TUCSON ELECTRIC POWER CO
Form 10-K
February 15, 2018

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
Washington, D.C. 20549
FORM 10-K
(Mark One)
x ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934
For the fiscal year ended December 31, 2017
OR
¨ TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934
For the transition period from to .
Commission File Number 1-5924
TUCSON ELECTRIC POWER COMPANY
(Exact name of registrant as specified in its charter)

| | |
|---|---|
| Arizona<br>(State or other jurisdiction of incorporation or organization) | 86-0062700<br>(I.R.S. Employer Identification No.) |

88 East Broadway Boulevard, Tucson, AZ 85701
(Address of principal executive offices)(Zip Code)
Registrant's telephone number, including area code: (520) 571-4000
Securities registered pursuant to Section 12(b) of the Exchange Act: None
Securities registered pursuant to Section 12(g) of the Exchange Act: Common Stock, No Par Value (Title of Class)
Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act of 1933. Yes o No x
Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Securities Exchange Act of 1934 (Exchange Act). Yes o No x
Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes x No o
Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files). Yes x No o
Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of each registrant's knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K. x
Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, a smaller reporting company, or an emerging growth company. See the definitions of "large accelerated filer," "accelerated filer," "smaller reporting company," and "emerging growth company" in Rule 12b-2 of the Exchange Act. (Check one):

| | | | | |
|---|---|---|---|---|
| Large Accelerated Filero | Accelerated Filero | Non-Accelerated Filerx<br>(do not check if a smaller reporting company) | Smaller Reporting Companyo | Emerging Growth Companyo |

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act. o
Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). Yes o No x
State the aggregate market value of the voting and non-voting common equity held by non-affiliates: None
As of February 14, 2018, Tucson Electric Power Company had 32,139,434 shares of common stock, no par value, outstanding, all of which were held by UNS Energy Corporation, an indirect wholly owned subsidiary of Fortis Inc.
Documents incorporated by reference: None
Tucson Electric Power meets the conditions set forth in General Instruction I(1)(a) and (b) of Form 10-K and is, therefore, filing portions of this Form 10-K with the reduced disclosure format specified in General Instruction I(2) of Form 10-K.

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DEFINITIONS

The abbreviations and acronyms used in the 2017 Form 10-K are defined below:

| | |
|---|---|
| 2010 Reimbursement Agreement | Reimbursement Agreement, dated December 14, 2010, between TEP, as borrower, and a financial institution |
| 2017 Rate Order | A rate order issued by the ACC resulting in a new rate structure for TEP, effective on February 27, 2017 |
| ACC | Arizona Corporation Commission |
| APS | Arizona Public Service Company |
| BART | Best Available Retrofit Technology |
| BBtu | Billion British thermal unit(s) |
| DG | Distributed Generation |
| DSM | Demand Side Management |
| EE Standards | Energy Efficiency Standards |
| EPA | Environmental Protection Agency |
| EPNG | El Paso Natural Gas Company, LLC. |
| FERC | Federal Energy Regulatory Commission |
| Fortis | Fortis Inc., a corporation incorporated under the Corporations Act of Newfoundland and Labrador, Canada, whose principal executive offices are located at Fortis Place, Suite 1100, 5 Springdale Street, St. John's, NL A1E 0E4 |
| Four Corners | Four Corners Generating Station |
| GAAP | Generally Accepted Accounting Principles in the United States of America |
| Gila River | Gila River Generating Station |
| GWh | Gigawatt-hour(s) |
| kV | Kilo-volt(s) |
| kWh | Kilowatt-hour(s) |
| LFCR | Lost Fixed Cost Recovery Mechanism |
| LOC | Letter(s) of Credit |
| Luna | Luna Generating Station |
| MMBtu | Million British thermal units |
| MW | Megawatt(s) |
| MWh | Megawatt-hour(s) |
| Navajo | Navajo Generating Station |
| NBV | Net Book Value |
| PNM | Public Service Company of New Mexico |
| PPA | Power Purchase Agreement |
| PPFAC | Purchased Power and Fuel Adjustment Clause |
| PV | Photovoltaic |
| REC | Renewable Energy Credit |
| Regional Haze Rules | Rules promulgated by the EPA to improve visibility at national parks and wilderness areas |
| RES | Renewable Energy Standard |
| Retail Rates | Rates designed to allow a regulated utility recovery of its cost of providing services and an opportunity to earn a reasonable return on its investment |
| RICE | Reciprocating Internal Combustion Engine |
| San Juan | San Juan Generating Station |
| SCR | Selective Catalytic Reduction |

| | |
|---|---|
| SES | Southwest Energy Solutions, Inc. |
| SJCC | San Juan Coal Company |
| SNCR | Selective Non-Catalytic Reduction |

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| | |
|---|---|
| Springerville | Springerville Generating Station |
| SRP | Salt River Project Agricultural Improvement and Power District |
| Sundt | H. Wilson Sundt Generating Station |
| TCJA | On December 22, 2017, the Tax Cuts and Jobs Act was signed into law enacting significant changes to the Internal Revenue Code including a reduction in the U.S. federal corporate income tax rate from 35% to 21% effective for tax years beginning after 2017 |
| TEP | Tucson Electric Power Company, the principal subsidiary of UNS Energy Corporation |
| Third-Party Owners | Wilmington Trust Company and William J. Wade, as Owner Trustee and Co-trustee under a separate trust agreement with each of Alterna Springerville LLC (Alterna) and LDVF1 TEP LLC (LDVF1) (Alterna and LDVF1, together with the Owner Trustees and Co-trustees, the Third-Party Owners) |
| TSA | Transmission Service Agreement |
| Tri-State | Tri-State Generation and Transmission Association, Inc. |
| UES | UniSource Energy Services, Inc., a wholly-owned subsidiary of UNS Energy Corporation, and the intermediate holding company established to own the operating companies UNS Electric, Inc. and UNS Gas, Inc. |
| UNS Electric | UNS Electric, Inc., an indirect wholly-owned subsidiary of UNS Energy Corporation |
| UNS Energy | UNS Energy Corporation, the parent company of TEP, whose principal executive offices are located at 88 East Broadway Boulevard, Tucson, Arizona 85701 |
| UNS Energy Affiliates | Affiliated subsidiaries of UNS Energy Corporation including UniSource Energy Services Inc., UNS Electric, Inc., UNS Gas, Inc., and Southwest Energy Solutions, Inc. |
| UNS Gas | UNS Gas, Inc., an indirect wholly-owned subsidiary of UNS Energy |

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## FORWARD-LOOKING INFORMATION

This Annual Report on Form 10-K contains forward-looking statements as defined by the Private Securities Litigation Reform Act of 1995. Tucson Electric Power Company (TEP or the Company) is including the following cautionary statements to make applicable and take advantage of the safe harbor provisions of the Private Securities Litigation Reform Act of 1995 for any forward-looking statements made by TEP in this Annual Report on Form 10-K. Forward-looking statements include statements concerning plans, objectives, goals, strategies, future events, future economic conditions, future operational or financial performance and underlying assumptions, and other statements that are not statements of historical facts. Forward-looking statements may be identified by the use of words such as anticipates, believes, estimates, expects, intends, may, plans, predicts, potential, projects, would, and similar expressions. From time to time, we may publish or otherwise make available forward-looking statements of this nature. All such forward-looking statements, whether written or oral, and whether made by or on behalf of TEP, are expressly qualified by these cautionary statements and any other cautionary statements which may accompany the forward-looking statements. In addition, TEP disclaims any obligation to update any forward-looking statements to reflect events or circumstances after the date of this report, except as may otherwise be required by the federal securities laws.

