



## *Barnett Shale Update*

*Commissioner Victor G. Carrillo*

*Texas Railroad Commission*

**Platts Shale Developer Conference**

**June 5, 2008 – Houston, TX**



# Texas Railroad Commission

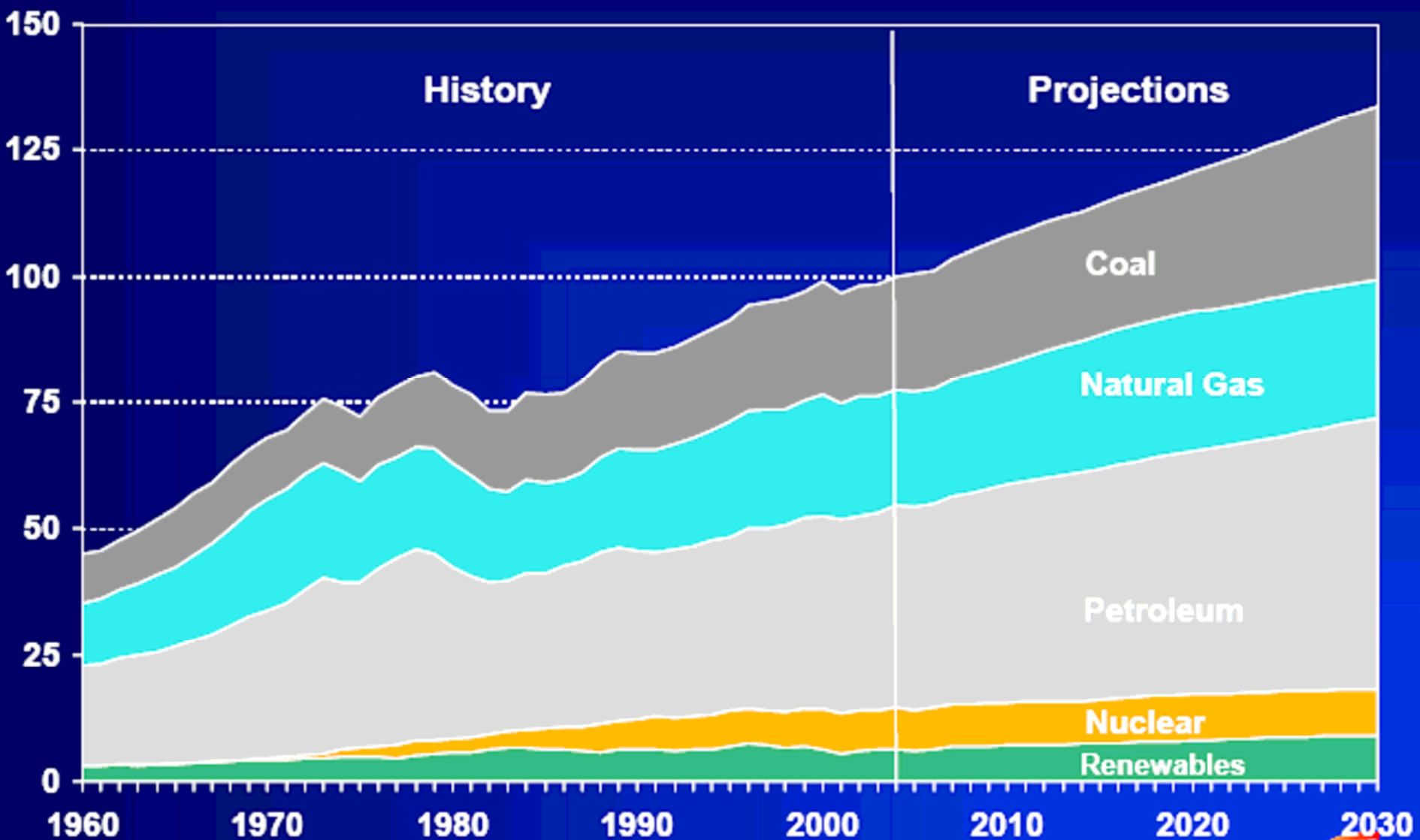
- Established: 1891
- 3 statewide elected officials
- No rail issues since 2005
- Regulate:
  - oil & gas
  - pipelines
  - surface mining
  - natural gas utilities
- "TX Energy Commission"



U.S. Congressman Joe Barton  
Energy & Commerce Committee  
Principal author, EPACT 2005

