America's Natural Gas Market Challenge

American Gas Association

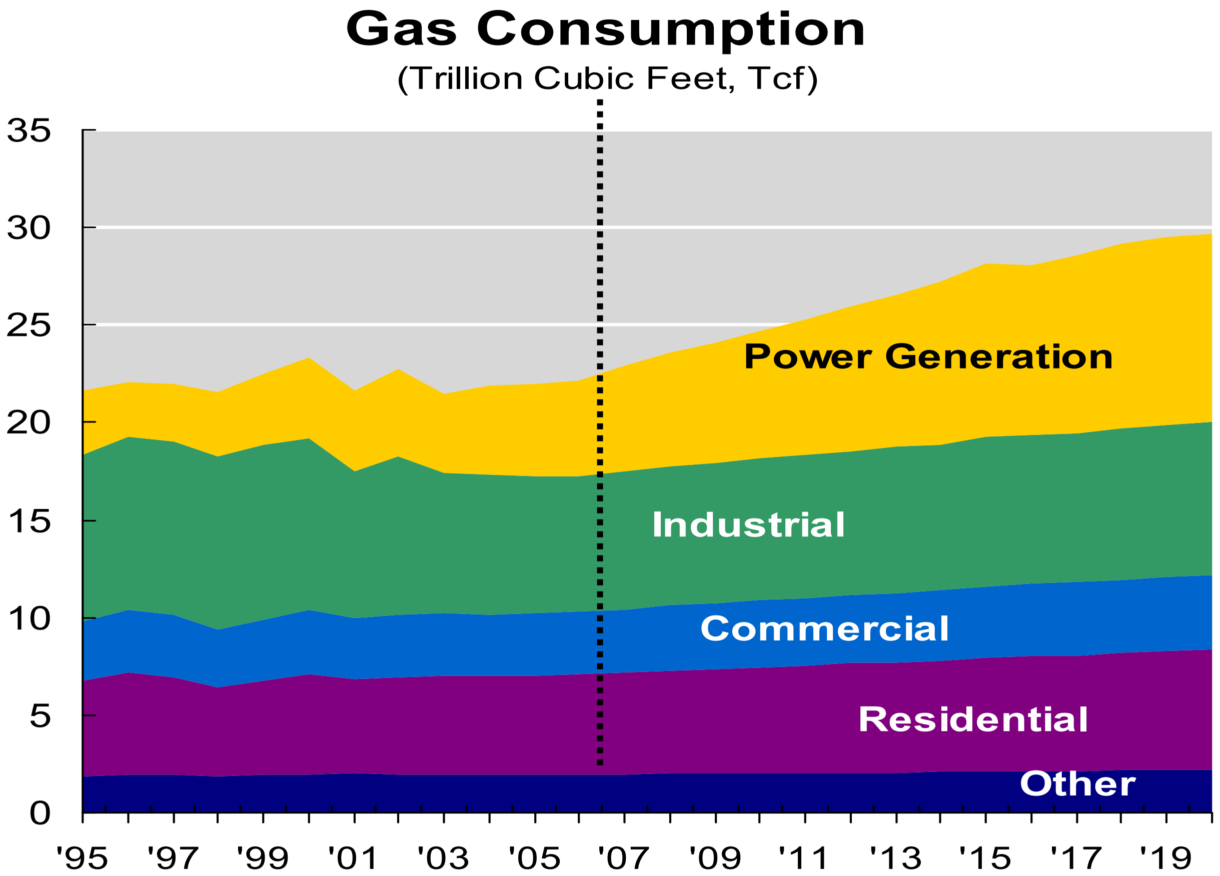
2004

American Gas Association

North American Gas Market

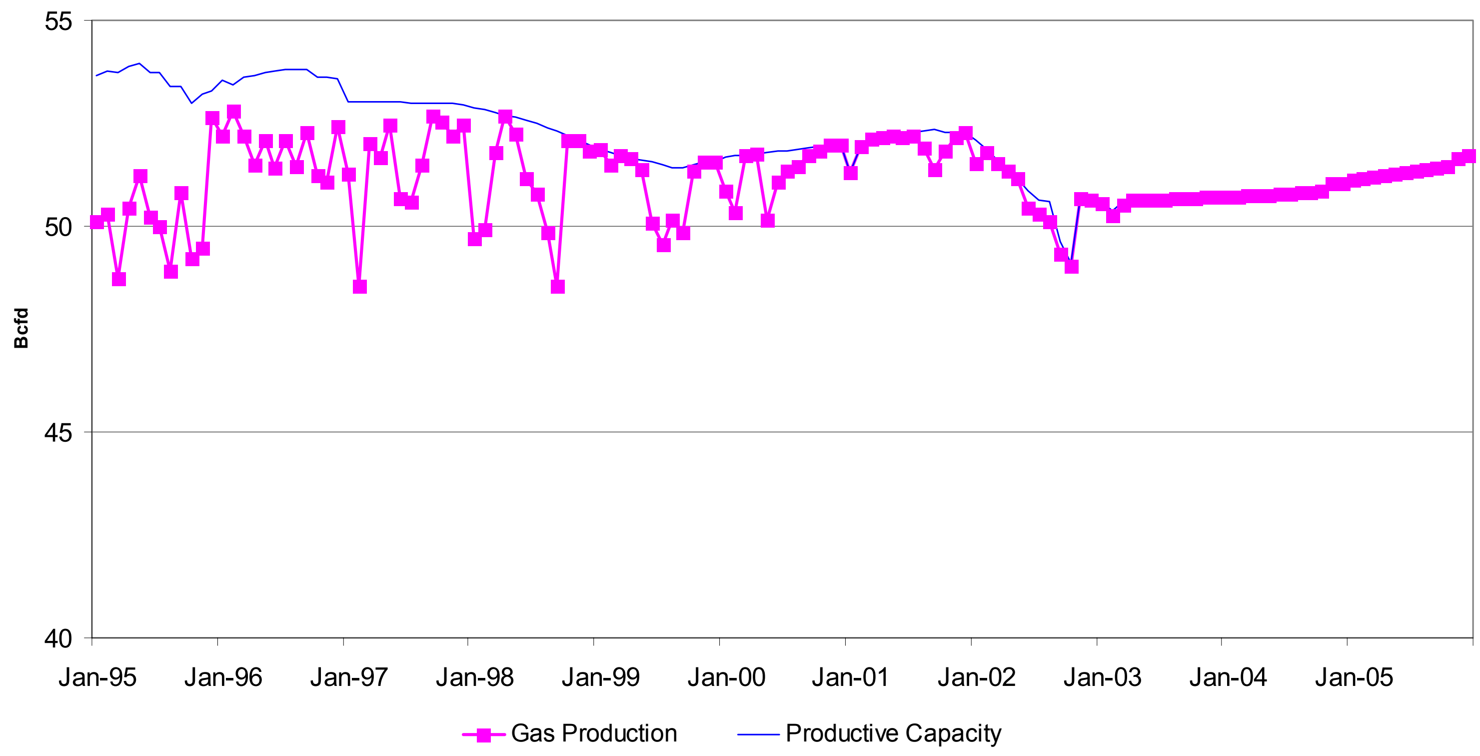
- North American supply/demand balance is and will remain tight.
- Gas consumption grows.
- Gas prices remain relatively high.
- High levels of price volatility continue.