Forward-looking statements involve risks and uncertainties which could cause actual results or outcomes to differ materially from those expressed therein. We express our estimates, expectations, beliefs, and projections in good faith and believe them to have a reasonable basis. However, we make no assurances that management’s estimates, expectations, beliefs, or projections will be achieved or accomplished. We have identified the following important factors that could cause actual results to differ materially from those discussed in our forward-looking statements. These may be in addition to other factors and matters discussed in: Part I, Item 1A. Risk Factors; Part II, Item 7. Management’s Discussion and Analysis of Financial Condition and Results of Operations; and other parts of this report. These factors include: state and federal regulatory and legislative decisions and actions, including changes in tax policies; changes in, and compliance with, environmental laws and regulatory decisions and policies that could increase operating and capital costs, reduce generating facility output or accelerate generation facility retirements; regional economic and market conditions which could affect customer growth and energy usage; changes in energy consumption by retail customers; weather variations affecting energy usage; the cost of debt and equity capital and access to capital markets and bank markets; the performance of the stock market and a changing interest rate environment, which affect the value of our pension and other postretirement benefit plan assets and the related contribution requirements and expenses; the potential inability to make additions to our existing high voltage transmission system; unexpected increases in operations and maintenance expense; resolution of pending litigation matters; changes in accounting standards; changes in our critical accounting policies and estimates; the ongoing impact of mandated energy efficiency and distributed generation initiatives; changes to long-term contracts; the cost of fuel and power supplies; the ability to obtain coal from our suppliers; cyber-attacks, data breaches, or other challenges to our information security, including our operations and technology systems; the performance of TEP's generation facilities; and the impact of the Tax Cuts and Jobs Act on our financial condition and results of operations, including the assumptions we made relating thereto.

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PART I
ITEM 1. BUSINESS
OVERVIEW OF BUSINESS
General
TEP and its predecessor companies have served the greater Tucson metropolitan area for 125 years. TEP was incorporated in the State of Arizona in 1963. TEP is a regulated electric utility company serving approximately 422,000 retail customers. TEP’s service territory covers 1,155 square miles and includes a population of over one million people in Pima County, as well as parts of Cochise County. TEP's principal business operations include generating, transmitting, and distributing electricity to its retail customers. In addition to retail sales, TEP sells electricity, transmission, and ancillary services to other utilities, municipalities, and energy marketing companies on a wholesale basis. TEP is subject to comprehensive state and federal regulation. The regulated electric utility operation is TEP's only segment.
TEP is a wholly owned subsidiary of UNS Energy Corporation (UNS Energy), a utility services holding company. In 2014, UNS Energy was acquired by Fortis Inc. (Fortis) and became an indirect wholly owned subsidiary of Fortis which is a leader in the North American electric and gas utility business.
Regulated Utility Operations
TEP delivers electricity to retail customers in southern Arizona. TEP owns or has contracts for coal, natural gas, wind, and solar generation resources to provide electricity. This electricity, together with electricity purchased on the wholesale market, is delivered over transmission lines which are part of the Western Interconnection, a regional grid in the United States. The electricity is then transformed to lower voltages and delivered to customers through TEP's distribution system.
TEP operates under a certificate of public convenience and necessity as regulated by the Arizona Corporation Commission (ACC), under which TEP is obligated to provide electricity service to customers within its service territory. The ACC establishes rates that are designed to allow a regulated utility recovery of its cost of providing services and an opportunity to earn a reasonable return on its investment (Retail Rates).
Customers
Electricity sold to retail and wholesale customers by class of customer and the average number of retail customers over the last three years were as follows:

| (sales in GWh) | 2017 | | | 2016 | | | 2015 | | |
|---|---|---|---|---|---|---|---|---|---|
| Electric Sales | | | | | | | | | |
| Residential | 3,786 | 28 | % | 3,724 | 29 | % | 3,724 | 28 | % |
| Commercial | 2,192 | 17 | % | 2,139 | 17 | % | 2,124 | 15 | % |
| Industrial, non-Mining | 1,939 | 15 | % | 2,006 | 16 | % | 2,063 | 15 | % |
| Industrial, Mining | 991 | 8 | % | 997 | 8 | % | 1,109 | 8 | % |
| Other | 18 | — | % | 30 | — | % | 33 | — | % |
| Total Retail Sales by Customer Class | 8,926 | 68 | % | 8,896 | 70 | % | 9,053 | 66 | % |
| Wholesale Sales, Long-Term | 587 | 4 | % | 463 | 4 | % | 750 | 5 | % |
| Wholesale Sales, Short-Term | 3,630 | 28 | % | 3,308 | 26 | % | 3,928 | 29 | % |
| Total Electric Sales | 13,143 | 100 | % | 12,667 | 100 | % | 13,731 | 100 | % |
| | | | | | | | | | |
| Average Number of Retail Customers | | | | | | | | | |
| Residential | 381,399 | 90 | % | 378,991 | 90 | % | 376,439 | 90 | % |
| Commercial | 38,564 | 9 | % | 38,403 | 9 | % | 38,253 | 9 | % |
| Industrial, non-Mining | 520 | — | % | 580 | — | % | 588 | — | % |
| Industrial, Mining | 4 | — | % | 4 | — | % | 4 | — | % |

| | | | | | | |
|---|---|---|---|---|---|---|
| Other | 1,879 | 1 % | 1,866 | 1 % | 1,857 | 1 % |
| Total Retail Customers | 422,366 | 100% | 419,844 | 100% | 417,141 | 100% |

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Retail Customers

TEP provides electric utility service to a diverse group of residential, commercial, industrial, and public sector customers. Major industries served include copper mining, cement manufacturing, defense, healthcare, education, military bases, and other governmental entities. TEP’s retail sales are influenced by several factors including economic conditions, seasonal weather patterns, Demand Side Management (DSM) initiatives and the increasing use of energy-efficient products, and customer-sited Distributed Generation (DG).

Local, regional, and national economic factors impact the growth in the number of customers in TEP’s service territory. In each of the past five years, TEP’s average number of retail customers increased by less than 1%. TEP expects the number of retail customers to increase at a rate of approximately 1% in 2018 based on the estimated population growth in its service territory.

TEP’s retail sales volume in 2017 was 8,926 gigawatt-hours (GWh), which is a decrease of 3.8% from 2013 levels. During the past five years, mining load reductions and state requirements to reduce retail sales through energy efficiency and DG have resulted in lower sales volumes.

TEP’s mining customers make up 11% of total retail sales. TEP’s GWh sales to mining customers depend on a variety of factors including commodity prices, electricity prices, and the mines’ development of self-generating resources. TEP’s GWh sales to mining customers decreased by 8% from 2013 levels as a result of the decline in commodity prices requiring the mines to curtail production starting in 2016. TEP cannot predict future commodity prices or the impact they will have on mining production.

Wholesale Customers

TEP’s utility operations include the wholesale marketing of electricity to other utilities and power marketers. Wholesale sales transactions are made on both a firm and interruptible basis. A firm contract requires TEP to supply power on demand (except under limited emergency circumstances), while an interruptible contract allows TEP to stop supplying power under defined conditions.

Generally, TEP commits to future sales based on expected generation capability, forward prices, and generation costs using a diversified portfolio approach to provide a balance between long-term, mid-term, and spot energy sales. TEP’s wholesale sales consist primarily of two types:

Long-Term Wholesale Sales

Contracts for long-term wholesale sales cover periods of one year or greater. TEP typically uses its own generation to serve the requirements of its long-term wholesale customers.

TEP’s long-term wholesale contract with Shell Energy North America expired in 2017. TEP's primary long-term wholesale sale contracts are presented in the table below:

| Counterparty | Contracts Expire December 31, |
|---|---|
| Navajo Tribal Utility Authority | 2022 |
| TRICO Electric Cooperative | 2024 |
| Navopache Electric Cooperative | 2041 |

Short-Term Wholesale Sales

Certain contracts for short-term wholesale sales cover periods of less than one year and obligate TEP to sell capacity or power at a fixed price. TEP also engages in short-term sales by selling power in the daily or hourly markets at fluctuating spot market prices and making other non-firm power sales. The majority of our revenues from short-term wholesale sales are passed through to TEP’s retail customers offsetting fuel and purchased power costs. TEP uses short-term wholesale sales as part of its hedging strategy to reduce customer exposure to fluctuating power prices.

Competition

Retail Customers

TEP is the primary electric service provider to retail customers within its service territory and operates under a certificate of public convenience and necessity as regulated by the ACC.

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Wholesale Customers

The Federal Energy Regulatory Commission (FERC) regulates rates for wholesale power sales and transmission services. TEP engages in long-term wholesale sales to optimize its generation resources. As a result of its wholesale power activity, TEP competes with other utilities, power marketers, and independent power producers in the wholesale markets.