**“There is no greater issue  
facing our world over the  
next century than energy.”**

# U.S. Primary Energy Consumption by Fuel, 1960-2030 (quadrillion Btu)



Source: EIA, *Annual Energy Outlook 2006*



*U.S. oil imports ~ 60%!*



*Oil: \$130+ Natural Gas: \$12+/Mcf*

*How high will it go?*

# *Natural Gas*



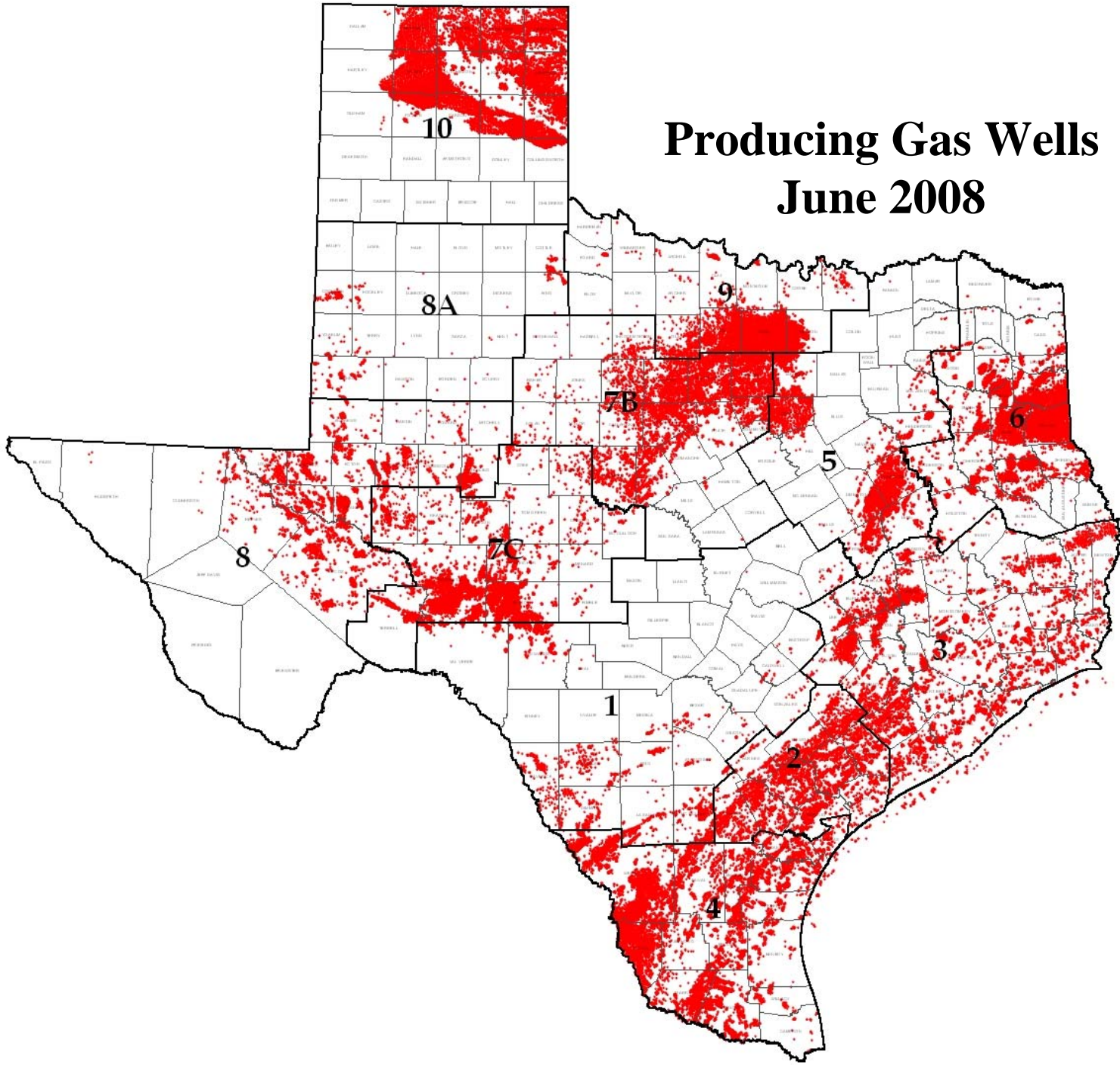
**2007 U.S. Consumption: 23 Tcf**

- U.S. much less dependent on natural gas imports
- U.S. imports ~ 20% of natural gas

**TX Produced 7.0 Tcf**

- 38% of U.S. domestic production
- 30% of U.S. consumption
- **Without TX, U.S. would import > 50% nat. gas**

# Producing Gas Wells June 2008





# TEXAS OVERVIEW

“Mature” Producing Province:

~ 7,100 active operators

Total Active Producing Wells:

