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## ANOTHER PERSPECTIVE ON THE COST OF STOCK OPTIONS

There are several ways of measuring the "cost" of stock options. Typical measures used include EPS dilution, overhang, run rate and the methodology prescribed under Financial Accounting Standards Number 123 (FAS 123) guidelines. The EPS dilution method, as discussed in our letter of July 6, 1998, measures the difference between actual earnings per share and the earnings per share value that would exist if there were no stock options outstanding. Overhang measures the percentage of fully diluted outstanding shares allocated to options (includes both options outstanding and options reserved for future awards). Run rate measures the percentage of outstanding shares that are granted annually as options. Compensation expense under FAS 123 is based on the "fair value" of an option at grant using a Black-Scholes or binomial pricing model and is generally recognized, net of tax (nonqualified stock options only), ratably over the award's vesting period.

Current stock-based accounting rules under Accounting Principles Board Opinion No. 25 (APB 25) do <u>not</u> require companies to recognize compensation expense for stock options that are granted at fair market value. In this analysis, we ask, "what would the cost of stock options be if their fair value at grant were delivered in the form of cash and the cost was fully recognized in the initial year?" We asked the question because many companies are shifting a portion of their long-term incentives away from options to vehicles that will require an accounting charge. In an attempt to answer this question we reviewed each of the top 100 U.S. companies, based on market capitalization as of December 31, 1998 and calculated the annual equivalent cash compensation pre-tax expense of stock options granted over a three fiscal year timeframe as a percent of pre-tax earnings each year.

- Annual equivalent cash compensation pre-tax expense of stock options is the grant date fair value of the aggregate annual number of options.
  - $\Rightarrow$  Grant date fair value is the Black-Scholes value per share at grant, as reported by the company, multiplied by the number of options granted.
  - $\Rightarrow$  Note that this analysis is not based on the FAS 123 method of accruing the cost over the vesting term, but assumes annual option awards are fully expensed in the year of grant.
- Total annual stock options awarded and average Black-Scholes option values at grant for each of the three most recent fiscal years ended at or before September 30, 1999, were drawn from most recently available (as of 2/29/00) fiscal year-end company annual reports or 10-Ks based on the FAS 123 footnote disclosure.
- Company net income and effective tax rate data were obtained from 1999 Value Line reports.
  - $\Rightarrow$  Pre-tax earnings were calculated as net income (defined as net income before extraordinary items and accounting changes) divided by (1 tax rate).

Data on a company-by-company basis for the Top 100 companies are shown in the attached **Exhibit**. Statistical summary results are shown in the following table:

	Option Expense as a % of Pre-tax Earnings			
Top 100 Companies	Fiscal Years Ending			
	10/98 to 9/99	10/97 to 9/98	10/96 to 9/97	
High	156.8%	195.1%	45.1%	
75th Percentile	10.4%	10.4%	7.3%	
Median	5.1%	5.0%	3.4%	
25th Percentile	2.6%	2.3%	1.9%	
Low	0.5%	0.5%	0.1%	
Average	10.3%	9.6%	6.0%	

As shown in the preceding table, median practice among the top 100 companies over the last two fiscal years shows that if the annual present value of stock options, measured using Black-Scholes methodology, was expensed on a current basis, it would represent approximately 5% of pre-tax income. As evidence of the continued increase in the value of stock options awarded, note the increase from the fiscal year 1996 median practice at 3.4%.

We also divided the data into those industry segments represented by at least six companies. As shown in the table below, the technology sector, with a median of approximately 13%, has by far the greatest costs associated with options. This is not surprising since this industry tends to demand more human capital investment relative to other industries.

	Fiscal Years Ending			
By Industry	10/98 to 9/99	10/97 to 9/98	10/96 to 9/97	
Technology	13.0%	13.1%	7.5%	
Pharmaceuticals	5.8%	4.4%	3.0%	
Consumer Products	5.0%	4.8%	3.2%	
Retail	4.8%	3.4%	4.2%	
Communications	3.3%	3.7%	2.6%	
Financial Services	2.9%	3.7%	2.8%	
Manufacturing	2.8%	2.3%	1.9%	
Energy/Chemicals	2.6%	2.3%	0.9%	

Median Option Expense as a % of Pre-tax Earnings

In conclusion, in a market of level or declining stock prices, companies that wish to replace stock options with cash, or other award resulting in compensation expense, need to contemplate the potential impact on earnings. The impact could be substantial if options were totally abandoned.

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General questions may be addressed to Robert Timmerman in our New York Office at (212) 986-6330. Copies of this letter and other published materials are available on our web site, www.fwcook.com.