Gas Demand Outlook



Source: Energy and Environmental Analysis (EEA)

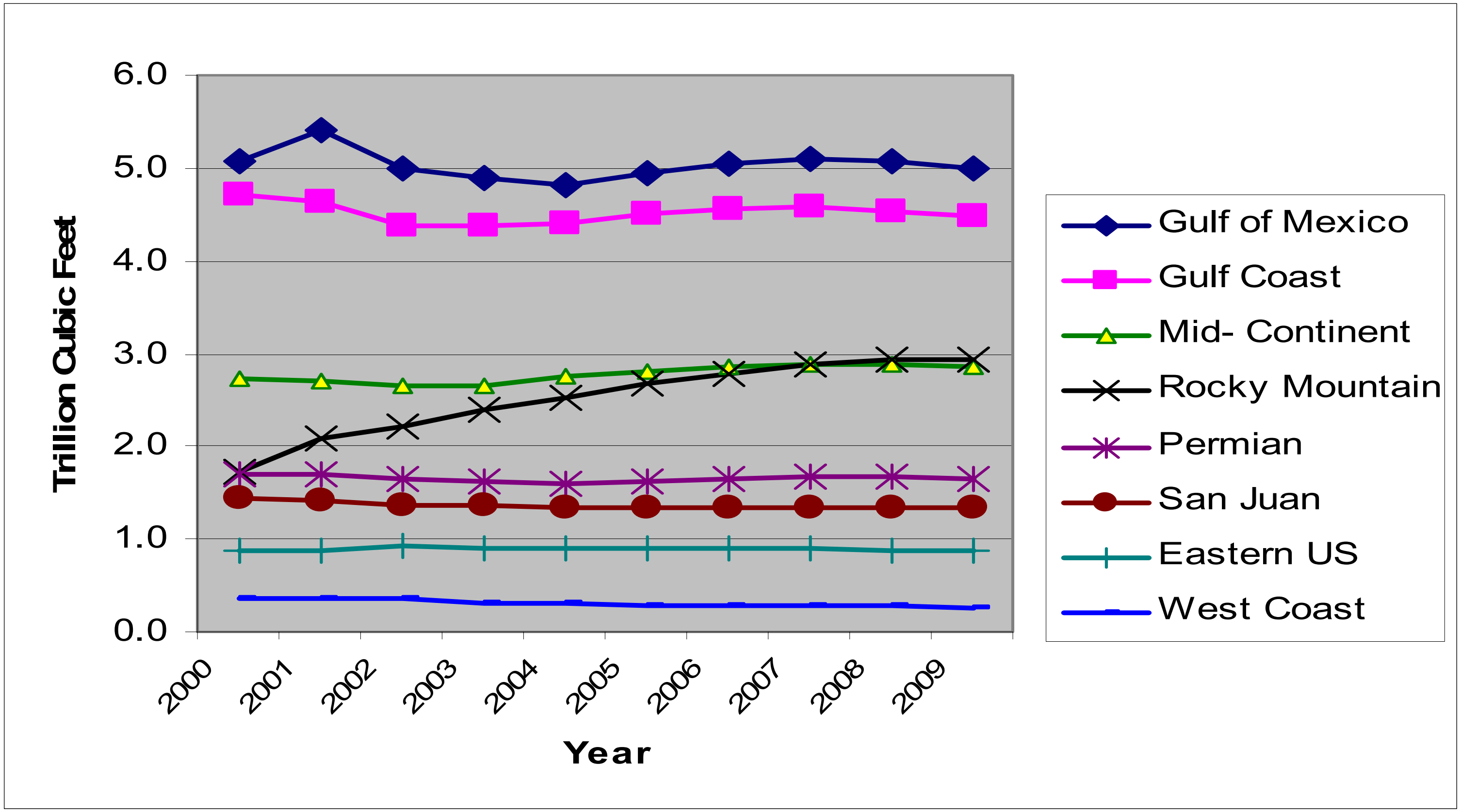
Lower-48 Dry Gas Production vs Dry Gas Productive Capacity



