



why **HISTORICAL COST ACCOUNTING** makes **Sense**

BY TIM KRUMWIEDE, CPA

As the Financial Accounting Standards Board (FASB) continues to march toward fair value accounting and away from historical cost accounting, it's a good time to consider the flaws of fair value accounting. Enron's demise, after all, has been partially blamed on fair value accounting. In addition, it has been suggested that the use of fair value accounting for securities backed by subprime loans has exacerbated the current credit crises. The difference between historical cost accounting and fair value accounting? In many cases, only historical cost accounting produces reliable, verifiable information.

At the crux of the raging debate are reliability and relevance—the two cornerstones of financial reporting. Those opposed to fair value accounting believe it provides unreliable information. Proponents of fair value reporting, however, believe it provides more timely and relevant information despite its increased use of estimates and judgments.

Undoubtedly, financial information must contain varying degrees of relevance and reliability to be useful. These two attributes are the primary focus of this article, which will tackle the potential expanded application of fair value measurements to long-lived and intangible assets. Although the focus will be on long-lived and intangible assets, we can easily extend the points made to analyze other applications of fair value accounting. Rounding out the article will be a look at the direction of the FASB, a comprehensive fair value model, fair value measurements and allocation, the criticisms, and how investment analysts use financial statements.

TOWARD FAIR VALUE ACCOUNTING

Generally, long-term and intangible assets are reported on a balance sheet at historical cost or historical cost adjusted for depreciation or amortization. Exceptions, however, exist under Statement of Financial Accounting Standards (SFAS) No. 142, “Goodwill and Other Intangible Assets,” and SFAS No. 144, “Accounting for the Impairment or Disposal of Long-Lived Assets,” for impaired assets. These Standards require impaired assets to be measured at and written down to fair value. More recent guidance issued by the FASB suggests fair value accounting could be further extended to long-lived and intangible assets.

To establish clear, consistent guidelines for fair value measurements and provide for fair value disclosures, the FASB issued SFAS No. 157, “Fair Value Measurements,” in September 2006. On the heels of this Statement was SFAS No. 159, “The Fair Value Option for Financial Assets and Financial Liabilities.” Although this Standard didn’t extend to nonfinancial assets and liabilities, the Board suggests in the background information for Statement No. 159 that it will continue to consider additional fair value elections.

This progression toward fair value is also evident in the Exposure Draft on the conceptual framework that the FASB issued on May 29, 2008 (“Conceptual Framework for Financial Reporting: The Objective of Financial Reporting and Qualitative Characteristics and Constraints of Decision-Useful Financial Reporting Information”). In

general, the exposure draft appears to emphasize the balance sheet instead of the income statement, which ultimately implies the extended use of fair value measurements. This emphasis differs from a more traditional view the FASB expressed in Statement of Financial Accounting Concepts (SFAC) No. 1, “Objectives of Financial Reporting by Business Enterprises,” issued in 1978:

The primary focus of financial reporting is information about earnings and its components. Financial accounting is not designed to measure directly the value of a business enterprise, but the information it provides may be helpful to those who wish to estimate its value. (Paragraph 3)

This view from SFAC No. 1 is consistent with the view that the traditional income-statement approach should be emphasized. The income-statement approach uses historical cost accounting and a transaction approach that minimizes the use of estimates and judgments. This traditional approach, which companies have used for several hundred years, provides information that has a sufficient level of reliability and is verifiable. On the other hand, a balance-sheet approach, which potentially would incorporate an extended use of fair value measurements that often aren’t grounded in market observations, can result in information that is potentially unreliable and not easily verified. Think Enron here.

A COMPREHENSIVE FAIR VALUE MODEL

The most unyielding proponents of fair value accounting would be in favor of extending it to all assets and liabilities. In such a model, the income statement could simply represent the changes in the values of an entity’s assets and liabilities during a period to the extent the changes aren’t attributable to transactions with owners (for example, payment of dividends and capital contributions).

Consider Company A with \$500 in operating assets and \$400 in long-term debt originally borrowed to finance the operating assets. Assume that poor economic conditions result in a reduction in the future utility and fair value of the operating assets. At year-end, the fair value of the assets is estimated to be \$200. Now assume the same conditions decrease the creditworthiness of the company and thus the fair value of its long-term debt. Assume the long-term debt has a market value of \$300 at year-end. In summary, the assets have decreased in value by \$300, and the liabilities have decreased in value by \$100. The decrease to equity from the fair value measurements is the net of the two, or \$200.

