

**MINUTES
of the
SECOND MEETING
of the
WATER AND NATURAL RESOURCES COMMITTEE**

**July 26-27, 2018
Merrion Room
San Juan College School of Energy
Farmington**

The second meeting of the Water and Natural Resources Committee was called to order by Representative Matthew McQueen, co-chair, on July 26, 2018 at 9:30 a.m. in the Merrion Room of the San Juan College (SJC) School of Energy in Farmington.

Present

Rep. Bealquin Bill Gomez, Co-Chair
Rep. Matthew McQueen, Co-Chair
Rep. Gail Armstrong
Rep. Paul C. Bandy
Sen. Craig W. Brandt
Sen. Benny Shendo, Jr. (7/26)
Rep. Nathan P. Small (7/27)
Sen. Jeff Steinborn
Rep. James R.J. Strickler
Sen. Pat Woods (7/27)
Rep. Bob Wooley

Advisory Members

Sen. Pete Campos
Sen. Ron Griggs
Rep. D. Wonda Johnson (7/26)
Rep. Bill McCamley (7/26)
Sen. Cisco McSorley (7/26)
Sen. Steven P. Neville
Sen. Gerald Ortiz y Pino
Sen. William E. Sharer

Absent

Sen. Joseph Cervantes, Vice Chair
Rep. Randal S. Crowder
Rep. Derrick J. Lente
Rep. Rodolpho "Rudy" S. Martinez
Sen. Sander Rue
Sen. Mimi Stewart
Rep. Carl Trujillo

Sen. Carlos R. Cisneros
Rep. Sharon Clahchischilliage
Rep. George Dodge, Jr.
Rep. Rebecca Dow
Rep. Brian Egolf
Rep. Candy Spence Ezzell
Rep. Harry Garcia
Rep. Yvette Herrell
Sen. Stuart Ingle
Sen. Gay G. Kernan
Rep. Larry A. Larrañaga
Sen. Carroll H. Leavell
Rep. Rick Little
Sen. Linda M. Lopez
Rep. Sarah Maestas Barnes
Rep. Javier Martínez

Rep. Greg Nibert
Sen. Mary Kay Papen
Rep. William "Bill" R. Rehm
Rep. Debbie A. Rodella
Sen. Nancy Rodriguez
Rep. Angelica Rubio
Rep. Patricio Ruiloba
Rep. Tomás E. Salazar
Sen. John Arthur Smith
Sen. Peter Wirth

Guest Legislator

Rep. Rod Montoya

(Attendance dates are noted for members not present for the entire meeting.)

Staff

Shawna Casebier, Legislative Council Service (LCS)

Erin Bond, LCS

Jeret Fleetwood, LCS

Guests

The guest list is in the original meeting file.

Handouts

Handouts and other written testimony can be found in the meeting file or on the New Mexico Legislature's website at www.nmlegis.gov.

Thursday, July 26

Welcome

Representative McQueen asked members of the committee to introduce themselves.

Dr. Toni Hopper Pendergrass, president, SJC; Nate Duckett, mayor, City of Farmington; and Kim Carpenter, county executive officer, San Juan County, welcomed the committee and thanked members for coming to Farmington.

SJC's Preparations to Address the Closure of the San Juan Generating Station

Dr. Pendergrass provided the committee with an overview of SJC. She discussed the school's mission, size and economic impact on the region, which she estimates at just over \$327 million. Dr. Pendergrass went on to discuss the potential impacts to the school of closing the remaining units at the San Juan Generating Station, including lost property tax revenue, scholarships and an annual training contract with Public Service Company of New Mexico

(PNM). She also noted efforts that the college has undertaken to respond to stakeholder needs in the area, including working with area economic development organizations and various local industries to better tailor graduate skills to those necessary for the area's workforce.

Questions and comments from the committee included:

- SJC works closely with economic development entities in the region to help align the school's curriculum with the needs of area businesses and better prepare graduates to enter the workforce;
- important factors in helping foster economic development are an airport and broadband internet connectivity, and SJC is currently applying for a grant to help improve area broadband;
- the school hopes to bring back a program for solar panel installers, in part because demand for installers is expected to increase;
- once the generating station closes, SJC students and graduates will have to look for work elsewhere, which may likely mean leaving the region;
- development of outdoor recreation as an economic development tool offers some potential;
- about 1,600 jobs will be lost once the generating station closes, and the phasing out of the "hold harmless" provision of the gross receipts tax exemption on food will only magnify the negative economic impact on the area;
- the population of San Juan County has decreased since the 2010 census;
- discussion of graduation rates at local high schools and the cost of online courses and community colleges;
- SJC offers apprenticeship programs; and
- low-income housing grants offered by the New Mexico Mortgage Finance Authority could help some people in the region once the generating station closes.