**152,657 oil**

**88,025 natural gas**

**#1 producer of oil & natural gas in the U.S**

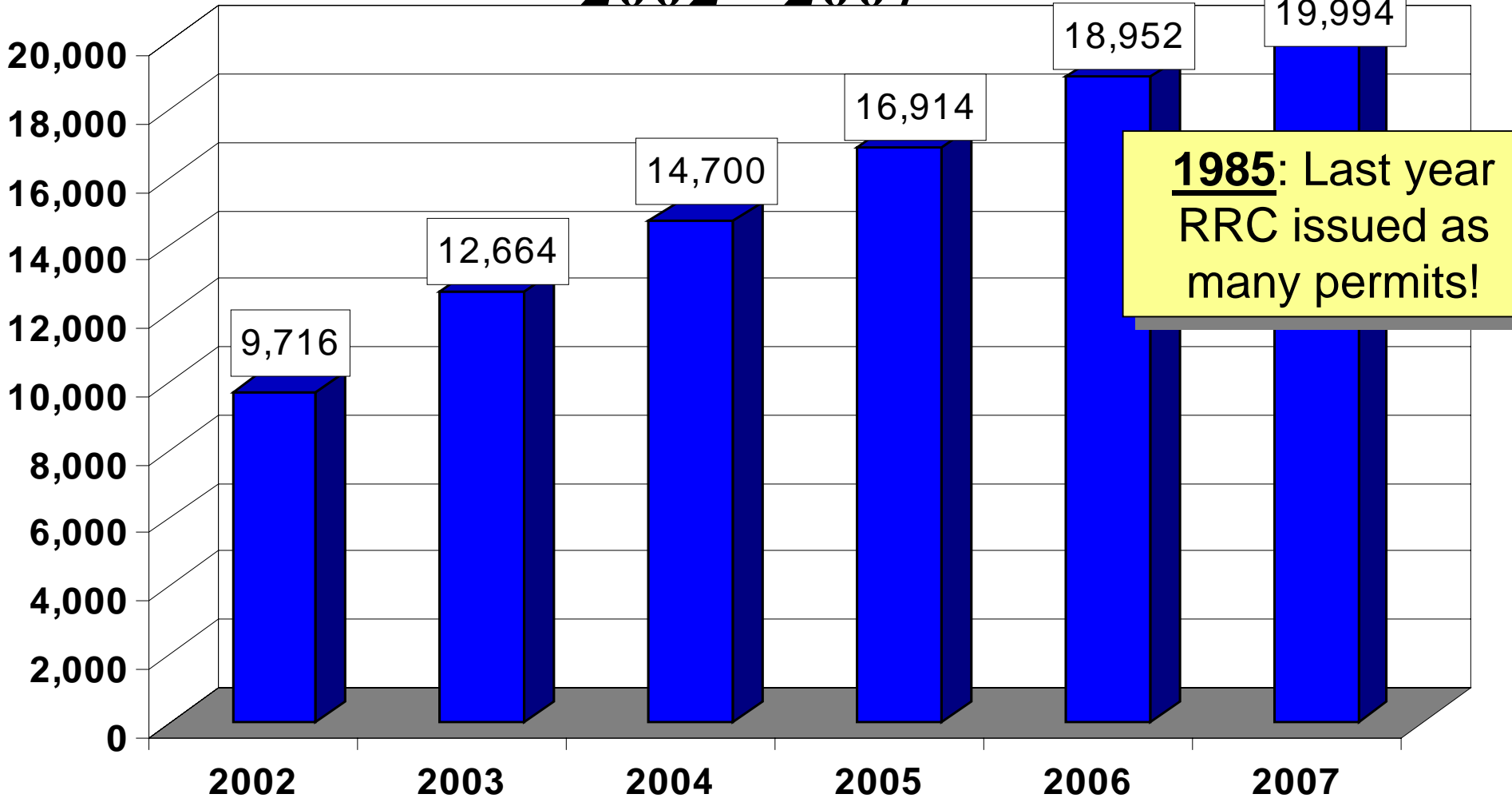
**~340 million barrels oil (2007)**

**~ 7.0 Tcf natural gas (2007)**

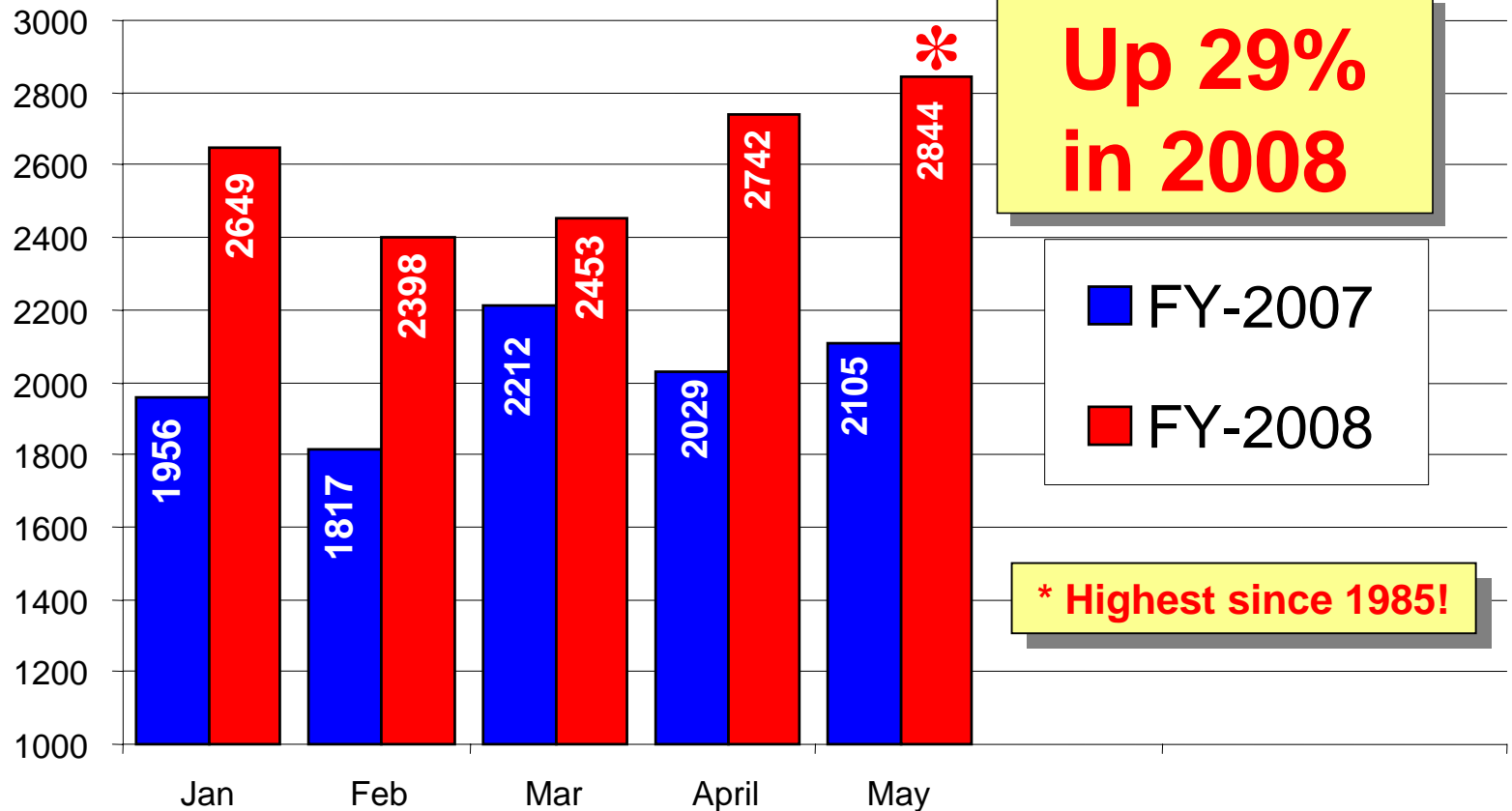
- Largest pipeline infrastructure in nation
- 26% total U.S. refinery capacity
- Oil & gas & petrochemicals = \$100 billion+ industry in TX



