Core Gas Hedging Program

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Introduction

The goal of PSE's natural gas hedging program is to balance the benefit of customer protection from market volatility with the costs of hedging

PSE has made two big changes in recent years to improve its hedging program and incorporate guidance from the Commission policy statement

- 2013 PSE adjusted hedging volumes and included fixed price call-options to increase its flexibility to lower hedge costs

- 2017 PSE adjusted programmatic hedging volumes and incorporated risk-responsive strategies to align with policy statement goals

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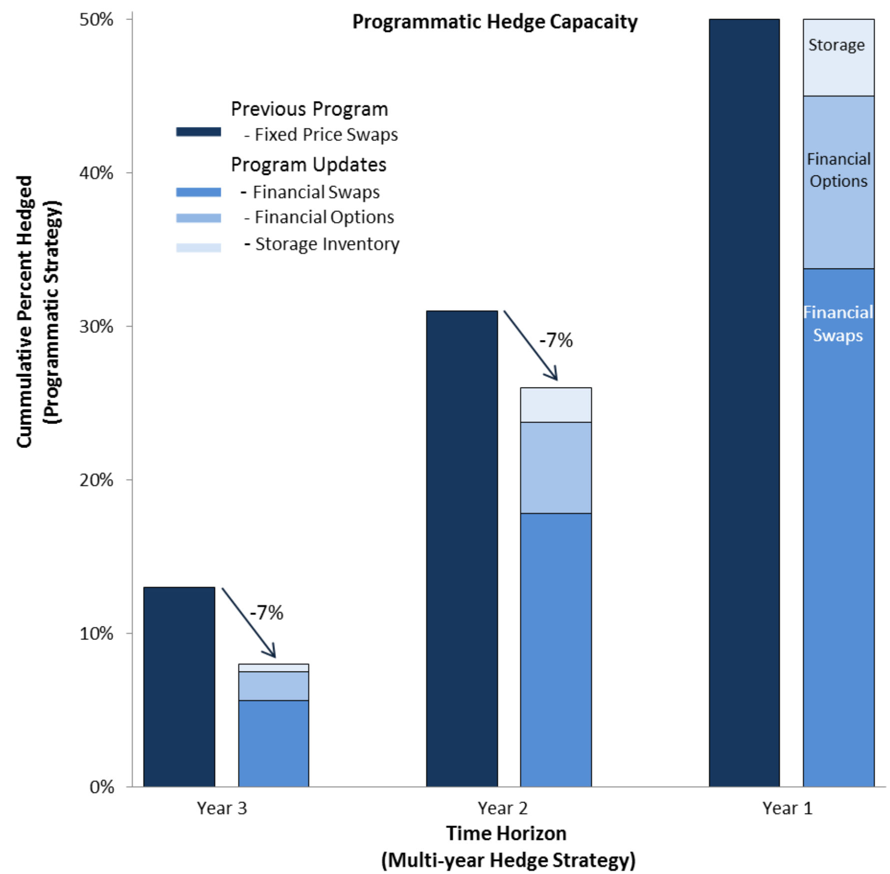
What has happened since 2012?

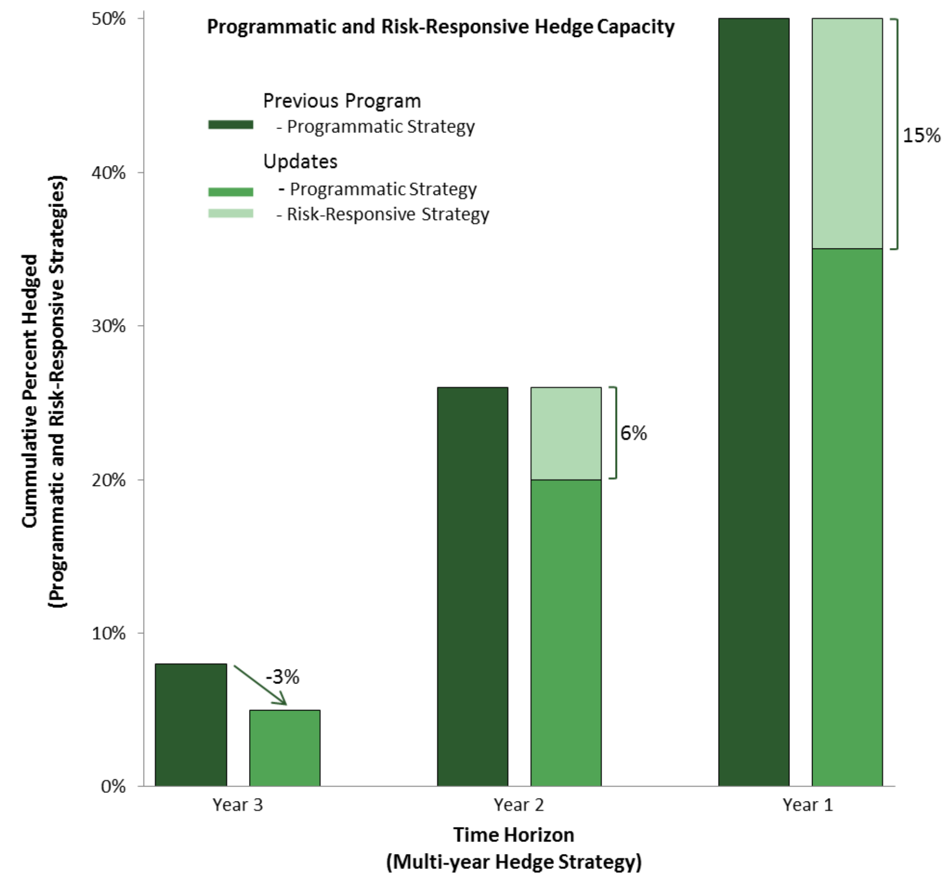
- 2013 Updates
  - Reduced programmatic hedging volume in years 2 and 3 of our multi-year strategy
  - Reduced winter hedge volume by integrating storage inventory into the strategy
  - Included the use of fixed price call options as a hedging instrument
- Benefits
  - Reduced the exposure to higher hedge premiums in the forward natural gas market
  - Improved integration of storage resources into the hedging strategy
  - Option premiums reduce the variability to hedge costs



* Illustrative Winter Example

Recent Strategy Updates

- 2017 Updates
  - Reduced programmatic hedging volume from 50% to 35%
  - Added a risk-responsive strategy with capacity of 15%
    - Risk-responsive hedging is a risk managed approach, triggering hedges based on the potential for price changes
- Benefits
  - Reduced programmatic hedge volume lowers potential hedge costs
  - Hedges executed on a risk-view, added only when necessary
  - The addition of a risk-responsive strategy provides equivalent hedging capacity to the prior program



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PSE's Current Approach to Hedging

1. Programmatic Strategy (Updated)
   - Dollar cost averaging approach
   - Hedges added consistently over approximately a three year time horizon
   - Provides cost stability, reducing the effects of price volatility on the portfolio
2. Risk-Responsive Strategy (New)
   - Measures and monitors market price risk
   - Hedges added in response to the risk of price change
   - Hedges added over a two-year time horizon
3. Low Price Strategy (Existing)
   - Opportunistic, taking advantage of low prices resulting from near term market fundamentals
   - Hedge capacity triggered in response to lower market prices
   - Hedges added over a shorter, 12–18 month time horizon