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Phelps Dodge

NYSE: PD

Buy

February 5, 2002

S&P Sector – Basic Materials

Industry – Metal Mining

MARKET DATA

Price	52-Wk Range	Price Target	Shares Out.	Market Cap.	Beta	Book Value	P/S	P/E
2-5-02 close	low on 10-3-01	Valuation Result	(million)	(billion)	Value Line	per share	(ttm)	(ttm)
\$33.55	\$26.56-\$51.20	\$39.94	78.7	\$2.64	0.89	\$34.40	0.67	N/A

COMPANY OVERVIEW – FROM YAHOO! FINANCE

Phelps Dodge Corporation is a producer of copper, carbon black and magnet wire, as well as continuous-cast copper rod. The Company also produces molybdenum and molybdenum products. The Company consists of two divisions, Phelps Dodge Mining Company and Phelps Dodge Industries. Phelps Dodge Mining Company is the Company's international business segment that comprises a group of companies involved in vertically integrated copper operations including mining, concentrating, electrowinning, smelting and refining, rod production, marketing and sales. Phelps Dodge Industries is the manufacturing division comprising two business segments that produce engineered products principally for the global energy, telecommunications, and transportation and specialty chemicals sectors.

INVESTMENT RECOMMENDATION

- ☐ Buy 200 shares of PD.

SUMMARY

- ☐ The stock is currently undervalued by approximately 20%. My 2-stage model indicates a current price valuation of \$40.00 / share based on the following CAPM assumptions: beta of 0.89, risk-free rate equal to 5.50%, and a risk premium of 5.50%. Since the company recently suspended dividends, a DVD model is not feasible.
- ☐ PD may encounter additional losses in 2002, but it is my belief that a combination of better copper prices and aggressive cost-cutting will result in profitable results by 2003, if not before. Beyond this point, PD is particularly well poised to benefit from a global economic recovery.
- ☐ Much of PD's success hinges on a recovery in copper prices, which are currently mired in a cyclical trough. However, on a historical basis copper is well below its long-term average cash price, and has been for at least the past twelve months. This leads me to believe that we are experiencing a bottom in the cycle and prices will only head higher from here.
- ☐ The near term outlook for the metals and mining industry is murky, as economic indicators paint a mixed picture of the US and global economies. However, for investors with a long-term view, PD will be a good stock to ride when economic activity eventually turns a corner.

INDUSTRY INSIGHT

News & Trends Metals and mining companies have been directly affected by the macroeconomic slowdown both in the US and abroad. Since this sector comprises companies producing the basic building blocks of infrastructure and durable goods, the slowdown in consumer and business spending has adversely affected earnings across the industry. Those firms with the ability to reduce costs and survive the downturn are the ones that will emerge the most profitably when the tide eventually turns.

As a result, the trend appears to be one of slashing costs wherever possible. Many firms have announced restructuring programs, including layoffs and capital expenditure curtailments. Operating costs, too, are a focus, as many companies struggle to contain the cash cost per pound of the metals they produce. The effort is beginning to pay off, as many firms are realizing major cost savings associated with genuine and long-term changes in operations. These changes will only serve to strengthen the competitive position of those firms endeavoring to raise the bar.

The question now is simply one of timing. Firms in this industry have always been at the mercy of macroeconomic cycles, and this period is no different. Instead of trying to forecast a turning point, I suggest focusing on firms with a solid base from which to grow when activity returns.