For comparison purposes, Company B is identical in

assets and operations (\$500 in assets at the start of the period and a \$200 value for the assets at the end of the period). But Company B isn't leveraged and has no related long-term debt. For it, the decrease to equity is \$300. Company B, the entity without the leverage, has the poorest performance as measured by the reduction in equity. Whether or not Company A ultimately turns around its performance and repays its debt, this use of fair value accounting would seem to compromise the relevance and comparability of financial reporting. Reporting liabilities at fair value has already provided some results that could be considered counterintuitive. For the quarter ended March 31, 2008, some financial institutions that adopted SFAS No. 159 reported significant amounts of revenue because of the write-downs of their liabilities.

MEASURING FAIR VALUE

The reliability of fair value depends on the inputs in the measurement process. SFAS No. 157 provides an input hierarchy to measure fair value: Level 1, Level 2, and Level 3. The highest level of inputs, Level 1, are observations from active markets, such as the stock exchanges, for identical assets or liabilities. To the extent that fair value measurements are grounded in Level 1 market observations, most individuals would agree the measurements are reliable.

Level 2 inputs, which the FASB prefers over Level 3 inputs, include all other observable inputs that aren't Level 1 inputs. An example of a Level 2 input for an asset would be an observed sales price for a similar asset. Level 3 inputs are unobservable inputs. In most cases, Level 2 and Level 3 inputs will be used for long-term and intangible assets because Level 1 inputs won't be available. When Level 2 and Level 3 inputs are necessary, the reliability of fair value measurements is questionable.

A present value (PV) technique, such as discounted cash flow (DCF), is a common method of valuation for long-term and intangible assets. Because PV computations use forecasting, the reliability of this valuation technique is open to criticism. Studies have found that DCF is the most commonly used valuation technique for goodwill. In addition, in SFAS No. 144, the FASB acknowledges that a PV technique is commonly used to measure the fair value of long-lived assets. Let's now focus on DCF because of its widespread use in measuring fair value for intangible and long-lived assets.

In Appendix B of SFAS No. 144, the FASB expresses the following thoughts regarding fair value measurement:

The Board acknowledges that in many instances,

quoted market prices in active markets will not be available for the long-lived asset (asset groups) covered by this Statement.... a present value technique is often the best available valuation technique with which to estimate fair value.... During its deliberations leading to the Exposure Draft, the Board concluded that an expected present value technique is superior to a traditional present value technique, especially in situations in which the timing or amount of estimated future cash flows is uncertain (Paragraph B40).

First, the FASB recognizes that a PV technique is a common method of measuring fair value for long-lived assets. Next, the Board recognizes the uncertainty involved in measuring fair value as indicated by terms such as "expected present value," "estimated future cash flows," and "uncertain." When a PV technique is used to measure fair value, the following could contribute to the unreliability of these fair value estimates:

- ◆ *The starting point is management's projection of future cash flows to be generated from the asset group (both the amount and length of time cash flows will be generated). Projections require prediction about the future.*
- ◆ *The estimated cash flows must then be discounted to the present. Picking a discount rate and incorporating an appropriate risk premium into the discount rate or the cash flows is an educated guess. For some entities, the risk premium will need to encompass a broad range of factors. For example, if some sales or operating expenses are denominated in a foreign currency, foreign currency risks need to be considered.*

The potential lack of reliability resulting from the use of a PV technique is the essence of these points. Management is asked to predict the future. How effectively can management predict for how many more years a particular product will sell? The amount of the future sales and any resulting changes in sales prices? Future operating expenses? How will the economy affect sales of a product several years into the future? How much risk should be incorporated into a discount rate or cash flows? How should the discount rate or cash flows be adjusted for inflation expectations?

Estimating fair value could be even more difficult when goodwill or other indefinite-life intangible assets exist because management must exercise judgment in estimating the life of the goodwill or other indefinite-life intangible asset. For instance, for how long will excess

cash flows or earnings be generated because of the goodwill? It's quickly evident that using Level 3 inputs for fair value measurements (at least when using PV techniques) requires predictions about the future that are difficult to make and even more difficult to verify.

Properly incorporating risk into a PV model, as suggested by the discussion above, requires significant judgment. Acknowledging the difficulty of measuring risk, the FASB clarified its view of a risk premium in SFAS No. 157, indicating a risk premium should be used in PV computations, despite the fact that the appropriate risk premium may be difficult to determine.

To grasp the difficulty in measuring risk, consider some of the valuation problems for debt securities backed by subprime mortgages that have been widely reported in the financial press. These securities, which include mortgage-backed securities (MBS) and collateralized debt obligations, are typically composed of component parts with contractual cash flows (e.g., mortgages in the case of MBSs). The uncertainty in measuring risk, even though the future cash flows to be generated from the securities are contractual, clearly illustrates the difficulty in making accurate predictions for purposes of determining fair value. Most long-lived and intangible asset groups aren't associated with "contractual cash flows." Thus, it seems probable that estimating future cash flows and fair value for long-term and intangible assets is even more subjective and potentially less reliable. Even if other techniques were used to measure the fair value of these assets, significant subjectivity could result in unreliable fair value measurements.

