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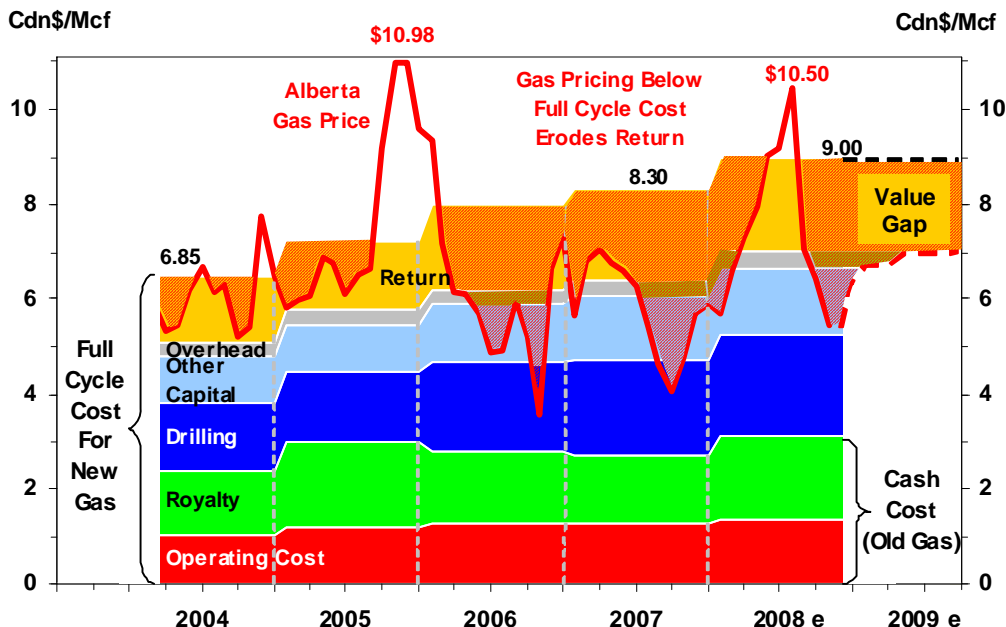
Calgary, Nov. 24, 2008

Western Canada 22nd Reserve Replacement Cost Study Financial Challenges for the Canadian E & P Industry

Ziff Energy has analysed cost and reserve data from 77 companies (producers and royalty trusts) and issued its 22nd consecutive Western Canada Reserve Replacement (Finding & Development) Costs Study. Finding & development cost escalation and rising operating costs have a significant impact on the cost of bringing on new natural gas supply from the 9 strategy regions. The **average ‘full cycle’ cost of new natural gas supply in Western Canada, including a 15% return on capital (F&D cost) Before Tax, has more than doubled to Cdn\$8.30/Mcf in 2007** from 2000. Ziff Energy estimates 2008 ‘full cycle’ cost at Cdn\$9.00/Mcf, 20% higher than the Cdn\$7.50/Mcf received by producers at the Alberta Gas Plant Gate in 2008 (10 months year to date), and far above the 2009 calendar gas ‘price strip’ (futures forecast).

Figure 1 contrasts the full cycle average cost of new gas supply (showing the main cost components) with the AECO price (red line) of gas in Alberta, including the 2005 spike caused by Hurricanes Rita and Katrina, and the sharp price slide in 2006. *In the last 3 years, the gas price Canadian producers receive has generally been lower than the full cycle cost for new gas, so producers will earn a lower or even no return on this new gas.*

**Figure 1
 Western Canada Full Cycle Gas Cost vs. AECO Price**



The Western Canada Finding & Development Study focuses on reserve replacement cost analysis for 9 natural gas strategy regions including Foothills, Tight Gas, and Coal Bed Methane, plus 5 conventional oil strategies, which are based on similar geological plays, depths, and development characteristics. **Some findings** of the 2008 study:

- F&D cost for industry to find and develop new natural gas reserves has *tripled* since 2000, due to both smaller reserve targets and much higher input costs to buy land, drill, and develop
- *most gas strategies show an increasing F&D cost*; highest F&D cost areas are generally the most remote, with limited access and infrastructure, including the new shale gas play
- *F&D gas costs vary by over Cdn\$4/Mcf* from the lowest cost strategy to the highest cost
- *gas completions are down 19%* in the first 10 months of 2008 compared to 2007; the pie chart shows 2007 completions, down 17% from 2006
- *unconventional gas* (Tight Gas and CBM) has high production growth, reserve replacement, and reinvestment with low F&D costs.