# Texas Drilling Permits Issued 2002 - 2007



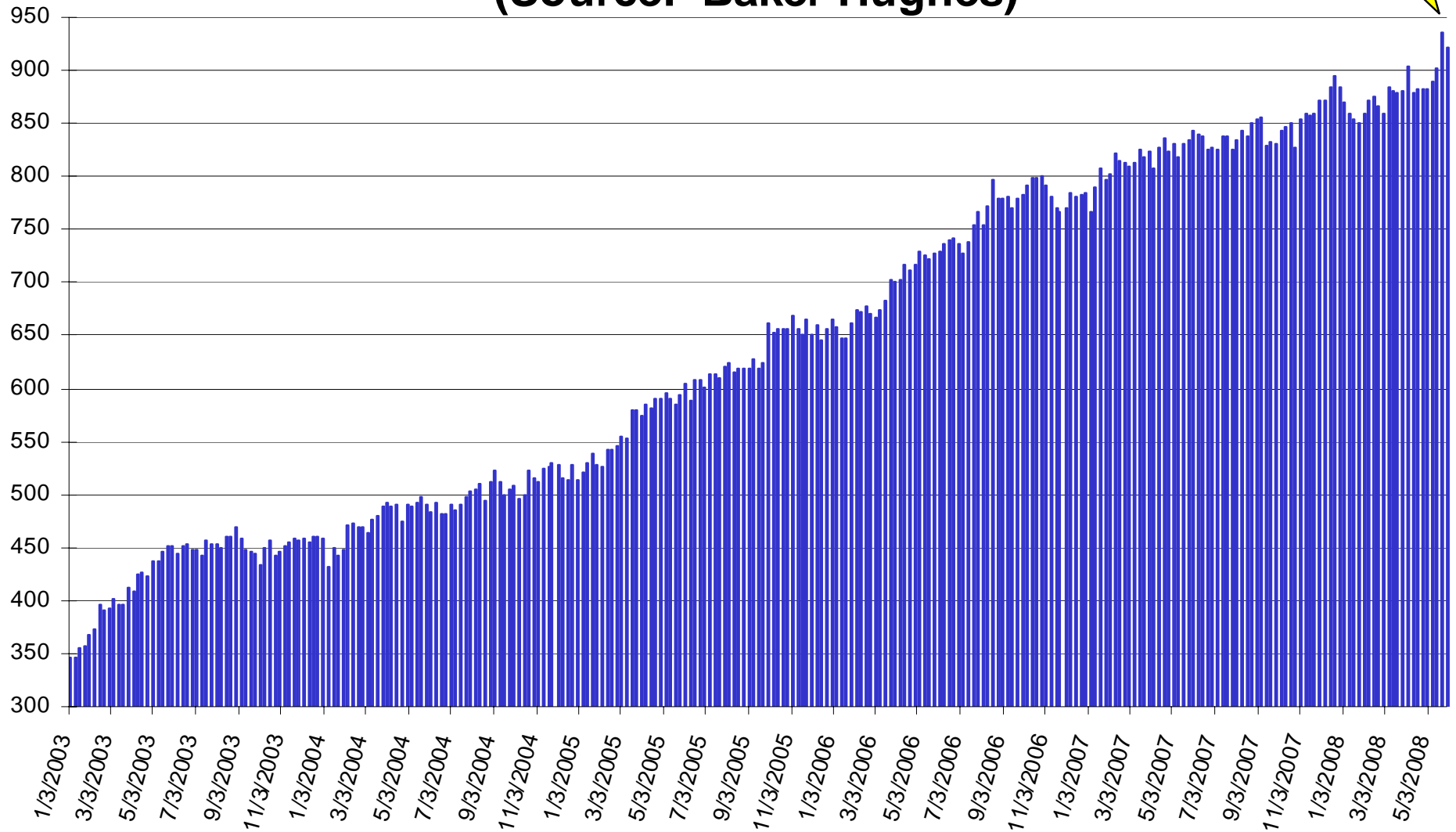
## Total Submitted Drilling Permits



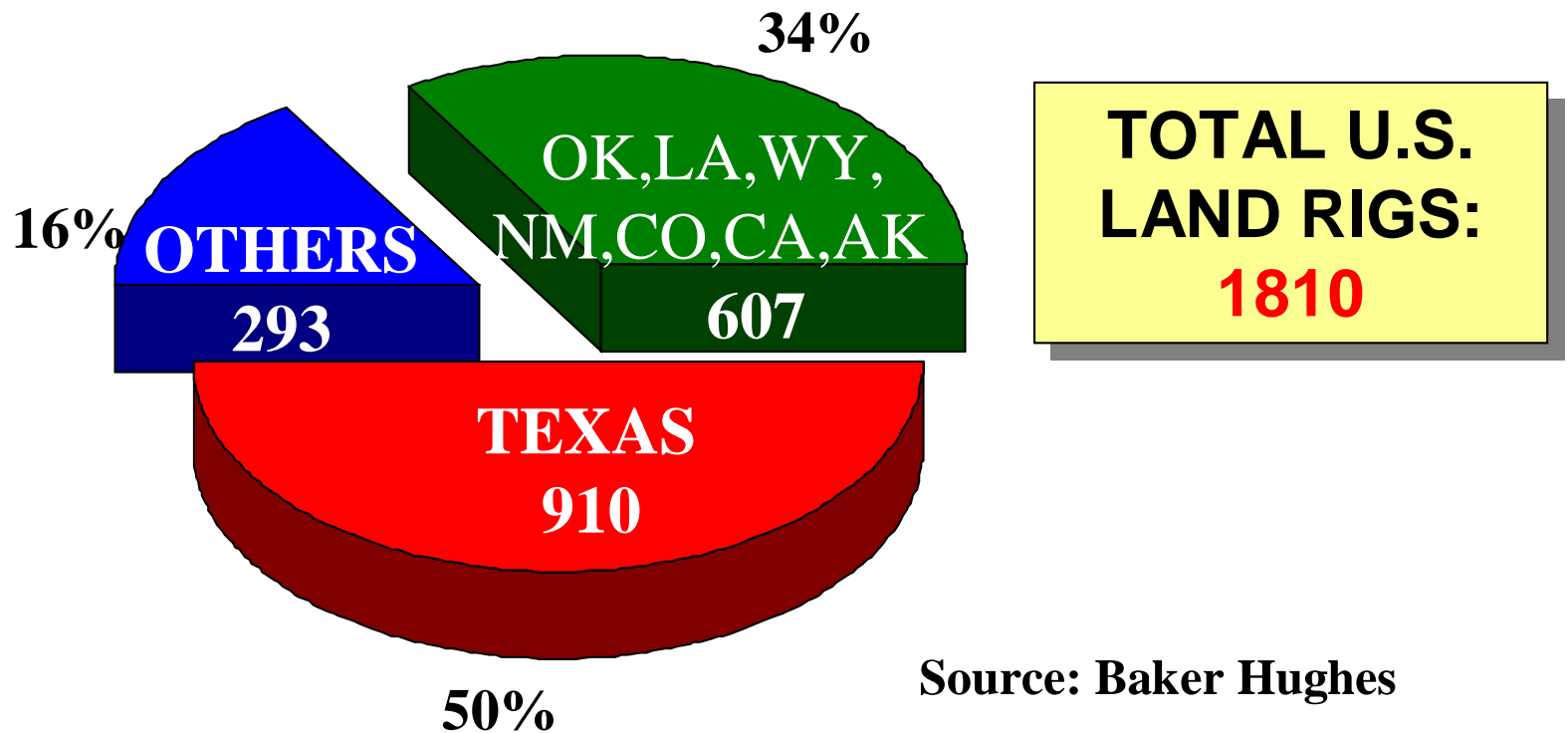
- Process Time:
  - Expedited -- 13 days
  - Non-Expedited -- 40 days