Generation Facilities

As of December 31, 2017, TEP owned 2,531 megawatts (MW) of nominal generation capacity, as set forth in the following table. Nominal capacity is based on unit design net output and measured in alternating current (AC) except for the solar generation which is measured in direct current (DC).

| Generation Source | Unit No. | Location | Date In Service | Resource Type | Capacity MW | Operating Agent | TEP's Share % | TEP's Share MW |
|---|---|---|---|---|---|---|---|---|
| Springerville | 1 | Springerville, AZ | 1985 | Coal | 387 | TEP | 100 | 387 |
| Springerville (1) | 2 | Springerville, AZ | 1990 | Coal | 406 | TEP | 100 | 406 |
| San Juan | 1 | Farmington, NM | 1976 | Coal | 340 | PNM | 50.0 | 170 |
| Navajo (2) | 1 | Page, AZ | 1974 | Coal | 750 | SRP | 7.5 | 56 |
| Navajo (2) | 2 | Page, AZ | 1975 | Coal | 750 | SRP | 7.5 | 56 |
| Navajo (2) | 3 | Page, AZ | 1976 | Coal | 750 | SRP | 7.5 | 56 |
| Four Corners | 4 | Farmington, NM | 1969 | Coal | 785 | APS | 7.0 | 55 |
| Four Corners | 5 | Farmington, NM | 1970 | Coal | 785 | APS | 7.0 | 55 |
| Gila River | 3 | Gila Bend, AZ | 2003 | Gas | 550 | Ethos Energy | 75.0 | 413 |
| Luna | 1 | Deming, NM | 2006 | Gas | 555 | PNM | 33.3 | 185 |
| Sundt (3) | 1 | Tucson, AZ | 1958 | Gas/Oil | 81 | TEP | 100 | 81 |
| Sundt (3) | 2 | Tucson, AZ | 1960 | Gas/Oil | 81 | TEP | 100 | 81 |
| Sundt | 3 | Tucson, AZ | 1962 | Gas | 104 | TEP | 100 | 104 |
| Sundt | 4 | Tucson, AZ | 1967 | Gas | 156 | TEP | 100 | 156 |
| Sundt Internal Combustion Turbines | | Tucson, AZ | 1972-1973 | Gas/Oil | 50 | TEP | 100 | 50 |
| DeMoss Petrie | | Tucson, AZ | 2001 | Gas | 75 | TEP | 100 | 75 |
| North Loop | | Tucson, AZ | 2001 | Gas | 94 | TEP | 100 | 94 |
| Springerville | | Springerville, AZ | 2002-2014 | Solar | 16 | TEP | 100 | 16 |
| Tucson | | Tucson, AZ | 2010-2014 | Solar | 13 | TEP | 100 | 13 |
| Ft. Huachuca | | Ft. Huachuca, AZ | 2014-2017 | Solar | 22 | TEP | 100 | 22 |
| Total TEP Capacity (4) | | | | | | | | 2,531 |

(1) Springerville Generating Station (Springerville) Unit 2 is owned by San Carlos Resources, Inc., a wholly-owned subsidiary of TEP.

(2) TEP, along with the other participants at the Navajo Generating Facility (Navajo), plan to discontinue operations of Navajo Units 1-3 by the end of 2019.

(3) TEP plans to discontinue operations of Sundt Units 1 & 2 by the end of 2020.

(4) On December 20, 2017, San Juan Generating Station (San Juan) Unit 2 was removed from service. TEP's 50% share of San Juan Unit 2's nominal capacity was 170 MW.

Springerville Generating Station

TEP's other interests in Springerville include: (i) undivided interests in certain common facilities at Springerville (Springerville Common Facilities) made up of 67.8% of ownership interest and 32.2% of leased interest, that includes assets such as, but not limited to: administration building, roads, and well fields used to serve all four units at

Springerville that cannot be proportioned to each unit; and (ii) an 82.95% ownership interest in the Springerville Coal Handling Facilities.

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Springerville Common Facilities Leases

As of December 31, 2017, TEP holds two leveraged lease arrangements related to a 32.2% undivided interest in Springerville Common Facilities. The lease arrangements are scheduled to expire in January 2021 and have fair market value renewal options as well as fixed-price purchase options totaling $68 million.

See Note 6 of Notes to Consolidated Financial Statements in Part II, Item 8 of this Form 10-K for additional information regarding the capital leases.

Springerville Units 3 and 4

Springerville Units 3 and 4 are each approximately 400 MW coal-fired generation facilities that are operated but not owned by TEP. These facilities are located at the same site as Springerville Units 1 and 2. The lessee of Springerville Unit 3 compensates TEP for operating the facilities and pays an allocated portion of the fixed costs related to the Springerville Common Facilities and Springerville Coal Handling Facilities. The owner of Springerville Unit 4 owns 17.05% of the Springerville Coal Handling Facilities and pays TEP for a portion of the fixed costs allocated for the common facilities.

Renewable Energy Resources

The ACC's Renewable Energy Standard (RES) requires Arizona regulated utilities to increase their use of renewable energy each year until it represents at least 15% of their total annual retail energy requirements by 2025, with DG accounting for 30% of the annual renewable energy requirement. Arizona utilities must file an annual RES implementation plan for review and approval by the ACC. TEP plans to meet these requirements through a combination of utility-owned resources, Power Purchase Agreements (PPAs), and customer-sited DG. See Note 2 of Notes to Consolidated Financial Statements in Part II, Item 8 of this Form 10-K and Rates and Regulations below for additional information regarding RES.

Owned Renewable Resources

As of December 31, 2017, TEP owned 51 MW of photovoltaic (PV) solar generation capacity measured in DC. The solar generation facilities are located on properties held under land easements and leases.

Renewable Power Purchase Agreements

As of December 31, 2017, TEP had renewable PPAs for 198 MW measured in DC from solar resources, 80 MW measured in AC from wind resources and 4 MW measured in AC associated with the purchase of landfill gas. The solar PPAs contain options that allow TEP to purchase all or part of the related project at a future date.

Purchased Power

TEP purchases power from other utilities and power marketers. TEP may enter into contracts to purchase: (i) power under long-term contracts to serve retail load and long-term wholesale contracts; (ii) capacity or power during periods of planned outages or for peak summer load conditions; and (iii) power for resale to certain wholesale customers under load and resource management agreements. See Note 7 of Notes to Consolidated Financial Statements related to the commitment amount of purchased power in Part II, Item 8 of this Form 10-K.

TEP typically uses its generation, supplemented by purchased power, to meet the summer peak demands of its retail customers. Due to its increasing natural gas and purchased power usage, TEP hedges a portion of its total energy price exposure with forward priced contracts. Certain of these contracts are at a fixed price per megawatt-hour (MWh) and others are indexed to natural gas prices. TEP also purchases power in the daily and hourly markets to meet higher than anticipated demands, to cover generation outages, or when doing so is more economical than generating its own power.

TEP is a member of a regional reserve-sharing organization and has reliability and power-sharing relationships with other utilities. These relationships allow TEP to call upon other utilities during emergencies, such as facility outages and system disturbances, and reduce the amount of reserves TEP is required to carry.

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Peak Demand and Future Resources

Peak Demand

| (in MW) | 2017 | 2016 | 2015 | 2014 | 2013 |
|---|---|---|---|---|---|
| Retail Customers | 2,415 | 2,278 | 2,222 | 2,218 | 2,230 |

In 2017, TEP's generation and purchased resources were sufficient to meet total retail and long-term wholesale peak demand, while maintaining a reserve margin in compliance with reliability criteria set forth by the Western Electricity Coordinating Council, a regional council of North American Reliability Corporation (NERC).

Peak demand occurs during the summer months due to the cooling requirements of retail customers in TEP’s service territory. Retail peak demand varies from year-to-year due to weather, energy conservation, DG, economic conditions, and other factors. Retail peak demand in 2017 increased 6% compared to 2016 due to unseasonably hot weather.

Forecasted retail peak demand for 2018 is 2,270 MW compared with actual peak demand of 2,415 MW in 2017. TEP’s 2018 estimated retail peak demand is based on weather patterns observed over a 10-year period and other factors, including estimates of customer usage. TEP believes that existing generation capacity and PPAs are sufficient to meet the expected demand and reserve margin requirements in 2018.

