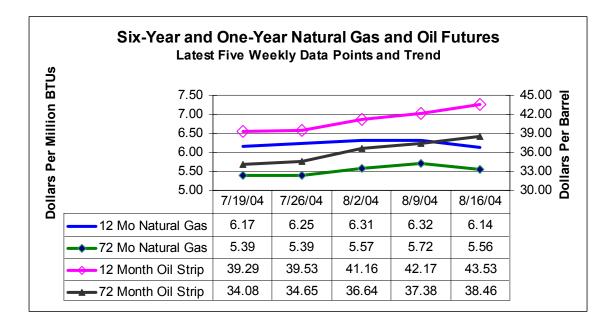
A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

Bells Are Ringing

Summary and Recommendation

The futures market is ringing bells that oil and gas stocks are undervalued. The headline number, September oil futures near \$46, rings a small bell. The more relevant indicator for stock prices, six-year oil futures above \$38, rings a large bell. Estimates of present value correspond to \$30 to \$35. Buy-rated stocks have a median McDep Ratio of less than 0.8 implying an attractive return at \$25 to \$30 oil. Bells are ringing to buy well-positioned producers like **Encore Acquisition Company (EAC)**, **Anadarko Petroleum (APC)**, **Norsk Hydro (NHY)** and **ConocoPhillips (COP)** among others.

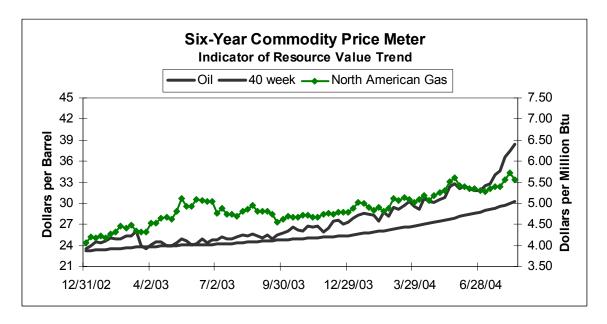


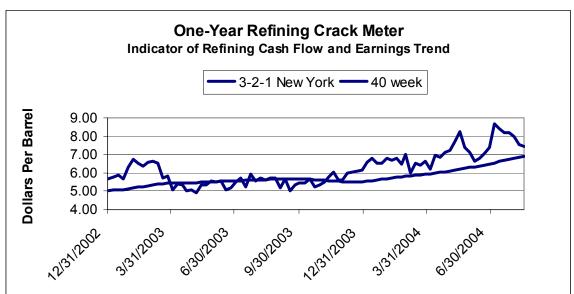
Question on the Dollar: Warren Buffett has a bearish view of the dollar. How would a weak dollar affect oil and gas stocks?

Answer: Oil is the best hedge I know against the weakness of the dollar and of currencies in general. Concern about the currency is a source of "comfort" for my confident longer term outlook on oil price. (I am not cheering for the loss of value in the dollar anymore than Mr. Buffett is.) Because oil is a global commodity, the real value of oil production should not be too sensitive to home currency trends. Refining is more economically sensitive, but also reflects global conditions. A very weak dollar should boost dollar stock price for each of my five categories of recommendations probably in the order of

A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

royalty trusts, small independent producers, large independent producers, non-U.S. producer/refiners and lastly mega caps. Combining oil and natural gas with Treasury Inflation Protected Securities should give a good combination of real return with inflation protection and deflation resistance.





Question: Doesn't it depend on the company and country. eg a US domestic would have fixed costs and a rising commodity price which is the best of all worlds versus a Canadian producer where the match is not the same?

A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

Answer: Yes, I recognize recent changes in local currencies in my next twelve months projections and there can be a temporary stock market reaction. I do not project any further differences in my estimates of present value.

My qualitative sense is that the Chinese stocks and the Canadian royalty trusts performed especially well when the dollar was weakening last year. When the dollar came back this year, the opposite seemed true. Lately the U.S. royalty trusts seemed to do a lot better than some Canadian trusts.

I suppose it is like interest rates and the stock market, sometimes they move together, sometimes they don't. I believe that owning some non-U.S. oil and gas stocks is beneficial from a strategic diversification point of view for U.S. investors.

Question about Oil Shortage: Floyd Norris states in the New York Times on August 13 that oil shortage is not the problem – it is a lack of infrastructure, worldwide. What is your reaction to the article?

