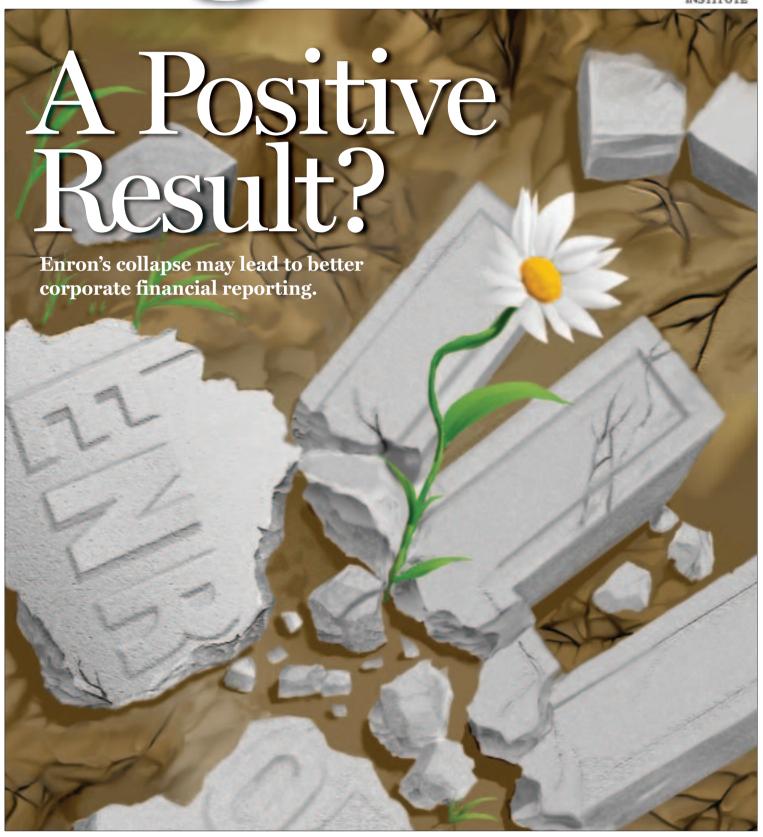
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REGULATION was first published in July 1977 "because the extension of regulation is piecemeal, the sources and targets diverse, the language complex and often opaque, and the volume overwhelming." REGULATION is devoted to analyzing the implications of government regulatory policy and its effects on our public and private endeavors.

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## Entering the New Century

BY THE HON. RICHARD H. BAKER

Chairman, Capital Markets Subcommittee

NRON REPRESENTED AN HISTORIC AND subversive attack against the foundation of free market capitalism: "truth in numbers." In response, Congress passed the Sarbanes-Oxley Act in the summer of 2002, which reformed corporate governance and public sector oversight of corporate activities. What Sarbanes-Oxley could not address, however, was the need for a thorough review of the current rules-based, backward-looking corporate financial reporting and disclosure regime.

The articles that follow discuss three improvements to corporate financial reporting: the use of eXtensible Business Reporting Language (XBRL), the opportunities for the SEC to utilize XBRL, and, the need to expand corporate financial reporting beyond GAAP. The implementation of those innovations will take several years, but the result will be a twenty-first century corporate financial disclosure system that will restore transparency and confidence to America's capital markets.

XBRL is a new Internet-based technology developed by the accounting profession in collaboration with over 200 private sector companies. It is non-proprietary and freely licensed to anyone who wants to use it. XBRL is, in the words of Bryan Bergeron's book *Essentials of XBRL*, "an open, platform-independent, international standard for the timely, accurate, efficient, and cost-effective electronic storage, manipulation, repurposing, and communication of financial and business reporting data."

The function of XBRL for financial reports is analogous to that of the Dewey Decimal System for books and the Universal Product Code for retail products. All financial data are "tagged" with a unique address that is defined in a taxonomy developed by industry working groups. For example, under XBRL, "net sales" will mean the same thing across companies and will be assigned a unique tag. In addition, under XBRL all data is only entered once and then always available via its unique tagged address for a number of uses. As a result, the cost of financial reporting for public companies is estimated to be reduced by 40

**Rep. Richard H. Baker** (R-La.) is the chairman of the Capital Markets Subcommittee of the House Financial Services Committee.

to 60 percent per year and it will enable companies to more directly and accurately communicate with their constituents. XBRL also lowers the cost of accessing information reported by companies and increases the ability of individual investors, analysts, creditors, regulators, and other corporate constituents to analyze corporate financial information.