Former Representative Thomas C. Taylor explained that the community needs to find a way to address the loss of tax revenue that will come as a result of the generating station closing, explaining that, once lost, it will likely not come back. He also noted that renewable energy does not generate much tax revenue.

Update on the New Mexico Energy Roadmap and Its Implementation

Daren Zigich, manager, Engineering Technology Program, Energy Conservation and Management Division, Energy, Minerals and Natural Resources Department (EMNRD), provided the committee with an overview of the development of the New Mexico Energy Roadmap. He began by reviewing the history of the roadmap, which began in 2016 when the Energy Conservation and Management Division received funding to develop it over the next two years. Mr. Zigich explained that New Mexico First had conducted the research on developing the energy roadmap, dividing it into five principle topics: energy economy diversion; moving energy; transportation; energy efficiency; and workforce and education. He also pointed out that,

in the energy industry, the lowest-cost sources usually win out over other sources, but factors such as value also influence the market.

Grant Taylor, economic policy director, New Mexico First, provided the committee with a summary of the work done by New Mexico First regarding the energy roadmap. He began by outlining the goals and strategies of each of the five topics noted by Mr. Zigich in developing the roadmap. He also discussed implementation of the roadmap, pointing out that it is a living project that will evolve over time. He explained that legislators can help with the roadmap by supporting initiatives that promote innovation and reduce waste in all energy sectors.

Theresa Cardenas, principal, Noble Renewables Group of the West, speaking on behalf of the Union of Concerned Scientists, discussed the value of the energy roadmap. She talked about the various contributors to development of the roadmap, which represent widely varying interests and incorporate many different perspectives. As a result, Ms. Cardenas said that in developing the roadmap, there were no major efforts to advance any particular solution. She also noted that the state's renewable energy portfolio standards will expire in 2020.

Questions and comments from the committee included:

- petrochemicals are the precursors to plastics and could represent an avenue for economic development in San Juan County;
- legislation being developed in conjunction with the energy roadmap includes revisions to the Efficient Use of Energy Act and the establishment of a loan program for alternative fuel vehicles;
- revision of building codes, as called for in the energy roadmap, would likely occur more through rulemaking than through statutory changes but have been a contentious issue in the past;
- electric car ownership and use are not tracked at the state level;
- the contribution, if any, to the state economy of using federal funding for railways to serve the Four Corners region and the feasibility of exporting oil and coal from the Four Corners region to other parts of the Southwest;
- the value of continued development of traditional fossil fuels, which remain subject to severance taxes and, as petrochemicals used in making plastic, pervade every aspect of modern life;
- Kit Carson Electric Cooperative was not a participant in initial development of the energy roadmap but has since reviewed the report and is currently participating in ongoing development and implementation;
- for the purposes of the energy roadmap, nuclear energy is not considered to be a renewable energy source;
- anticipated costs associated with the eventual decommissioning of the Palo Verde Generating Station, a nuclear power plant in Arizona; and
- potential exportation of natural gas to Mexico, which may need additional natural gas resources.

Representative McQueen explained that at the committee's May 15, 2018 meeting, a motion was made and passed to write a letter on behalf of the committee to the New Mexico Supreme Court questioning whether approval of the Navajo water rights settlement, without explicit legislative authorization, could be a separation of powers issue. However, he noted that upon researching the issue further, staff determined that such a letter likely represented ex parte communication between the court and a potential litigant in any case brought before the court and was therefore inadvisable.

Status Update on the Closure of the San Juan Generating Station

Tom Fallgren, vice president for generation, PNM, provided the committee with some background information and an update on PNM's closure of the remaining units at the San Juan Generating Station. He explained that closure of the plant was confirmed by PNM in a filing with the Public Regulation Commission (PRC) in July 2017 and that subsequent hearings had concluded and closure of the plant was reconfirmed. Mr. Fallgren indicated that, while a somewhat longer life cycle was estimated for the plant during initial development, a number of factors are forcing PNM to close it early. Most notable among those factors was a pricing analysis and a reduction in ownership interests from nine to five principal owners. He pointed out that closure had recently been re-analyzed, taking into account adjusted prices for natural gas and coal, as well as revisions to the federal tax code, but that it remained in PNM's best interest to retire the plant in 2022. Mr. Fallgren also said that some current owners have expressed a desire to continue operating the plant, but other owners, whose contracts have either expired or will soon expire, do not wish to do so. Mr. Fallgren went on to discuss efforts to lessen the economic impact suffered by the community by the closure of the plant, saying that one-half of the overall job loss had already happened through attrition.

