UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, DC 20549

FORM 8-K

CURRENT REPORT
Pursuant to Section 13 or 15(d)
of the Securities Exchange Act of 1934

Date of report (Date of earliest event reported): February 5, 2008 (February 5, 2008)

Arch Coal, Inc.

(Exact name of registrant as specified in its charter)

Delaware	1-13105	43-0921172
(State or other jurisdiction of incorporation)	(Commission File Number)	(I.R.S. Employer Identification No.)

CityPlace One
One CityPlace Drive, Suite 300
St. Louis, Missouri 63141
(Address, including zip code, of principal executive offices)

Registrant's telephone number, including area code: (314) 994-2700

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions:

o Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)

o Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)

o Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))

o Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

Item 7.01 Regulation FD Disclosure.

On February 5, 2008, Robert J. Messey, Senior Vice President and Chief Financial Officer of Arch Coal, Inc., will deliver a presentation at the Credit Suisse First Boston 2008 Energy Summit, that will include written communication comprised of slides. The slides from the presentation are attached hereto as Exhibit 99.1 and are hereby incorporated by reference.

A copy of the slides will be available at http://investor.archcoal.com/events.cfm for 30 days.

Item 9.01 Financial Statements and Exhibits.

(d) Exhibits

The following exhibits are attached hereto and furnished herewith.

Exhibit No.	Description
99.1	Slides from the presentation at the Credit Suisse First Boston 2008 Energy Summit.

Signatures

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned hereunto duly authorized.

Dated: February 5, 2008

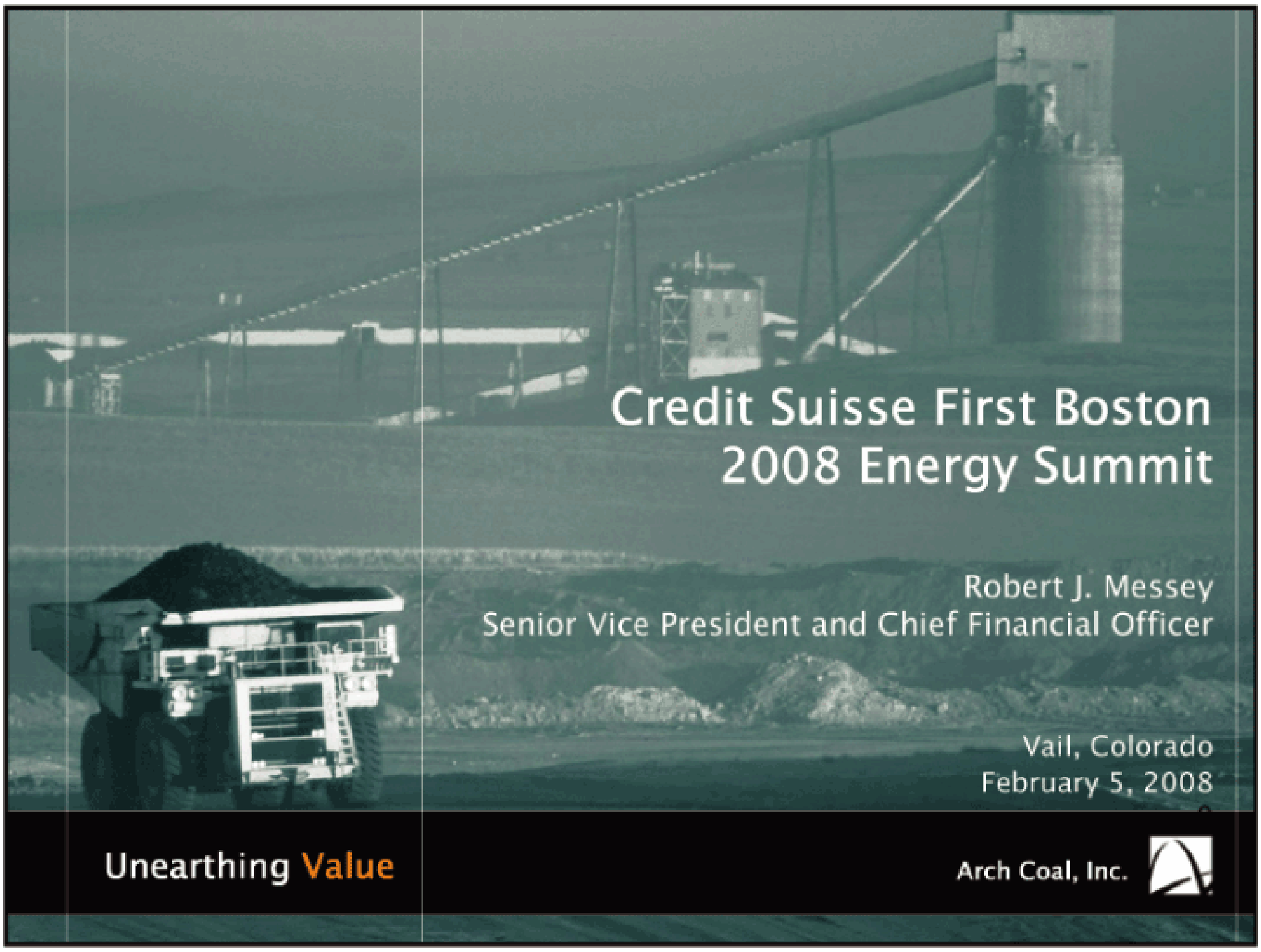
Arch Coal, Inc.

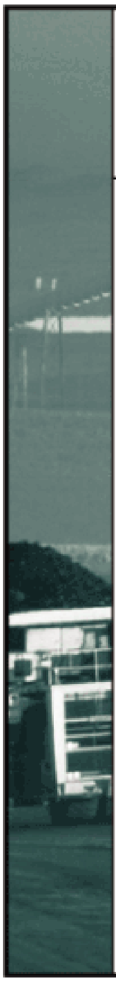
By: /s/ Robert G. Jones
Robert G. Jones
Vice President – Law, General Counsel and Secretary

Exhibit Index

Exhibit No.	Description
99.1	Slides from the presentation at the Credit Suisse First Boston 2008 Energy Summit.

Exhibit 99.1


Credit Suisse First Boston
2008 Energy Summit
Robert J. Messey
Senior Vice President and Chief Financial Officer
Vail, Colorado
February 5, 2008
Unearthing Value
Arch Coal, Inc.

