

OREGON

Public Utility Commission

PacifiCorp IGCC Working Group Meeting

Oregon on IGCC- Related Issues

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State Policy on CO₂

- **Oregon Legislature has not adopted a policy**
- **West Coast Governors' Agreement outlines 36 actions that will be taken to curb global warming emissions**
- ***Oregon Strategy for Greenhouse Gas Reductions* submitted by Governor's Advisory Group on Global Warming in December 2004**
- **Governor Kulongoski adopted the goals recommended by the Advisory Group**
 - Arrest growth of emissions by 2010
 - 10% reduction below 1990 levels by 2020
 - 75% reduction below 1990 levels by 2050

State Policy on CO₂ (cont.)

- **Oregon is implementing recommended policies**
 - Oregon DEQ adopted the California motor vehicle greenhouse gas standards.
 - The 2005 Oregon Legislature adopted appliance energy efficiency standards for 11 products not covered by federal standards (9 were later superseded by federal standards). State standards remain for external power sources and lighting fixtures.
 - A Governor's Task Force is exploring and designing a load-based, carbon emission cap standard for Oregon electricity suppliers. Recommendations are due this fall.
- **The Governor recently established a Climate Change Integration Group to:**
 - Oversee implementation of recommendations by 2004 Advisory Group
 - Assess current state of knowledge about the sensitivity, adaptive capacity, and vulnerability of natural and human systems to global warming
 - Make recommendations about how the state can adapt to unavoidable changes

State's Views on Coal

- **Energy policy of the state of Oregon (ORS 469.010)**
 - “Continued growth in demand for nonrenewable energy forms poses a serious and immediate, as well as future, problem. It is essential that future generations not be left a legacy of vanished or depleted resources, resulting in massive environmental, social and financial impact.”
 - “It is the goal of Oregon to promote the efficient use of energy resources and to develop permanently sustainable energy resources.... It is, therefore, the policy of Oregon ... [t]hat development and use of a diverse array of permanently sustainable energy resources be encouraged....”
- **The Governor proposes a Renewable Portfolio Standard for consideration by the 2007 Legislature**
 - 25% by 2025, based on energy (not capacity)
 - The Governor’s Renewable Energy Working Group is developing proposed design
 - If renewable energy covers Oregon’s load requirements, what is coal’s role?

Oregon Commission's Views on Coal

- **Commission considers the financial risk to utilities from future regulation of pollutants such as CO₂**
- **Since 1989, utilities have been required to include environmental costs in the cost of any resource in their long-term supply plans. (Order No. 89-507)**
 - “The result of the process is the selection of that mix of options which yields, for society over the long run, the best combination of expected costs and variance of costs.”
 - “...[A] utility should include in the cost of a resource all costs that will or may be internalized, *i.e.*, those costs, such as the costs of pollution control and wildlife mitigation, which will be charged to the utility and its customers.”
- **Since 1993, scenario analyses have been required using costs per ton of CO₂ emissions at zero, \$10, \$25 and \$40, in 1990 dollars. (Order No. 93-695)**
- **The Commission will soon be revising its requirements for IRPs and may adjust CO₂ adders.**

Commission's Views on Coal (cont.)

- **The Commission did not acknowledge acquisition of a pulverized coal plant for PacifiCorp's last two IRPs.**
- **New order on competitive bidding (No. 06-446)**
 - “Selection of the final short-list of bids should be based, in part, on the results of modeling the effect of candidate resources on overall system costs and risks. The portfolio modeling and decision criteria used to select the final short-list of bids must be consistent with the modeling and decision criteria used to develop the utility's acknowledged IRP Action Plan.”
 - “...[W]e expect the utility to apply the same analytical approach and judgment in selecting the final short-list as it did in developing its acknowledged IRP Action Plan. For example, it should apply the same tradeoff between cost and risk in the bid process as it did in the IRP, and not simply focus on expected cost at the acquisition stage.”

Commission's Views on Coal (cont.)

- **Order on PacifiCorp's 2004 IRP (No. 06-029)**
 - “While it is impossible to predict CO₂ regulatory costs over the expected life of a new coal plant, all parties commenting in this proceeding, including PacifiCorp, recognize the associated uncertainties and risks for ratepayers. That makes an IGCC plant, with the ability to later add CO₂ sequestration, an attractive option....”
 - “[T]he Commission does not acknowledge the choice of one fuel type, gas or coal, over another.... Our decision does not mean that it would be imprudent to choose a gas-fired CCCT or a pulverized coal plant. It simply means that we cannot conclude, based on the information before us, that it is reasonable to commit to either one of these resources without additional analysis.”
 - “Coupled with reasonable measures that could be taken to avoid outages (e.g., additional short-term purchases, demand response programs and distributed resources), analysis of the coal plant delay scenarios indicates that it may be reasonable to wait a couple of years until IGCC technology is further developed before the Company commits to its next large thermal resource.”

Commission's Views on Coal (cont.)