ALLOCATION OF FAIR VALUE

As a practical matter, it would seem unusual for cash flows to be measured on an asset-by-asset basis. It's more common that cash flows are measured for a group of assets related to the production of one or more products. Furthermore, given the externalities from joint and common production, separation of the cash flows isn't conceptually possible. Accordingly, a DCF approach in the measurement of fair value requires grouping assets together. Once the fair value for an asset group is determined, an allocation of the asset group's fair value to various assets within the group could prove challenging.

To illustrate practical considerations, let's look at a manufacturing operation that includes property, plant, equipment, and intangible assets. Measurement of the fair value for each individual asset or asset category isn't always practical or possible. For example, a company may

tailor and modify equipment and machinery to meet specific manufacturing needs. In addition, robots used in the manufacturing process are typically programmed for specific purposes. Once a company has modified these assets and used them for several years, it's probable that no market observations exist for identical or similar assets. Furthermore, market values for intangible assets are generally not available. Even if market values are available for some assets in a group, a DCF approach may be necessary to measure the fair value of the asset group because market values aren't available for other assets in the group. Consequently, DCF will often become a necessary valuation technique for a group of assets, and allocation of estimated fair values among asset categories will be necessary.

In addition to the subjectivity in determining a value for a group of assets, allocating a fair value measurement to assets within a group of assets is an inherently subjective process. This use of judgment could provide opportunistic or dishonest management a chance to manipulate earnings. For example, assume a company allocates a fair value measurement between assets that aren't subject to cost recovery (land and certain intangible assets) and assets subject to cost recovery. If the subjective allocation results in an understatement of values assigned to assets subject to cost recovery, future depreciation and amortization will be lower than it should be, resulting in increased future earnings.

Similar concerns can arise with goodwill. Conceptually, the estimated fair value of goodwill is a residual value—the difference between the fair value of a reporting unit and the fair value of the identifiable net assets of the reporting unit. The identifiable assets and goodwill, however, work in tandem to produce cash flows. Thus, if a company uses a DCF model to estimate fair value of a reporting unit, how easily can the fair value be separated between the goodwill and the identifiable net assets? If reliable market observations are available to measure fair value of most assets and liabilities, the subjectivity in the process can be mitigated; as a practical matter, however, reliable market observations for identical assets and liabilities won't be available. Hence, the allocation will require significant judgment. It would seem that the allocation would be especially problematic for an entity with a significant number of intangible assets other than goodwill.

Properly dividing a reporting unit's fair value between goodwill and identifiable assets is critical. An overallocation of fair value to goodwill can result in an underallo-

cation of fair value to other long-term assets. In turn, the other long-term assets would have understated values, and future cost-recovery deductions would be abnormally small, resulting in increased future earnings.

CRITICISMS OF FAIR VALUE MEASUREMENT

Let's now summarize several criticisms of fair value accounting. First, even well-intentioned management estimates of fair value will be wrong to the extent that the various predictions and assumptions are wrong. Second, opportunistic and dishonest management can take advantage of the judgments and estimates used in the process to manipulate and massage the numbers to result in desired earnings numbers. With a DCF model, estimates of cash flows can be managed to overstate or understate values based on the desires of management. A company can record large write-downs in a poor performing year (the so-called big-bath procedure). These losses would result in reduced carrying values, which, in turn, would increase earnings in future years as a result of reduced cost-recovery deductions, reduced write-downs in future periods, or even future recovery of write-downs.

Whether or not management is well intentioned, the use of Level 2 and Level 3 fair value inputs results in numbers that are hard to verify. Management has the best information and is in the best position to make these predictions. Independent verification by an outside auditor would need to place a degree of reliance on management estimates. But if these predictions turn out to be materially incorrect, how can it be determined if the estimates were honest errors or the result of intentional manipulation by dishonest management?

Finally, it's conceivable that any movement to a fair value model could be inconsistent with a principles-based standards-setting process. In an attempt to seek guidance, additional rules and operating procedures could proliferate in an effort to deal with the uncertainties and estimates used in conjunction with fair value measurements.

The FASB noted this problem in a response to the Securities & Exchange Commission (SEC) study on the adoption of a principles-based accounting system. In commenting on the attitudes and behavior of preparers and auditors, the FASB noted in "Response to SEC Study on the Adoption of a Principles-Based Accounting System" in July 2004:

In addition, the Board's recent experience suggests that many preparers and auditors have become less willing to exercise professional judgment in areas involving accounting estimates, uncertainties, and

inherent subjectivity. Instead, they have been requesting detailed rules and bright lines in an apparent effort to reduce the need for the exercise of judgment in inherently subjective areas.