- 2,514 Drilling Permits pending (early June, 2008)

# Texas Active Rig Count January 2003 -- May 2008 (Source: Baker Hughes)

**921 TX Rigs  
(May 30, 2008)**



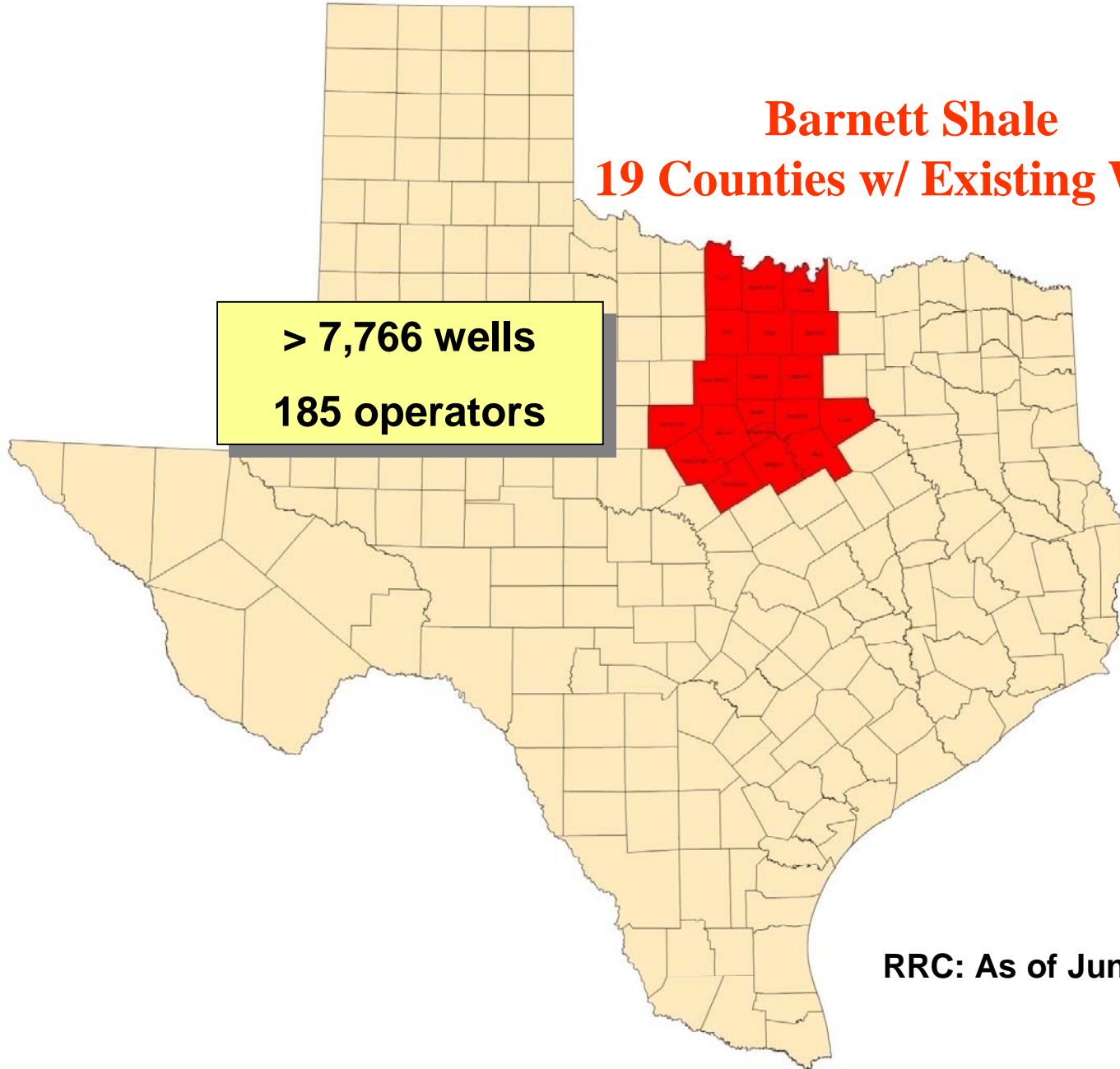
# Total U.S. Land Rig Activity (05/30/08)