INVESTMENT HIGHLIGHTS

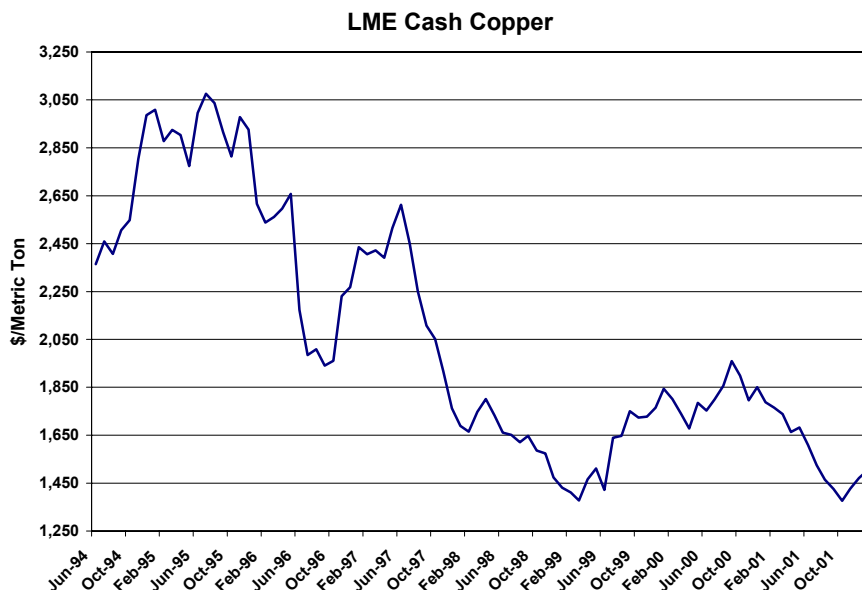
Overall Effect on Wright Fund

The basic materials sector of the fund contains only one holding at this time, i.e. Praxair, but its positive performance has caused our sector to be overweight relative to the S&P 500 index. Adding Phelps Dodge to our holdings will exacerbate the overweight situation, but should help diversify the volatility of this sector nonetheless.

Another benefit to holding PD is that it will expose the fund to commodity risk, which is an asset class that many large funds look to hold. Commodities behave differently than other assets, and this differentiation should help smooth the overall returns of the fund.

Rationale

The primary reason to establish a position in PD is to benefit from a recovery in copper prices. Over the past few months, the red metal has traded down to levels not seen in nearly three years (see chart below). Commodity prices tend to lead economic recoveries, which could explain why prices are beginning to trend north again. And based on historical trading patterns, this up-tick may be just the beginning of a much more sustained rally in copper prices. In other words, there is still time to get to the party before it's over.



Furthermore, firms in the copper industry have demonstrated restraint over the past several months by voluntarily curtailing capacity. This has kept a situation of oversupply from developing, which will leave the market tight should demand suddenly recover. Consensus forecasts in the industry place the market pretty well balanced for 2001, leaving no overhang to work off when activity returns.

Risks

Regarding the materials sector as a whole, the primary risk remains a prolonged recessionary environment both at home and abroad. Due to its mix of businesses, however, PD's exposure is more heavily weighted to the US economy. For instance, the majority of its refined copper is sold in the form of rod, which due to freight costs, would most likely be sold into the US, Canadian and Mexican markets. Unlike other integrated copper producers, therefore, PD is less exposed to the economies of Europe and Asia, where the outlook is perhaps more questionable.

Another risk facing PD is energy costs. As a significant consumer of electricity in its production process, the company is exposed to the volatility of energy prices. However, in a dramatic change from twelve months ago, prices for spot power and natural gas have moderated significantly. Q2'01 and Q3'01 round-the-clock power prices are currently trading in the \$20 - \$30 per Megawatt hour range, a much more reasonable proposition for PD. Natural gas prices for the same period are presently \$2.27 and \$2.57 per mmbtu, respectively.

More importantly, the consensus outlook for summer energy prices is quite tame. This trend will go a long way toward helping PD achieve its copper production cost goal of 60 c/lb. Even if energy prices trend higher, PD learned its lessons from the last crisis and has positioned itself well with the use of financial hedges and alternative energy sources.

Valuation

My two-stage growth model assumes a modest and gradual increase in Cu prices over a four-year period to approximately \$1,727 per metric ton. Terminal growth in the model is at 3% per annum, and using the CAPM, a discount rate of 10.4% was derived. The model assumed PD will increase its copper production at an annual growth rate of approximately 5%, which is conservative by historical standards. It was further predicted that PD will come close to realizing its goal of 60 c/lb copper over a period of the next two years, with no further cost reductions thereafter.

PD Industries, which includes the specialty chemicals and wire & cable segments, was left static in the model, thereby contributing nothing to growth over the next four years.

See detailed model on page 9 and 10 for more details.

Other Considerations

- ☐ Management has announced the potential sale of PD Industries, which could significantly aid the company's cash position if an appropriate buyer materializes.
- ☐ As the company's profitability improves, it would make sense for PD to become acquisitive again. The purchase of Cyprus Amax in 1999 significantly added to its production capacity, and I would expect to see PD continue searching for sensible candidates to buy.