AGA American Gas Association

Source: Energy and Environmental Analysis

Lower-48 Annual Gas Production By Region 2000-2009

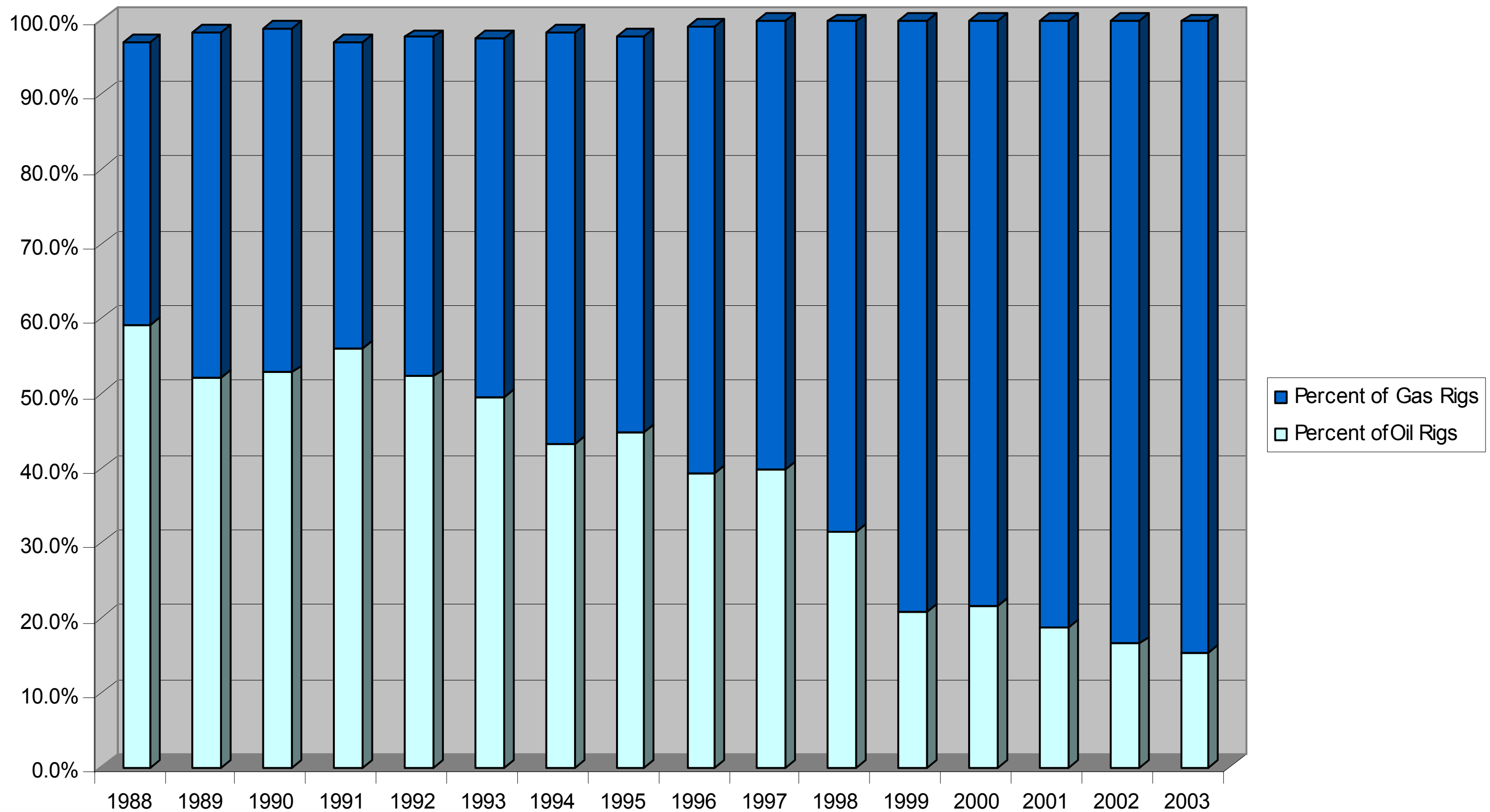


Source: Lippman Consulting, Inc., AGA

American Gas Association

U.S. Annual Percentage of Gas vs. Oil Rigs Operating

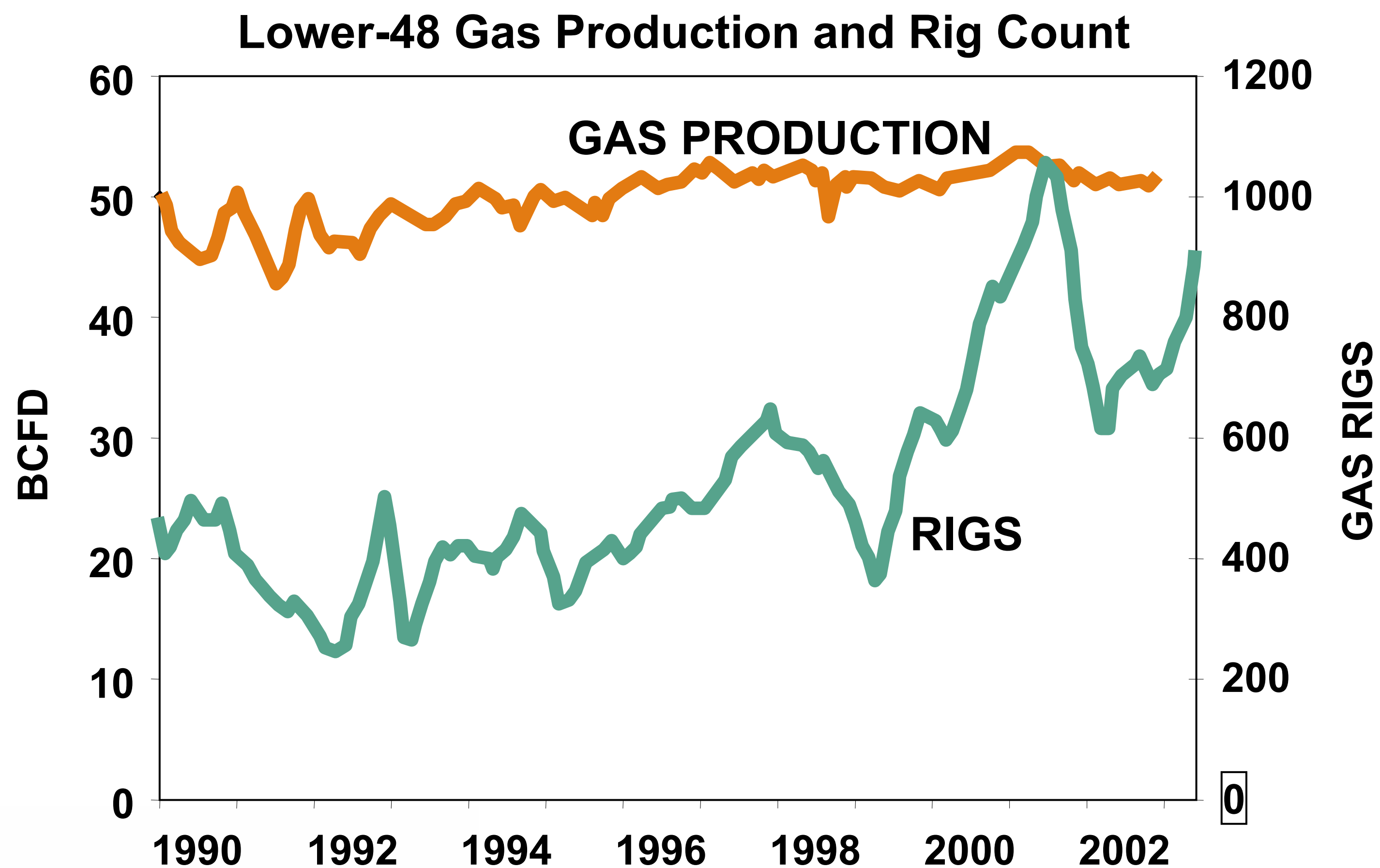
Source: Lippman Consulting, Inc.