Answer: Floyd Norris usually makes sense. I read the article and remember two points. On the first one, infrastructure, he uses a different word for what I would simply call investment or capital. All it takes to expand oil supply in a reasonably secure environment is money and time. Of course the new supply is different from the old supply and usually is more expensive. In the end it is simply a long 30-year economic cycle. On the second point I remember was his conclusion that much of the recent price increase is likely to stick. He points to futures prices that tell us more today than when we did not have them in the past.

Question on Canadian Royalty Trusts: Aside from your favorite Canadian Oil Sands Trust (COSWF), how deep do you drill down into this space and what would you recommend here, if anything?

Answer: Though my analysis is less intensive, I think **Enerplus (ERF)** and **Pengrowth (PGH)** are reasonable value as I portray them. I encourage investors who want more distributable income and already own my recommendations to hold or buy those two. I take some comfort in the long record and larger size of ERF and PGH.

If the form of distribution does not matter, investors may do better in time with lower McDep Ratio Canadian stocks **Encana (ECA – B1)**, **Petro-Canada (PCZ – B3)**, **Suncor (SU – B3)** and **Imperial (IMO – B3)** while meeting any requirement for extra distribution by selling shares.

Kurt H. Wulff, CFA

A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

Table 1-1
Energy Producers
Rank by McDep Ratio: Market Cap and Debt to Present Value

			Price (\$/sh)		Market	Net Present	Debt/	
	Symbol/		(φ/sn) 16-Aug	Shares	магкеі Сар	Value	Present	МсДер
	•	Rating	2004	(mm)	(\$mm)	(\$/sh)	Value	Ratio
Mega Cap	I	Kunng	2004	(mm)	(\$mm)	(φ/SH)	vaiue	Kuno
Exxon Mobil Corporation	XOM	В3	45.09	6,547	295,000	43.00	0.08	1.04
BP plc	BP	B3	54.54	3,681	293,000	60.00	0.08	0.92
Shell Transport and Trading Co. plc	SC	B3	44.26	1,587	70,000	51.20	0.13	0.92
Total S.A.	TOT	B3	97.10	1,237	120,200	113.00	0.17	0.89
Royal Dutch Petroleum	RD	вэ В1	50.61	2,031	103,000	60.00	0.10	0.88
-	CVX	B1	96.64			125.00	0.17	0.87
ChevronTexaco Corporation		DІ	90.04	1,065	102,900	123.00		
Total or Median					892,000		0.15	0.88
Producer/Refiners - Large Cap and	_		50.75	125	7.470	20.00	0.72	1.52
Kinder Morgan, Inc.	KMI	S2	59.75	125	7,470	20.00	0.73	1.53
Valero Energy Corporation	VLO		67.97	121	8,200	55.00	0.43	1.13
Murphy Oil Corporation	MUR	D.2	72.28	93	6,710	62.00	0.20	1.13
Imperial Oil Limited (30%)	IMO	B3	48.01	108	5,170	52.00	0.10	0.93
Marathon Oil Corporation	MRO	B3	35.62	346	12,330	41.00	0.30	0.91
Suncor Energy	SU	B3	28.45	460	13,090	38.00	0.13	0.78
Norsk Hydro ASA	NHY	B1	64.56	256	16,500	90.00	0.16	0.76
ConocoPhillips	COP	B1	74.19	687	51,000	110.00	0.27	0.76
ENI S.p.A.	Е		103.55	755	78,200	150.00	0.12	0.73
Petro-Canada	PCZ	В3	46.15	266	12,290	68.00	0.14	0.72
Petroleo Brasileiro S. A.	PBR		29.75	1,096	32,600	50.00	0.28	0.71
Lukoil Oil Company	LUKOY	B2	113.50	210	24,000	208.00	0.05	0.57
PetroChina Company Ltd (10%)	PTR	B2	47.25	176	8,310	88.00	0.07	0.57
Total or Median	!				276,000		0.16	0.76
Independent Natural Gas and Oil								
CNOOC Limited (19%)	CEO	B2	46.40	78	3,630	55.00	-	0.84
Canadian Natural Resources Limited	CNQ		32.49	271	8,810	44.00	0.29	0.81
XTO Energy Inc.	XTO	B1	26.52	271	7,190	38.00	0.21	0.76
Unocal Corporation	UCL	B3	36.53	276	10,100	54.00	0.26	0.76
Encana Corporation	ECA	B1	41.53	471	19,500	63.00	0.25	0.74
Occidental Petroleum Corp.	OXY	В3	50.32	397	20,000	75.00	0.19	0.73
Apache Corporation	APA		43.68	324	14,200	64.00	0.15	0.73
Devon Energy Corporation	DVN	В3	66.87	249	16,700	110.00	0.24	0.70
Anadarko Petroleum Corp.	APC	B1	57.35	254	14,600	94.00	0.21	0.69
Burlington Resources	BR	B1	36.24	397	14,400	58.00	0.14	0.68
Pioneer Natural Resources Company	PXD		32.25	119	3,840	57.00	0.22	0.66
Pogo Producing Company	PPP		42.61	64	2,730	70.00	0.07	0.64
Total or Median	ı				136,000		0.21	0.73