Questions and comments from the committee included:

- two of the four units in the generating station have already been closed, and the remaining two will be closed in 2022;
- the PRC's acceptance of PNM's Integrated Resource Plan;
- a timetable for closure of coal mines in the area as a result of closure of the generating station;
- PNM plans to notify the PRC, by the end of December, the extent to which, if any, operation of the generating station will continue; and
- installation of pollution control units, costing hundreds of thousands of dollars, added to operating costs of the plant but was deemed necessary by PNM.

Approval of Minutes

Representative McQueen explained that for the purposes of establishing a quorum, Representative Johnson and Senator McSorley had been appointed by the speaker of the house of representatives and president pro tempore of the senate to serve as voting members for the

duration of the meeting. On a motion made, seconded and passed, the minutes of the May 15, 2018 meeting of the committee were approved as submitted.

Impacts of the Closure of the San Juan Generating Station on the Workforce, Taxes and Schools and the Coal Mine

Alicia Corbell, interim dean, SJC School of Energy, provided the committee with testimony regarding closure of the San Juan Generating Station. She began by explaining that the 2017 decision to close the still-compliant plant has accelerated the region's need to diversify its economy. Ms. Corbell noted that other studies, such as a six-county loss report, have made estimates about the impact of the plant's closure. She said that there would be an annual loss of \$117 million and almost 1,600 jobs, and she cited the use of primary source data in estimating that the average salary of a plant employee, whose average age is 46, is about \$86,000. Ms. Corbell also noted that lost wages would account for about \$57 million annually. She explained that closure of the plant would also affect direct suppliers to the plant, area philanthropy, school districts and virtually all public services.

Mark Duncan, mayor, Kirtland, noted that most of the Kirtland residents employed by the plant or ancillary industries will be forced to move away. He also noted that the tax burden of \$89 million in taxable property will fall upon remaining residents.

Randy Manning, a member of the Central Consolidated School District Board, discussed the social and legal aspects of closure of the plant. He explained that the closure of the first two units left some school children in the Aztec Municipal School District without legal representation, as parents were forced to move elsewhere for work. Mr. Manning noted that the last school bond issue had passed, adding to the property tax burden facing homeowners, although he noted that the district would never have put the bond question on the ballot had it known about the plant's planned closure.

Duane Yazzie, a farmer and community leader from Shiprock, discussed the health risks that coal mining and burning expose residents to. He also pointed out that other options are more costly than renewable energy and noted that some PNM customers had already taken steps to replace electricity generated by the plant with 100 percent renewable energy. He said that shifting to renewable energy means less water consumption, and he acknowledged the importance of the issue and the importance of balance in Navajo culture.

Robert Joe of the Office of the President and Vice President of the Navajo Nation discussed the challenges associated with the closures of the San Juan Generating Station and potentially the Navajo Generating Station in Arizona. He acknowledged that while shifting to renewable energy would lessen the carbon footprint of the generating station, the shift would not be able to replace the money and jobs that the region stands to lose. Mr. Joe emphasized the need to diversify both the region's economy and the economy of the Navajo Nation.

Anthony Peterman of the Office of the Speaker of the Navajo Nation Council explained that he had worked in the coal mines and power plants in the region and noted that shutting them down will likely break up families, as fathers will have to leave the area to chase jobs. He also noted that there have been health and environmental impacts from burning coal in homes for heat. Mr. Peterman said that the speaker of the Navajo Nation Council supports keeping the plant open but also supports a responsible transition.

