

# ***Making Money in Oil and Gas Stocks***

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Thank you and Good Morning ladies and gentlemen. It is an honor to be here in Calgary, and I appreciate your attention. The Summary and Recommendation for my topic of Making Money in Oil and Gas Stocks is spread over five slides that I will go over briefly before going into detail.

## Summary and Recommendation

- Invest in oil and gas stocks to act on energy demand, supply, environmental and geopolitical expectations.
- Energy equity in diversified portfolio:
  - 10% Modest, 15% Neutral
  - 20% Moderately Concentrated
- Analyst's portfolio
  - 50% Energy
  - 50% Inflation linked bonds, gold, cash

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Investing in oil and gas stocks is the action we can take to capitalize on the insight we gained from the excellent presentations that we have heard covering energy demand, supply, environmental and geopolitical expectations.

In a diversified global equity portfolio the energy component might typically range from 10 to 20%. In my own case, energy equity accounts for half of my total investable portfolio with the other half primarily in inflation-linked bonds, along with some gold and some cash

## Summary and Recommendation Continued

- Patience may be required
  - No stocks above 200 day ave. (March 4)
  - Only a few stocks above 50 day average (March 4)
- Stocks valued on 7% real return on \$40 oil, \$5 natural gas (March 4)

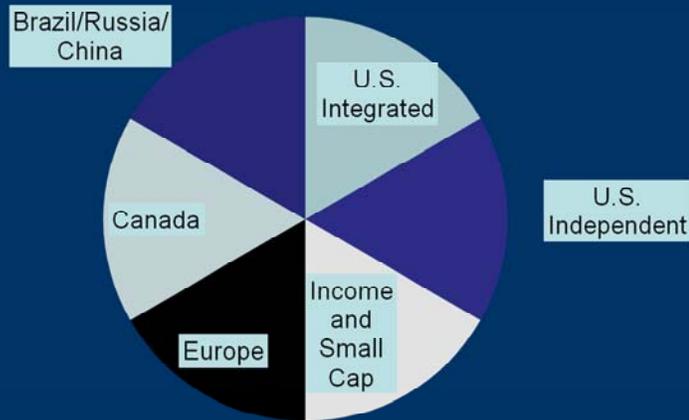
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Some patience may be required because stocks are still in a down trend compared to the 200 day average although more issues are increasingly trading above the 50 day average.

Meanwhile on a long-term basis. I estimate that energy stocks purchased at today's prices would deliver a 7% unlevered real return at low, long-term prices of \$40 a barrel for oil and \$5 a million btu for natural gas. After a powerful advance in the past month, those numbers are about 10% higher.

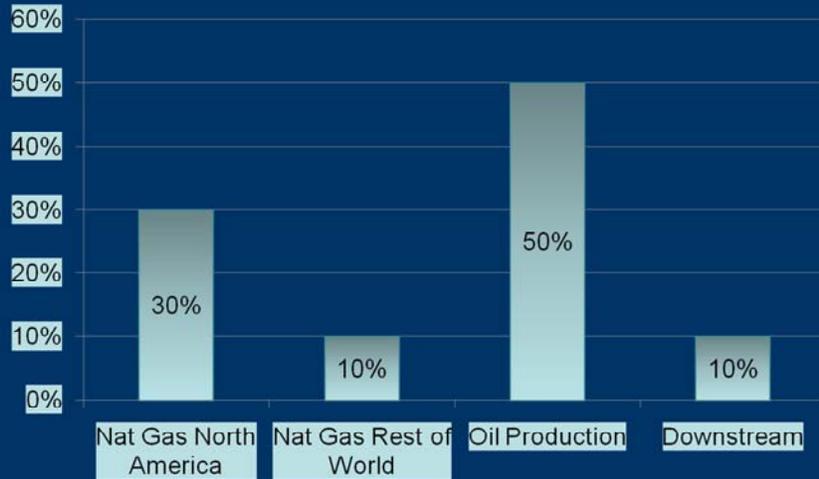
## Summary and Recommendation Energy Sectors



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My recommendations cover six energy sectors. Three are mostly geographic. The first is Europe. In the second I combine Brazil/China/Russia. The third is Canada. The other three sectors are mostly U.S. stocks – Integrated, Independent and Income and Small Cap. Essentially, I am suggesting an equal weighting in each of these six sectors. Since my research concentrates on oil and gas producers, I have no recommendations in other sectors such as oil service or energy utilities.