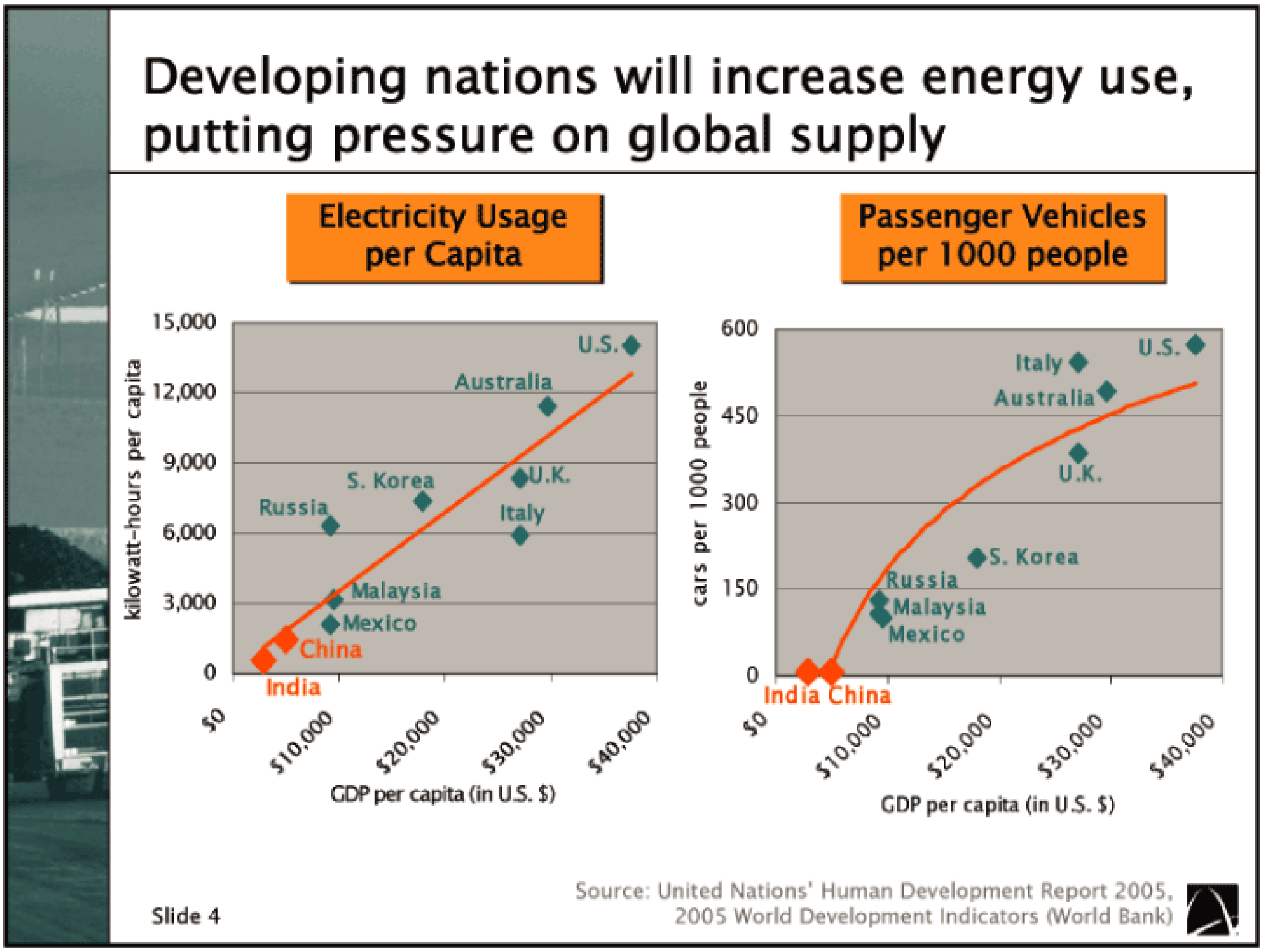


Forward-looking information

This presentation contains "forward-looking statements" - that is, statements related to future, not past, events. In this context, forward-looking statements often address our expected future business and financial performance, and often contain words such as "expects," "anticipates," "intends," "plans," "believes," "seeks," or "will." Forward-looking statements by their nature address matters that are, to different degrees, uncertain. For us, particular uncertainties arise from changes in the demand for our coal by the domestic electric generation industry; from legislation and regulations relating to the Clean Air Act and other environmental initiatives; from operational, geological, permit, labor and weather-related factors; from fluctuations in the amount of cash we generate from operations; from future integration of acquired businesses; and from numerous other matters of national, regional and global scale, including those of a political, economic, business, competitive or regulatory nature. These uncertainties may cause our actual future results to be materially different than those expressed in our forward-looking statements. We do not undertake to update our forward-looking statements, whether as a result of new information, future events or otherwise, except as may be required by law. For a description of some of the risks and uncertainties that may affect our future results, you should see the risk factors described from time to time in the reports we file with the Securities and Exchange Commission.

This presentation includes certain non-GAAP financial measures, including Adjusted EBITDA. These non-GAAP financial measures are not measures of financial performance in accordance with generally accepted accounting principles and may exclude items that are significant in understanding and assessing our financial results. Therefore, these measures should not be considered in isolation or as an alternative to net income from operations, cash flows from operations, earnings per fully-diluted share or other measures of profitability, liquidity or performance under generally accepted accounting principles. You should be aware that our presentation of these measures may not be comparable to similarly-titled measures used by other companies. A reconciliation of these financial measures to the most comparable measures presented in accordance with generally accepted accounting principles has been included at the end of this presentation.

