 | 9.78 | 64 |
| 2000 | 11.44 | 11.25 | 22 | 2015 | 9.76 | 9.65 | 46 |
| 2001 | 11.04 | 11.00 | 20 | 2016 | 9.68 | 9.60 | 68 |
| 2002 | 11.19 | 11.16 | 33 | 2017 | 9.73 | 9.60 | 77 |
| 2003 | 10.98 | 10.75 | 45 | 2018 | 9.59 | 9.60 | 88 |
| 2004 | 10.72 | 10.50 | 43 | 2019 | 9.68 | 9.70 | 79 |

Data compiled Jan. 29, 2020.

Kentucky Utilities Company
Response to Commission Staff's Second Request for Information
Dated July 31, 2020

Case No. 2020-00060

Question No. 2

Witness: Daniel K. Arbough / Robert M. Conroy

- Q-2. The most recent Commission awarded ROE for an investor-owned electric utility is 9.25 percent.⁶ Provide support for KU's proposed ROE of 9.725 percent in comparison to this recent Commission awarded ROE.
- A-2. Producing the kind and quantity of evidence sufficient to satisfy *Bluefield* and *Hope* criteria⁷ requires a fully developed record typically found only in base rate cases. For that very reason the Commission has made a standard practice of applying the ROE established in a utility's most recent base rate case to the utility's environmental surcharge (i.e., ECR for KU and LG&E) calculations until the utility's next base rate case.⁸ It is therefore consistent with the Commission's established practice that the Companies proposed to continue using the 9.725% ROE, recognizing that: the Companies intend to file base rate cases in the near future; the 9.725% ROE was approved by the Commission slightly more than a year ago in its final orders in those base rate cases; and the 9.725% was affirmed by the Commission less than ten months ago in the Companies' most recent six-month and two-year ECR review proceedings.⁹

Given the inherent lag between the case record and regulators' decisions, the historical average ROEs referenced in the RRA reports for 2020 and the Commission's awarded ROE for Duke Energy Kentucky of 9.25% in April 2020 do not reflect the substantial increase in common equity risk associated with utility stocks since the onset of the COVID-19 pandemic. This higher risk level is documented by the significant increase in beta values associated with electric utility stocks. As shown in the attached table, the average beta value reported by Value Line for the stocks in its electric utility industry group increased

⁶ See Case No. 2019-00271, *Electronic Application of Duke Energy Kentucky, Inc. for 1) an Adjustment of the Electric Rates; 2) Approval of New Tariffs; 3) Approval of Accounting Practices to Establish Regulatory Assets and Liabilities; and 4) All other Required Approvals and Relief* (Ky. PSC Apr. 27, 2020), Order at 46.

⁷ *Big Sandy Community Action Program v. Chaffins*, 502 S.W.2d 526 (Ky. 1973); *Drummond v. Todd County Bd. of Educ.*, 349 S.W.3d 316 (Ky. App. 2011).

⁸ The Commission explicitly acknowledged its established practice in its final orders in the Companies' 2008 base rate cases: "Typically, an electric utility with an environmental surcharge approved pursuant to KRS 278.183 uses the ROE from its most recent rate case in the return component of the environmental costs included in its surcharge." Case No. 2008-00251, Order at 7; Case No. 2008-00252, Order at 8.

⁹ *Electronic Examination by the Public Service Commission of the Environmental Surcharge Mechanism of Kentucky Utilities Company for the Two-Year Billing Period Ending April 30, 2019*, Case No. 2019-00205, Order (Ky. PSC Oct. 22, 2019); *Electronic Examination by the Public Service Commission of the Environmental Surcharge Mechanism of Louisville Gas and Electric Company for the Two-Year Billing Period Ending April 30, 2019*, Case No. 2019-00206, Order (Ky. PSC Oct. 22, 2019).

from 0.59 as of December 31, 2019 to 0.86 as of July 3, 2020.¹⁰ While U.S. Treasury bond yields have moved lower due to a “flight to safety” and unprecedented Federal Reserve monetary policies, the increase in utility beta values demonstrates a significant increase in risk associated with utility common stocks. Thus, it is evident that while some components of a thorough ROE analysis might indicate a lower ROE, other components might indicate a higher ROE. This is yet another reason supporting the continued reasonableness of the 9.725% ROE for the Companies.