B1 = Buy full unlevered position, B2 = Buy half unlevered position, B3 = Alternative buy

S2 = Short half unlevered position

McDep Ratio = Market cap and Debt to present value of oil and gas and other businesses

A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

Table 1-2
Energy Producers
Rank by EV/Ebitda: Enterprise Value to Earnings Before Interest, Tax, Deprec.

			Price (\$/sh)	EV/	EV/		Divd or Distrib	PV/
	Symbol/		16-Aug	Sales	Ebitda	P/E	NTM	Ebitda
	Ra	iting	2004	NTM	NTM	NTM	(%)	NTM
Mega Cap								
Exxon Mobil Corporation	XOM	В3	45.09	1.1	6.7	12	2.4	6.5
Total S.A.	TOT	В3	97.10	1.0	6.1	11	2.9	6.9
BP plc	BP	B3	54.54	0.8	5.2	9	3.0	5.6
Shell Transport and Trading Co. plc	SC	B3	44.26	0.9	5.1	10	4.1	5.7
Royal Dutch Petroleum	RD	B1	50.61	0.8	5.0	9	4.2	5.7
ChevronTexaco Corporation	CVX	B1	96.64	0.8	4.6	8	3.3	5.7
Median				0.8	5.1	10	3.1	5.7
Producer/Refiners - Large Cap and M	id Cap							
Kinder Morgan, Inc.	KMI	S2	59.75	3.0	12.3	15	3.8	8.0
Suncor Energy	SU	В3	28.45	2.2	6.8	16	0.6	8.7
Murphy Oil Corporation	MUR		72.28	1.3	6.5	13	1.1	5.8
Imperial Oil Limited (30%)	IMO	B3	48.01	1.1	6.0	10	1.4	6.4
Valero Energy Corporation	VLO		67.97	0.3	6.0	8	0.7	5.3
Marathon Oil Corporation	MRO	B3	35.62	0.4	5.3	10	2.8	5.8
ConocoPhillips	COP	B1	74.19	0.6	4.4	6	2.3	5.8
Norsk Hydro ASA	NHY	B1	64.56	0.9	4.3	11	2.5	5.6
ENI S.p.A.	E		103.55	1.5	4.2	7	4.4	5.7
Petro-Canada	PCZ	В3	46.15	1.3	4.0	8	1.0	5.5
Petroleo Brasileiro S. A.	PBR		29.75	1.5	3.9	5	2.5	5.5
PetroChina Company Ltd (10%)	PTR	B2	47.25	2.0	3.7	7	4.6	6.5
Lukoil Oil Company	LUKOY	B2	113.50	0.9	2.3	4	2.3	4.1
Median				1.3	4.4	8	2.3	5.8
Independent Natural Gas and Oil								
CNOOC Limited (19%)	CEO	B2	46.40	4.3	5.5	11	3.4	6.5
XTO Energy Inc.	XTO	B1	26.52	4.4	5.5	11	0.2	7.2
Pioneer Natural Resources Company	PXD		32.25	3.3	4.7	14	-	7.2
Occidental Petroleum Corp.	OXY	B3	50.32	2.3	4.6	8	2.2	6.3
Burlington Resources	BR	B1	36.24	3.2	4.5	9	0.9	6.6
Anadarko Petroleum Corp.	APC	B1	57.35	3.2	4.3	8	1.0	6.3
Encana Corporation	ECA	B1	41.53	2.4	4.3	9	1.0	5.8
Unocal Corporation	UCL	В3	36.53	1.8	4.3	7	2.2	5.6
Apache Corporation	APA		43.68	3.0	4.1	7	0.5	5.7
Canadian Natural Resources Limited	CNQ		32.49	2.7	4.0	6	0.9	4.9
Devon Energy Corporation	DVN	В3	66.87	3.0	3.7	7	0.6	5.3
Pogo Producing Company	PPP		42.61	2.1	2.8	6	0.5	4.4
Median				3.0	4.3	8	0.9	6.0