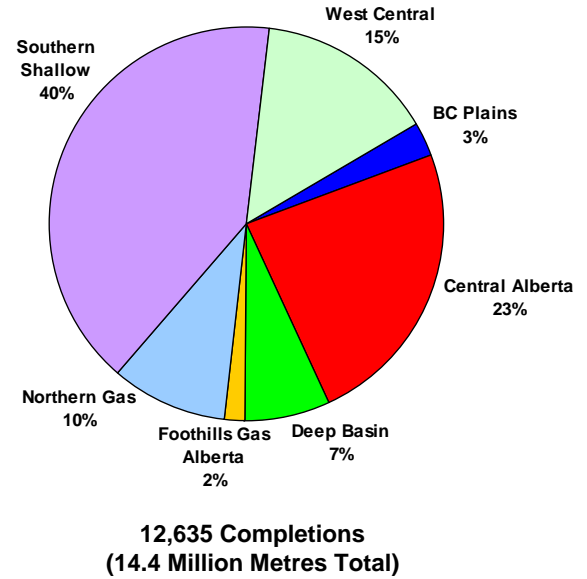


Figure 2 shows the 7 conventional, 2 unconventional gas strategies, and the emerging Shale Gas areas:

**Figure 2
Western Canada 9 Gas Strategies**

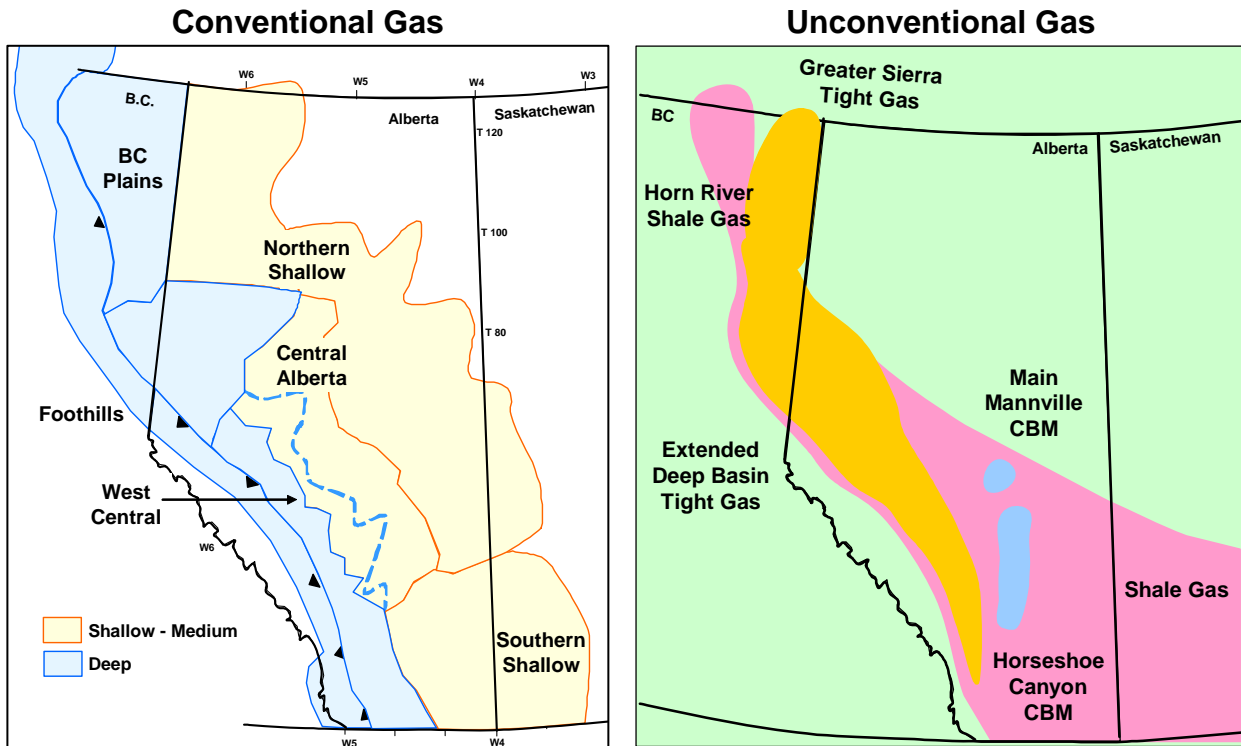
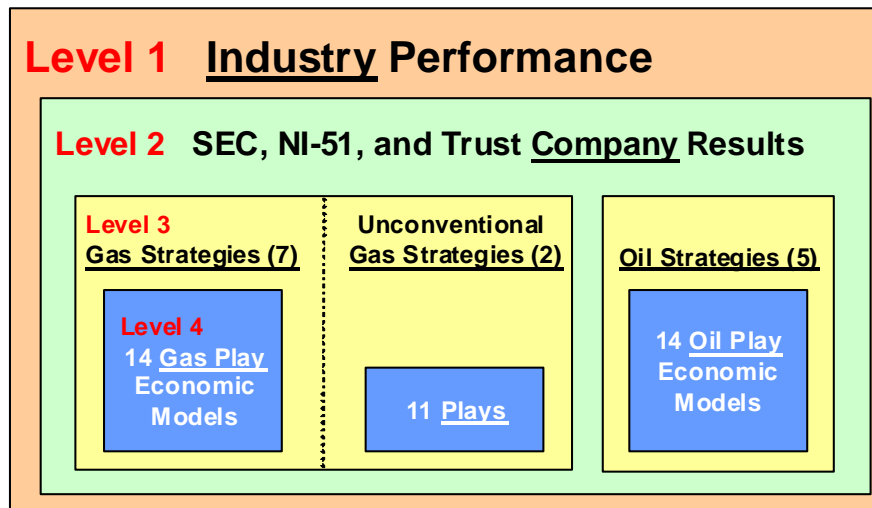


