Ferguson: Energy Matters

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Summer 2007 Natural Gas Update

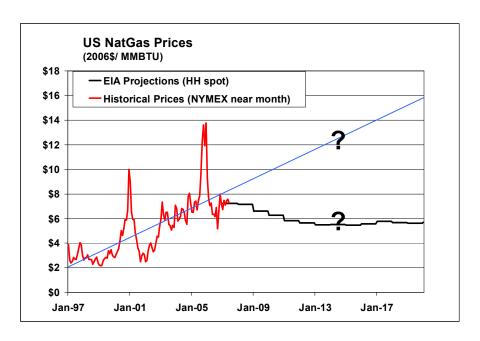
U.S. natural gas markets are expecting another surfeit of gas in storage by the beginning of the heating season in November, and gas prices are dropping accordingly. Storage levels for the week ending July 6 stood at 2,627 billion cubic feet, only 64 bcf lower than last year's record for the date. Total storage capacity is about 4,000 bcf, and at the current rate of increase this limit will be tested before withdrawals begin this winter.

Gas prices are dropping in response to the storage reports. The NYMEX front month contract closed July 11 at \$6.60/MMBtu, down substantially since reaching \$8.19/MMBtu in early June. As I write this, the gas price is dropping still farther in response to the bearish storage report issued July 12.

This year looks like a repeat of last—high levels of gas in storage tending to depress prices, while near-record crude oil prices provide support. U.S. crude oil prices are again approaching the \$77/barrel peak reached last August.

It is not yet clear what accounts for the large amounts of gas going into storage this year. Weather this spring has been about the same as last year. However, since May 2007, nearly 200 bcf more gas has gone into storage compared to the same period last year. Data are not yet available to tell us why—either gas supplies have increased or industrial demand has decreased or both. My guess is that supply has increased a bit this year over last.

The long-term gas price outlook remains controversial. Over the last decade, gas prices have increased about 300 percent when adjusted for inflation (see chart.) When I make projections, I usually assume that changes in the past will continue into the future, more or less. Such a projection would indicate that gas prices 10 years hence could reach about \$14/MMBtu, as the chart indicates.



The Energy Information Administration, however, assumes that gas prices will *decline* over this time and stabilize under \$6/MMBtu. The EIA projection is based on the notion that Saudi Arabia will pump much more oil in the future, lowering crude prices and taking gas prices down, too.

Which gas price projection to use for electricity planning is obviously a matter of some importance, as I argued at an Energy Commission workshop this week. If you believe the EIA projection, electricity from gas-fired power plants will get cheaper. If you believe the linear projection, we should *not* be investing in additional gas plants.

Unfortunately, the risk of guessing wrong falls entirely on consumers since the price of gas to run power plants is passed directly through in rates. What should the Energy Commission advise?

At the workshop, I suggested that the risk of any chosen long-term gas price projection could be monetized. That is, the state should try to buy an insurance policy that would provide a firm gas price on which policy decisions could be made. Commissioner John Geesman opined that we would get no offers for such insurance. He believes that the risk to any guarantor would be too great and too uncertain for anyone to take it on at any price.

"What does that tell us?" he asked. Every time we approve a new gas-fired power plant we are putting additional risk on consumers that even a Goldman Sachs wouldn't touch.

I admitted that in the absence of firm long term gas prices, there is no objective basis for comparing future costs of gas-fired electricity to non-fossil generation. In my opinion, prudency requires that we assume future gas prices will look more

like the linear projection than the optimistic EIA low-ball forecast. EIA's underlying reliance on the Saudis to keep prices low seems especially foolhardy.

So it's up to the commissioners to decide how much gas price risk consumers should be forced to accept. That's what they get paid for, I suppose. Let's hope they keep their heads out of the Saudi sand.

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