Recent Results & Guidance

Industry Results:

- ☐ The long-term outlook for the metals and mining industry is positive; recent results have been difficult, especially in the case of PD, as the company reported four consecutive quarterly losses.
- ☐ The S&P Metals Mining Index rose 4.22% in 2001 versus a decline of 9.6% in the S&P 500. I expect this positive trend for metals companies will continue moderately in 2002, with additional improvement beyond

Sources:

Bloomberg
Yahoo! Finance
MSN Money
Phelps Dodge website
Bear Stearns Phelps Dodge report dated January 31, 2002
Industry Surveys – Monthly Investment Review, January 2002
Value Line – Investment Survey, January 11, 2002

Phelps Dodge: Recent Annual Financials (from MSN Money)

Annual Income Statement (Values in Millions)	12/2001	12/2000	12/1999	12/1998	12/1997
Sales	4,002.4	4,525.1	3,114.4	3,063.4	3,914.3
Cost of Sales	NA	3,580.2	2,451.7	2,360.4	2,744.1
Gross Operating Profit	NA	944.9	662.7	703.0	1,170.2
Selling, General & Admin. Expense	NA	191.9	193.8	177.9	229.6
Other Taxes	NA	0.0	0.0	0.0	0.0
EBITDA	NA	753.0	468.9	525.1	940.6
Depreciation & Amortization	NA	464.2	329.1	293.3	283.7
EBIT	NA	288.8	139.8	231.8	656.9
Other Income, Net	NA	31.5	14.2	4.6	45.1
Total Income Avail for Interest Exp.	NA	268.5	-301.4	427.3	656.1
Interest Expense	NA	213.3	120.2	94.5	62.5
Minority Interest	NA	7.0	-2.1	7.9	4.7
Pre-tax Income	NA	55.2	-421.6	332.8	593.6
Income Taxes	NA	19.2	-165.2	134.0	180.4
Special Income/Charges	NA	-51.8	-455.4	190.9	-45.9
Net Income from Cont. Operations	-273.0	29.0	-254.3	190.9	408.5
Net Income from Discont. Ops.	0.0	0.0	0.0	0.0	0.0
Net Income from Total Operations	-273.0	29.0	-254.3	190.9	408.5
Normalized Income	NA	80.8	201.1	0.0	454.4
Extraordinary Income	0.0	0.0	0.0	0.0	0.0
Income from Cum. Eff. of Acct. Chg.	-2.0	0.0	-3.5	0.0	0.0
Income from Tax Loss Carryforward	0.0	0.0	0.0	0.0	0.0
Other Gains (Losses)	0.0	0.0	0.0	0.0	0.0
Total Net Income	-275.0	29.0	-257.8	190.9	408.5
Dividends Paid per Share	0.75	2.00	2.00	2.00	2.00
Preferred Dividends	NA	0.00	0.00	0.00	0.00
Basic EPS from Cont. Operations	-3.47	0.37	-4.13	3.28	6.68
Basic EPS from Discont. Operations	0.00	0.00	0.00	0.00	0.00
Basic EPS from Total Operations	-3.47	0.37	-4.13	3.28	6.68
Diluted EPS from Cont. Operations	-3.47	0.37	-4.13	3.26	6.63
Diluted EPS from Discont. Operations	0.00	0.00	0.00	0.00	0.00
Diluted EPS from Total Operations	-3.47	0.37	-4.13	3.26	6.63

Annual Balance Sheet (Values in Millions)	12/2001	12/2000	12/1999	12/1998	12/1997
Assets					
Current Assets					
Cash and Equivalents	NA	250.0	234.2	221.7	157.9
Receivables	NA	528.7	541.5	321.1	420.5
Inventories	NA	451.5	498.3	266.0	297.8
Other Current Assets	NA	277.4	419.4	171.2	174.9
Total Current Assets	NA	1,507.6	1,693.4	980.0	1,051.1
Non-Current Assets					
Property, Plant & Equipment, Gross	NA	8,926.9	6,303.4	6,081.2	5,836.1
Accum. Depreciation & Depletion	NA	3,032.3	265.7	2,494.0	2,391.0
Property, Plant & Equipment, Net	NA	5,894.6	6,037.7	3,587.2	3,445.1
Intangibles	NA	0.0	0.0	0.0	0.0
Other Non-Current Assets	NA	428.6	497.9	469.3	469.0
Total Non-Current Assets	NA	6,323.2	6,535.6	4,056.5	3,914.1
Total Assets	NA	7,830.8	8,229.0	5,036.5	4,965.2
Liabilities & Shareholder's Equity					
Current Liabilities					
Accounts Payable	NA	669.8	786.5	451.3	553.2
Short Term Debt	NA	724.7	582.5	184.6	146.2
Other Current Liabilities	NA	23.4	49.3	15.2	1.7
Total Current Liabilities	NA	1,417.9	1,418.3	651.1	701.1
Non-Current liabilities					
Long Term Debt	NA	1,963.0	2,172.5	836.4	857.1
Deferred Income Taxes	NA	439.0	385.7	508.6	439.2
Other Non-Current Liabilities	NA	814.2	879.4	359.7	344.1
Minority Interest	NA	91.7	96.3	93.3	113.3
Total Non-Current Liabilities	NA	3,307.9	3,533.9	1,798.0	1,753.7
Total Liabilities	NA	4,725.8	4,952.2	2,449.1	2,454.8
Shareholder's Equity					
Preferred Stock Equity	NA	0.0	0.0	0.0	0.0
Common Stock Equity	NA	3,105.0	3,276.8	2,587.4	2,510.4
Total Equity	NA	3,105.0	3,276.8	2,587.4	2,510.4
Total Liabilities & Stock Equity	NA	7,830.8	8,229.0	5,036.5	4,965.2