American Gas Association

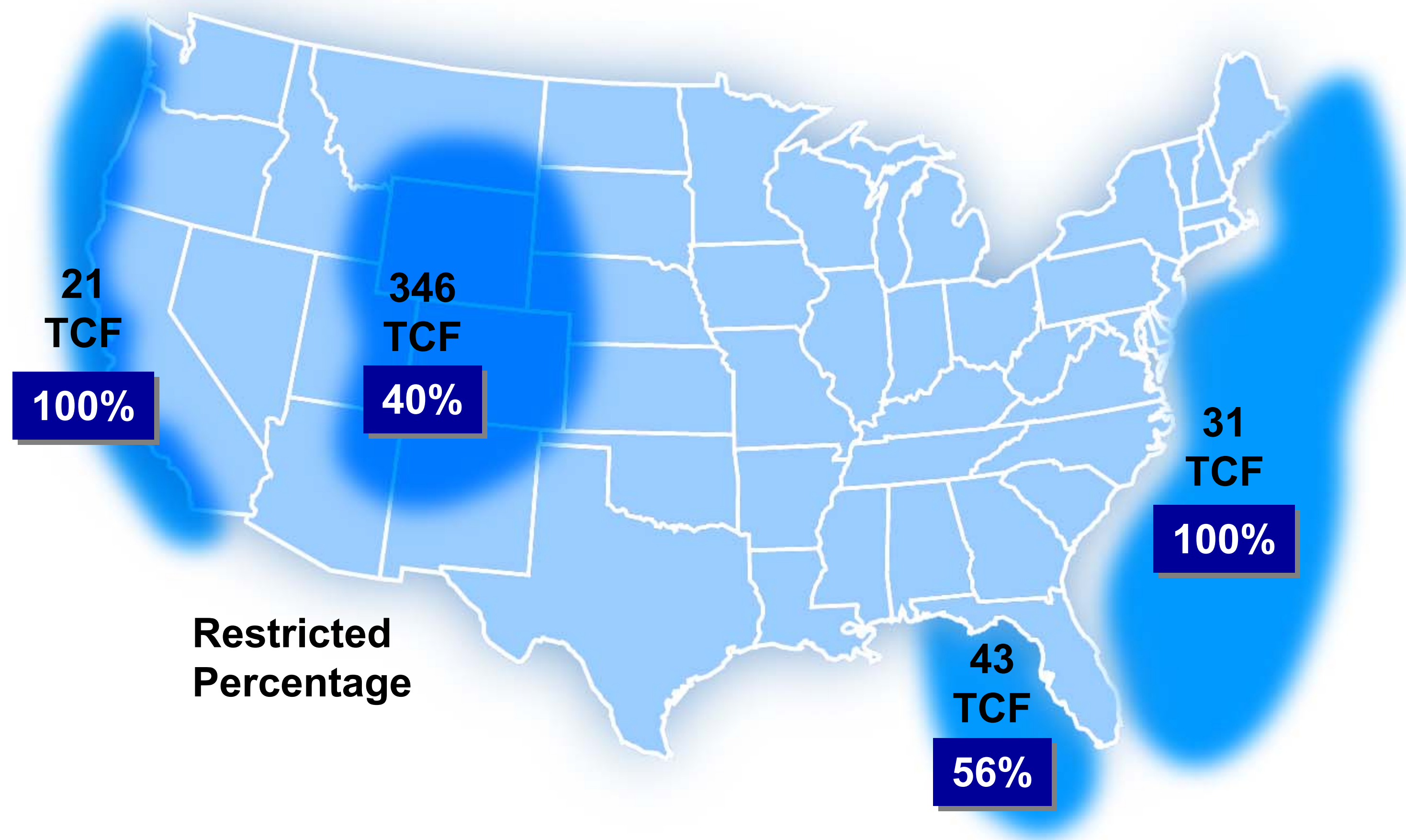
Production Response From Increased Drilling Has Been Modest

(NPC 2003)



American Gas Association

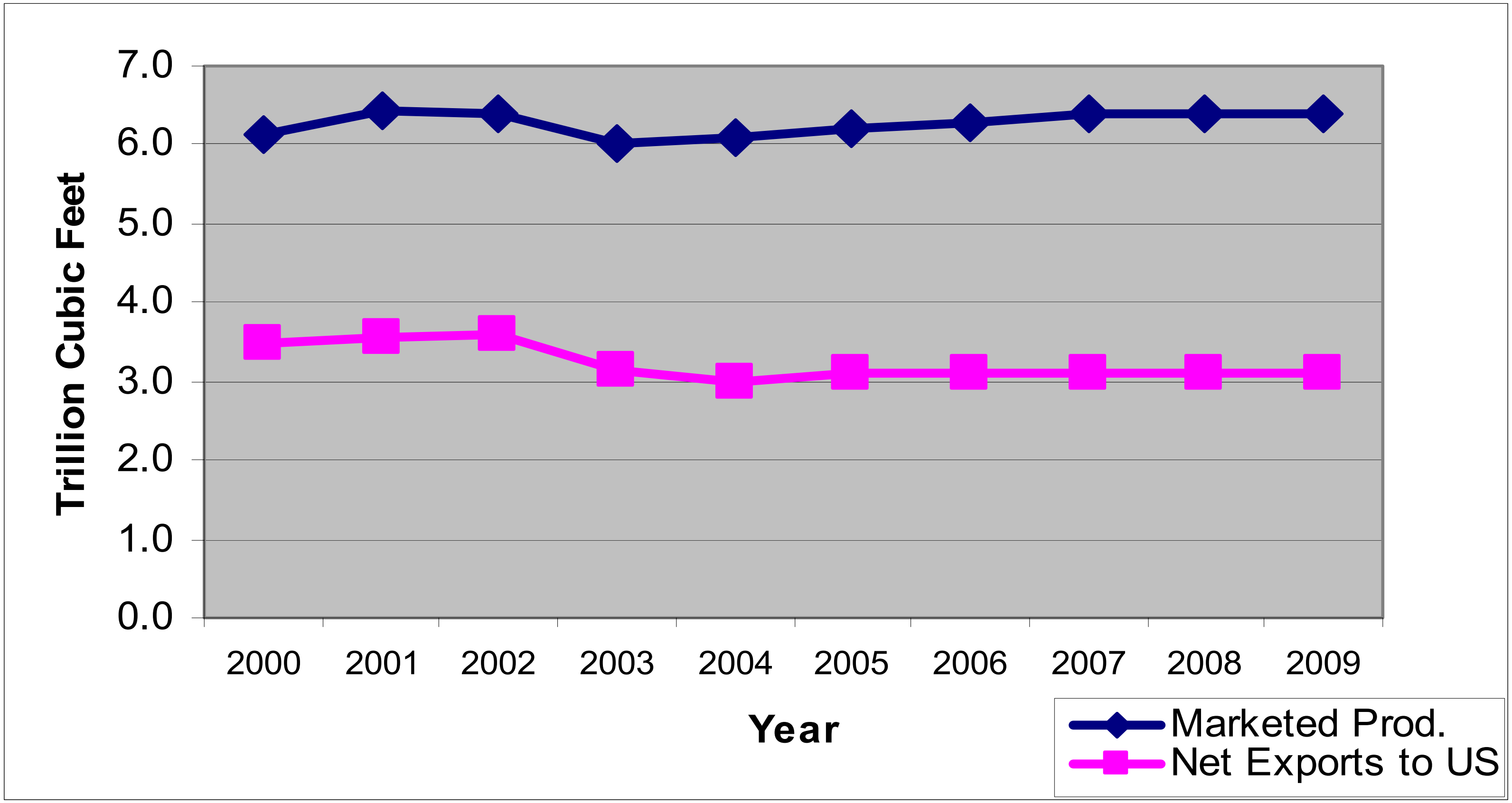
Major Portions of the Gas Resource Base Are Not Accessible



Approximately 29 trillion cubic feet (TCF) of the Rockies gas resources are closed to development and 108 TCF are available with restrictions.