## Summary and Recommendation Energy Business Segments



Depending on the stocks selected the portfolio would have representation in four business segments. The approximate weightings I like may be 30% North American Natural Gas, 10% Rest of World Natural Gas, 50% Oil Production and 10% Downstream.

## Summary and Recommendation Recent Buys

ExxonMobil (XOM)	ConocoPhillips (COP)
Total S.A. (TOT)	StatoilHydro ASA (STO)
PetroChina (PTR)	Gazprom (OGZPY)
Devon Energy (DVN)	EOG Resources (EOG)
Encana (ECA)	Canadian Oil Sands Trust (COSWF)
Cimarex Energy (XEC)	Hugoton Royalty Trust (HGT)

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Here are the twelve stocks for a diversified energy portfolio that I'll be talking about in more detail. Exxon Mobil and ConocoPhillips are from the US integrated group. Total, the French company and StatoilHydro, the Norwegian company are from my European category. PetroChina, and Gazprom represent emerging markets. Devon Energy and EOG Resources are dynamic, independent natural gas producers. Encana and Canadian Oil Sands Trust are well known here in Calgary. Finally, small-cap Cimarex Energy, and income stock, Hugoton Royalty Trust round out the selections.

## Seek Low McDep Ratio

Market Cap and Debt

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Present Value of Oil and Gas  
and other businesses

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Now that you know where I'm going I will try to explain how I attempt to make the fundamental analysis of oil and gas producers understandable. I summarize my analytical work with my McDep Ratio. The numerator of the ratio is Market Cap and Debt also known as Enterprise Value. The denominator of the ratio is Present Value of oil and gas resources and other businesses. You'll see that the name of the ratio comes from the M and c in Market Cap, De in Debt and p in Present Value.

I call it an unlevered ratio, because it is calculated before taking account of debt, i.e. financial leverage. I developed it soon after US Steel acquired Marathon Oil in 1981. After the acquisition was financed entirely with debt, the new company had an extraordinarily low ratio of stock price to net present value, a measure that I and others used regularly. That seemed misleading. Looking for an alternative, I thought taking the total value of US Steel, equity and debt, and comparing it to all of its assets before subtracting debt was more reasonable. As a result, I found myself comparing all of my stocks on the new basis. After saying "market cap and debt to present value" so frequently and often too fast, it started to sound like "McDep".

## Neutralize Leverage

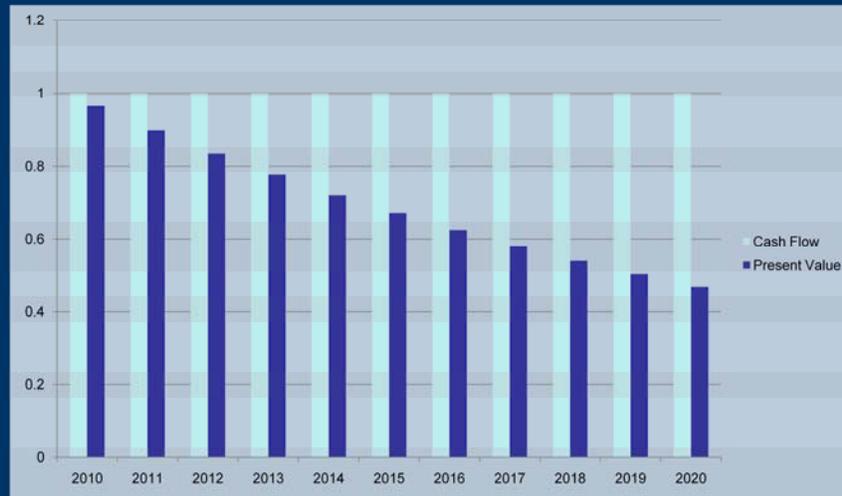
- Measure weights of portfolio stocks by Market Cap and Debt a.k.a. Enterprise Value, not just Market Cap
- Control financial leverage by asset class rather than by stocks, i.e. allocation to bonds (or borrowings against portfolio)