Some critics have suggested that XBRL is not ready for primetime. In fact, it is. I commend the leadership of Chairman Don Powell of the Federal Deposit Insurance Corporation, who as chairman of the Federal Institutions Examination Council has announced that the Federal Reserve, the Office of the Comptroller of the Currency, the FDIC, and the Office of Thrift Supervision are converting the bank Call Reports to XBRL in 2004. A substantial pilot is scheduled for early in the year and, if the plan stays on schedule, all 8,500 banks and thrifts that must complete the Call Report quarterly will begin to do so using XBRL in the third quarter of 2004.

Similarly, I am delighted to see that in his short time at the Securities and Exchange Commission, chairman William Donaldson has endorsed the concept of using tagged reports. The SEC is beginning the process of evaluating the objectives and scope of moving SEC corporate reporting to tagged technology. It will certainly be a multi-year effort, but it is one I believe market participants will find worth the time and effort.

A major lesson from Enron and other corporate scandals is the importance of accurate, timely, and usable information in markets. An XBRL reporting system will disseminate relevant information in a flexible, usable format to markets on an almost real-time basis. As a result, investors will receive a more accurate picture of a corporation's financial status, and corporate malfeasance will be more quickly identified.

Too much damage has occurred to the U.S. economy and the capital markets because of the lack of timely and transparent financial information. I have confidence that XBRL will eliminate those deficiencies.

Changes to the corporate financial reporting system will take time and diligence to achieve. We are just now embarking on this monumental task, and the articles that follow provide a good starting point.

### XBRL will produce more effective reporting through market-based standards.

# Corporate Reporting Enters the Information Age

#### BY MIKE WILLIS

International Steering Committee of XBRL

OW MORE THAN EVER, DECISION makers across the corporate reporting supply chain recognize the need for accurate, reliable, timely, and accessible business information. In the age of Sarbanes-Oxley, executives in particular have a critical responsibility: Ensuring that communication of operational results also means conveying those results through efficient delivery in an interactive medium such as the Internet.

Resistance to the idea of using the Internet for gathering and disseminating financial information largely reflects a wide-spread perception that the required technologies are too complicated, too unwieldy, and perhaps not worth the time, talent, and money. The means of reducing complexity and promoting more straightforward information-sharing among disparate types and brands of business reporting and analytical software lies in the creation of a standard that all business software can understand and use. That standard has already been created, and is moving into the corporate reporting supply chain more quickly than you might think. Welcome to the age of eXtensible Business Reporting Language (XBRL).

#### THE PROBLEM WITH PAPER

What if air traffic controllers were required to issue paper reports detailing the speed, direction, and location of aircraft during the prior quarter? We probably would not have much air travel. Information about landings and departures that

**Mike Willis** is founding chairman of the International Steering Committee of XBRL International and a partner at PricewaterhouseCoopers.

already occurred is irrelevant to the control tower as it directs current activity in the skies over the airport. Air traffic controllers require real-time information, which is why airplanes are equipped with transponders that allow the real-time tracking of their movements on screen rather than on paper.

Paper-based reporting is opaque, linear, and unable to meet real-time information needs. So why do investors still have to perform their analyses and make decisions based on voluminous, backward-looking, paper-based periodic reports? On paper or in an electronic version of a paper report, important information could be on page 2 or it could be buried on page 76. In the Information Age, that is no way to run an efficient market system.

XBRL will bring corporate reporting into the twenty-first century. Users of information from XBRL-enabled corporate reports will be able to extract data instantly and easily, and enter it into their analytical software tools for immediate analysis. XBRL represents the next stage in the evolution of human communications.

Freed from the paper From stone tablets to papyrus, to paper, to printing press, to electronic documents, the written word has always been embedded into the medium in which it is presented. In order to find and use a specific piece of information, it first has to be located and then copied before it can be used. With XBRL, information can still be presented in traditional document formats, but it is not locked into the document. Instead, information can be located and extracted in an automated manner, with software doing in moments what previously took human eyes and hands hours to accomplish.

The advantages of XBRL relative to the current business information exchange process are:

- Lower production costs and more efficient reporting. In an XBRL framework, all business information is identified according to a label or "tag" that can be understood and used by any type of business software. That allows direct, software-to-software informationsharing, eliminating the need for human intervention and for paper. Data is entered only once, and thereafter can be addressed for any reporting or analytical purpose. Information is transferred file-to-file instead of file-tohands-to-file. As a result, the cost of financial reporting for public companies could drop by 40 to 60 percent per year while enabling companies to communicate more directly and accurately with their constituents.
- Lower consumption costs and greater transparency. Information consumers (including managers, investors, creditors, regulators, and other stakeholders) will gain significantly increased access to information in corporate reports at lower cost.
- **Enhanced information-sharing.** XBRL exponentially increases the timeliness and communication abilities between any and all parties interested in corporate information. That is not only relevant for communication between companies and investors, but also between entities whose communications are derived from corporate report aggregations, such as reports issued by regulators to other government agencies for analysis and policy-making decisions.