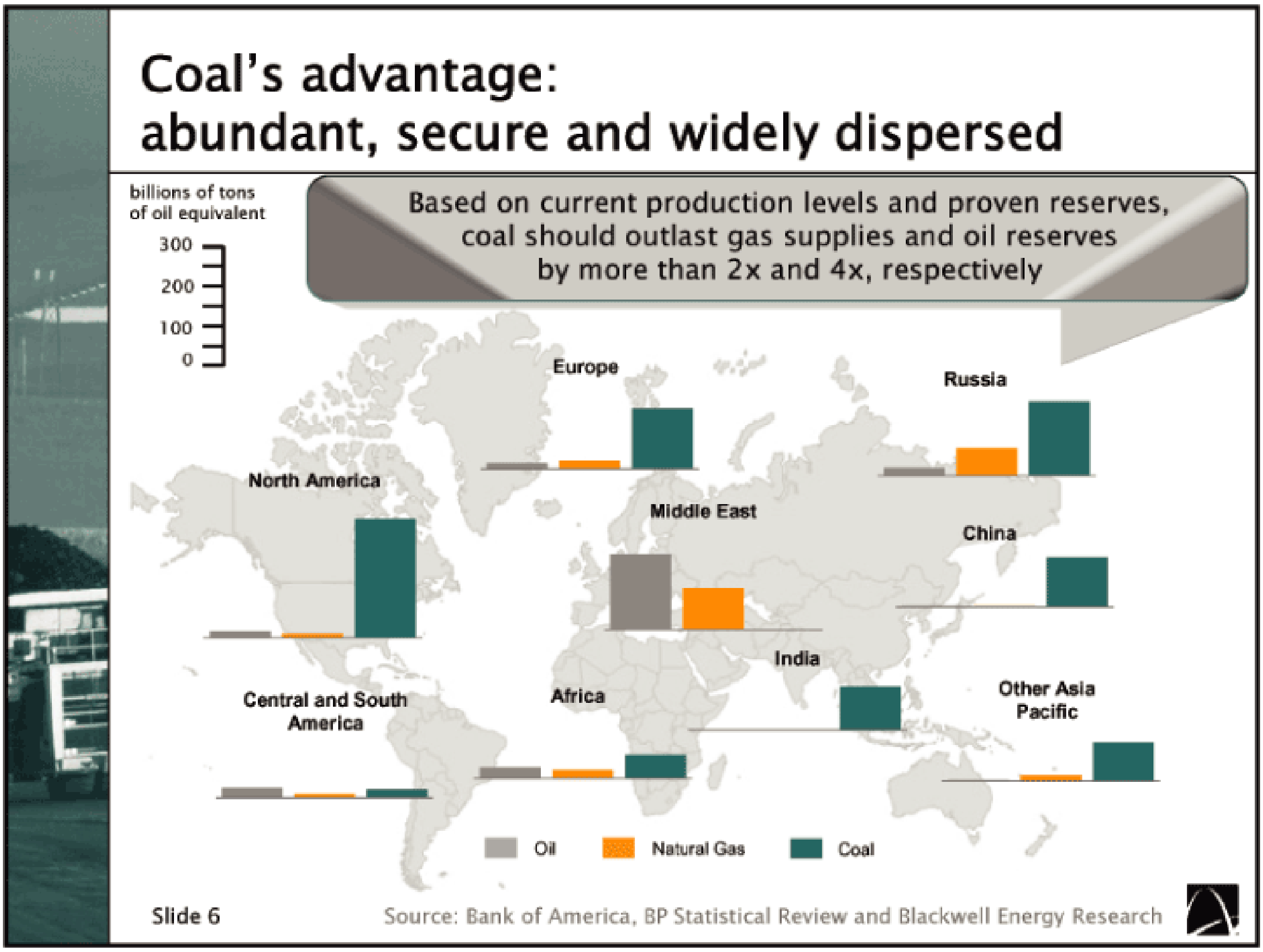

Long-Term
Macro Fundamentals
Unearthing Value
Arch Coal, Inc.


Developing nations will increase energy use, putting pressure on global supply
Electricity Usage per Capita
15,000
12,000
9,000
6,000
3,000
0
kilowatt-hours per capita
U.S.
Australia
S. Korea
U.K.
Russia
Italy
Malaysia
Mexico
China
India
$0
$10,000
$20,000
$30,000
$40,000
GDP per capita (in U.S. $)
Passenger Vehicles per 1000 people
600
450
300
150
0
cars per 1000 people
Italy
U.S.
Australia
U.K.
S. Korea
Russia
Malaysia
Mexico
India China
$0
$10,000
$20,000
$30,000
$40,000
GDP per capita (in U.S. $)
Source: United Nations' Human Development Report 2005, 2005 World Development Indicators (World Bank)
Slide 4

The resurgence of ‘resource nationalism’ threatens future U.S. energy supply & security

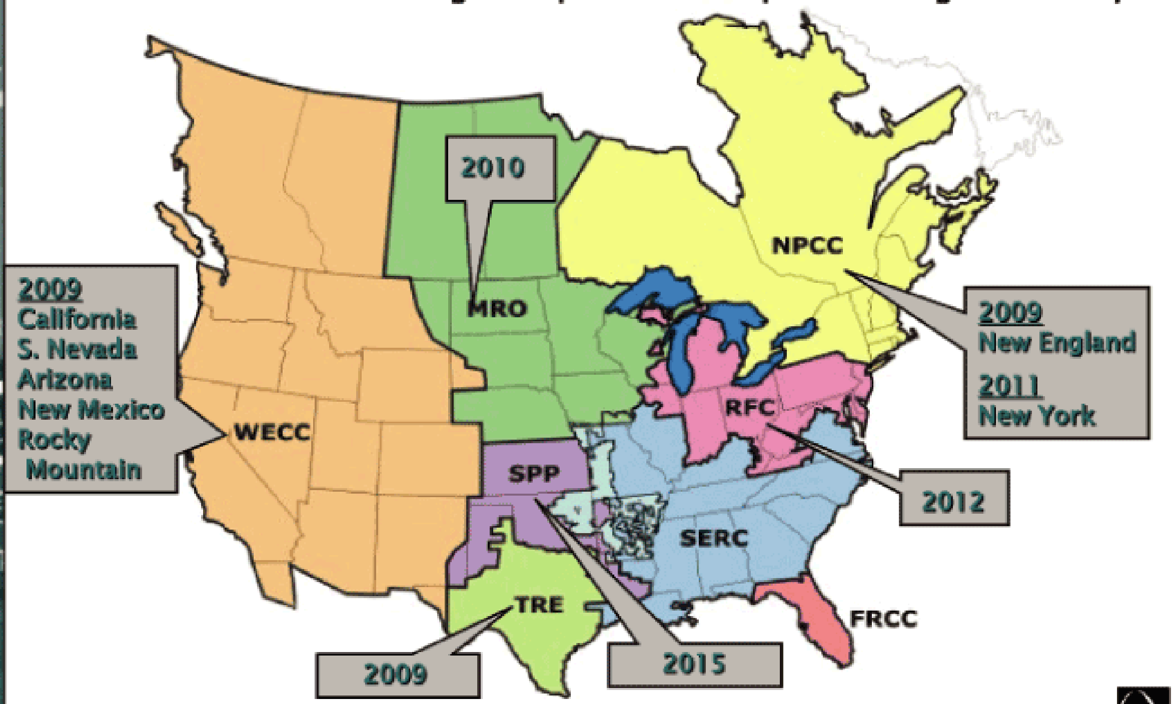
- OPEC will continue to increase its share of the world oil and liquid natural gas supply to more than 50 percent by 2030
- Non-OPEC conventional crude oil and natural gas production expected to peak in the next decade, further increasing OPEC’s influence

Source: IEA World Energy Outlook 2007


Coal's advantage:
abundant, secure and widely dispersed
billions of tons
of oil equivalent
300
200
100
0
Based on current production levels and proven reserves, coal should outlast gas supplies and oil reserves by more than 2x and 4x, respectively
Europe
Russia
North America
Middle East
China
India
Central and South America
Africa
Other Asia Pacific
Oil
Natural Gas
Coal
Slide 6
Source: Bank of America, BP Statistical Review and Blackwell Energy Research

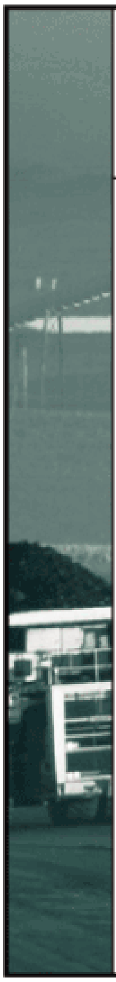
In the U.S., electric generation demand is projected to outstrip planned supply growth

North American Reserve Margins Expected to Drop Below Target Levels by:

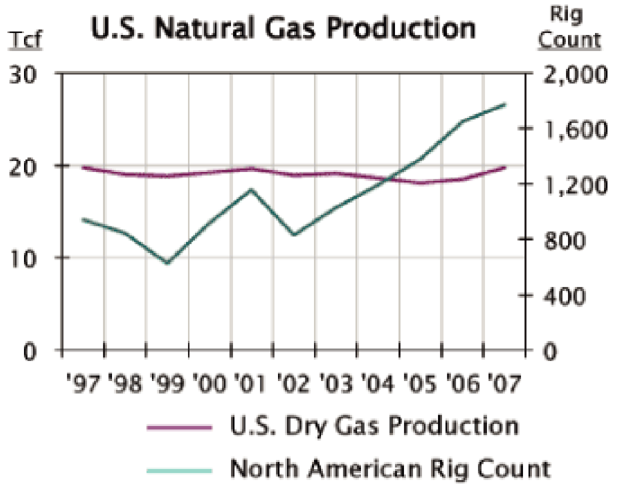


Slide 7

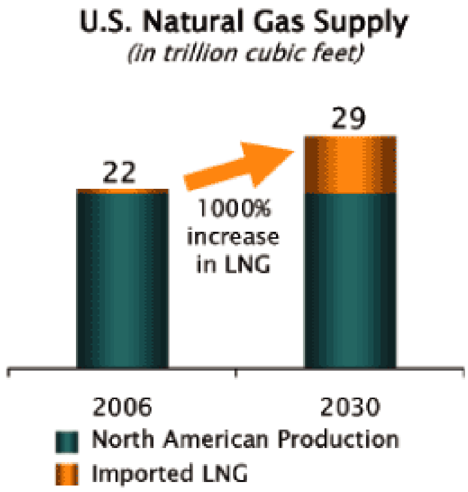
Source: NERC 2007 Long-Term Reliability Assessment



U.S. electric generation will increasingly rely on foreign sources of natural gas



- Since 1997, U.S. dry natural gas production has remained essentially flat despite an ever increasing number of rigs in production

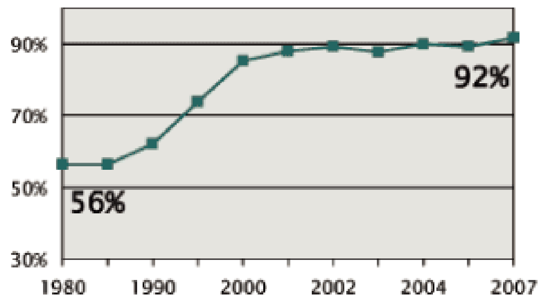


- Increased dependence on foreign natural gas will be required for natural gas just to maintain its share of electric generation

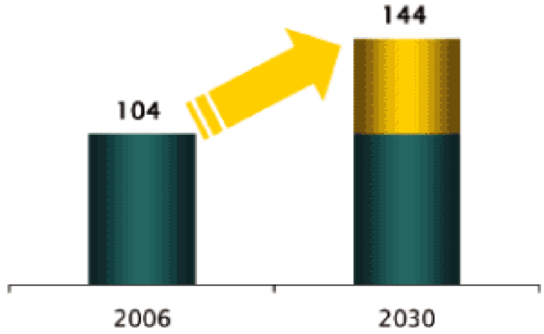
Slide 8

Source: EIA, ACI and Baker Hughes

Significant nuclear expansion in the U.S. is necessary just to maintain share

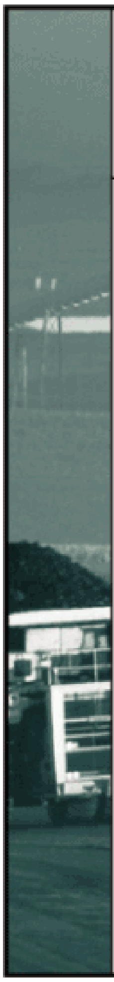


- Since 2000, growth in nuclear utilization has been essentially flat
- It is unlikely that utilization can increase further given refueling and maintenance requirements



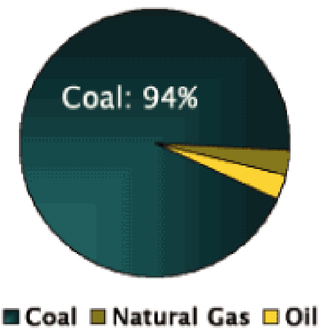
- At least 40 new units are needed just to maintain current share
  - *New plant additions are unlikely in the next 10 years*
- Current nuclear generating infrastructure is aging
  - *By 2030, the average age of nuclear infrastructure will be 50 years old*

Source: EIA and ACI

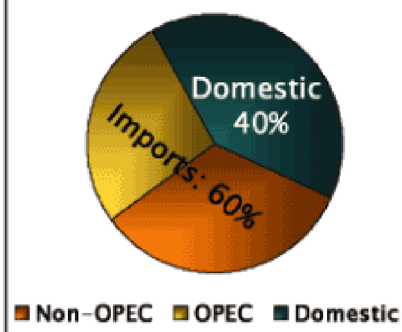


Coal is – and will remain – a vital part of America's energy future

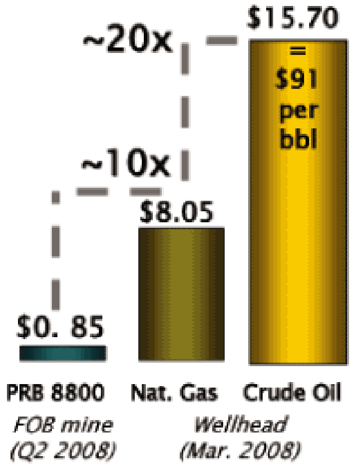
U.S. Energy Reserves
(in trillion Btu)



U.S. Petroleum Supply
(million bbls per day)