Future Resources

As of December 31, 2017, approximately 49% of TEP's generation capacity is coal-fired generation. TEP is executing strategies and evaluating additional steps to reduce its dependency on coal-fired generation while still meeting its peak load requirements and maintaining affordable Retail Rates. TEP's five-year capital expenditure forecast includes investments related to Reciprocating Internal Combustion Engines (RICE) at H. Wilson Sundt Generating Station (Sundt) and the planned purchase of Gila River Generating Station (Gila River) Unit 2. These anticipated investments will provide replacement capacity for the planned early retirements of coal-fired and other generation resources.

See Part II, Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations, Factors Affecting Results of Operations of this Form 10-K for additional information regarding TEP's generation resources planned retirements and additions.

Fuel Supply

A summary of Fuel and Purchased Power resource information is provided below:

| | Average Cost (cents per kWh) | | | Percentage of Total kWh Resources | | |
|---|---|---|---|---|---|---|
| | 2017 | 2016 | 2015 | 2017 | 2016 | 2015 |
| Coal | 2.41 | 2.30 | 2.44 | 54 % | 62 % | 60 % |
| Gas | 3.06 | 2.84 | 3.35 | 23 % | 25 % | 19 % |
| Purchased Power, Non-Renewable | 3.78 | 3.43 | 3.04 | 18 % | 8 % | 18 % |
| Purchased Power, Renewable | 6.67 | 7.00 | 9.82 | 5 % | 5 % | 3 % |
| | | | | 100 % | 100 % | 100 % |

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Coal

The coal used for electric generation is low-sulfur, bituminous or sub-bituminous coal from mines in Arizona and New Mexico. The table below provides information on the existing coal contracts that supply our generation stations. The average cost of coal per million metric British thermal unit (MMBtu), including transportation, was $2.29 in 2017, $2.21 in 2016, and $2.34 in 2015.

| Station | Coal Supplier | 2017 Coal Consumption (tons in 000s) | Contract Expiration | Average Sulfur Content | Coal Obtained From |
|---|---|---|---|---|---|
| Springerville | Peabody CoalSales | 2,289 | 2020 | 1.0% | Lee Ranch Mine/El Segundo Mine |
| Four Corners | NTEC | 285 | 2031 | 0.7% | Navajo Mine |
| San Juan (1) | San Juan Coal Co. | 1,181 | 2022 | 0.8% | San Juan Mine |
| Navajo | Peabody CoalSales | 441 | 2019 | 0.6% | Kayenta Mine |

(1) Reflects the fuel consumption of San Juan Units 1 and 2. In December 2017, San Juan Unit 2 was removed from service.

Coal-Fired Generation Facilities Operated by TEP

The coal supplies for Springerville Units 1 and 2 are transported approximately 200 miles by railroad from northwestern New Mexico. TEP expects coal reserves to be sufficient to supply the estimated requirements for Springerville Units 1 and 2 for their remaining lives.

Coal-Fired Generation Facilities Operated by Others

TEP also participates in jointly-owned coal-fired generation facilities at Four Corners Generating Station (Four Corners), the Navajo Generating Station (Navajo), and San Juan. Four Corners, which is operated by Arizona Public Service Company (APS), and San Juan, which is operated by Public Service Company of New Mexico (PNM), are mine-mouth generation facilities located adjacent to the coal reserves. Navajo, which is operated by Salt River Project Agricultural Improvement and Power District (SRP), obtains its coal supply from the nearby Kayenta coal mine and receives deliveries on a dedicated electric rail delivery system. TEP expects coal reserves available to these three jointly-owned generation facilities to be sufficient for the remaining lives of the stations.

Natural Gas Supply

TEP uses generation from its facilities fueled by natural gas, in addition to power from its coal-fired generation facilities and purchased power, to meet the summer peak demands of its retail customers and local reliability needs. The average cost of natural gas per MMBtu, including transportation, was $3.58 in 2017, $3.14 in 2016, and $3.49 in 2015.

TEP has long-term firm agreements with El Paso Natural Gas Company, LLC. (EPNG) for transportation from the Permian and San Juan Basins to Sundt under firm transportation agreements. TEP also purchases firm gas transportation for Gila River Unit 3 from EPNG and Transwestern Pipeline Co., and for the Luna Generating Station (Luna) from EPNG. TEP purchases natural gas from Southwest Gas Corporation under a retail tariff for North Loop Generating Station's (North Loop) 94 MW of internal combustion turbine generation and receives distribution service under a transportation agreement for DeMoss Petrie Generating Station's (DeMoss Petrie) 75 MW of internal combustion turbine generation.

Transmission and Distribution

TEP's transmission system is part of the Western Interconnection, which includes the interconnected transmission systems of 14 western states, two Canadian provinces and parts of Mexico. TEP's transmission system, together with contractual rights on other transmission systems, enables TEP to integrate and access generation resources to meet its customer load requirements. TEP's transmission and distribution systems included approximately 2,175 miles of transmission lines and 7,642 miles of distribution lines as of December 31, 2017.

Rates and Regulations

The ACC and the FERC each regulate portions of utility accounting practices and rates of TEP. The ACC regulates rates charged to retail customers, the siting of generation and transmission facilities, the issuance of securities, transactions with affiliated parties, and other utility matters. The ACC also enacts other regulations and policies that can affect business decisions and accounting practices. The FERC regulates terms and prices of transmission services and wholesale electricity sales.

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See Part II, Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations, Factors Affecting Results of Operations and Note 2 of Notes to Consolidated Financial Statements in Part II, Item 8 of this Form 10-K for additional information that relates to rates and regulations that affect TEP including key provisions of its 2017 Rate Order.

2017 Rate Order

In February 2017, the ACC issued a rate order in the rate case filed by TEP in November 2015, which was based on a test year ended June 30, 2015 (2017 Rate Order). The 2017 Rate Order authorizes an annual increase in non-fuel revenue requirements of $81.5 million. New billing rates were effective starting on February 27, 2017.

Purchased Power and Fuel Adjustment Clause

The Purchased Power and Fuel Adjustment Clause (PPFAC) allows TEP recovery of its fuel, transmission, purchased power, and other similar costs allowed by the ACC to serve its retail load. The PPFAC consists of a forward component and a true-up component. The forward component adjusts for any costs over or under base fuel collection rates expected over a 12-month period. The true-up component reconciles any over/under collected amounts from the preceding 12-month period and is calculated to credit or recover these amounts from customers in the subsequent year.

As of December 31, 2017, TEP had over-collected fuel and purchased power costs by $9 million.

Renewable Energy Standard and Tariff

The ACC's RES requires Arizona utilities to increase their use of renewable energy each year until it represents at least 15% of their total annual retail energy requirements in 2025, with DG accounting for 30% of the annual renewable energy requirement. Arizona utilities must file an annual RES implementation plan for review and approval by the ACC. The approved costs of carrying out this plan are recovered from retail customers through the RES surcharge. The associated lost revenues attributable to meeting DG targets will be partially recovered through the Lost Fixed Cost Recovery Mechanism (LFCR).

In 2017, the percentage of retail kilowatt-hour (kWh) sales from renewable energy was 13% of which approximately 10% was attributable to RES exceeding the 2017 requirement of 7%. The 2018 RES requirement is 8% of retail kWh sales. Compliance is determined through the ACC's review of TEP's annual RES implementation plan. As TEP no longer pays incentives to obtain DG Renewable Energy Credits (REC), which are used to demonstrate compliance with the DG requirement, the ACC approved a waiver of the 2017 and 2018 residential distributed renewable energy requirement.

Energy Efficiency Standards

Under the Energy Efficiency Standards (EE Standards), the ACC requires electric utilities to implement cost-effective programs to reduce customers' energy consumption. The EE Standards require increasing cumulative annual targeted retail kWh savings equal to 22% by 2020. As of December 31, 2017, TEP's cumulative annual energy savings was approximately 14%.

Distributed Generation

In 2016, the ACC held proceedings under the Value and Cost of Distributed Generation (Value of DG) docket to examine the ACC's net metering rules and determine the value that utilities should pay DG customers who deliver electricity from rooftop solar systems back to the grid. Prior to this proceeding, the ACC's net metering rules allowed DG customers who overproduced electricity to carry-over or "bank" excess electricity at a value equal to the full retail rate per kWh. Banked kWh could then be used by the customer to offset future energy usage that could not be met by their DG system.