Questions and comments from the committee included:

- the Navajo Nation receives a significant portion of its income from coal mining and royalty payments, which will be threatened should the generating station shut down;
- 60 percent of the Aztec Municipal School District's tax base and revenue is derived from coal;
- property owners in Aztec will have to shoulder an additional \$89 million burden to make up for lost property tax revenue;
- payment options for outstanding balances on bond issues could include having the State Board of Finance lower interest rates;
- options for keeping the generating station open and operating more efficiently;
- changes in natural gas and coal prices have made natural gas and coal uncompetitive fuel sources;
- the need for more time for the community to explore options;
- PNM spent \$150 million on pollution control for the generating station;
- abandonment costs will be paid by ratepayers;
- new plant ownership offering to operate at lower costs could mean elimination of union contracts that help ensure higher wage jobs;
- asthma and lung cancer rates in the region and the influence of the generating station on those rates;
- if the school district defaults on bond payments, the state assumes the debt; and
- the timing of the generating station's closure is a result of certain contracts expiring in 2022 and lack of desire by the plant's owners to renew those contracts.

San Juan County Economic Development and Diversification

Mike Eisenfeld, manager, Energy and Climate Program, San Juan Citizens Alliance, explained that while coal did offer more stable employment than the boom and bust cycle of oil and gas, its era is also ending, as PNM has already shut down two coal-fired units and plans to shut the remaining two down in 2022. Mr. Eisenfeld said that renewable energy sources, such as solar, wind and battery storage, are a path forward. He noted that New Mexico, including the Four Corners region, is well-positioned to produce renewable energy, pointing out that, across the Southwest, renewables are already competitive with, or cheaper than, fossil fuels. Mr. Eisenfeld also said that both the state and PNM need to lead the way toward energy diversification by committing to build renewable energy infrastructure on the site of the San Juan Generating Station, creating a transition fund to help retrain the generating station's current employees and emphasizing other economic opportunities, such as outdoor recreation.

Hank Adair, director, Farmington Electric Utility System, provided the committee with an overview of the Farmington Electric Utility System, noting its territory, customers served and energy portfolio. He discussed options for replacement of electricity once PNM closes the generating station, such as wind, pumped storage hydropower, solar, geothermal and gas. Mr. Adair also discussed the pros and cons of each source, and he discussed studies that identified a preferred portfolio, which included installing reciprocating engines in the short term, using natural gas once the generating station closes and transitioning to solar for the long term.

Warren Unsicker, chief executive officer, Four Corners Economic Development, discussed various ways to diversify the economy in the Four Corners region. He identified five strategic targets for diversification: outdoor recreation and manufacturing; agricultural value-added manufacturing; petrochemical manufacturing; retirement facilities and destination retirement; and transportation and logistics. Mr. Unsicker discussed the potential for each target and noted the urgent nature of beginning to diversify the area's economy.

Former Representative Taylor explained that community leaders began to reform economic development in the area 13 years ago when the price of oil dropped and the population in the area declined. He also noted that in researching the issue, he cannot find an energy-based economy anywhere in the world that has been able to recover from closures and market shifts.

Shantel Cooper, chair, executive board, Four Corners Economic Development, explained that community leaders are working with the best possible resources, but they need time to be able to diversify the area's economy.

Questions and comments from the committee included:

- economic development funds from the state could be used for workforce training and to attract other businesses to Farmington;
- lack of private land for solar energy farms may not be an issue if rooftops are available to use for panels;
- potential for marketing to foreign tourists;
- access to alternative forms of electricity for various communities in the area;
- use of gas to replace some of the power that coal currently generates;
- renewable resources required to meet base load and peak load demands; and
- some backup generation would likely be necessary to meet peak load demands.

Securitization

Noah Long, senior attorney, National Resources Defense Council, explained that the conversation that began during the 2018 legislative session regarding closure of the generating station has continued. He noted that most of the owners of the generating station think that it will be best to close in 2022, when some of the current contracts expire. Mr. Long said that there are three major issues that must be addressed: transitioning away from coal; the development of renewable resources; and getting a fair deal for PNM's customers. He said that no renewable

facility would be able to replace the jobs lost by the generating station's closure. Mr. Long also provided the committee with a draft of a bill on behalf of Senator Ortiz y Pino and Senator Jacob R. Candelaria, explaining that the bill, while still a work in progress, addresses the issues he outlined earlier.

Henry Monroy, director, Corporate Budget, Cost of Service and Generation Accounting, PNM, said that PNM looks forward to reviewing the bill presented by Mr. Long. He also provided the committee with a brief overview of PNM's structure, explaining that the company needs funding and incurs debt to build infrastructure, then sells power to customers to both pay back debt and realize profits for the company's shareholders. Mr. Monroy said that PNM first began to invest in facilities in the Four Corners region in the 1970s that the company was seeking securitization legislation to help recover some of that investment through models that were not traditional. He said that enabling the company to securitize its debt could be viewed as a win for everyone: PNM gets back some of its investment, shareholders forego some profit and customers enjoy lower utility rates.