EV = Enterprise Value = Market Cap and Debt; Ebitda = Earnings before interest, tax, depreciation and amortization; NTM = Next Twelve Months Ended June 30, 2005; P/E = Stock Price to Earnings; PV = Present Value of oil and gas and other businesses

A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

Table 2-1
Energy Producers - Small Cap
Rank by McDep Ratio: Market Cap and Debt to Present Value

	Symbol/ Ra	uting	Price (\$/sh) 16-Aug 2004	Shares (mm)	Market Cap (\$mm)	Net Present Value (\$/sh)	Debt/ Present Value	McDep Ratio
Short Life								
Unit Corporation	UNT		31.17	44.1	1,380	25.00	0.01	1.24
Western Gas Resources	WGR		29.82	74.0	2,210	25.00	0.17	1.16
Southwestern Energy Company	SWN		31.60	36.0	1,140	29.00	0.22	1.07
Penn West Petroleum Ltd. (US\$)	PWT.TO		49.56	54.7	2,710	57.00	0.21	0.90
Denbury Resources Inc.	DNR		19.70	55.7	1,100	25.00	0.21	0.83
Cimarex Energy Company	XEC	B2	30.34	42.7	1,300	38.00	0.00	0.80
Purcell Energy, Ltd. (US\$)	PEL.TO		1.99	62.0	123	2.80	0.27	0.79
Energy Partners Ltd.	EPL	В3	14.76	38.4	567	22.00	0.14	0.72
PetroKazakhstan Inc.	PKZ		29.72	80.7	2,400	42.00	0.01	0.71
Chesapeake Energy Corporation	CHK		14.11	220	3,100	24.00	0.29	0.71
Range Resources Corporation	RRC		14.42	57.0	820	24.00	0.26	0.71
St. Mary Land and Exploration Compar	r SM		32.71	29.0	950	50.00	0.10	0.69
Forest Oil Corporation	FST		25.04	53.5	1,340	53.00	0.25	0.60
Total or Median					19,100		0.21	0.79
Long Life								
Ultra Petroleum Corp.	UPL		39.66	78.0	3,090	25.00	0.06	1.55
Quicksilver Resources Inc.	KWK		26.61	50.4	1,340	25.00	0.19	1.05
Abraxas Petroleum Corporation	ABP		1.60	35.8	57	1.50	0.77	1.01
Berry Petroleum Company	BRY	B2	31.00	22.4	694	43.00	0.06	0.74
Swift Energy Company	SFY		19.12	27.4	520	32.00	0.29	0.71
Whiting Petroleum Corporation	WLL		22.66	18.8	430	40.00	0.21	0.66
Encore Acquisition Company	EAC	B2	26.58	30.6	812	47.00	0.18	0.64
Vintage Petroleum, Inc.	VPI		15.86	63.0	1,000	33.00	0.28	0.62
Total or Median					7,900		0.20	0.73
Master Limited Partnerships and Canadian Royalty Trusts								
Kinder Morgan Energy Partners, L.P.	KMP	S2	42.95	145.0	6,228	15.00	0.49	1.95
Kinder Morgan Management, LLC	KMR	S2	37.00	52.5	1,942	15.00	0.49	1.75
Dorchester Minerals, L.P.	DMLP		19.10	27.0	516	17.00	-	1.12
Pengrowth Energy Trust	PGH		15.27	125.0	1,909	14.00	0.14	1.08
Enerplus Resources Fund	ERF		29.83	90.4	2,697	28.00	0.13	1.06
PrimeWest Energy Trust	PWI		19.81	50.5	1,000	19.00	0.21	1.03
Canadian Oil Sands Trust (US\$)	COSWF	B1	36.71	91.9	3,380	62.00	0.19	0.67
Total or Median					17,700		0.19	1.08
U.S. Royalty Trusts								
Sabine Royalty Trust	SBR		37.25	14.6	543	27.00	-	1.38
Permian Basin RT (41%)	PBT		10.39	19.1	199	7.70	-	1.35
San Juan Basin Royalty Trust	SJT	Н	27.91	46.6	1,301	22.00	-	1.27
Hugoton RoyaltyTrust (46%)	HGT		25.36	18.4	467	22.00	-	1.15
Cross Timbers Royalty Trust	CRT		30.90	6.0	185	30.00	-	1.03
Total or Median					2,700			1.27

McDep Ratio = Market cap and Debt to present value of oil and gas and other businesses Buy/Sell rating after symbol: B1 - Buy full unlevered position, B2 - Buy half unlevered position S2 - Short quarter unlevered position, H - Hold (neutral)

A Weekly Analysis of Energy Stocks Using the McDep Ratio August 17, 2004

Table 2-2
Energy Producers - Small Cap
Rank by EV/Ebitda: Enterprise Value to Earnings Before Interest, Tax, Deprec.