In December 2016, the ACC approved an order that will begin to reform net metering in Arizona. The order adopts a number of net metering changes and policies, including:

- placing DG customers in a separate rate class;
- 

grandfathering current DG customers under net metering rules and rate design for 20 years from interconnection application;
- eliminating the banking of excess kWh for non-grandfathered DG customers; and
- compensating non-grandfathered customers for their exported kWh based on the DG export rate in effect at the time of interconnection.

The initial compensation for DG exports will be based on a five-year historical average cost per kWh of TEP’s portfolio of owned and contracted utility-scale solar projects and will be established in a second phase of TEP's rate case (Phase 2). The DG

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export rate will be updated each year and customers adopting solar will be compensated for 10 years at the rate in effect at the time they file an application for interconnection. An avoided cost methodology will also be developed for potential use in TEP's next rate case. See Part II, Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations, Factors Affecting Results of Operations of this Form 10-K for additional information that relates to Phase 2.

FERC Compliance

In 2016, the FERC issued orders relating to certain late-filed Transmission Service Agreements (TSA), which resulted in TEP recording a liability and paying time-value refunds to the counterparties under these TSAs (FERC Refund Orders). In May 2017, the FERC informed TEP that the related investigation was closed. See Note 7 of Notes to Consolidated Financial Statements in Part II, Item 8 of this Form 10-K for additional information related to the FERC Refund Orders.

ENVIRONMENTAL MATTERS

The Environmental Protection Agency (EPA) regulates the amount of sulfur dioxide ($SO_2$), nitrogen oxide ($NO_x$), carbon dioxide ($CO_2$), particulate matter, mercury, and other by-products produced by generation facilities. TEP may incur added costs to comply with future changes in federal and state environmental laws, regulations, and permit requirements at its generation facilities. Environmental laws and regulations are subject to a range of interpretations, which may ultimately be resolved by the courts. Because these laws and regulations continue to evolve, TEP is unable to predict the impact of the changing laws and regulations on its operations and consolidated financial results. TEP expects the recovery of the cost of environmental compliance through Retail Rates.

National Ambient Air Quality Standards

In October 2015, the EPA released the final rule for the 8-hour U.S. National Ambient Air Quality Standards (NAAQS) for ozone ($O_3$). The EPA lowered the standard from 75 parts per billion (ppb) to 70 ppb. If Pima County does not meet the standard, the county will be designated as a "non-attainment" area and will need to develop a plan to bring the air-shed into compliance. A "non-attainment" designation may slow economic growth in the region and impact our ability to site new local generation. Arizona's recommendation of area designations (attainment, non-attainment, or unclassified) was submitted in September 2016, and Pima County's was recommended as an attainment area.

In November 2017, the EPA published a final rule in the Federal Register establishing the initial Air Quality designations, for the 2015 Ozone Standard. The majority of Arizona counties were designated as "attainment" or "unclassified" except for Pima and Maricopa counties for which a designation will be addressed in a separate, future action.

Effluent Limitation Guidelines

In 2015, as part of the Clean Water Act, the EPA published the final Effluent Limitation Guidelines (ELG) setting standards and limitations for steam electric generation facility discharges. The ELG rule establishes discharge limits for fly ash and mercury-contaminated wastewater at those facilities that require a National Pollution Discharge Elimination System (NPDES) with an effective date between November 2018 and November 2023. With the exception of Four Corners, none of the other TEP owned facilities require an NPDES permit and therefore are not affected. With regard to Four Corners, until a draft NPDES permit is proposed during the 2018-2023 time-frame, TEP cannot predict what will be required to control these discharges to be in compliance with the finalized effluent limitations at that facility. TEP does not anticipate a significant financial impact from these requirements.

In 2017, the EPA announced its decision to reconsider the ELG. The EPA also filed and was granted a motion requesting the U.S. Court of Appeals for the Fifth Circuit to hold the litigation challenging the Rule in abeyance while the Agency reconsiders the ELG, after which it will inform the Court of any portions of the ELG for which it seeks a remand so that it can conduct further rulemaking. As a result, the U.S. Court of Appeals for the Fifth Circuit approved a briefing schedule for the ELG that puts industry groups' challenges on hold indefinitely.

TEP believes it is in material compliance with applicable environmental laws and regulations. Refer to Part II, Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations, Liquidity and Capital Resources of this Form 10-K for additional information related to environmental laws and regulations as well as environmental compliance capital expenditures.

EMPLOYEES

As of December 31, 2017, TEP had 1,510 employees, of which approximately 671 are represented by the International Brotherhood of Electrical Workers Local No. 1116. The current collective bargaining agreements between the IBEW and TEP expire in December 2018.

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EXECUTIVE OFFICERS OF THE REGISTRANT

Executive Officers, who are elected annually by TEP’s Board of Directors, acting at the direction of the Board of Directors of UNS Energy, as of January 2, 2018, are as follows:

| Name | Age | Position(s) Held | Executive Officer Since |
|---|---|---|---|
| David G. Hutchens (1) | 51 | President and Chief Executive Officer | 2007 |
| Frank P. Marino (1) | 53 | Vice President and Chief Financial Officer | 2013 |
| Erik B. Bakken | 45 | Vice President, Transmission and Distribution Planning and Environmental | 2018 |
| Kentton C. Grant | 59 | Vice President, Rates and Planning | 2007 |
| Susan M. Gray | 45 | Vice President, Energy Delivery | 2015 |
| Todd C. Hixon (1) | 51 | Vice President, General Counsel and Chief Compliance Officer | 2011 |
| Mark C. Mansfield | 62 | Vice President, Energy Resources | 2012 |
| Catherine E. Ries | 58 | Vice President, Customer and Human Resources | 2007 |
| Mary Jo Smith | 60 | Vice President, Public Policy and Rates | 2015 |
| Morgan C. Stoll | 47 | Vice President and Chief Information Officer | 2016 |
| Martha B. Pritz | 56 | Treasurer | 2017 |
| Herlinda H. Kennedy | 56 | Corporate Secretary | 2006 |

(1) Member of the TEP Board of Directors. The directors of TEP are elected annually by TEP's sole shareholder, UNS Energy, acting at the direction of the Board of Directors of UNS Energy.

SEC REPORTS AVAILABLE ON TEP'S WEBSITE

TEP makes available its annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, and all amendments to those reports as soon as reasonably practical after it electronically files or furnishes them to the Securities and Exchange Commission (SEC). These reports are available free of charge through TEP’s website address at www.tep.com/about/investors/.

TEP is providing the address of TEP’s website solely for the information of investors and does not intend the address to be an active link. The information contained on TEP’s website is not a part of, or incorporated by reference into, any report or other filing filed with the SEC by TEP.

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## ITEM 1A. RISK FACTORS

The business and financial results of TEP are subject to a number of risks and uncertainties, including those set forth below. These risks and uncertainties fall primarily into five major categories: revenues, regulatory, environmental, financial, and operational. Additional risks and uncertainties that are not currently known to TEP or that are not currently believed by TEP to be material may also harm TEP’s business and financial results.

### REVENUES

A significant decrease in the demand for electricity in TEP's service area would negatively impact retail sales and adversely affect results of operations, net income, and cash flows at TEP.

National and local economic conditions have a significant impact on customer growth and overall retail sales in TEP’s service area. TEP anticipates an annual customer growth rate of 1% for the next five years.

Research and development activities are ongoing for new technologies that produce power and reduce power consumption. These technologies include renewable energy, customer-sited DG, appliances, equipment, battery storage and control systems. Continued development and use of these technologies and compliance with the ACC's EE Standards and RES continue to have a negative impact on TEP’s use per customer and overall retail sales. TEP's use per customer declined by an average of 1% per year from 2013 through 2017.

The revenues, results of operations, and cash flows of TEP are seasonal and are subject to weather conditions and customer usage patterns, which are beyond the Company’s control.