Source: Baker Hughes

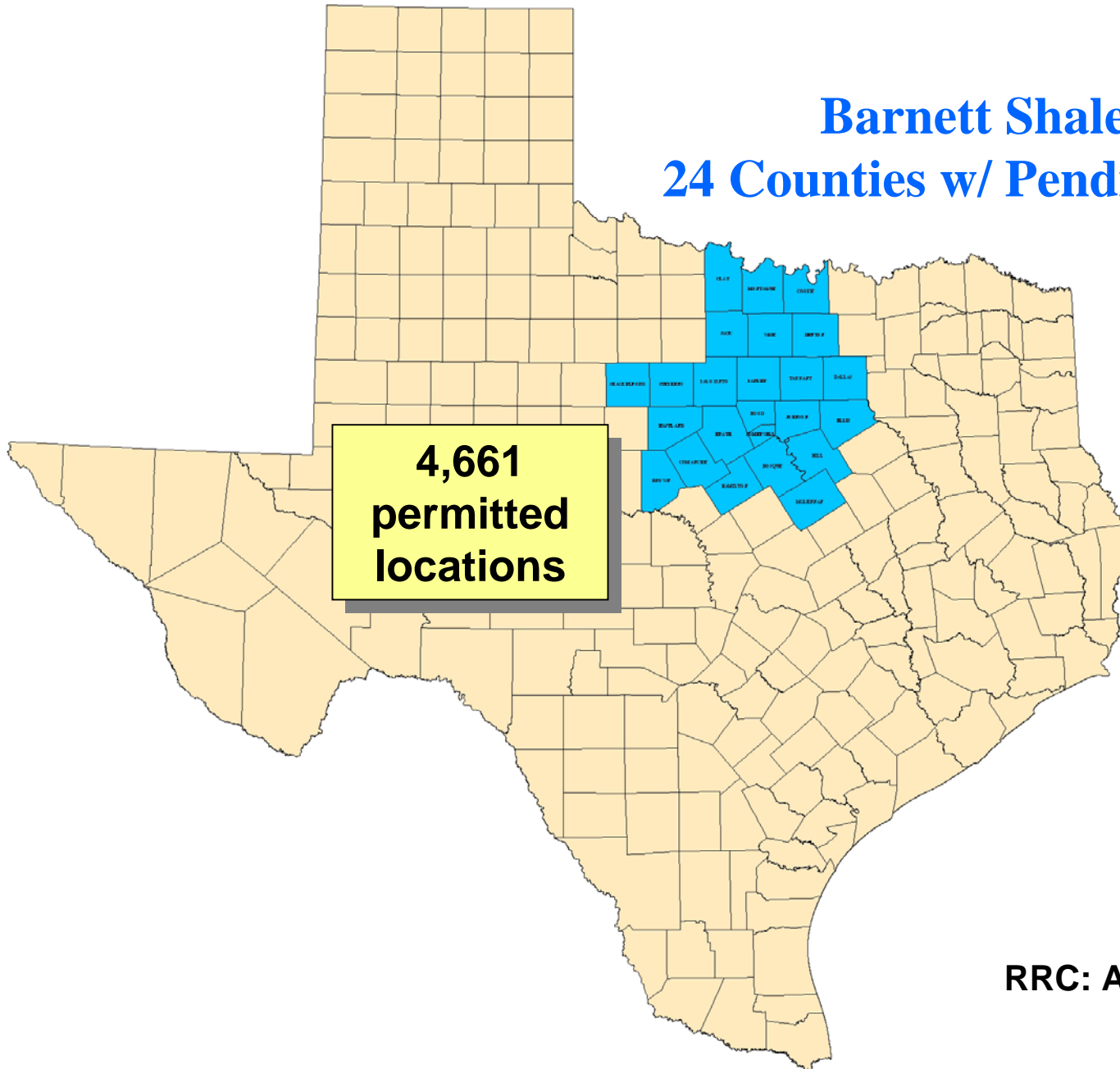
**Barnett Shale**  
**19 Counties w/ Existing Wells**