Cynthia Hall, commissioner, PRC, provided the committee with an overview of the PRC's constitutional responsibilities regarding utilities. She also discussed the commission's authority over abandonments and regulatory compacts. Commissioner Hall explained how the review process works for processes such as plant closures and abandonments. She also explained that debt securitization involves a new type of bond — ratepayer obligation bonds — which involve direct borrowing by an unregulated affiliate of the utility to finance certain costs. However, she noted that the PRC does play some role in securitization through issuance of an irrevocable financing order, which appears on customers' bills and cannot be removed by future commissioners.

Questions and comments from the committee included:

- PNM must seek the approval of the PRC before changing rates;
- bond rates would be at market value;
- as PNM shuts down the generating station and seeks power from lower-cost alternatives, rates should decrease for customers;
- the PRC would stay involved in the securitization process to help ensure that customers pay the lowest possible rate;
- previous versions of the securitization bill would allow PNM to own generation and transmission facilities, but the draft bill does not have such a provision;
- the intent of the draft bill is to distribute the financial burden of lost investment in the generating station equally between ratepayers and shareholders;
- abandoning the plant is a potential option for PNM;
- building and operating a new generation facility will require PNM to seek PRC approval and would likely result in higher rates;
- the cost of power in California after the state increased its renewable portfolio standards;

- the need for renewable portfolio standards if fossil fuels are no longer competitive;
- the possibility of eventually reopening the generating station;
- the certificate of public convenience and necessity process through the PRC;
- the use of bonds would be for stranded investment costs, not cleanup;
- reclamation costs would likely be borne by ratepayers; and
- large PNM customers can opt out of renewable portfolio standards.

Public Comment

Chris Roup, a coal miner at a mine serving the generating station, thanked the committee for holding a hearing about closure of the generating station. He noted that, in the past, coal has created good jobs. Mr. Roup pointed out that he was a proud member of a union, which had helped protect his salary. He also emphasized that his job supported his family and that while he would prefer to stay in the area, closure of the generating station will likely force him to move his family elsewhere.

Orion Nightwalker Yazzie, a Navajo resident of the area, noted that his ancestors had inhabited the region for thousands of years and pointed out that while farming and ranching, particularly sheep, had always been a significant part of both the local economy and tradition, the practice has grown more difficult over the past few generations, particularly because of the effects of coal plant emissions on livestock. He encouraged the committee to fund, and follow up on, increased studies of the health effects of continued operation of coal-burning plants in the region.

Tom Soloman of 350 New Mexico said that numerous signs, as evidenced by news headlines, suggested that temperatures are indeed rising and suggested that the increase is the direct consequence of burning coal and other fossil fuels.

Sophie Shemas of the New Mexico Wildlife Federation said that she hopes that the planned closure of the generating station involves input from all interested parties and that the impact of the closure on local and state economies will be made clear to federal decision makers. She also suggested continued growth of New Mexico's outdoor recreation industry.

Gloria Lehmer, a San Juan County resident, stated the importance of diversifying the region's economy, lessening the reliance on the boom and bust cycle of fossil fuels and developing resources such as outdoor recreation and cultural sites to attract visitors to the area. She also noted that signs have been pointing toward coal not being an economic resource for some time.

Sally Burbridge, senior vice president of economic development, Four Corners Economic Development, and former mayor of Aztec, emphasized the need for more time for the region to plan for and absorb the impacts of the closure of the generating station.

Don Schreiber discussed the economic transition facing the community, saying that it is difficult to move forward without involvement from community leaders and elected officials. He said that few, if any, meetings of state policymakers had been held in the area.

Kim Smith said that, despite suggestions to the contrary, the plant was not actually closing too early for the community to be able to deal with it. In fact, she said, both PNM and the community had almost 45 years to plan for its closure. She highlighted a need for health impact studies in the region.

Daniel Tso of Torreon, which is on the eastern edge of the Navajo Nation, said that residents there had experienced health effects but that no studies had been performed, in part because of the remoteness and multi-jurisdictional geography of the area. He suggested that studies be funded to gauge the effects of oil and gas development and electricity generation on areas beyond the Four Corners region.

Recess

The committee recessed at 5:40 p.m.