TEP typically earns the majority of its operating revenue and net income in the third quarter because retail customers increase their air conditioning usage during the summer. Conversely, TEP’s first quarter net income is typically limited by relatively mild winter weather in its retail service territory. Cool summers or warm winters may reduce customer usage, negatively affecting operating revenues, cash flows, and net income by reducing sales.

TEP is dependent on a small number of customers for a significant portion of future revenues. A reduction in the electricity sales to these customers would negatively affect our results of operations, net income, and cash flows.

TEP’s ten largest customers represented 10% of total revenues in 2017. TEP sells electricity to mines, military installations, and other large commercial and industrial customers. Retail sales volumes and revenues from these customers could decline as a result of, among other things: global, national, and local economic conditions; curtailments of customer operations due to unfavorable market conditions; military base reorganization or closure decisions by the federal government; the effects of energy efficiency and distributed generation; or the decision by customers to self-generate all or a portion of their energy needs. A reduction in retail kWh sales by any one of TEP’s ten largest customers would negatively affect our results of operations, net income, and cash flows.

### REGULATORY

TEP is subject to regulation by the ACC, which sets the Company’s Retail Rates and oversees many aspects of its business in ways that could negatively affect the Company’s results of operations, net income, and cash flows.

The ACC is a constitutionally created body composed of five elected commissioners. Commissioners are elected state-wide for staggered four-year terms and are limited to serving a total of two terms. As a result, the composition of the commission, and therefore its policies, are subject to change every two years.

TEP’s Retail Rates consist of base rates and various rate adjustors that are intended to allow for timely recovery of certain costs between rate cases. The ACC is charged with setting Retail Rates at levels that are intended to allow TEP recovery of its cost of service and provide it with an opportunity to earn a reasonable rate of return. In setting TEP’s Retail Rates, the ACC could disallow the recovery of costs, not provide for the timely recovery of costs or increase regulatory oversight. If customers or regulators have or develop a negative opinion of the Company's utility services or the electric utility industry in general, this could negatively affect TEP's regulatory outcomes. The decisions made by the ACC on such matters impact the net income and cash flows of TEP.

Changes in federal energy regulation may negatively affect the results of operations, net income, and cash flows of TEP.

TEP is subject to the impact of comprehensive and changing governmental regulation at the federal level that continues to change the structure of the electric utility industry and the ways in which this industry is regulated. TEP is subject to regulation

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by the FERC. The FERC has jurisdiction over rates for electric transmission in interstate commerce and rates for wholesale sales of electric power, including terms and prices of transmission services and sales of electricity at wholesale.

Owners and operators of bulk power systems, including TEP, are subject to mandatory transmission standards developed and enforced by NERC and subject to the oversight of the FERC. Compliance with modified or new transmission standards may subject TEP to higher operating costs and increased capital costs. Failure to comply with the mandatory transmission standards could subject TEP to sanctions, including substantial monetary penalties.

Changes in tax regulation may negatively affect the results of operations, net income, and cash flows of TEP.

The Company is subject to taxation by the various taxing authorities at the federal, state and local levels where it does business. Legislation or regulation could be enacted by any of these governmental authorities which could affect the Company’s tax positions.

In December 2017, the Tax Cuts and Jobs Act (TCJA) was signed into law which enacted significant changes to the Internal Revenue Code including a reduction in the U.S. federal corporate income tax rate from 35% to 21% effective for tax years beginning after 2017. Subsequently, the ACC opened a docket requesting that all regulated utilities submit proposals to address passing any ongoing benefits of the TCJA through to customers. TEP cannot predict the timing or extent of the regulatory treatment related to the TCJA impacts but any decrease in rates paid by customers would have a negative impact on operating cash flows.

ENVIRONMENTAL

TEP is subject to numerous environmental laws and regulations that may increase its cost of operations or expose it to environmental-related litigation and liabilities. Many of these regulations could have a significant impact on TEP due to its reliance on coal for electric generation.

Numerous federal, state, and local environmental laws and regulations affect present and future operations. Those laws and regulations include rules regarding air emissions, water use, wastewater discharges, solid waste, hazardous waste, and management of coal combustion residuals.

These laws and regulations can contribute to higher capital, operating, and other costs, particularly with regard to enforcement efforts focused on existing generation facilities and compliance standards related to new and existing generation facilities. These laws and regulations generally require TEP to obtain and comply with a wide variety of environmental licenses, permits, authorizations, and other approvals. Both public officials and private individuals may seek to enforce applicable environmental laws and regulations. Failure to comply with applicable laws and regulations may result in litigation, the imposition of fines, penalties, and a requirement by regulatory authorities for costly equipment upgrades.

Existing environmental laws and regulations may be revised and new environmental laws and regulations may be adopted or become applicable to our facilities. Increased compliance costs or additional operating restrictions from revised or additional regulation could have a negative effect on TEP's results of operations, particularly if those costs are not fully recoverable from TEP customers. TEP’s obligation to comply with the EPA’s Regional Haze Rule requirements as a participant or owner in the Springerville, San Juan, Four Corners, and Navajo, coupled with the financial impact of future climate change legislation, other environmental regulations and other business considerations, could jeopardize the economic viability of these generation facilities. Additionally, these regulations may jeopardize continued generation facility operations or the ability of individual participants to meet their obligations and willingness to continue their participation in these facilities potentially resulting in an increased operational cost for the remaining participants.

TEP also is contractually obligated to pay a portion of the environmental reclamation costs incurred at generation facilities in which it has a minority interest and is obligated to pay similar costs at the mines that supply these generation facilities. While TEP has recorded the portion of its costs that can be determined at this time, the total costs for final reclamation at these sites are unknown and could be substantial.

Federal regulations limiting greenhouse gas emissions require a shift in generation from coal to natural gas and renewable generation and could increase TEP's cost of operations.

In 2015, the EPA issued the Clean Power Plan (CPP) limiting $CO_2$ emissions from existing and new fossil-fueled generation facilities. The CPP establishes state-level $CO_2$ emission rates and mass-based goals that apply to fossil fuel-fired generation. The plan requires $CO_2$ emission reductions for existing facilities by 2030 and establishes interim goals that begin in 2022. In its current form, the CPP requires a shift in generation from coal to natural gas and renewables and could lead to the early retirement of coal-fired generation in Arizona and New Mexico within the 2022 to 2030 compliance time-frame. In 2017, the EPA issued a proposal to repeal the CPP and has not determined whether or not a replacement rule will be issued. TEP will

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continue to work with the other Arizona and New Mexico utilities, as well as the appropriate regulatory agencies, to develop compliance strategies. TEP is unable to determine whether the current CPP will remain in effect or be modified or any final CPP rule will impact its facilities until all legal challenges have been resolved and the currently required state compliance plans are developed and approved by the EPA.

FINANCIAL

Early closure of TEP's coal-fired generation facilities could result in TEP recognizing regulatory impairments or increased cost of operations if recovery of TEP's remaining investments in such facilities and the costs associated with early closures are not permitted through rates charged to customers.

Some of TEP's coal-fired generation facilities will be closed before the end of their useful lives in response to economic conditions and/or recent or future changes in environmental regulation, including potential regulation relating to greenhouse gas emissions. If any of the coal-fired generation facilities from which TEP obtains power are closed prior to the end of their useful life, TEP may need to seek recovery of the remaining net book value (NBV) and could incur added expenses relating to accelerated depreciation and amortization, decommissioning, reclamation and cancellation of long-term coal contracts of such generation facilities. As of December 31, 2017, TEP's regulatory assets balance related to its planned early generation retirement costs was $84 million.

Volatility or disruptions in the financial markets, rising interest rates, or unanticipated financing needs, could: increase TEP's financing costs; limit access to the credit or bank markets; affect the Company's ability to comply with financial covenants in debt agreements; and increase TEP's pension funding obligations. Such outcomes may negatively affect liquidity and TEP's ability to carry out the Company's financial strategy.

We rely on access to the bank markets and capital markets as a significant source of liquidity and for capital requirements not satisfied by the cash flows from our operations. Market disruptions such as those experienced in 2008 and 2009 in the United States and abroad may increase our cost of borrowing or negatively affect our ability to access sources of liquidity needed to finance our operations and satisfy our obligations as they become due. These disruptions may include turmoil in the financial services industry, including substantial uncertainty surrounding particular lending institutions and counterparties we do business with, unprecedented volatility in the markets where our outstanding securities trade, and general economic downturns in our utility service territories. If we are unable to access credit at reasonable rates, or if our borrowing costs dramatically increase, our ability to finance our operations, meet our debt obligations, and execute our financial strategy could be negatively affected.