**> 7,766 wells**  
**185 operators**



**RRC: As of June 3, 2008**

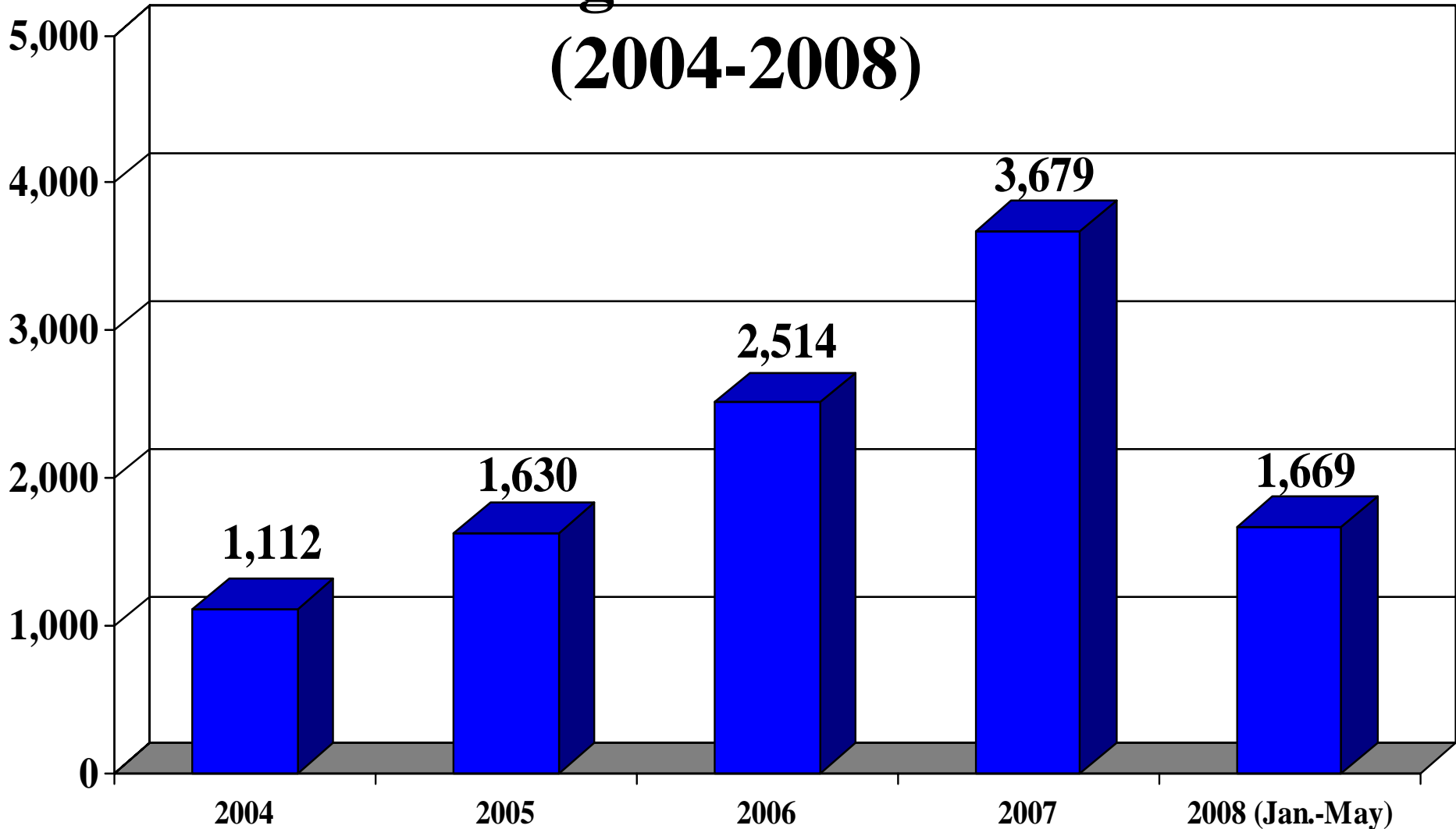
# Barnett Shale 24 Counties w/ Pending Wells