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By itself debt, adds nothing to value. Yet we frequently see performance comparisons that say one stock went up more than another without any reference to whether the underlying companies had high or low financial leverage. Sometimes performance comparisons are risk adjusted, which takes account of leverage indirectly along with other risk factors. At the negative extreme, underappreciation of the consequences of too much leverage is a root of the current global financial crisis.

I suggest controlling, or neutralizing leverage in the portfolio in two steps. In one step weight stocks by Enterprise Value rather than market cap. Basically that means own more of low-debt stocks and less of high-debt stocks. In the second step control leverage of the whole portfolio by asset class. To add sensitivity to the typical portfolio, just own less bonds.

## Present Value of a Resource

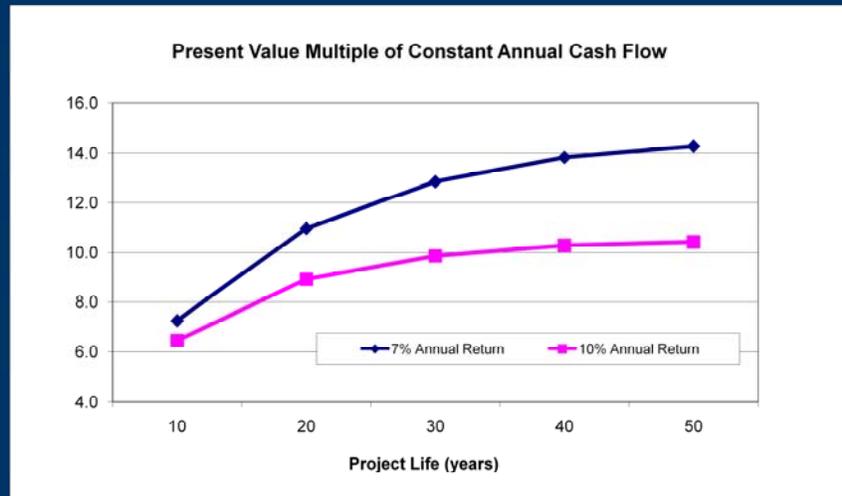


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With debt under control, let us now focus on value. My model for valuing an oil and gas company is to estimate the present value of its oil and gas resources. In its most comprehensive form, present value analysis involves projecting cash flow for years into the future. On the slide I illustrate 11 years of constant annual cash flow. Then those cash flows are discounted at an annual rate of return that I set at 7% per year.

I see that as a 7% real return or return after inflation. For that to be the case, I would project cash flows without adjustment for inflation. Thus, I am assuming that revenues, or cash inflows, would go up at the same rate of inflation as costs, or cash outflows. For example, if the rate of inflation were 3% a year I could add 3% inflation adjustment to both revenues and costs and add 3% to the discount rate. In that case discounting the inflated cash flows by 10% a year and adding them up would get much the same present value as ignoring inflation and using a 7% discount rate.