Total Common Shares Outstanding	78.7 Mil	78.7 Mil	78.7 Mil	57.9 Mil	58.6 Mil
Preferred Shares	NA	0.0	0.0	0.0	0.0
Treasury Shares	NA	17.1 Mil	0.0	17.3 Mil	16.6 Mil

Annual Cash Flow (in Millions)	12/2002	12/2000	12/1999	12/1998	12/1997
Cash Flow from Operating Activities					
Net Income (Loss)	NA	29.0	-254.3	190.9	408.5
Depreciation and Amortization	NA	464.2	329.1	293.3	283.7
Deferred Income Taxes	NA	12.5	-191.7	52.2	34.9
Operating (Gains) Losses	NA	0.9	-4.4	5.8	-6.5
Extraordinary (Gains) Losses	NA	0.0	-3.5	0.0	0.0
Change in Working Capital					
(Increase) Decr. in Receivables	NA	9.7	-144.5	53.3	36.5
(Increase) Decr. in Inventories	NA	39.3	31.2	9.0	-6.2
(Increase) Decr. in Other Curr. Assets	NA	-3.0	6.2	-9.4	-2.4
(Decrease) Incr. in Payables	NA	-12.4	-2.2	-42.1	20.1
(Decrease) Incr. in Other Curr. Liabs.	NA	-110.0	-18.0	-7.6	-25.4
Other Non-Cash Items	NA	81.0	456.6	-166.9	21.4
Net Cash from Cont. Operations	NA	511.2	204.5	378.4	764.6
Net Cash from Discont. Operations	NA	0.0	0.0	0.0	0.0
Net Cash from Operating Activities	NA	511.2	204.5	378.4	764.6
Cash Flow from Investing Activities					
Cash Flow Provided by:					
Sale of Property, Plant, Equipment	NA	152.6	246.6	486.2	7.1
Sale of Short Term Investments	NA	0.0	0.0	0.0	0.0
Cash Used by:					
Purchase of Property, Plant, Equipmt.	NA	-397.2	-200.9	-318.1	-661.6
Purchase of Short Term Investments	NA	0.0	0.0	0.0	0.0
Other Investing Changes Net	NA	-29.6	-39.7	-352.1	-139.3
Net Cash from Investing Activities	NA	-274.2	6.0	-184.0	-793.8
Cash Flow from Financing Activities					
Cash Flow Provided by:					
Issuance of Debt	NA	114.6	348.8	108.0	418.4
Issuance of Capital Stock	NA	0.0	0.0	0.0	0.0
Cash Used for:					
Repayment of Debt	NA	-178.3	-209.1	-85.6	-66.9
Repurchase of Capital Stock	NA	0.0	0.0	-35.4	-511.5
Payment of Cash Dividends	NA	-157.5	-124.3	-117.3	-122.7
Other Financing Charges, Net	NA	0.0	-213.4	-0.3	-0.3
Net Cash from Financing Activities	NA	-221.2	-198.0	-130.6	-283.0

Effect of Exchange Rate Changes	NA	0.0	0.0	0.0	0.0
Net Change in Cash & Cash Equivalents	NA	15.8	12.5	63.8	-312.2
Cash at Beginning of Period	NA	234.2	221.7	157.9	470.1
Free Cash Flow	NC	-43.5	-120.7	-57.0	-19.7

CHARTS / TECHNICAL

PD Daily Stock Chart (source: Yahoo! 2/4/02)



Assumptions

Growth Rate of Sales

Copper Price Increase / Decrease

Translation (LME \$/MT)