AGA American Gas Association

Canadian Marketed Production And Net Exports to US 2000-2009



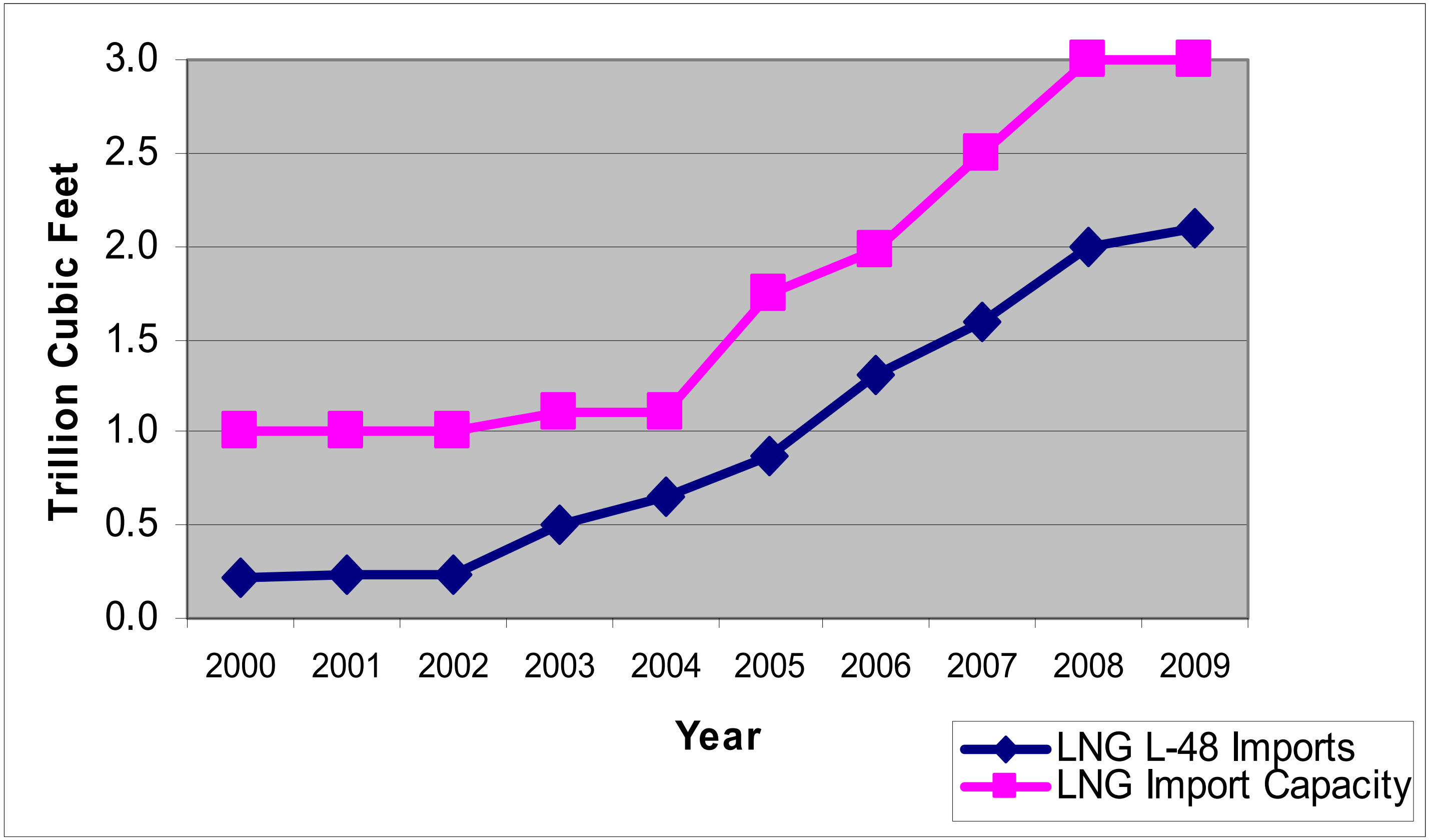
American Gas Association

New Supply Must Come From New Areas…

American Gas Association

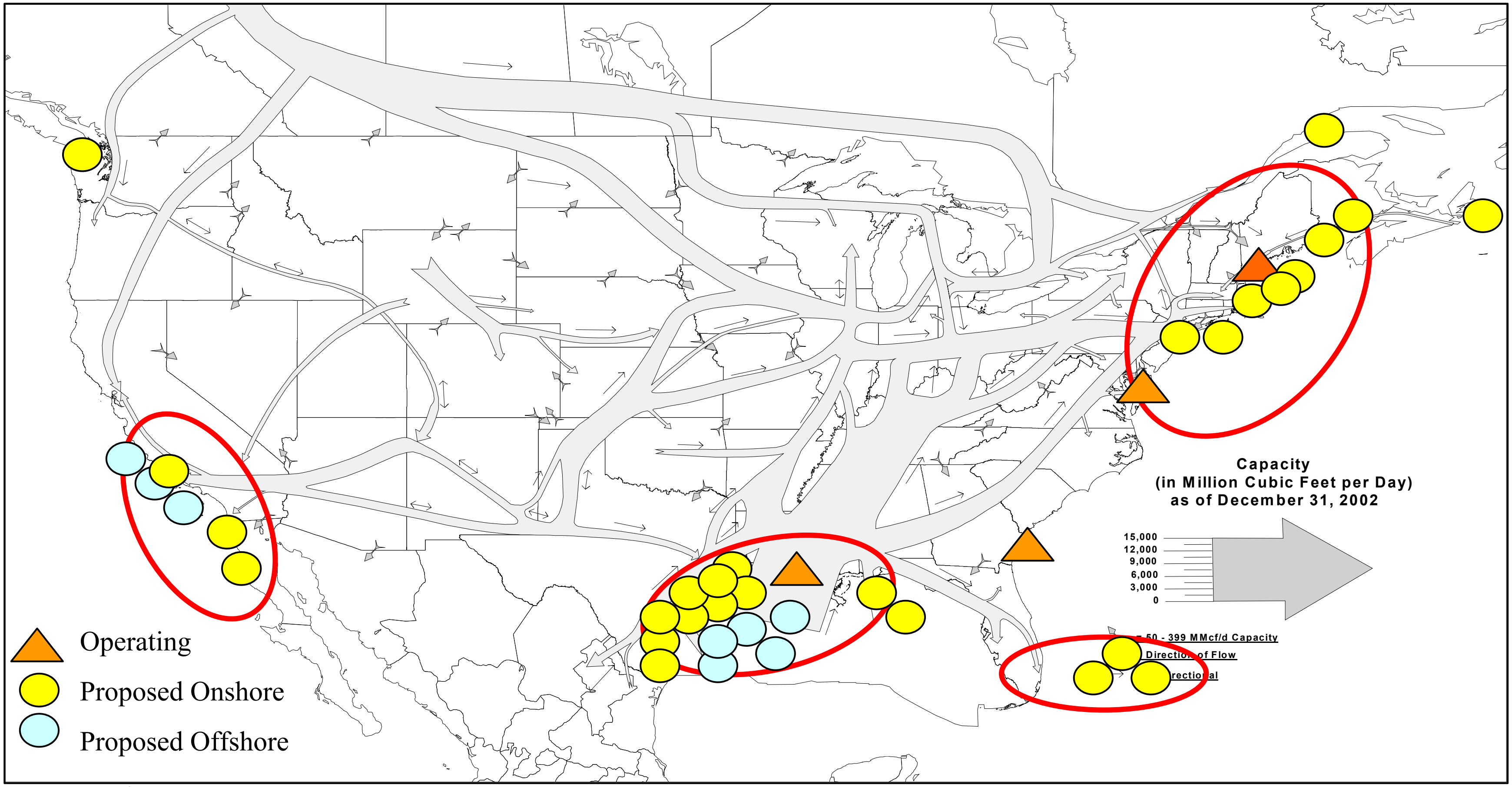
Source: CMS Panhandle Companies

LNG Imports and Import Capacity 2000-2009