## Present Value of Flat Trend

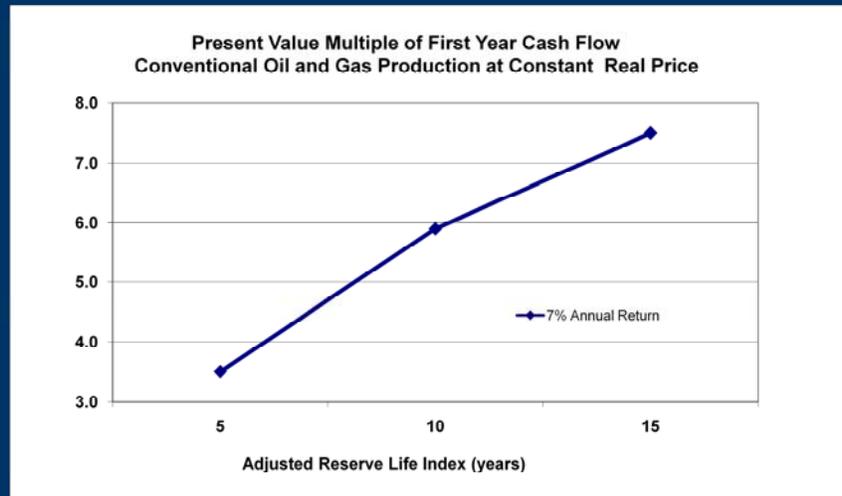


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After doing a lot of cash flow calculations, it becomes apparent that the result can be approximated by a multiple of annual cash flow. I show what the multiple would be for a constant annual cash flow depending on life of the project. It is only logical that a longer life cash flow stream would be worth a higher multiple than a shorter life cash flow stream. If constant annual cash flow lasts 10 years, the multiple would be little more than six times at a 10% annual return and more than 7 times at the 7% annual return I use.

For a very long life project the multiple levels out at the reciprocal of the discount rate. An oil sands mine and upgrader would be an important example of project capable of a constant annual cash flow for a long time. If you can visualize a constant annual cash flow at a particular oil price and after covering capital investments needed to keep cash flow flat, present value at a 7% real return would be about 14 times annual cash flow before adjustment for inflation.

## Present Value - Declining Volume

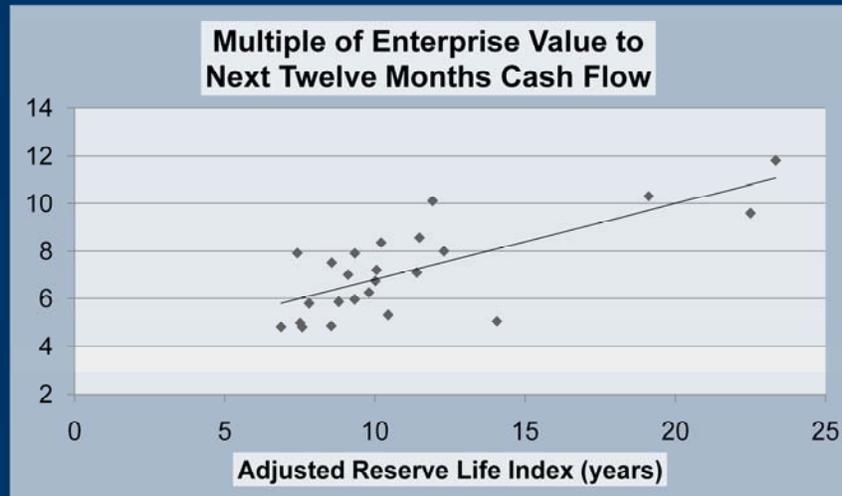


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However most oil and gas properties have a declining production trend. Volume and cash flow will be higher in the earlier years and lower in the later years. The typical property or company with a ten year reserve life index might have production that declines at 10% a year and lasts for 20 years. As a multiple of first-year cash flow that company would be worth six times at a 7% real return.

Of course, companies are more dynamic and are always striving to develop new projects to grow production or to keep production at the current level. I handle that in the present value model by assuming that each company can reinvest at the discount rate. If that is true, then the present value of the company that returns money to shareholders will be the same as for one that reinvest in new projects. On that reasoning, I estimate the same present value for oil and gas properties, whether they are held in an income trust or an operating company.

## Recent Enterprise Value Multiple



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Despite the simplicity of our model we see that it is not far from reality. Companies in my coverage were priced recently at about six times unlevered cash flow for a 10 year reserve life index. The line slopes upward with higher multiples for longer life, which is the way I think it should be in the present value framework. Thus, multiple of cash flow depending on reserve life that we illustrated mathematically also has validity in the market place.