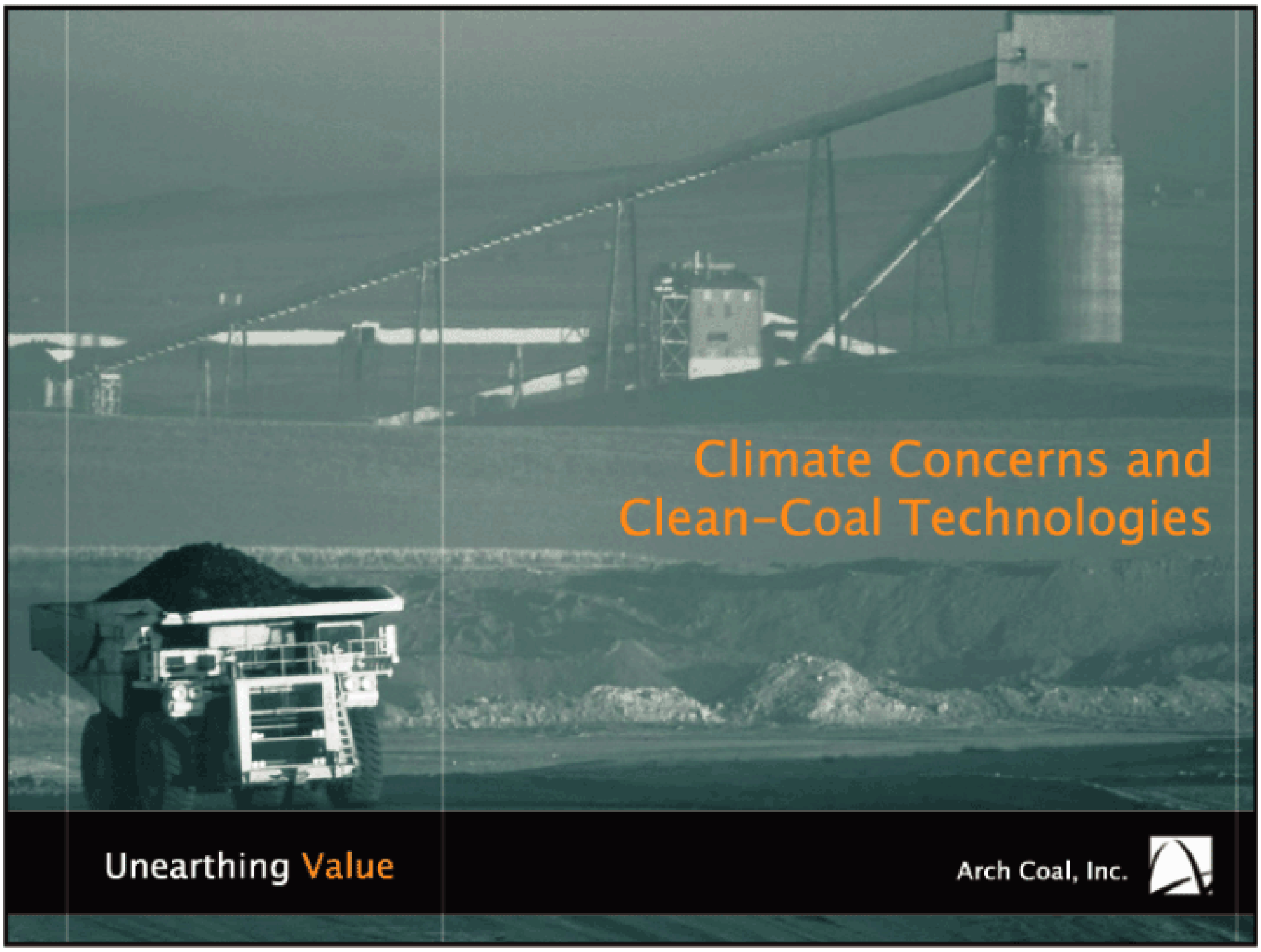


U.S. Fuel Prices
($/mm Btu at 1/31/08)

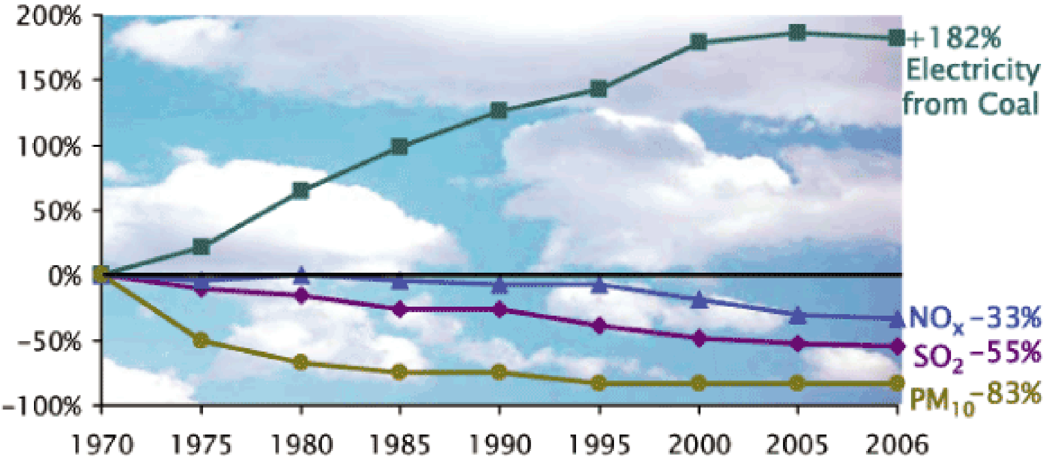


Slide 10

Source: EIA, Platts, Argus Coal Daily and NYMEX


Climate Concerns and
Clean-Coal Technologies
Unearthing Value
Arch Coal, Inc.

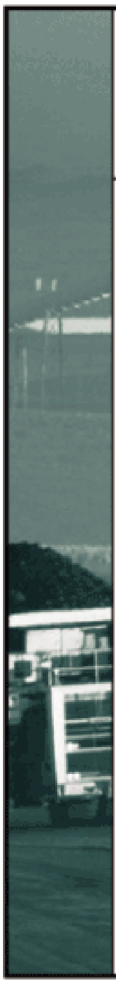
Since 1970, coal has been used in increasingly clean ways in the U.S.



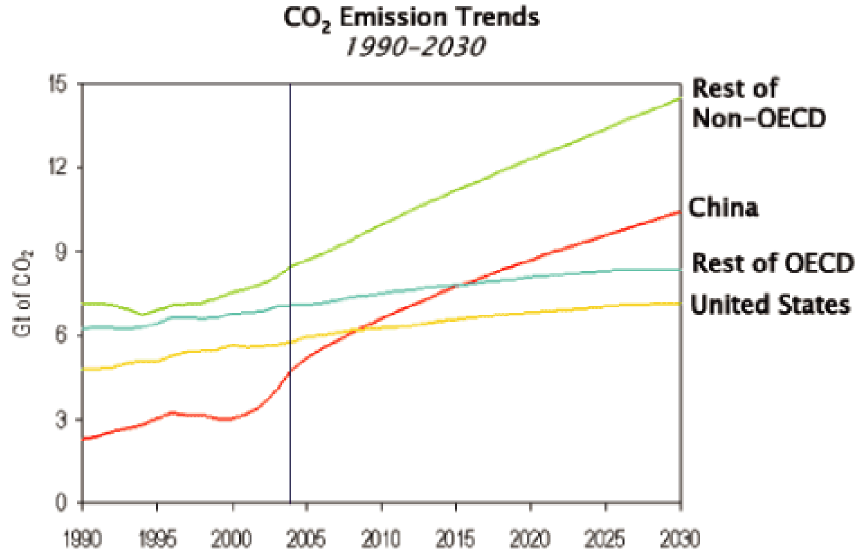
- More progress is expected under existing regulations
- Higher efficiency rates and the eventual deployment of coal gasification technologies create opportunities for reducing carbon intensity as well

NO_x (Nitrogen Oxide), SO_2 (Sulfur Dioxide), PM_{10} (Particulate Matter)

Source: NMA



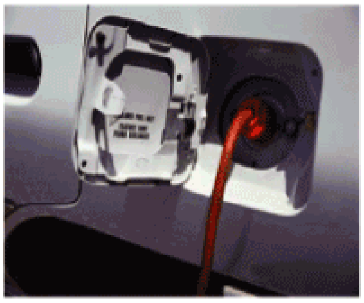
Developed world must adopt climate solutions and export these to developing nations



- China likely surpassed the U.S. in greenhouse gas emissions in 2007
- The growth rate of greenhouse gas emissions in developing nations is likely to significantly exceed that of the developed world