Increases in short-term interest rates would increase the cost of borrowing on TEP's tax-exempt variable rate debt obligations of $137 million as of December 31, 2017, and increase the cost of borrowings under its credit facility. In addition, changing market conditions could negatively affect the market value of assets held in our pension and other postretirement defined benefit plans and may increase the amount and accelerate the timing of required future funding contributions.

Generation facility closings or changes in power flows into TEP's service territory could require us to redeem or defease some or all of the tax-exempt bonds issued for the Company's benefit. This could result in increased financing costs.

TEP has financed a substantial portion of utility plant assets with the proceeds of pollution control revenue bonds and industrial development revenue bonds issued by governmental authorities. Interest on these bonds is, subject to certain exceptions, excluded from gross income for federal tax purposes. This tax-exempt status is based, in part, on continued use of the assets for pollution control purposes or the local furnishing of power within TEP’s two-county retail service area.

As of December 31, 2017, there were outstanding approximately $309 million aggregate principal amount of tax-exempt bonds that financed pollution control expenditures at TEP’s generation facilities. Should certain of TEP’s generation facilities be retired and dismantled prior to the stated maturity dates of the related tax-exempt bonds, it is possible that some or all of the bonds financing such pollution control expenditures would be subject to early redemption by TEP. Of the total amount outstanding, $37 million of the principal amount of the bonds can currently be redeemed at par upon notice to holders, and $272 million of the principal amount of the bonds has early redemption dates or final maturities ranging from 2019 to 2022.

In addition, as of December 31, 2017, there were outstanding approximately $307 million aggregate principal amount of tax-exempt bonds that financed local furnishing facilities. Depending on changes that may occur to the regional generation mix in the desert southwest, to the regional bulk transmission network, or to the demand for retail power in TEP’s local service area, it is possible that TEP would no longer qualify as a local furnisher of power within the meaning of the Internal Revenue Code. If TEP could no longer qualify as a local furnisher of power, all of TEP’s tax-exempt local furnishing bonds could be subject to mandatory early redemption by TEP or defeasance to the earliest possible redemption date, and TEP could be required to pay additional amounts if interest on such bonds were no longer tax-exempt. Of the total tax-exempt local furnishing bonds outstanding, $100 million of the principal amount of the bonds can currently be redeemed at par upon notice to holders, and $207 million of the principal amount of the bonds has early redemption dates ranging from 2020 to 2023.

OPERATIONAL

The operation of electric generation facilities and transmission and distribution systems involves risks and uncertainties that could result in reduced generation capability or unplanned outages that could negatively affect TEP’s results of operations, net income, and cash flows.

The operation of electric generation facilities and transmission and distribution systems involves certain risks and uncertainties, including equipment breakdown or failures, fires, weather, and other hazards, interruption of fuel supply, and lower than expected levels of efficiency or operational performance. Unplanned outages, including extensions of planned outages due to equipment failures or other complications, occur from time to time. They are an inherent risk of our business and can cause damage to our reputation. If TEP’s generation facilities or transmission and distribution systems operate below expectations, TEP’s operating results could be negatively affected or TEP's capital spending could be increased.

TEP receives power from certain generation facilities that are jointly-owned and operated by third parties. Therefore, TEP may not have the ability to affect the management or operations at such facilities which could negatively affect TEP’s results of operations, net income, and cash flows.

Certain of the generation facilities from which TEP receives power are jointly owned with, or are operated by, third parties. TEP may not have the sole discretion or any ability to affect the management or operations at such facilities. As a result of this reliance on other operators, TEP may not be able to ensure the proper management of the operations and maintenance of the generation facilities. Further, TEP may have no ability or a limited ability to make determinations on how best to manage the changing economic conditions or environmental requirements which may affect such facilities. A divergence in the interests of TEP and the co-owners or operators, as applicable, of such facilities could negatively impact the business and operations of TEP.

TEP is subject to physical attacks which could have a negative impact on the Company's business and results of operations.

As operators of critical energy infrastructure, TEP is facing a heightened risk of physical attacks on the Company's electric systems. Our electric generation, transmission, and distribution assets and systems are geographically dispersed and are often in rural or unpopulated areas which makes it especially difficult to adequately detect, defend from, and respond to such attacks.

If, despite our security measures, a significant physical attack occurred, we could have our operations disrupted, property damaged, experience loss of revenues, response costs, and other financial loss; and be subject to increased regulation, litigation, and damage to our reputation, any of which could have a negative impact on TEP's business and results of operations.

TEP is subject to cyber-attacks which could have a negative impact on the Company's business and results of operations.

TEP is facing a heightened risk of cyber-attacks. The Company's information and operations technology systems may be vulnerable to unauthorized access due to hacking, viruses, acts of war or terrorism, and other causes. TEP's operations technology systems have direct control over certain aspects of the electric system, and the Company's utility business requires access to sensitive customer data, including personal and credit information, in the ordinary course of business.

If, despite TEP's security measures, a significant cyber or data breach occurred, the Company could have: (i) our operations disrupted, property damaged, and customer information stolen; (ii) experience loss of revenues, response costs, and other financial loss; and (iii) be subject to increased regulation, litigation, and damage to our reputation. Any of these could have a negative impact on TEP's business and results of operations.

## ITEM 1B. UNRESOLVED STAFF COMMENTS

None.

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## ITEM 2. PROPERTIES

Transmission facilities owned by TEP and third parties are located in Arizona and New Mexico and transmit the output from TEP's electric generation facilities at Four Corners, Navajo, San Juan, Springerville, Gila River, and Luna to the Tucson area. The transmission system is interconnected at various points in Arizona and New Mexico with other regional utilities. See Part I, Item 1. Business, Overview of Business of this Form 10-K for additional information regarding the transmission facilities.

TEP's generation facilities (except as noted below), administrative headquarters, warehouses and service centers are located on land owned by TEP. The distribution and transmission facilities owned by TEP are located:

- on property owned by TEP;
- under or over streets, alleys, highways, and other places in the public domain, as well as in national forests and state lands, under franchises, land easements, or other rights-of-way which generally are subject to termination;
- under or over private property as a result of land easements obtained primarily from the record holder of title; or
- over tribal lands under the grant of easement by the Secretary of the Interior or leased from Indian Nations.

Springerville is located on property held by TEP under a term patent with the State of Arizona. TEP, under separate sale and leaseback arrangements, leases a 32.2% undivided interest in the Springerville Common Facilities (which does not include land).

Four Corners and Navajo are located on properties held under land easements from the United States and under leases from the Navajo Nation. TEP, individually and in conjunction with PNM in connection with San Juan, has acquired land rights, land easements, and leases for the generation facilities, the transmission lines, and a water diversion facility located on land owned by the Navajo Nation. TEP has also acquired land easements for transmission facilities related to San Juan, Four Corners, and Navajo located on tribal lands of the Zuni, Navajo, and Tohono O'odham Nations. TEP, in conjunction with PNM and Samchully Power & Utilities 1 LLC, holds an undivided ownership interest in the property on which Luna is located. TEP and UNS Electric, Inc. (UNS Electric), an affiliate subsidiary of TEP, own a 75% and 25%, respectively, undivided interest in Gila River Unit 3. Gila River Unit 3 is situated on land owned by TEP and UNS Electric, who also own a 25% undivided ownership interest in the common facilities at Gila River as tenants in common. TEP and UNS Electric, together with the remaining 75% common facilities owners have a free and clear title of all common facilities.

TEP's rights under these various land easements and leases may be subject to defects such as:

- possible conflicting grants or encumbrances due to the absence of, or inadequacies in, the recording laws or record systems of the Bureau of Indian Affairs (BIA) and the Indian Nations;
- possible inability of TEP to legally enforce its rights against adverse claims and the Indian Nations without Congressional consent; or
- failure or inability of the Indian tribes to protect TEP's interests in the land easements and leases from disruption by the U.S. Congress, Secretary of the Interior, or other adverse claims.