After I have explained the technique and justification for calculating the McDep Ratio, you might ask if it works. In my experience, low McDep Ratio stocks outperform high McDep Ratio stocks. Yet there are exceptions. In a bear market, for example, financial weakness can overwhelm long-term value. Moreover, inputs to the calculation, like commodity prices, are not readily predictable. Further, market prices sometimes tell a different story before it becomes obvious in fundamental analysis. In the end, I can be confident in relating resource value characteristics to stock price with the McDep Ratio, but like any of us, I will still not know the future.

With those humble qualifiers, let us look at some stocks to buy, starting with the US Integrated group.

## U.S. Integrated

	ExxonMobil (XOM)	ConocoPhillips (COP)
Natural Gas North America	5%	13%
Natural Gas Rest of World	27%	10%
Oil Production	46%	60%
Downstream	21%	17%
McDep Ratio (4 Mar)	0.75	0.49
Nugget	Income Model	Emulate XOM

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I'll be talking about each of six groups in order of their market size. The US Integrated group has the most market cap as it includes Exxon Mobil, the largest company in the world.

The unrecognized business segment story in Exxon is the doubling of concentration on Rest of World Natural Gas to 27% from 13% five years ago. That is good strategically because natural gas has higher long-term volume growth prospects than oil. Another unrecognized feature of the most well-known oil company is that it has found a way for a mega-size resource company to beat the limits of growth. By returning cash to investors on a tax-efficient basis through share purchase, the company has turned a flat volume trend to a growth trend of 4% a year. The profit growth is higher because production today is more profitable per equivalent barrel. I have also likened share repurchase to the income model by adding the 4% repurchase rate to a 2% cash dividend to get a 6% real return before considering enhancement to principal.

ConocoPhillips offers Exxon type value at a one-third unlevered discount. That follows from a McDep Ratio one-third lower than ExxonMobil's. The levered discount is even greater at a half. In other words, COP's ratio of stock price to net present value is half that of XOM. COP is a partner with XOM in Alaska and in Canada's Syncrude oil sands venture. COP's natural gas concentration is in North America where it is the top producer. Having built COP to mega cap size and quality with advantageous deals, CEO Jim Mulva now can strive to emulate XOM in management execution. Like XOM, COP reduced share count last year while this year the focus will be more on reducing debt toward XOM's low level.

## Europe

	Total S.A.	StatoilHydro ASA
Natural Gas North America		
Natural Gas Rest of World	25%	50%
Oil Production	52%	50%
Downstream	23%	
McDep Ratio (4 Mar)	0.57	0.57
Nugget	Candid Leaders	Indigenous Oil and Gas

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Europe is the second largest group by enterprise value or market cap in my coverage.

Having little oil or natural gas resources in its home country, by necessity, Total has developed a diversified international portfolio. The stock offers proportionately more representation in oil production in Africa, the major oil companies' best source of volume growth in recent years. The French company is also proportionately stronger in liquefied natural gas, the faster growing, internationally traded clean fuel. Among its peers who also pay high dividends in today's market, Total stock pays a nice 6% in cash that is not likely to be reduced and more likely to increase at least at the rate of inflation. A 6% real yield from a financially strong company looks likely to beat government inflation-linked debt by a wide margin. Finally, I like the fresh perspective Total management brings to the oil business and appreciate the willingness of its leaders to express their insight candidly.

The value of natural gas and oil is about equal for StatoilHydro. Oil production accounts for most of current cash flow and natural gas for the most growth potential. The dominant producer in the waters offshore Norway, the company has advanced technological skills for operating in deep waters and under Arctic conditions. The experience supports the rationale to expand abroad in Russia, Africa, Brazil and the deep Gulf of Mexico. Meanwhile, indigenous Norwegian oil and gas is valuable strategically and politically to Europe which also depends heavily on imports from beyond its borders. A 6% dividend yield makes the stock attractive for income.