Source: IEA World Energy Outlook 2006, *Guardian*

Over the long-term, clean-coal technologies can broaden market demand for coal



- A plug-in hybrid is one entry for coal into the transportation market
  - *Likely to create significant off-peak demand for electricity*
- Coal can be converted into transportation fuel
  - *At current oil prices, coal-to-liquids facilities are economically feasible*
- Gasification can reduce emissions & transform coal into pipeline-quality natural gas
  - *IGCC & CCS should enable coal to prosper in a carbon constrained world*

Public policy initiatives aimed at domestic energy security are spurring debate on energy legislation and incentives for clean-coal technology development

Source: ACI

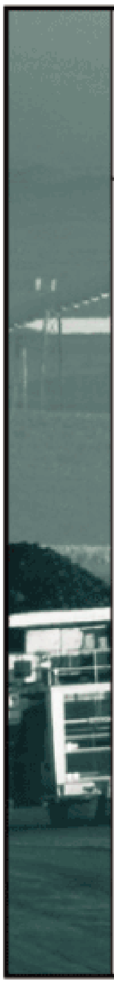
The U.S. coal industry is educating consumers about the benefits of clean coal

- Industry advocacy campaign
  - *High profile, national scope*
  - *TV, radio, print, web, PR*
- Raise awareness and increase support of coal as an American energy solution
- www.americaspower.org

Clean Coal. America's Power.

Source: ABEC

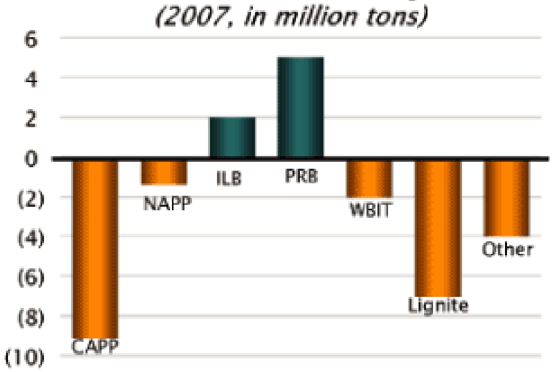

Current Trends
Unearthing Value
Arch Coal, Inc.



U.S. coal market fundamentals strengthened in 2007

U.S. Coal Industry Trends
(2007, in million tons)

Supply Decline by Region
(2007, in million tons)



- Coal consumption rebounded in 2007 due to more normal weather patterns
- Production declined due to supply constraints and rationalization
- These trends reduced the build in generator stockpiles last year
- Current stockpiles at year-end are estimated at 51 days
  - *Arch believes current levels are in target range*

* *Coal consumption for electric generation*

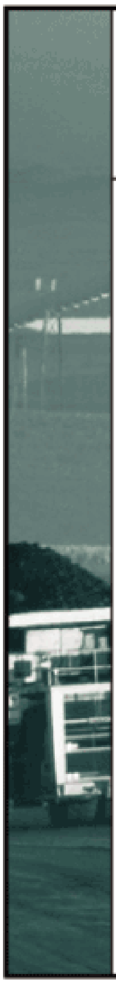
Source: ACI, NMA and MSHA

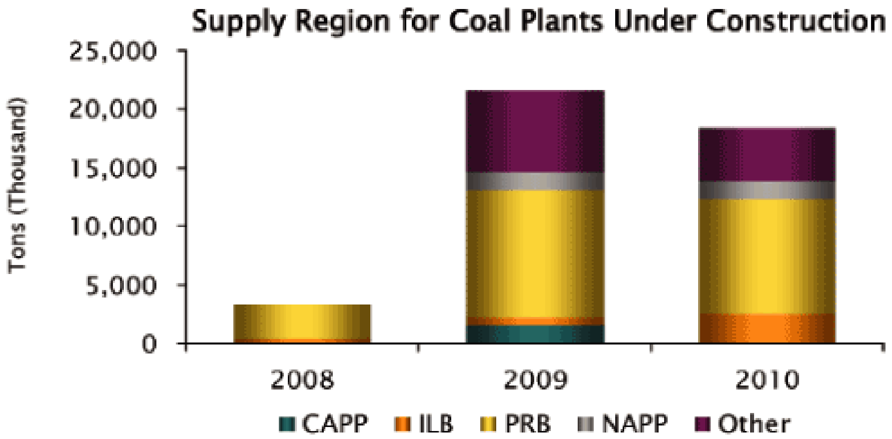
Robust international coal markets are influencing domestic coal markets

- In 2007, U.S. coal exports reached highest level since 2000
  - *Strong export market driven by higher coal consumption in Asia coupled with severe supply constraints in traditional export nations*
  - *Weak U.S. dollar*
  - *Growing global steel demand*
- U.S. import growth muted as supply is diverted into seaborne trade
- In 2008, U.S. coal exports likely to increase further
  - *U.S. coal increasingly valued for purposes of supply diversification*

Source: ACI, NMA and MSHA

Largest coal plant build-out since 1980 will meaningfully expand coal demand



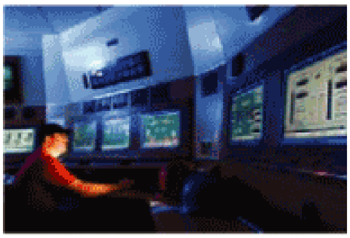
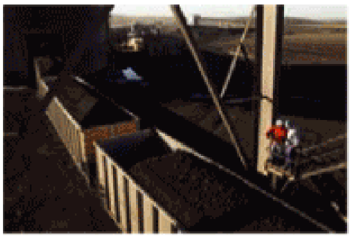


- Build-out of 14 GW translates into 50 million tons of new annual coal demand over next four years, with substantial increases in 2009 and 2010
- Arch's reserve base strategically positioned to service more than two-thirds of these new plants
- Another 8 GW—representing an additional incremental 30 million tons—is currently in advanced permitting stages