Steady State (g)

Current Assets/Sales Trend

Current Liab / Current Assets

COGS Trend

Cost Reduction Program / yr

Capex / CA

Terminal Capital Expenditures/CA

Depreciation/CA

LT Debt / CA

Tax rate

Average Interest Rate on Debt

Cost of Equity

WACC

Shares Outstanding

Results

Value of Equity

Share Price

-12%	2%	5%	3%	1%
1,550	1,581	1,660	1,710	1,727
(starting value)				

94%	90%	87%	87%	87%
0%	4.0%	4.0%	0.0%	0.0%

Costs of Equity Calculation	
Beta	0.89
Risk Premium	5.50%
RF Rate	5.50%

	1997	1998	1999	2000	2001	2002	2003	2004	2005
Actual Production (Millions ST)	0.812	0.874	0.890	1.200					
Historical Production Growth		7.64%	1.83%	34.83%					
Annual Growth Forecast	5.00%								
Pro Forma Production					1.26	1.32	1.39	1.46	1.53
Share of Revenue Attributable to CU	66%								
Revenue Share due to CU	2,583	2,022	2,056	2,987					
per ton revenue	3,182	2,313	2,310	2,489					
Pro Forma per ton revenue					2,190	2,234	2,346	2,416	2,440
Pro Forma Cu Revenues					2,760	2,956	3,258	3,524	3,737
PDI Revenue					1,333	1,333	1,333	1,333	1,333
PDI Revenue Growth				0.00%					
Total Revenues					4,092	4,288	4,591	4,857	5,070

	1997	1998	1999	2000	2001	2002	2003	2004	2005
Revenues	3,914.3	3,063.4	3,114.4	4,525.1	4002.4	4288.3	4591.3	4856.8	5070.0
Costs									
COGS	2,744.1	2,381.3	2,477.8	3,580.2					
Depreciation, Depl & Amort	283.7	293.3	329.1	464.2	426.6	457.1	489.4	517.7	517.7
SGA	141.8	102.0	115.5	135.1					
Exploration & Research	87.8	55.0	52.2	56.8					
Non-recurring charges	45.9	(190.9)	455.4	51.8					
Total Costs and Expenses	3,303.3	2,640.7	3,430.0	4288.1	3762.3	3869.8	3977.4	4207.5	4392.2
Pre-Tax Income (EBIT)	611.0	422.7	(315.6)	237.0	240.1	418.5	613.8	649.3	677.8
Capitalized Interest	11.7	1.9	0.2	4.5					
Interest Expense	(74.2)	(96.4)	(120.4)	(217.8)	(169.8)	(181.9)	(194.8)	(206.1)	(206.1)
Other income (exp)	33.4	8.8	9.1	30.0					
Income before Taxes	581.9	337.0	(426.7)	53.7					
Taxes	(180.4)	(134.0)	165.2	(19.2)	87.2	152.0	222.9	235.8	246.1
Minority Interest	(4.7)	(7.9)	2.1	(7.0)					
Equity in affiliated cos	11.7	(4.2)	5.1	1.5					
Cumulative effect of acctg change	-	-	(3.5)	-	22.5				
Net Income	408.5	190.9	(257.8)	29.0	(275.0)	84.6	196.2	207.5	225.7
Depreciation & Amortization	283.7	293.3	329.1	464.2	426.6	457.1	489.4	517.7	517.7
Capital Expenditures	661.6	318.2	200.9	397.2	311.0	185.0	185.0	300.0	456.5
Current Assets	1051.1	980.0	1693.4	1507.6	1596.7	1710.8	1831.6	1937.6	1937.6
Current Liabilities (Non-interest Bearing)	701.1	651.1	1418.3	1417.9	1299.9	1392.8	1491.2	1577.4	1577.4
Long Term Debt	857.1	836.4	2172.5	1963.0	1698.0	1819.3	1947.9	2060.5	2060.5
Implied Interest Rate	8.7%	11.5%	5.5%	11.1%					
Operating Working Capital	350.0	328.9	275.1	89.7	296.8	318.0	340.4	360.1	360.1
Change in Working Capital		-21.1	-53.8	-185.4	207.1	21.2	22.5	19.7	0.0
Free Cash Flows to Equity (before principal)						335.5	478.1	405.5	286.9
Less Principal Repayments						250.0	141.2	216.4	348.0
Free Cash Flows to Equity						85.5	336.9	189.1	-61.1
Terminal Value									3,995
PV(FCFE)						77	276	141	2,649