- **Advanced Coal Workshop on May 24th co-sponsored by Oregon, Washington and California Commissions**
 - Covered technologies and policies related to IGCC power plants and carbon capture and storage
 - Commissioners and staff from other states in the West participated
 - “For many years now, we’ve been including in our decision-making the financial risk of ... resources that are harmful to the environment. Given the mounting concerns about climate change, we’re at the point today where we should not be making any long-term bets on coal plants unless they’re designed to capture and sequester carbon emissions in the future.”
– *Lee Beyer, Chairman, Oregon Public Utility Commission*
- **“Joint Commitments” on climate change under development for the three Commissions**

IGCC Cost Recovery Issues

- **PacifiCorp should evaluate the cost/risk tradeoff for IGCC vs. other resource options in its 2006 IRP**
 - Staff and parties will have an opportunity to comment
 - Commission can consider the matter in its acknowledgment order
- **PacifiCorp should review the cost/risk tradeoff during its 2012 RFP process**
 - The Oregon Commission will review the company's proposed evaluation process when considering RFP approval
 - The updated competitive bidding guidelines provide a new "acknowledgment" process for the company's final short-list of bids (prior to negotiations)

IGCC Cost Recovery Issues (cont.)

- In the 2006 IRP and 2012 RFP processes, PacifiCorp should address uncertainty about IGCC cost and performance, including ways to mitigate risks through studies, plant design and performance guarantees.
- PacifiCorp should address feasibility of CO₂ sequestration (including transport options) for the specific site under consideration.

IGCC Cost Recovery Issues (cont.)

- **The Oregon Commission has discretion to include in rates the cost of studies for an IGCC plant if the costs are reasonably related to the resource the utility acquires. The Commission must conclude that the utility was prudent in considering an IGCC plant and that such consideration was part of an overall process of acquiring the resource.**
- **PacifiCorp should consider whether it will be able to recover in rates future regulatory costs of CO₂ emissions for new pulverized coal plants under possible scenarios.**

IGCC Cost Recovery Issues (cont.)

- **Types of proceedings related to cost recovery**
 - Acknowledgment of IRP and RFP final short-list
 - Acknowledgment is defined in Order No. 89-507
 - Seems reasonable, based on information provided to the Commission at the time
 - Favorable rate-making treatment is not guaranteed
 - Declaratory ruling
 - Parties stipulate to the facts
 - Examples include Trojan and NW Natural pipeline to Coos Bay
 - Rate case

IGCC Cost Recovery Issues (cont.)

- **Resource rate plan (ORS 757.212)**

- A plan by a public utility to construct a generating plant or to enter into a wholesale power purchase or sales agreement with a term longer than one year
- Establishes revenue requirement treatment of new resource over the term: If based on construction of a generating plant, the plan must state how the Commission will reflect the costs and revenues in the utility's rates during all or a portion of the expected useful life of the plant.
- *Legal issue:* Binds future Commission rate treatment of resource. If the Commission approves a resource rate plan, the Commission may not thereafter review the costs and rates specific to the plan, or other obligations of the utility under the plan (including any complaint), except for the purpose of determining whether the utility is in compliance with the plan.
- Statute is untested.

IGCC and Competitive Bidding

- The RFP process is a “means to promote and improve the resource actions identified in the utility’s IRP ... Action Plan.” Goals include “minimiz[ing] long-term energy costs.”
- The RFP should reflect changes since the IRP due to passage of time or events. Changes may be simple or dramatic.
- The Commission’s competitive bidding guidelines allow Benchmark Resources — site-specific, self-build options. The draft 2012 RFP includes an IGCC Benchmark Resource in 2014.

IGCC and Competitive Bidding (cont.)

- **Bidding guidelines allow exceptions to the RFP requirement for:**
 - Emergencies
 - A time-limited resource opportunity of unique value to customers
 - An alternative acquisition method in an acknowledged IRP
 - A Commission waiver on a case-by-case basis

IGCC Ready on Commercial Scale?

- **The company must make that determination.**
- **The company should fully explore performance guarantees to reduce performance risks.**
- **Commercial-readiness should be vetted in the 2006 IRP and 2012 RFP processes.**
 - “We ...expect the Company to fully explore whether delaying a commitment to coal until IGCC technology is further commercialized is a reasonable course of action. We believe it may be possible to do so within the RFP process by providing flexibility for bidders regarding online date, contract length, resource type and technology.” (Order No. 06-029)

Treatment of IGCC By-products

- **To the extent the IGCC plant included in customers' rates enables sales of by-products, revenues should be credited to customers.**

More Information

Related Links:

Oregon Public Utility Commission orders:

<http://apps.puc.state.or.us/edockets/ordselct.asp>

Governor's Carbon Allocation Task Force:

egov.oregon.gov/ENERGY/GBLWRM/CATF.shtml

Governor's Renewable Energy Working Group:

egov.oregon.gov/ENERGY/RENEW/REWG.shtml

Oregon Strategy for Greenhouse Gas Reductions:

egov.oregon.gov/ENERGY/GBLWRM/Strategy.shtml

Governor's Principles and Priorities for Global Warming:

www.governor.oregon.gov/Gov/GNRO/global_warming_energy.shtml

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