Source: Platts and ACI

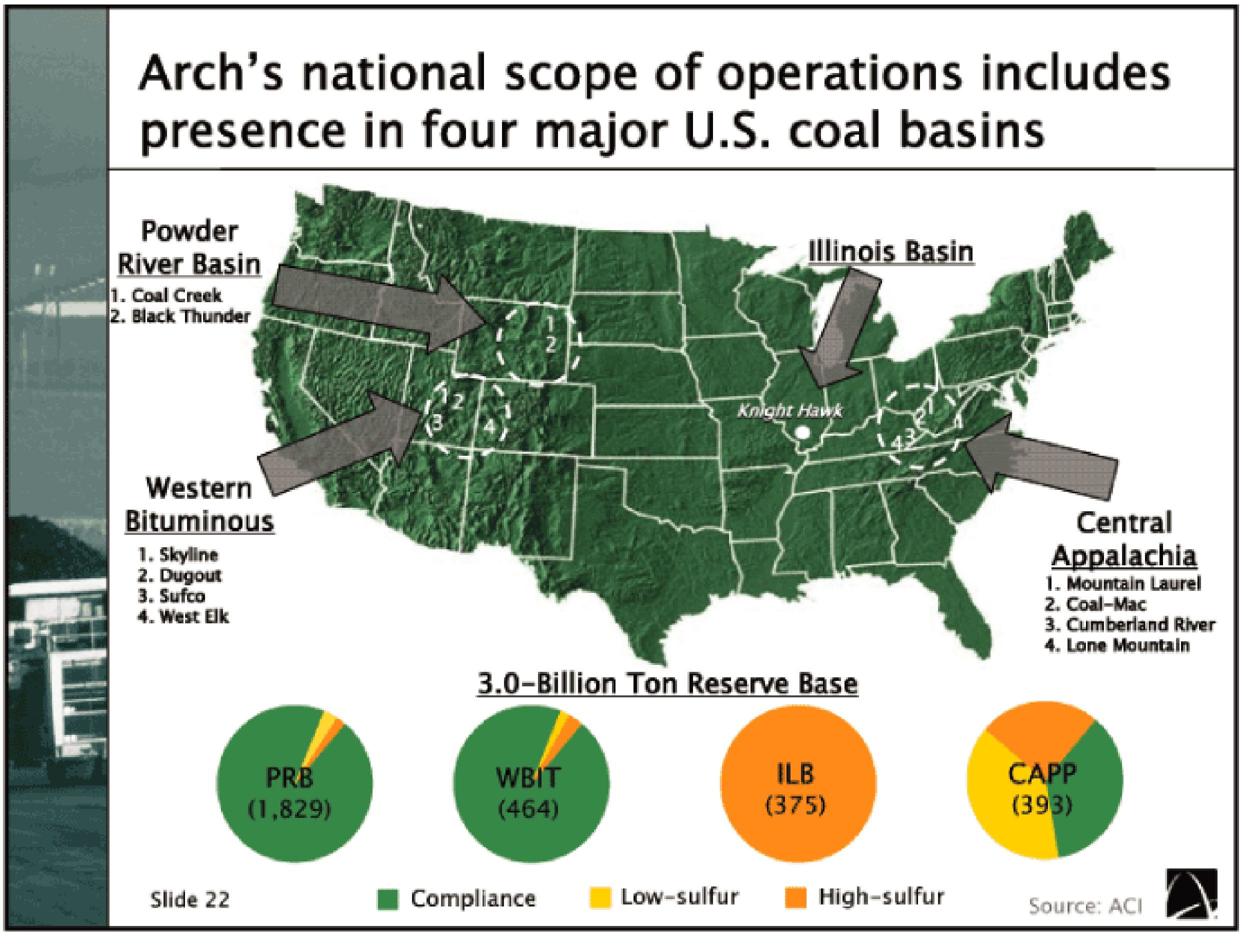

Arch Coal
Unearthing Value
Arch Coal, Inc.

About Arch Coal, Inc.

- One of the largest coal producers in the U.S.
- Core business is providing U.S. power generators with clean-burning, low-sulfur coal for electric generation
  - *Supplies roughly 12% of U.S. coal needs*
  - *Provides source fuel for roughly 6% of U.S. electricity*
- Talented workforce operates large, modern mines
- Industry leader in mine safety, land reclamation and productivity

Source: ACI


Arch's national scope of operations includes presence in four major U.S. coal basins
Powder River Basin
1. Coal Creek
2. Black Thunder
Illinois Basin
Knight Hawk
Western Bituminous
1. Skyline
2. Dugout
3. Sufco
4. West Elk
Central Appalachia
1. Mountain Laurel
2. Coal-Mac
3. Cumberland River
4. Lone Mountain
3.0-Billion Ton Reserve Base
PRB (1,829)
WBIT (464)
ILB (375)
CAPP (393)
Slide 22
Compliance
Low-sulfur
High-sulfur
Source: ACI

Arch's mines are strategically positioned to capitalize on improving market trends

Central Appalachia

- Timing of start-up of Mountain Laurel longwall on Oct. 1 was advantageous
- Flexibility to sell 4-5 million tons into international and domestic met and PCI markets

Western Bituminous

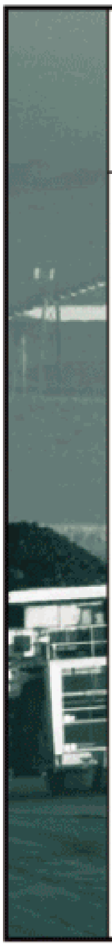
- Supply pressures in eastern U.S. will influence pricing
- Arch benefits as largest producer
- Recently signed significant export business

Powder River Basin

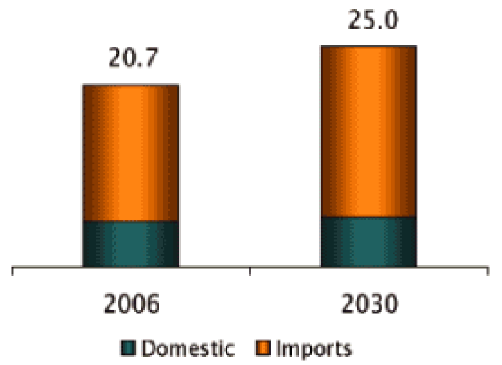
- Supply constraints and sufficient PRB rail capacity should pull coal east
- Arch should benefit from rising domestic prices
- In discussions to export coal

Source: ACI

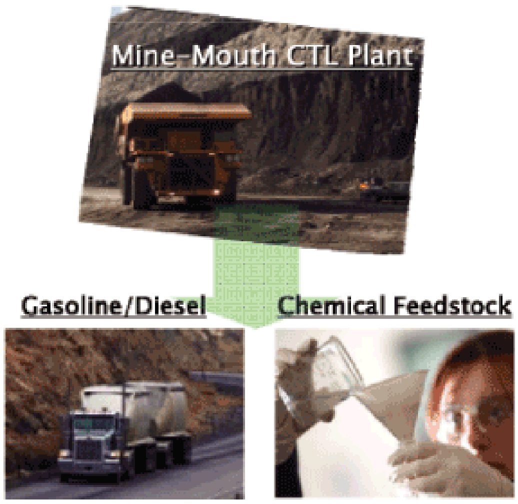
Arch is advancing clean-coal technology development via a CTL plant in Wyoming



U.S. Refined Product Consumption
(in million bbls per day, per EIA)



- Domestic oil consumption needs are growing, and increasingly will be supplied by imports
- CTL can have a positive impact on the U.S. economy, security & environment



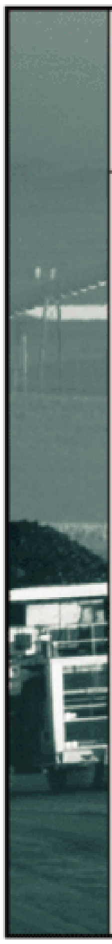
- Arch owns an equity interest in DKRW Advanced Fuels
- Proposed 13,000 bpd facility will capture CO_2 for enhanced oil recovery

Source: EIA and ACI

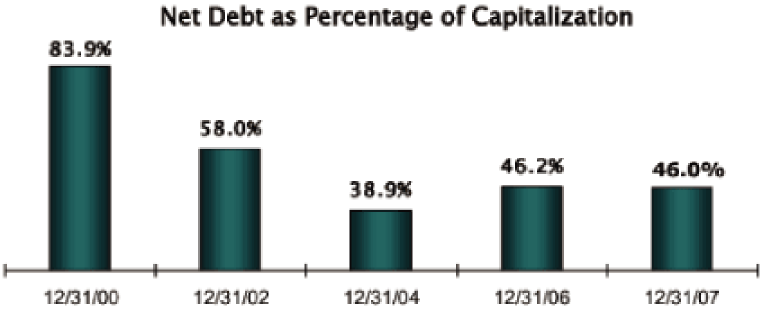
Arch's future success hinges on three key pillars of performance