Figure 3 shows the 4 levels of reserve cost analyses (Industry, Company, Strategy Area, and Play) presented in this study. The 100+ page study analyses costs and their impact, drawing on the world's largest private cost database in B.C., Alberta, and Saskatchewan, *spending from participating companies*, as well as proprietary Ziff Energy analysis of industry databases, and public reporting by 77 companies and royalty trusts. Ziff Energy has the highest quality, *actual cost data* available on Western Canada. Important features are the *'buy reserves vs. drill'* comparisons with *Sayer Energy Advisors* acquisition data, and the *value of oil and gas* found in 39 play types, calculated by *Sproule Associates*.

Figure 3
4 Levels of Reserve Cost Analysis

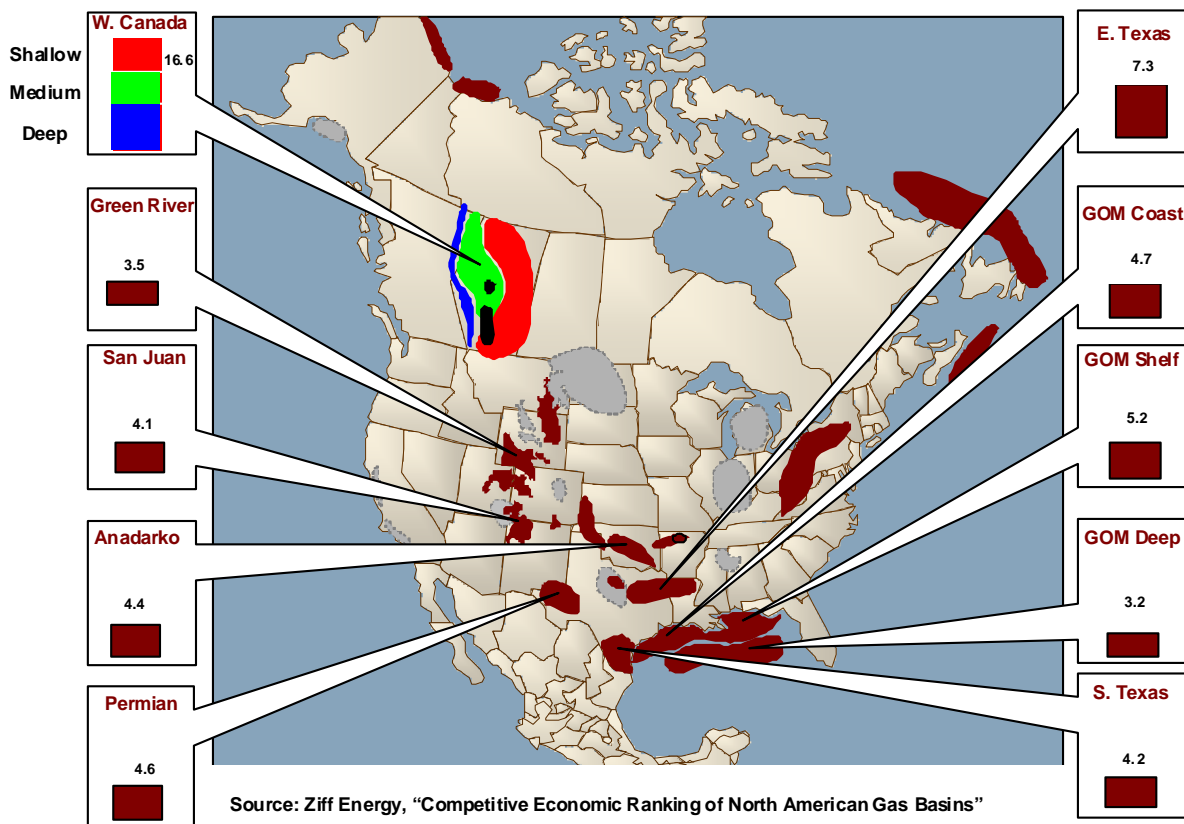
Conventional & Unconventional Gas
Conventional Oil



$$\text{Finding \& Development Cost} = \frac{\text{Proven Reserve Changes}}{\text{Actual Capital Costs (not estimates)}}$$

In Spring 2008, Ziff Energy completed a major report that compares the ‘full cycle’ cost the top 25 gas supply basin sources in North America. For example, full-cycle Tight Gas costs in Western Canada are compared to Greater Green River, Uinta-Piceance, East Texas-North Louisiana, South Texas, and Arkoma. CBM in Western Canada ‘full cycle’ costs are compared to Powder River, San Juan, and Raton basins. Similarly, for Shale Gas, full-cycle costs for Barnett, Woodford, and Fayetteville are analysed. Figure 4 illustrates some of the North American basins included in the comparison study. The study concluded that most of the Canadian gas strategies are less economically attractive than the competing American gas basin strategies, providing technical specifics that explain why cost are higher in Canada, and returns are lower, as shown in Figure 1, and demonstrated by the sharp decline in Canadian gas drilling at a time when U.S. gas spending is at 2 decade highs.

**Figure 4
North American Gas Basins**



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For more insight from Canada’s largest energy consultancy, based on real cost data on the Western Canada provinces, contact Paul Ziff, CEO, at (403) 234-4276, paul.ziff@ziffenergy.com, or Bill Gwozd, P.Eng., Vice President, Gas Services, at (403) 234-4299 (bill.gwozd@ziffenergy.com).

Ziff Energy Group, founded in 1982, is a leading North American gas consulting firm, celebrating its 25th year of service to Clients in the private and public spheres. On an international basis, Ziff Energy provides sophisticated industry and operational business analysis and custom consulting to the world wide energy industry. We have offices in Calgary and Houston, the primary oil and gas centers in North America. Our growing staff of 55+ includes many **industry specialists**, with **15 to 30 years of domestic and international experience**. Ziff Energy has completed over 165 upstream benchmarking studies in 20+



countries,
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