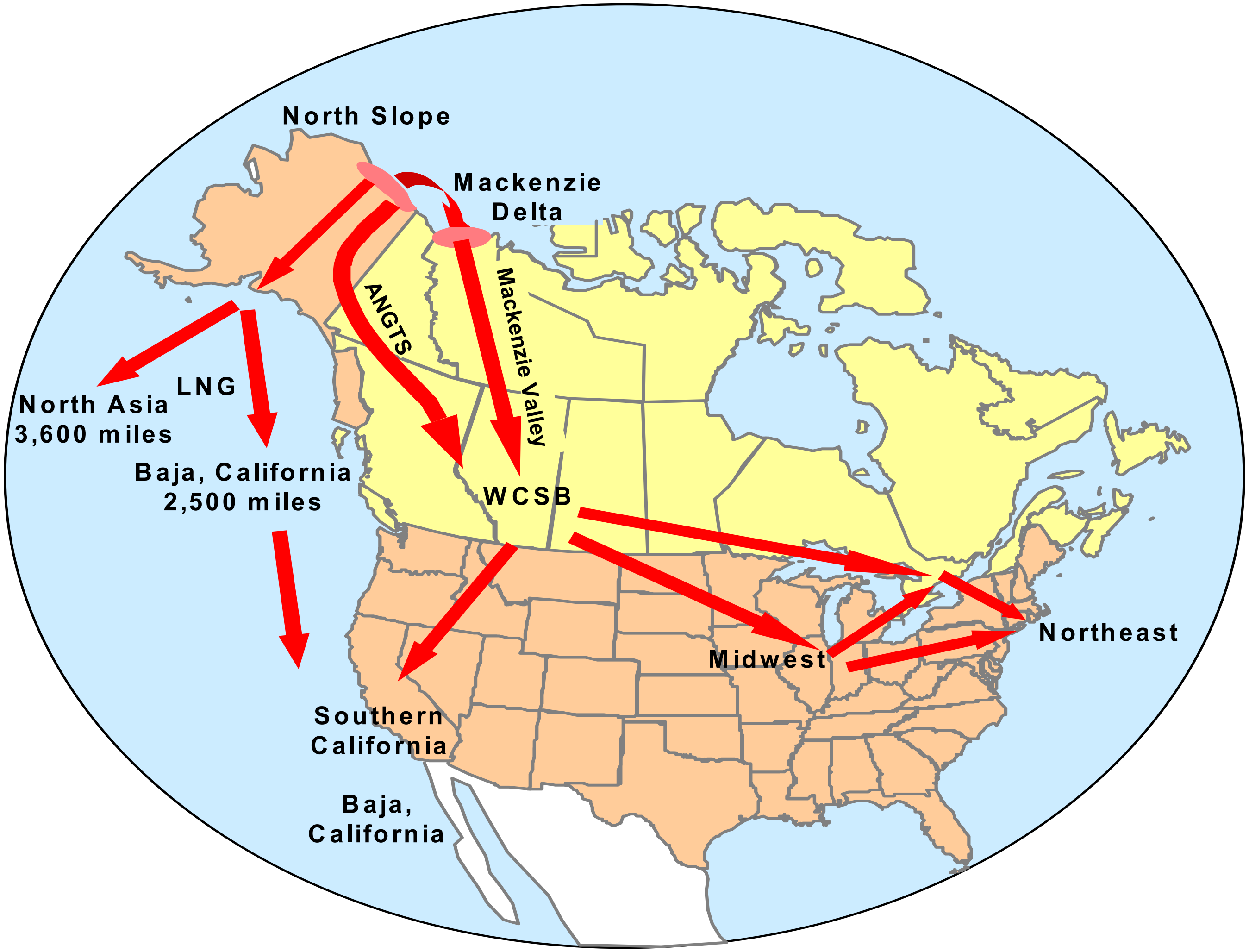
American Gas Association

Proposed North American LNG Terminals

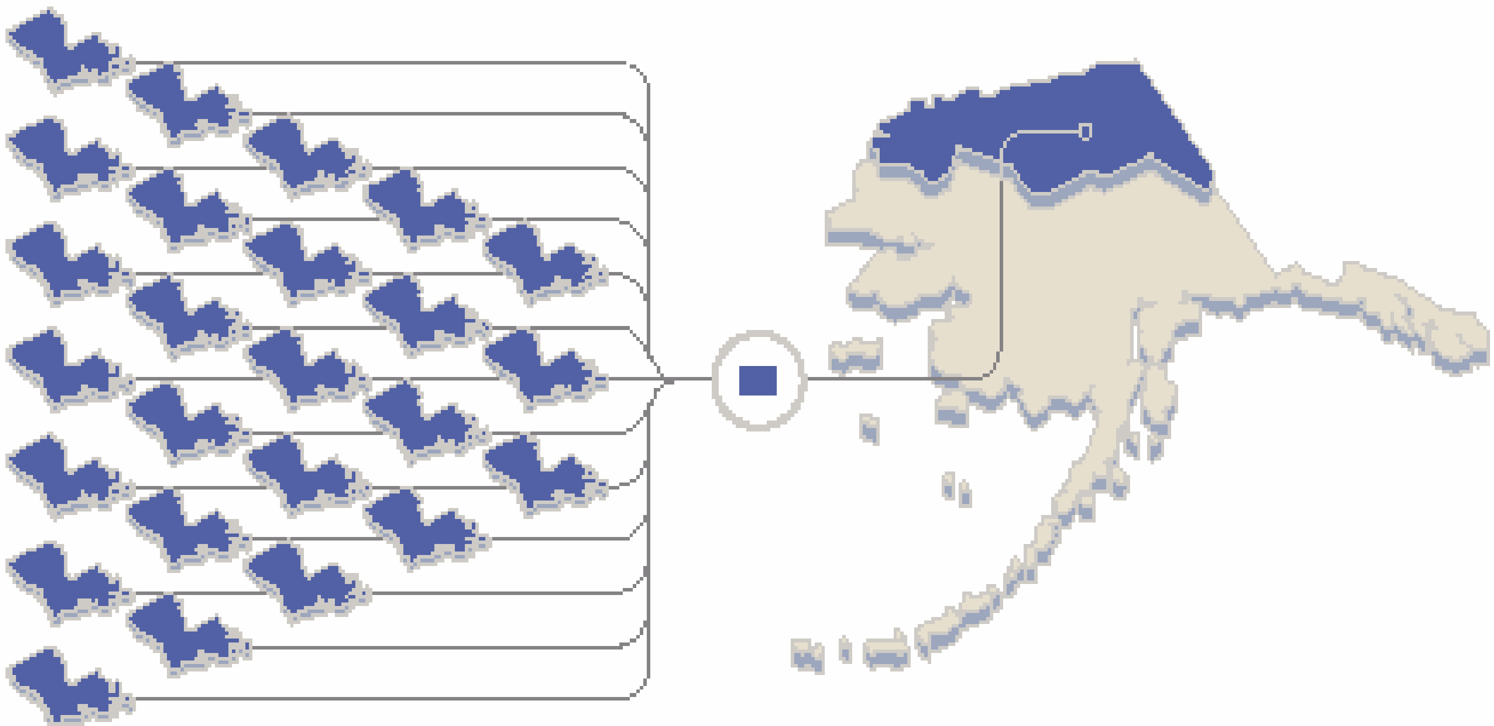


AGA
American Gas Association

Northern Gas Market Options



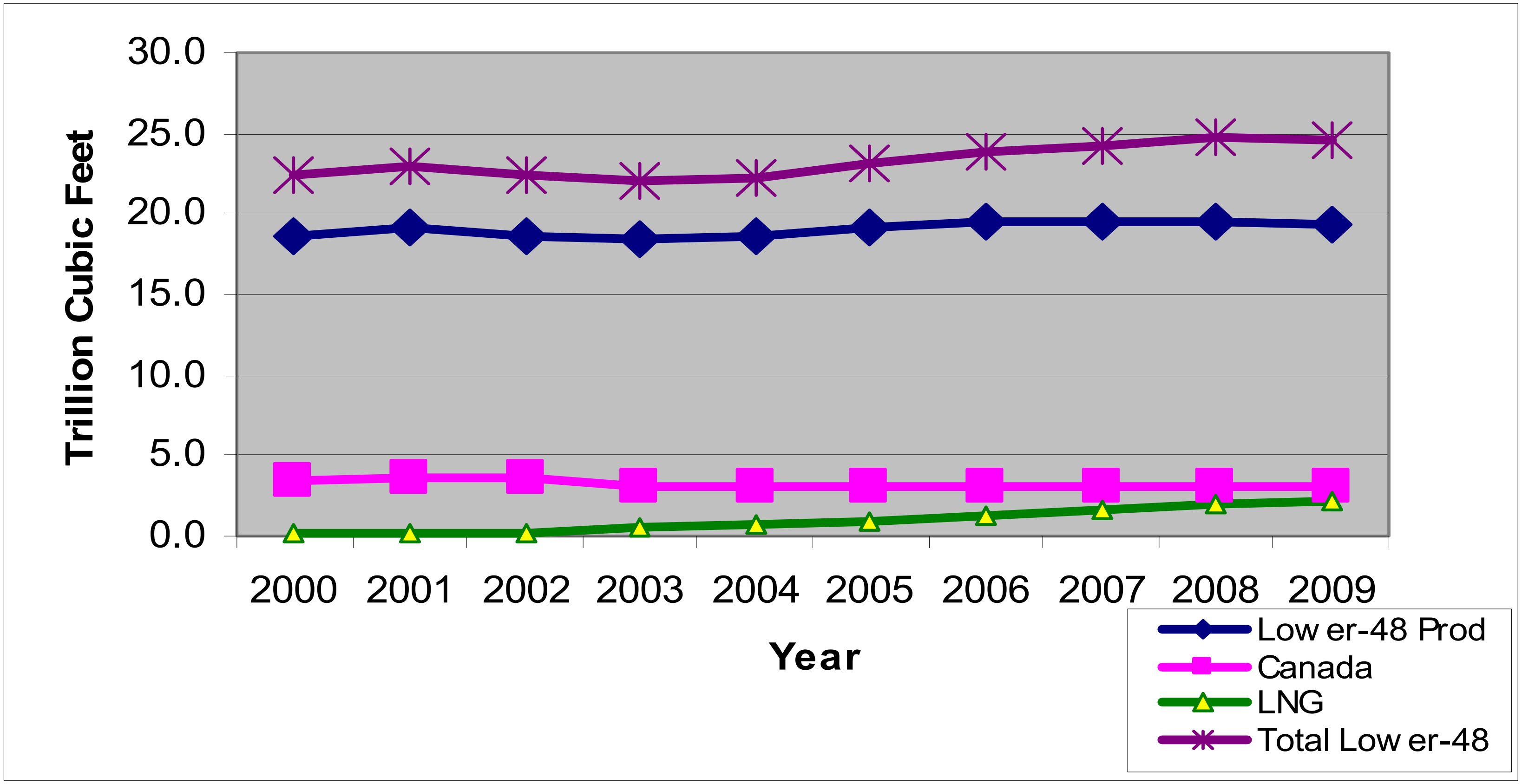
Alaska



25 years of production from onshore **Louisiana** is **equivalent** to proved gas reserves on the **North Slope of Alaska** alone.

AGA American Gas Association

Total Lower-48 Gas Supply By Source 2000-2009



Sources: Lippman Consulting, Inc., AGA, CAPP

CRITICAL SUPPLY ISSUES – TRADITIONAL SOURCES

LOWER-48

- Declining Productivity
- Access – Real vs Perceived
- Moratoria
- Takeaway Capacity
- Deepwater Activity Level