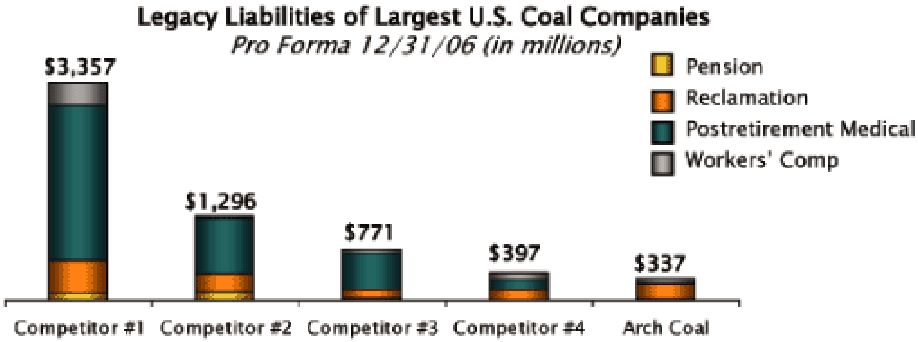
- **Operating the world's safest coal mines**
  - *Recognized in 2006 and 2007 with MSHA's Sentinels of Safety award for the nation's safest underground coal mines*
  - *2007 was second-best year on record for total incident rate*
  - *Outperformed the industry safety average by 2.5 times last year*
- **Acting as responsible citizens and environmental stewards**
  - *Third National Good Neighbor Award in past four years*
  - *2007 was Arch's best year on record for environmental compliance*
- **Achieving industry-leading productivity rates**
  - *Operated three of top ten most productive longwall mines last year*
  - *Surface mines produced 170% more tons per hour worked than industry average in 2007*

Source: ACI and Public Sources



Arch has one of the industry's strongest and cleanest balance sheets





Source: SEC filings compiled by ACI

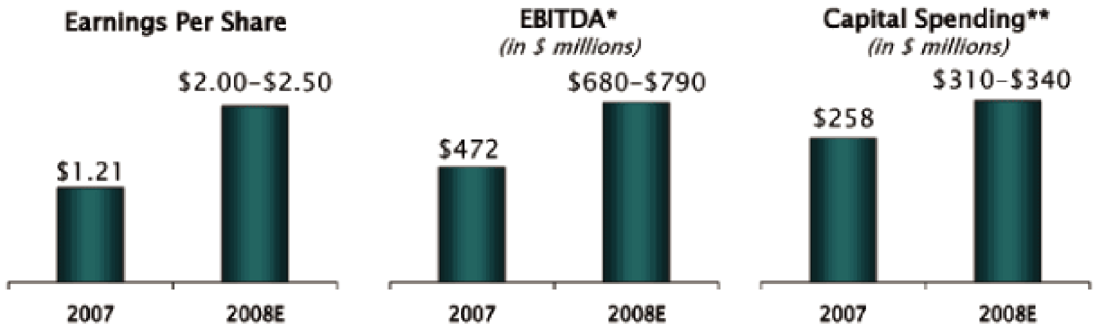
Arch's market-driven strategy in 2007 laid the foundation for future success

- Reduced production targets during the weak market cycle
  - *Preserved value of reserves for future periods*
- Lowered capital spending
  - *Matched spending with market demand and reduced production levels*
- Focused on cost control
  - *Reoriented mines to maintain production flexibility*
- Remained patient in sales contracting
  - *Layered in sales contracts as prices rebounded*
- Maintained unpriced position for future periods

Our strategy delivered Arch's second-best year for earnings despite a weak coal cycle in much of 2007

Source: ACI

Arch expects a record performance in 2008



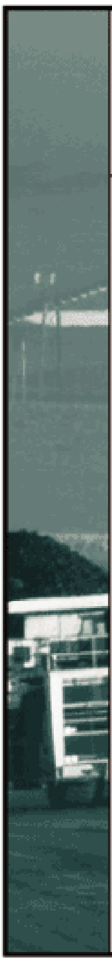
- Arch expects significant expansion in earnings per share and adjusted EBITDA
- Continue to execute a market-driven approach with leverage to the upside potential in coal markets

Unpriced Volume (in million tons)	2008	2009	2010
	15-25	85-95	95-105

- Attractive valuation vis-à-vis coal peers

** Refer to EBITDA reconciliation at end of presentation*
*** Excluding reserve additions*

Source: ACI



Arch continuously evaluates all avenues for value creation

Organic Growth
Invest in core businesses to enhance profit growth and return on capital, evaluate opportunities to further upgrade and expand reserve base

Strategic Growth
Consider acquisitions or other investments that strategically fit, are accretive and create value

Shareholder Returns

Market Expansion
Consider investments to expand market for coal (and improve coal's value proposition) through Btu-conversion and other advanced coal technologies

Capital Structure Enhancement
Maintain strong balance sheet, and consider other vehicles for value creation, such as share repurchases or dividend increases, when advantageous

Source: ACI

EBITDA Reconciliation Chart

Arch Coal, Inc. and Subsidiaries
Reconciliation of Non-GAAP Measures
(In thousands, except per share data)

Included in the accompanying release, we have disclosed certain non-GAAP measures as defined by Regulation G. The following reconciles these items to net income as reported under GAAP.

Adjusted EBITDA:

Adjusted EBITDA is defined as net income before the effect of net interest expense; income taxes; our depreciation, depletion and amortization; expenses resulting from early extinguishment of debt; and other non-operating expenses.

Adjusted EBITDA is not a measure of financial performance in accordance with generally accepted accounting principles, and items excluded to calculate Adjusted EBITDA are significant in understanding and assessing our financial condition. Therefore, Adjusted EBITDA should not be considered in isolation nor as an alternative to net income, income from operations, cash flows from operations or as a measure of our profitability, liquidity or performance under generally accepted accounting principles. We believe that Adjusted EBITDA presents a useful measure of our ability to service and incur debt based on ongoing operations. Furthermore, analogous measures are used by industry analysts to evaluate operating performance. Investors should be aware that our presentation of Adjusted EBITDA may not be comparable to similarly titled measures used by other companies. The table below shows how we calculate Adjusted EBITDA.

	Year Ended December 31, 2007	Targeted Results Year Ended December 31, 2008	
		Low	High
	(Unaudited)	(Unaudited)	
Net income	$ 174,929	$ 290,000	$ 362,000
Income tax (benefit) expense	(19,850)	25,000	58,000
Interest expense, net	72,265	85,000	80,000
Depreciation, depletion and amortization	242,062	280,000	290,000
Expenses from early debt extinguishment and other non-operating	2,273	-	-
Adjusted EBITDA	$ 471,679	$ 680,000	$ 790,000