The Companies also note that the Commission recently decided an infrastructure mechanism case for Kentucky American Water. Although the Final Order in that case does not expressly state the authorized ROE, the mechanism revenue requirement that was authorized in that case was based on an overall cost of capital submitted by the utility that included a 9.7% ROE (which was the ROE authorized in Kentucky American Water’s last base rate case).¹¹

The Companies also believe that the 9.25% ROE in the Duke Energy Kentucky case cannot be reasonably considered for application in this case without a more developed record. Such a record is typically based on competing expert witness testimony, composition of relevant proxy groups, credit ratings, and risk factors that are considered by the Commission in authorizing a new ROE. The authorized 9.725% is the product of such a record and should be used for the Companies in these ECR Plan proceedings.

¹⁰ The companies listed in the table showing beta values are the utilities comprising Value Line’s widely recognized Electric Industry Group.

¹¹ See the “Pre-Tax Return” tab of the Excel file that Kentucky American Water filed on May 28, 2020 in response to Item 4 of the Commission’s Second Set of Post-Hearing Data Requests in Case No. 2020-00027.

ELECTRIC UTILITY INDUSTRY BETA

| | | | (a) | (b) |
|----|-------------------|------------------------|--------------------------|------------------------|
| | <u>SYM</u> | <u>Company</u> | <u>12/31/2019</u> | <u>7/3/2020</u> |
| | | | <u>Beta</u> | |
| 1 | ALE | ALLETE | 0.65 | 0.85 |
| 2 | LNT | Alliant Energy | 0.60 | 0.80 |
| 3 | AEE | Ameren Corp. | 0.55 | 0.80 |
| 4 | AEP | American Elec Pwr | 0.55 | 0.75 |
| 5 | AGR | Avangrid, Inc. | 0.40 | 0.80 |
| 6 | AVA | Avista Corp. | 0.60 | 0.95 |
| 7 | BKH | Black Hills Corp. | 0.70 | 1.00 |
| 8 | CNP | CenterPoint Energy | 0.80 | 1.15 |
| 9 | CMS | CMS Energy Corp. | 0.50 | 0.80 |
| 10 | ED | Consolidated Edison | 0.45 | 0.75 |
| 11 | D | Dominion Energy | 0.55 | 0.80 |
| 12 | DTE | DTE Energy Co. | 0.55 | 0.90 |
| 13 | DUK | Duke Energy Corp. | 0.50 | 0.85 |
| 14 | EIX | Edison International | 0.55 | 0.90 |
| 15 | EE | El Paso Electric Co. | 0.65 | 0.50 |
| 16 | ETR | Entergy Corp. | 0.60 | 0.95 |
| 17 | EVRG | Evergy Inc. | n/a | 1.05 |
| 18 | ES | Eversource Energy | 0.55 | 0.90 |
| 19 | EXC | Exelon Corp. | 0.65 | 0.90 |
| 20 | FE | FirstEnergy Corp. | 0.65 | 0.85 |
| 21 | FTS | Fortis Inc. | 0.60 | 0.80 |
| 22 | HE | Hawaiian Elec. | 0.55 | 0.80 |
| 23 | IDA | IDACORP, Inc. | 0.55 | 0.80 |
| 24 | MGEE | MGE Energy | 0.55 | 0.70 |
| 25 | NEE | NextEra Energy, Inc. | 0.55 | 0.85 |
| 26 | NWE | NorthWestern Corp. | 0.60 | 0.90 |
| 27 | OGE | OGE Energy Corp. | 0.75 | 1.05 |
| 28 | OTTR | Otter Tail Corp. | 0.70 | 0.85 |
| 29 | PNW | Pinnacle West Capital | 0.50 | 0.85 |
| 30 | PNM | PNM Resources | 0.60 | 0.90 |
| 31 | POR | Portland General Elec. | 0.55 | 0.85 |
| 32 | PPL | PPL Corp. | 0.70 | 1.05 |
| 33 | PEG | Pub Sv Enterprise Grp. | 0.65 | 0.90 |
| 34 | SRE | Sempra Energy | 0.70 | 0.95 |
| 35 | SO | Southern Company | 0.50 | 0.90 |
| 36 | WEC | WEC Energy Group | 0.50 | 0.80 |
| 37 | XEL | Xcel Energy Inc. | <u>0.50</u> | <u>0.75</u> |
| | | Average | 0.59 | 0.86 |

(a) The Value Line Investment Survey (Nov. 15 & Dec. 13, 2019; Jan. 24, 2020).

(b) The Value Line Investment Survey, *Summary & Index* (Jul. 3, 2020).