CRITICAL SUPPLY ISSUES NON – TRADITIONAL SOURCES

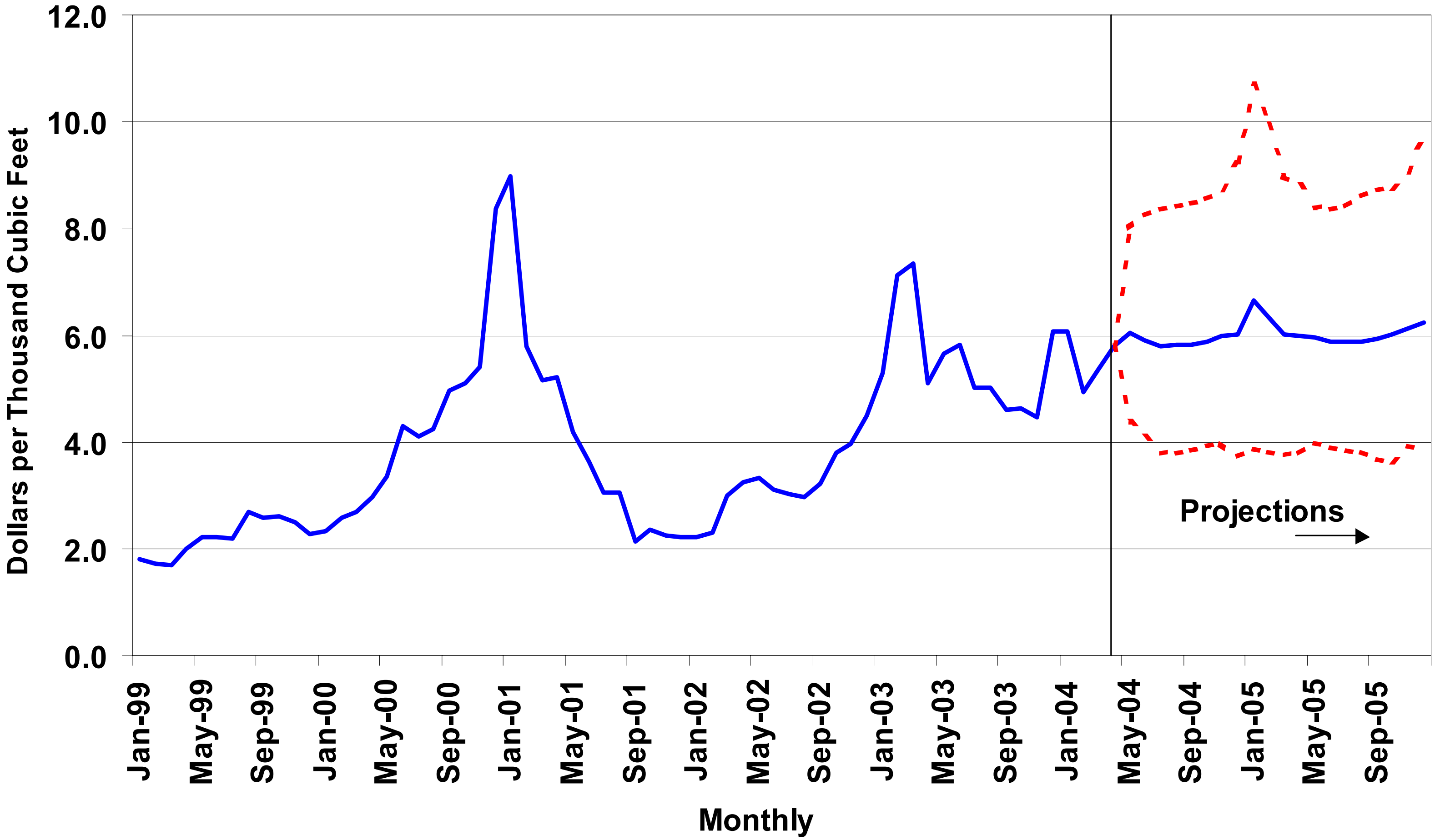
LNG

- World View vs "Imports are Bad"
- NIMBY
- Safety perception

ALASKA

- Justifiable Subsidy?
- Timing?

U.S. Natural Gas Spot Prices
(Base Case and 95% Confidence Interval*)



**The confidence intervals show +/- 2 standard errors based on the properties of the model. The ranges do not include the effects of major supply disruptions.*

Sources: History: Natural Gas Week; Projections: Short-Term Energy Outlook, May 2004.

www.eia.doe.gov

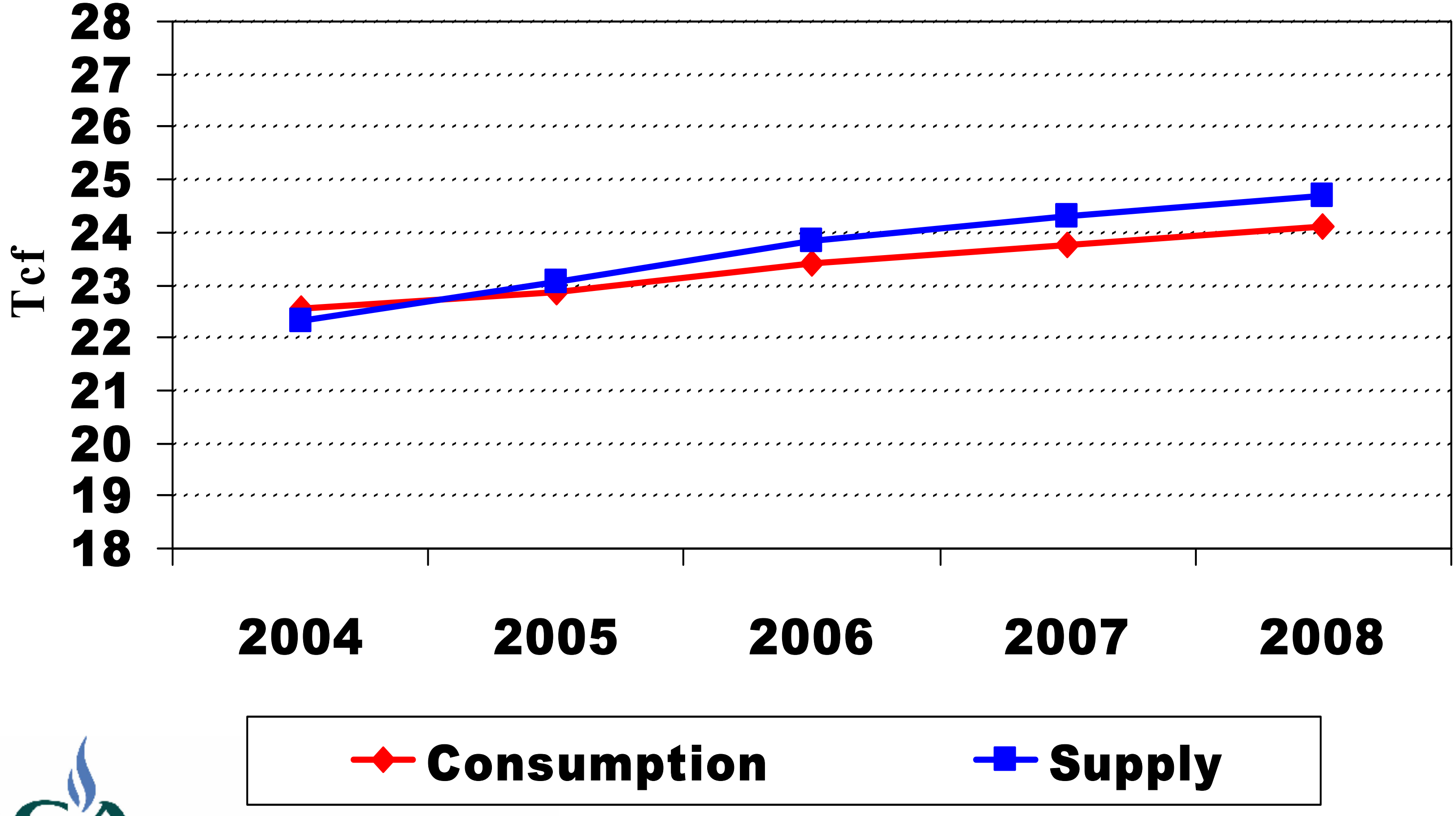
Regarding U.S. Gas Supply and the role of LNG and/or Alaska……

There is no Plan B!

Marie Fagan (CERA)

AGA
American Gas Association

POTENTIAL GAS SUPPLY vs. CONSUMPTION, 2004-2008



What Can We Do?
Short-Term Options

- Encourage natural gas storage
- Encourage payment programs including fixed-price contracts and budget and levelized billing
- Promote energy efficiency and conservation
- Encourage diversified gas supply portfolios, hedged and fixed-price purchases
- Encourage LIHEAP funding

What Can We Do?
Longer Term Options

- Natural gas is plentiful in America
- Encourage balance between economic and environmental values
- Encourage Alaskan supply
- Encourage LNG supply