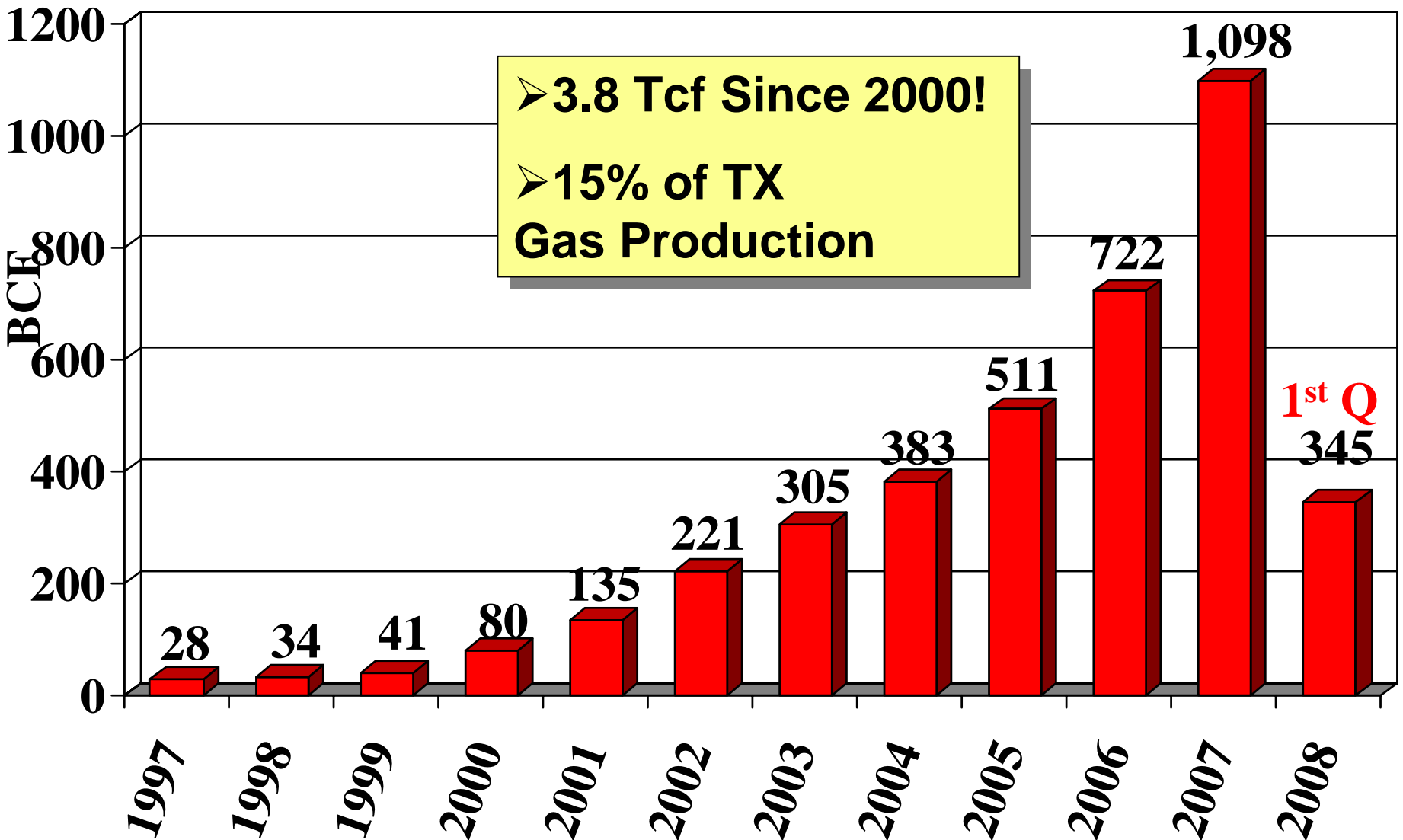
**4,661  
permitted  
locations**

**RRC: As of June 3, 2008**

# Barnett Shale Drilling Permits Issued (2004-2008)



# Barnett Shale Natural Gas Production (1997- March 2008)





# Top 10 Barnett Shale Operators: 1<sup>st</sup> Q 2008

Operator	Gas Produced (BCF)
Devon Energy Production Co., L.P.	74
XTO Energy Inc.	30
Chesapeake Operating, Inc.	23
EOG Resources, Inc.	18
Encana Oil & Gas (USA) Inc.	11
Burlington Resources O&G Co. LP	8
Range Production Company	6
Quicksilver Resources Inc.	3
Carrizo Oil & Gas, Inc.	3
Denbury Onshore, LLC	3

# Barnett Shale Trend



- Unconventional shale gas
- Technology driven
  - horizontal drilling
  - hydraulic fracturing
  - multi-well drills
- 20+ counties
- 185 operators
- USGS: ~26 Tcf

**Perryman Study:**

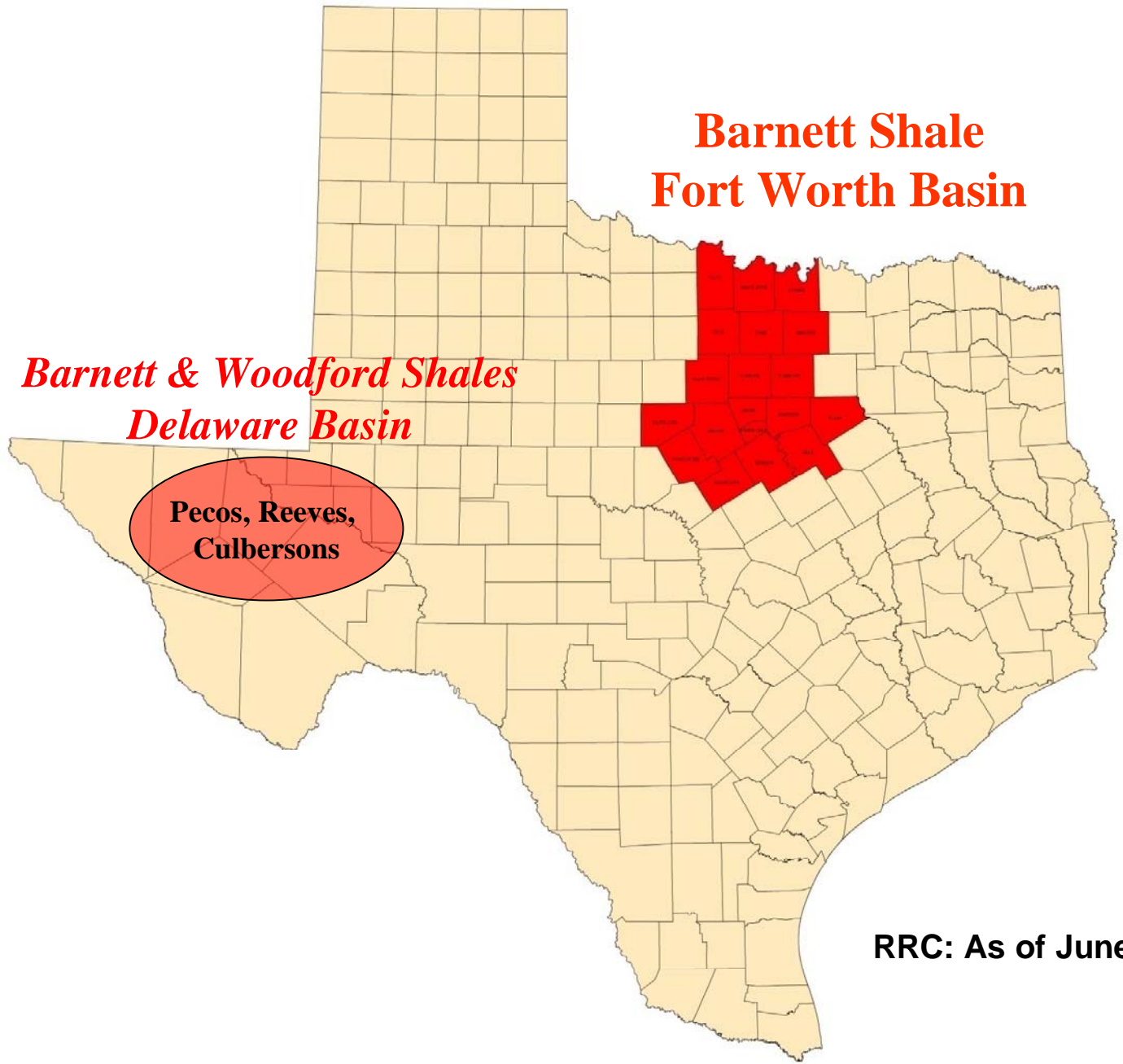
**100,000+ jobs**

**\$10+ billion annual output**

**Barnett Shale  
Fort Worth Basin**

*Barnett & Woodford Shales  
Delaware Basin*

**Pecos, Reeves,  
Culbersons**



**RRC: As of June 3, 2008**