## China/Russia/Brazil

	PetroChina (PTR)	Gazprom (OGZPY)
Natural Gas North America		
Natural Gas Rest of World	17%	88%
Oil Production	66%	12%
Downstream	17%	
McDep Ratio (4 Mar)	0.51	0.25
Nugget	Domestic Demand Growth	Political Risk, Contrarian Idea

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Investors willing to carry geographic diversification further to PetroChina saw a ten-fold stock price increase on the New York Stock Exchange in the 2000s before the recent market pullback. In the Shanghai market the stock became the world's first trillion dollar market cap. While that is bit exaggerated because only 14% of the stock is publicly held away from the government, it is no exaggeration to say that the company is fundamental to the growth of China. That implies that price controls on natural gas and refined products as well as an excise tax on domestic oil production are likely to be relaxed to assure continued investment in growth. Despite those restrictions, the stock's multiple of unlevered cash flow is below 6 times while adjusted reserve life index is a long 14 years. The dividend yield is about 5% with no foreign tax withheld from payment to U.S. investors.

At a McDep Ratio half of PetroChina's low ratio, stock price for Gazprom apparently reflects a heavy discount for political risk rather than operating or commodity risk. U.S. diplomacy seems to me to have been counterproductive the past few years. A new administration may bring a new approach that works better. Despite difficult political conditions, major oil companies have a long history of ultimately prospering. Gazprom can do so as well starting as it does with the largest natural gas producing, pipeline and distribution business in the world. The company has less than ten years of experience attempting to operate under normal business practices. I am optimistic that smart people can figure it out because the prize for the Russian economy and for investors is rich. Finally, investors who are still wary of political risk in one stock might spread participation among three other China/Russia/Brazil stocks in my coverage.

## U.S. Independent

	EOG Resources (EOG)	Devon Energy (DVN)
Natural Gas North America	75%	67%
Natural Gas Rest of World	5%	
Oil Production	20%	33%
Downstream		
McDep Ratio (4 Mar)	0.54	0.44
Nugget	Internal Growth	35 Year Record

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In the next large cap group, U.S. Independents, my picks are two stocks with natural gas concentration because I want more natural gas than the larger integrated companies offer. I also look for low McDep Ratio and feel more comfortable if debt is low as it is in the two companies I will discuss further.

Generally eschewing acquisition, EOG Resources finds and develops new reserves by drilling on lands it has accumulated on the basis of its geologic and economic analysis. Looking for ways to apply the improving technology of horizontal drilling with multiple fracturing treatments, EOG has gained large acreage positions prospective for oil and gas in tight shale rock including the Barnett in Texas, the Bakken in North Dakota and Horn River in British Columbia. Indeed the industry has been a victim of its own success in shale as new production has come on stream just as the economy and natural gas demand turned down. The resulting low stock prices offer attractive opportunities for investors to position for the expected cyclical recovery and for long-term growth.

Devon Energy got its leading position in the Barnett Shale by acquiring the company that initiated the play and followed up with another when the play heated up. Most of remaining natural gas production for the company is in onshore areas of the largest natural gas producing states. Cash flow margin is high because Devon controls its own processing plants. Main sources of oil production include thermal recovery in Canada, a carried interest in BP operated fields in Azerbaijan and, prospectively, in the Deep Tertiary Trend in the Gulf of Mexico. I think McDep Ratio is unduly low considering the 35-year record of the company's co-founder and current chairman, Larry Nichols.

## Canada

	Encana (ECA)	Canadian Oil Sands Trust (COSWF)
Natural Gas North America	69%	
Natural Gas Rest of World		
Oil Production	26%	100%
Downstream	4%	
McDep Ratio (4 Mar)	0.62	0.40
Nugget	Canada's Largest	Long Life

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Canada has great oil and gas companies from among which I feature here a natural gas stock and an oil stock.

Encana went beyond the rich legacy resources of its predecessor companies in Alberta to become the largest independent producer in North America. The company became a leader in applying new technology to develop unconventional natural gas resources in the U.S. Rockies with timing that beat U.S. companies in their own back yard. Nor has it lost any ground in Canada with expanding potential in the Montney formation and Horn River formation in British Columbia. While natural gas is important to Encana, oil sands is Canada's mega resource. In another creative effort, the company unlocked production from in situ oil sands largely overlooked under its legacy properties two decades ago. Those properties remain a candidate for a spinoff that has been aborted for now amid the global financial calamity.