More recent developments related to fair value accounting are noteworthy. Partly in response to the need for more guidance and clarification, the FASB announced a one-year deferral for the implementation of Statement No. 157 for most nonfinancial assets and liabilities. In addition, measuring fair value for securities backed by subprime mortgages has proven to be very difficult. In a letter to select financial institutions in March 2008, the SEC may have shown the first chink in the fair value armor. Among other suggested disclosures, the SEC recommended providing a range of estimates for difficult-to-value securities. As discussed earlier, these securities have contractual cash flows. Just imagine the potential valuation problems for assets that don't have contractual cash flows, such as most long-lived and intangible assets.

It isn't hard to imagine that extended use of fair value measurements could require ever-increasing disclosures and requests for and issuance of detailed rules. The disclosures required by Statement No. 157, along with other disclosures suggested by the SEC, already are resulting in the proliferation of longer and more complex financial reports. Could a financial reporting system based on extensive use of fair values become as convoluted as some parts of our income tax system?

RELEVANCE

Fair value accounting for long-lived and intangible assets could reduce the reliability of financial reporting. Sacrificing a degree of reliability in return for more relevant information is sometimes considered an appropriate trade-off because the return is viewed as more relevant information. But a sufficient level of reliability should be a precondition to relevance. After all, how can unreliable information be useful to decision makers? In addition, to the extent different entities use different assumptions and procedures in estimating fair value, comparability could be decreased.

Nevertheless, to gain insight into the use of long-lived and intangible asset information, let's consider how investment analysts use financial accounting information and whether or not this group wants a change to full fair value reporting.

Over the last 15 years, several studies have examined how financial analysts and funds managers use account-

ing information (a list of these studies is available from the author). Information for the studies came from either surveys or the review of analyst reports. The studies found financial analysts use the following measures the most: price-to-earnings ratio, price-to-sales ratio, and earnings growth. These measures don't use asset information. Cash-flow information, such as a DCF model, is used on a fairly frequent basis, but not as often as the aforementioned measures.

These studies consistently found that analysts have a strong preference for using income-statement information instead of balance-sheet information and that little or no use is made of long-term and intangible asset information. A logical question then is whether the use of long-term and intangible assets would increase if a company measured and reported these assets at fair value. Two studies, conducted about 30 years apart, found that investment professionals don't want accountants to provide current-value information on long-term and intangible assets. The studies did find, however, that investment professionals prefer fair value information for liquid assets, such as marketable securities. These results aren't surprising because reliable Level 1 inputs are available for most securities; for long-lived and intangible assets, however, reliable measures of fair value often aren't available. In addition, it's unclear that fair value measures for most long-lived and intangible assets, if available, would be of interest to investors.

A simplistic yet plausible explanation for the results is that investment professionals view an entity to be in business to sell a product or provide a service. Of primary interest to analysts are the revenue from the sales or services of a business and the corresponding expenses of producing the revenue. These views and the studies are consistent with the view that the FASB should emphasize the traditional income-statement approach (at least for long-lived and intangible assets). Current values for long-term and intangible assets may not be relevant because these assets are purchased or generated with the intent of using these assets over their useful life. Of what relevance would fair values of these asset categories be unless the intent was to sell the assets and produce cash?

TOWARD ACCURACY AND TRANSPARENCY

In SFAC No. 1, the FASB suggests that a primary objective of financial reporting is to "provide information that is useful to present and potential investors and creditors and other users in making rational investment, credit and similar decisions." Useful information should have the

attributes of reliability, relevance, and comparability. Any potential expanded use of fair value measurements for long-lived and intangible assets may not be consistent with these attributes.

As the FASB continues its move to require the use of fair value measurements, it should consider users simply may not have a desire for the reporting of long-term and intangible assets at fair value. Accordingly, additional movements toward fair value reporting may provide no benefit and, unfortunately, significant costs. In addition to the increased compliance and auditing costs, additional costs could be imposed in the form of both increased financial reporting errors and potential future abuses by opportunistic and dishonest management. These individuals could use the estimates and judgments that are often necessary in measuring fair value to manipulate earnings or asset values to meet their own personal needs. Finally, when predictions prove to be wrong, the result could be an increase in litigation costs.

The last two decades have seen numerous accounting scandals, and the last few years have seen a record number of earnings restatements. The restatements could be improving transparency and financial reporting. So why obstruct the move toward more accurate and transparent financial statements by extending fair value reporting to long-term and intangible assets? ■

Tim Krumwiede, Ph.D., CPA, is an associate professor of accounting at Bryant University in Smithfield, R.I. You can reach him at (401) 232-6394 or krumwied@bryant.edu.