Friday, July 27

Committee Discussion Regarding Carbon Fee Study (Senate Memorial 23 (2018))

Representative McQueen explained that during the 2018 session, Senate Memorial 23, which was passed by the senate, directed the appropriate interim committee to study the issue of assessing a fee on producers of carbon emissions and returning remaining balances of that fee to utility ratepayers. He noted the unusual nature of the request, pointing out that interim committees do not conduct studies, and suggested that it might be appropriate for the committee to direct a letter to the EMNRD suggesting that the department conduct the requested study and report back to the committee.

A motion was made and seconded to send a letter to the EMNRD requesting a study of carbon fee and dividend legislation. On a vote of five votes in favor and five votes against, the motion failed.

Status of Renewable Energy Transmission Capacity, Including the Use of Eminent Domain

Robert Busch, chair, New Mexico Renewable Energy Transmission Authority (RETA), provided the committee with a brief history of renewable energy projects in New Mexico, noting that the cost of delivering renewable energy has steadily decreased and is now competitive with other sources. He also said that New Mexico is closer to having a project actually enter the construction phase than at any time in the last decade. Mr. Busch cited three proposed renewable energy transmission projects currently seeking approval: SunZia, High Lonesome Mesa and Western Spirit. He then provided the committee with an overview and map of each project and went on to discuss the use of eminent domain in energy projects, explaining that it is always a

last resort. However, Mr. Busch pointed out that there would likely be no highways, sewers or prisons without the power of eminent domain.

Loralee Hunt, project development for New Mexico, SunZia Southwest Transmission Project, provided the committee with an overview SunZia's proposed transmission project. She discussed the location of the proposed line running from central New Mexico to the Palo Verde hub west of Phoenix, Arizona. Ms. Hunt also noted the potential economic benefits for New Mexico, both during construction and operation. She also discussed SunZia's work with landowners to reach agreements on location, construction, operation and continued access to the transmission lines. Ms. Hunt explained that SunZia has contacted 85 landowners and reached agreements with 73 of them, adding that many landowners were initially hostile but have since come to view the project as a potential long-term revenue source.

Ernie Torrez of the New Mexico Cattle Growers' Association explained that he came before the committee to discuss eminent domain, noting that while the state constitution and statute allow for its use, the term "public good" can be problematic and that private landowners tend to lose. He noted that fair compensation is also an issue, as land value is assessed as if it were agricultural land, despite the fact that condemned land will likely be used for industrial purposes. Mr. Torrez went on to note that landowners seeking to fight eminent domain cases in court are forced to deplete their financial resources. He also raised concerns about the SunZia project, noting that project managers imply that eminent domain may be used to condemn land as they negotiate easements, as well as concerns about the actual placement of transmission lines on land with negotiated easements. Mr. Torrez pointed out that the project will not actually provide energy to New Mexicans, as it is only to transmit power to markets in states further west. He went on to offer advice to landowners, such as specifying the exact location of lines, specifying who will be responsible for damage caused by events like fires and absolving landowners of certain liabilities.

Questions and comments from the committee included:

- the approach to transmission line easements used in Wyoming, which New Mexico could consider using;
- no special provisions exist in the RETA's eminent domain powers, as the existing Eminent Domain Code is used;
- landowners are entitled to get three appraisals on land to determine fair-market value, although a court may eventually make that determination;
- calculations on market value of land involve the land's value before and after alterations are made;
- industrial revenue bond process and payments;
- small landowners tend not to have the financial resources to negotiate fair easements;
- the appropriateness of the legislature getting involved in disputes among landowners, the RETA and SunZia;

- SunZia's plans to acquire two transmission corridors, one of which is planned to start construction in 2019 and the other possibly in 2025;
- potential economic benefits of the SunZia project to New Mexico include 94 jobs across the state and payments of about \$800,000 per year to the State Land Office;
- part of the SunZia line will be buried as it crosses White Sands Missile Range;
- once energy reaches the Palo Verde hub, it can be sold to markets in Arizona, California and Nevada; and
- not adequately funding the RETA for several years could represent a missed opportunity for New Mexico.

Renewable Portfolio Standards

Sarah Cottrell Probst, executive director, Interwest Energy Alliance, provided the committee with an overview of renewable portfolio standards, explaining that they are state policies dictating that a certain percentage of a state's electricity is generated by renewable resources. She also noted that most western and several midwestern states employ them. Ms. Cottrell Probst went on to provide the committee with a brief history of New Mexico's renewable portfolio standard. She emphasized that, while market forces have made renewable energy much more affordable, renewable portfolio standards remain an important component of energy policy.