These possible defects have not interfered, and are not expected to materially interfere, with TEP's interest in and operation of its facilities.

Under separate ground lease agreements, TEP leased parcels of land for the following PV facilities:

- the Solar Zone located at the University of Arizona Technology Park in Pima County, Arizona; and
- the Bright Tucson Community Solar located in Pima County, Arizona.

In addition, TEP has a 30-year easement agreement related to a PV facility in Cochise County, Arizona. The easement is to facilitate the operations of a solar PV renewable energy generation system on behalf of the Department of the Army.

See Part I, Item 1. Business, Overview of Business of this Form 10-K for additional information regarding generation facilities.

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ITEM 3. LEGAL PROCEEDINGS

TEP is party to a variety of legal actions arising out of the normal course of business. Plaintiffs occasionally seek punitive or exemplary damages. The Company believes such normal and routine litigation will not have a material impact on its consolidated financial results. TEP is also involved in other kinds of legal actions, some of which assert or may assert claims or seek to impose fines, penalties, and other costs in substantial amounts on TEP.

See Note 7 of Notes to Consolidated Financial Statements in Part II, Item 8 of this Form 10-K for additional information.

ITEM 4. MINE SAFETY DISCLOSURES

Not applicable.

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PART II

ITEM 5. MARKET FOR REGISTRANT’S COMMON EQUITY, RELATED STOCKHOLDER MATTERS, AND ISSUER PURCHASES OF EQUITY SECURITIES

Market Information

TEP’s common stock is wholly-owned by UNS Energy and is not listed for trading on any stock exchange.

Dividends

TEP declared and paid dividends to UNS Energy of $70 million in 2017 and $50 million in 2016 and 2015.

ITEM 6. SELECTED FINANCIAL DATA

The following table provides selected financial data for the years 2013 through 2017:

| (in thousands) | 2017 | 2016 | 2015 | 2014 | 2013 |
|---|---|---|---|---|---|
| Income Statement Data | | | | | |
| Operating Revenues | $1,340,935 | $1,234,995 | $1,306,544 | $1,269,901 | $1,196,690 |
| Net Income | 176,668 | 124,438 | 127,794 | 102,338 | 101,342 |
| Balance Sheet Data | | | | | |
| Total Utility Plant, Net | $3,768,702 | $3,782,806 | $3,558,229 | $3,425,190 | $2,944,455 |
| Total Assets | 4,590,249 | 4,449,989 | 4,249,478 | 4,119,830 | 3,482,860 |
| Long-Term Debt, Net | 1,354,423 | 1,453,072 | 1,451,720 | 1,361,828 | 1,213,367 |
| Non-Current Capital Lease Obligations | 28,519 | 39,267 | 55,324 | 69,438 | 131,370 |
| Other Data | | | | | |
| Ratio of Earnings to Fixed Charges [1] | 5.06 | 3.69 | 3.74 | 2.56 | 2.67 |

(1) For purposes of this computation, earnings are defined as pre-tax earnings from continuing operations before minority interest, or income/loss from equity method investments, plus interest expense and amortization of debt discount and expense related to indebtedness. Fixed charges are interest expense, including amortization of debt discount, interest on operating lease payments, and expense on indebtedness, including capital lease obligations.

See Part II, Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations for additional information.

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ITEM 7. MANAGEMENT’S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

Management’s Discussion and Analysis explains the results of operations, the general financial condition, and the outlook for TEP. It includes the following:

- outlook and strategies;
- operating results in 2017 compared with 2016, and 2016 compared with 2015;
- factors affecting our results of operations and outlook;
- liquidity and capital resources including capital expenditures, contractual obligations, and environmental matters;
- critical accounting policies and estimates; and
- recent accounting pronouncements.

Management’s Discussion and Analysis includes financial information prepared in accordance with Generally Accepted Accounting Principles in the United States of America (GAAP) financial measures. It also includes non-GAAP financial measures which should be viewed as a supplement to, and not a substitute for, financial measures presented in accordance with GAAP. Non-GAAP financial measures as presented herein may not be comparable to similarly titled measures used by other companies.

Management’s Discussion and Analysis should be read in conjunction with Part 2, Item 6, Selected Financial Data and the Consolidated Financial Statements and Notes in Part II, Item 8 of this Form 10-K. For information on factors that may cause our actual future results to differ from those we currently seek or anticipate, see Forward-Looking Information at the front of this report and Part I, Item 1A. Risk Factors for additional information.

References in this discussion and analysis to "we" and "our" are to TEP.

OUTLOOK AND STRATEGIES

TEP's financial prospects and outlook are affected by many factors including: (i) global, national, regional, and local economic conditions; (ii) volatility in the financial markets; (iii) environmental laws and regulations; and (iv) other regulatory factors. Our plans and strategies include the following:

- Achieving constructive outcomes in our regulatory proceedings that will provide us: (i) recovery of our full cost of service and an opportunity to earn an appropriate return on our rate base investments; (ii) updated rates that provide more accurate price signals and a more equitable allocation of costs to our customers; and (iii) the ability to continue providing safe and reliable service.
- Continuing to focus on our long-term resource diversification strategy, including shifting from coal to natural gas, renewables, and energy efficiency while providing rate stability for our customers, mitigating environmental impacts, complying with regulatory requirements, leveraging and improving our existing utility infrastructure, and maintaining financial strength. This long-term strategy includes a target of meeting 30% of our customers’ energy needs with non-carbon emitting resources by 2030.
- Focusing on our core utility business through operational excellence, promoting economic development in our service territory, investing in infrastructure to ensure reliable service, and maintaining a strong community presence.

Operational and Financial Highlights

For 2017, Management's Discussion and Analysis includes the following notable items:

- The ACC issued the 2017 Rate Order approving a non-fuel base rate increase of $81.5 million, a cost of equity component of 9.75%, and an equity ratio of approximately 50%. The new rates took effect on February 27, 2017.
- The Navajo Nation approved a land lease extension that allows Navajo to operate through December 2019 and decommissioning activities to begin thereafter. As a result of the planned early retirement, we transferred $52 million of the facility's NBV and other related costs to a regulatory asset.
- The FERC informed us that no further enforcement actions were necessary as the investigation related to the FERC Refund Orders had been closed. In addition, TEP and a counterparty, who had been a recipient of the time-value

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refunds in compliance with the FERC Refund Orders, entered into a settlement agreement which resulted in: (i) the counterparty paying TEP $8 million; and (ii) TEP dismissing a previously filed appeal.

- In conjunction with a generation modernization project at Sundt, we will discontinue operation of Sundt Units 1 and 2 by the end of 2020. As a result of the planned early retirements, we transferred $32 million of the facilities' NBV to a regulatory asset.
- We entered into a 20-year Tolling PPA with SRP to purchase and receive all 550 MW of capacity, power, and ancillary services from Gila River Unit 2. The Tolling PPA will allow us to continue to move toward its long-term goal of resource diversification. Our obligations under the agreement are contingent upon SRP's acquisition of Gila River Units 1 and 2, which is expected to be completed by March of 2018.
- We purchased an additional 17.8% undivided ownership interest in Springerville Common Facilities for $38 million bringing its total ownership interest to 67.8%.
- San Juan Unit 2 ceased operations in compliance with a State Implementation Plan (SIP) covering BART requirements for San Juan. TEP owns 50% of San Juan Unit 2 and applied excess depreciation reserves against the unrecovered NBV as approved in the 2017 Rate Order.

RESULTS OF OPERATIONS

The following discussion provides the significant items that affected TEP's results of operations in years ended December 31, 2017, 2016, and 2015, presented on an after-tax basis.

2017 compared with 2016

TEP reported net income of $177 million in 2017 compared with $124 million in 2016. The increase of $53 million, or 43%, was primarily due to:

- $52 million in higher retail revenue primarily due to an increase in rates as approved in the 2017 Rate Order and an increase in usage due to favorable weather;
- $21 million in higher net income due to time-value FERC ordered refunds incurred in 2016 and the reversal of accrued refunds in 2017 related to late-filed TSAs. See Note 7 of Notes to Consolidated Financial Statements in Part II, Item 8 of this Form 10-K for additional information related to late-filed TSAs; and
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