For a pure play on long-life oil production it is hard to beat the quality of Canadian Oil Sands Trust as I see it. The trust has a 37% interest in the Syncrude oil sands mine and upgrader built and operated essentially by ExxonMobil/Imperial Oil. The low current McDep Ratio is tied to a present value of US\$42 a unit for the trust at a long-term price of US\$75 a barrel for Light, Sweet Crude in Oklahoma. By the illustration in Slide 10, earlier in my talk, the present value estimate implies sustainable long-term cash flow of US\$3 a unit (ignoring a small adjustment for debt, divide 42 by 14). That level seems readily achievable at current capacity.

Environmental concerns are valid, but disproportionate as long as the world gets more than a third of its energy from coal.

## Income and Small Cap

	Cimarex (XEC)	Hugoton Royalty Trust (HGT)
Natural Gas North America	75%	91%
Natural Gas Rest of World		
Oil Production	25%	9%
Downstream		
McDep Ratio (4 Mar)	0.41	0.32
Nugget	Trustworthy Leader	Debt-Free, Hedge-Free Income

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Some of the most seriously lagging stocks today are in the Income and Small Cap group.

Cimarex is a conservatively managed active driller with a solid long-term record. Operating some 40 rigs at the peak last year, the company increased production 8% in 2009. With the natural gas price collapse, rig use is down to a half dozen or less. Reduced spending and low debt assure financial health through the price cycle. At the same time, a new shale emphasis promises attractive upside. Developed over a few years and enhanced with a property acquisition last year, Cimarex is a dominant producer along with Devon Energy in a play Cimarex calls "Woodford Shale" and Devon calls "Cana", as in Canadian River that runs through it in western Oklahoma.

Hugoton Royalty Trust is representative of a little-known category of U.S. investments that have rewarded income seeking investors in the past and from today's surprisingly low prices are likely to reward investors again in the future. The trust has a 75% net profits interest in three long-life natural gas fields operated by sponsor, XTO Energy. Two of the fields are in Oklahoma and one in Wyoming. In the past, the Wyoming production would sometimes suffer unusually low prices for lack of pipeline capacity out of the Rocky Mountain region. With the unusually sharp economic contraction of 2008, unusually low prices have spread to Oklahoma as well. Meanwhile, U.S. royalty trusts have no debt, which protects the downside and have no hedges, which frees the upside. All the cash flow from oil and gas production is distributed to unitholders. Owning the stock might be likened to owning long-term commodity futures without counterparty risk and with nice income while waiting. Stock price usually adjusts to keep year ahead income yield at perhaps 8 to 10%.

## Oil and Gas Stocks Recap

- Long-Term Return, Short-Term Risk
- Invest Globally
- Large Cap and Small Cap
- Oil and, especially, Natural Gas
- Growth and Income
- More Low Debt, Less High Debt
- Buy 12 Low McDep Ratio Stocks

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Those are the high points of investment action to implement your understanding of the economic, political and industry trends. For further background, you can see all of my work, except for the most recent, on my website referenced on the final slide.

I like oil and gas stocks for potential long-term return while there are always short-term risks. Include stocks from outside your home geographic area where there may be greater growth. I like owning large cap stocks as well as small cap issues. Resist the likelihood of the portfolio becoming oil heavy and seek more exposure in natural gas for its environmental advantage and higher global growth prospects. While growth gets all the attention, the income model is less understood and may work as well or better in delivering long-term return. Debt may also be poorly understood. It may be more efficient to own more of low debt, rather than high debt stocks and control leverage by asset class allocation. Finally, I believe the 12 stocks I am currently recommending constitute a portfolio well positioned for long-term return while offering inflation protection and providing deflation resistance.

Thank you again for your attention and I welcome your questions.

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