Patrick O'Connell, director of planning and resources, PNM, noted that wind and solar energy are already staples of PNM's portfolio and suggested that policymakers begin to think about classifying other types of energy, such as geothermal, as renewable. He also said that transmission and storage deserve additional attention. Mr. O'Connell added that the majority of carbon emission reductions are because of utilities, while the transportation industry has made few strides in this area.

Michael McDiarmid, a consulting energy engineer, discussed implementation of renewable portfolio standards. He noted that about one-half of the growth in renewable energy generation in the United States can be attributed to renewable portfolio standards. He went on to discuss the various renewable energy incentives used by New Mexico, such as the wind energy program used by the EMNRD. Mr. McDiarmid went on to point out that while renewable energy projects are steadily growing across the United States and in New Mexico, the state still lags far behind several neighboring states in developing wind energy. He suggested that renewable portfolio standards be extended, financial support for the RETA be increased and energy efficiency programs be expanded.

Questions and comments from the committee included:

- renewable portfolio standards are intended more for investor-owned utilities than other providers, such as rural electric cooperatives;
- PNM's standards involve the total amount of energy sold to its customers;
- hydroelectric power is one of the most economical forms of energy, with significant amounts of storage already built;

- options for storage of renewable energy include chemical and hydraulic options;
- California represents a vast energy market for which New Mexico can develop wind resources to sell;
- the energy industry is highly regulated, so statutory incentives are not always necessary to encourage development of renewable energy;
- PNM will derive 20 percent of its total portfolio from renewable sources by 2020, although the company has been able to generate about 50 percent from renewable sources on certain days;
- raising renewable portfolio standards could have unintended consequences;
- development of demand-side energy management;
- some incentives for resources such as geothermal may still be necessary to encourage their development;
- per-kilowatt costs of coal, wind, solar and natural gas; and
- costs of operating a facility around the clock versus one that generates renewable energy on an intermittent basis.

Community Choice Energy (CCE)

Ty Tosdal, an attorney with the Tosdal Law Firm, provided the committee with an overview of CCE, explaining that it is a nonprofit energy provider that can meet community goals, provide consumer choice and enhance local control. He noted that seven states use CCE, including 2.5 million accounts in California. Mr. Tosdal discussed the organizational structure of CCEs, as well as customer programs available. He also discussed average monthly rates for CCEs versus more traditional, for-profit utilities, noting that CCE rates tend to be lower. Mr. Tosdal added that state legislatures can play a role in CCEs by passing legislation authorizing the creation of CCE programs.

Gill Sorg, council member, City of Las Cruces, discussed the energy portfolio for the city, noting that it has managed to reduce costs and save almost \$1 million. He also said that Las Cruces plans to reach its goal of 100 percent of its electricity from renewable energy sources by 2050 but that the city needed more options to be able to do so. He suggested that the legislature consider authorizing CCE programs to give cities like Las Cruces additional options.

Athena Christodoulou, president, New Mexico Solar Energy Association, discussed renewable energy trends across the country, noting that New Mexico lags behind many other states despite its considerable renewable resources. She pointed out that New Mexico is the only southwestern state not to rank in the top 10 states in solar energy generation. Ms. Christodoulou went on to say that authorizing CCE programs could be an economic engine for New Mexico while also offering cleaner electric power at lower prices than traditional utility companies. For example, she noted that CCEs could foster solar projects, such as rooftop solar, solar farms and electric vehicle charging stations. She pointed out that New Mexico does not rank in the top 10 states in electric vehicle charging stations, while Texas and Colorado both do.

Questions and comments from the committee included:

- most CCE models do not save consumers much more than one to three percent over traditional utilities, as they tend to be financially cautious;
- maintenance of power grids under CCE models;
- grid upgrades are made by utilities and paid for through transmission fees charged to CCE providers;
- renewable portfolio standard numbers refer to retail power sales;
- real estate costs in California contribute to the overall cost of renewable resources;
- customers can walk away from CCE agreements if they are not satisfied with their savings;
- electric cooperatives function similarly to utilities but tend to serve more of a distribution function;
- the attraction of CCEs is consumer choice; and
- separating transmission from generation.

Adjournment

There being no further business, the committee adjourned at 1:30 p.m.