	G 1 1/		Price (\$/sh)	EV/	EV/		Divd or Distrib	PV/
	Symbol/ Rai	ting	16-Aug 2004	Sales NTM	Ebitda NTM	P/E NTM	NTM (%)	Ebitda NTM
	Rut	ıng	2004	11111	141111	1 1 1 1 1 1 1	(70)	11111
Short Life								
Western Gas Resources	WGR		29.82	0.9	10.4	22	-	8.9
Unit Corporation	UNT		31.17	3.9	8.9	22	-	7.2
Southwestern Energy Company	SWN		31.60	3.9	6.7	13	-	6.3
Purcell Energy, Ltd. (US\$)	PEL.TO		1.99	4.1	5.6	12	-	7.1
Range Resources Corporation	RRC		14.42	3.8	4.9	9	0.3	7.0
Penn West Petroleum Ltd. (US\$)	PWT.TO		49.56	3.6	4.9	10	0.8	5.4
Denbury Resources Inc.	DNR		19.70	3.2	4.7	8	-	5.6
Chesapeake Energy Corporation	CHK		14.11	3.1	4.3	8	0.9	6.1
St. Mary Land and Exploration Company	SM		32.71	2.4	3.6	8	0.3	5.2
Forest Oil Corporation	FST		25.04	2.6	3.5	13	-	5.8
Cimarex Energy Company	XEC	B2	30.34	2.6	3.3	8	-	4.1
Energy Partners Ltd.	EPL	В3	14.76	2.1	2.9	8	-	4.0
PetroKazakhstan Inc.	PKZ		29.72	1.6	2.8	5	-	3.9
Median				3.1	4.7	9	-	5.8
Long Life								
Ultra Petroleum Corp.	UPL		39.66	12.9	16.6	27	-	10.7
Quicksilver Resources Inc.	KWK		26.61	7.6	11.3	22	-	10.8
Abraxas Petroleum Corporation	ABP		1.60	6.4	9.4		-	9.3
Swift Energy Company	SFY		19.12	3.3	4.8	9	-	6.7
Berry Petroleum Company	BRY	B2	31.00	3.0	4.8	11	1.4	6.5
Encore Acquisition Company	EAC	B2	26.58	3.4	4.6	9	-	7.1
Whiting Petroleum Corporation	WLL		22.66	2.9	4.4	8	-	6.7
Vintage Petroleum, Inc.	VPI		15.86	2.1	3.3	5	1.1	5.3
Median				3.3	4.8	9	-	6.9
Master Limited Partnerships and Canad	ian Royal	ty Tr	usts					
Kinder Morgan Energy Partners, L.P.	KMP		42.95	2.9	15.7	18	4.8	8.0
Kinder Morgan Management, LLC	KMR		37.00	2.6	14.0	15	5.6	8.0
Dorchester Minerals, L.P.	DMLP		19.10	9.2	10.0	18	10.0	8.9
Enerplus Resources Fund	ERF		29.83	4.7	6.8	12	10.6	6.4
PrimeWest Energy Trust	PWI		19.81	4.1	5.5	12	12.4	5.4
Canadian Oil Sands Trust (US\$)	COSWF	B1	36.71	3.5	5.5	7	4.1	8.2
Pengrowth Energy Trust	PGH		15.27	4.2	5.4	10	12.4	5.1
Median				4.1	6.8	12	10.0	8.0
U.S. Royalty Trusts								
Sabine Royalty Trust	SBR		37.25	11.7	12.1	12	8.2	8.8
Cross Timbers Royalty Trust	CRT		30.90	8.2	11.2	11	8.7	10.9
San Juan Basin Royalty Trust	SJT	Н	27.91	7.8	9.4	11	9.3	7.4
Permian Basin RT (41%)	PBT		10.39	6.9	9.4	10	7.2	6.9
Hugoton RoyaltyTrust (46%)	HGT		25.36	6.7	8.7	10	9.8	7.6
Median				7.8	9.4	11	8.7	7.6

EV = Enterprise Value = Market Cap and Debt; Ebitda = Earnings before interest, tax, depreciation and amortization; NTM = Next Twelve Months Ended June 30, 2005; P/E = Stock Price to Earnings; PV = Present Value of oil and gas and other businesses