No more data shovelling Businesses, regulators, stakeholders, and other corporate-information consumers face an enormous challenge: processing huge (and growing) volumes of information in a timely, cost-efficient manner. While the Internet is now used to collect and disseminate business information, the data within the reports cannot be shared easily. Disparate systems and software can only share documents — they generally cannot directly share the information in the documents. Thus, manual information gathering and consolidation searching through sources, then "cutting and pasting" or rekeying — is necessary to get information from its disparate sources to the point at which it can be used for analysis, decision making, and reporting.

Manual information processes are not economical, accurate, or flexible enough to accommodate today's changing and growing information needs. Many organizations are already realizing that throwing more money and people at "data shovelling" tasks adds no value to an organization's performance and may reduce value because of mistakes made in the manual data-transfer process. If all software could "speak" the same language, there would be no need for the manual data-transfer tasks. They would disappear, along with their associated costs and error risks.

#### **ONE STANDARD FOR MULTIPLE INFORMATION NEEDS**

XBRL is a universal format, specifically designed for business

information, that all software can understand and use. Because it is both software- and platform-neutral, XBRL enables direct software-to-software information-sharing and exchange using Internet technology. XBRL works through published "taxonomies," which are like dictionaries of business-data terms. Every single piece of business information has a business-data term, or "tag," attached to it that makes the data identifiable in any software.

Unlike solutions that require special-purpose software and proprietary standards to enable disparate systems to share information, XBRL does not leave organizations dependent upon particular third-party vendors for implementation, maintenance, or adaptation as information needs evolve and grow. With XBRL, there is no need for costly special-purpose software or development of proprietary information standards or manual tinkering to deliver information to those who wish to use it. XBRL can be deployed over existing systems and incorporated into software already in use. Unlike manual consolidation processes, human hands are a lot less involved, significantly enhancing the reporting control environment.

Banking on XBRL XBRL benefits both those who produce and those who consume corporate financial information. Many high-profile government regulators around the world have begun requiring companies to submit filings utilizing XBRL, and more will do so in the very near future. A sampling of global regulators adopting XBRL include the Bundesbank, which began an XBRL filing pilot in 2002; the UK Inland Revenue, which will start accepting XBRL filings for the 2003 tax year; the National Tax Agency of Japan (Kokuzeicho), which has scheduled implementation for 2003, and the newest agency to adopt XBRL, the U.S. Federal Deposit Insurance Corporation, which will begin XBRL filings in 2004. That will likely be followed shortly by XBRL implementations at FDIC's fellow members of the Federal Financial Institutions Examination Council.

Although several U.S. federal agencies have begun exploring XBRL's potential to lower costs, enhance performance, and increase responsiveness to information constituents, the FDIC is the first to act. The FDIC's Call Report Modernization Project will use an XBRL framework for collecting, processing, and distributing data from over 8,000 banks to audiences inside and outside the government. (A Call Report is a consolidated report of condition and income compliance that all FDICinsured institutions file quarterly.)

The FDIC anticipates that the \$39 million it will spend on implementing the new reporting over the next 10 years will produce a net savings of \$26 million in processing costs, starting in 2004. And the agency initially expects to take only five days to report consolidated information to other government agencies, financial institutions, and the public, instead of the minimum of two weeks it now takes.

The time difference results from automating consolidation of Call Report information. Here's how the process will work: The FDIC will provide a new, XBRL-enabled Call Report submission form so the data provided by banks will enter the agency's systems in a single form. That eliminates the manual

standardization process used today, enabling immediate information validation and processing.

The FDIC will store the information in a central repository, which will be accessible to other regulators, financial institutions, and the public. That will provide a single point of access for all information constituents, enabling them to select the information relevant to them. The FDIC will not have to produce a variety of different reports that utilize overlapping information.

What impact will the FDIC's XBRL implementation have on banks? The reporting window for banks will stay the same and the XBRL-enabled submission form does not, in itself, require banks to change their methods of gathering Call Report information However, the practical effect of the FDIC's implementation will be to highlight the need for banks to automate Call Report production. The reason is straightforward: The faster the FDIC turns reported data around, the more imperative it becomes for banks to provide 100 percent accurate information the first time.

With a five-day turnaround, there is little room for banks to send the FDIC corrected data — reporting will become a one-shot deal. With no second chances, the usual manual processes banks use to produce Call Reports will likely require added resources or an XBRL-enabled reporting process to ensure accuracy and completeness. Moreover, banks will need to begin adapting their processes as soon as possible because the five-day time span will grow shorter as the FDIC uses XBRL and its own streamlined processes to disseminate Call Report data within hours of receipt.

#### **BENEFITS FOR COMPANIES AND STAKEHOLDERS**

Because the FDIC's XBRL implementation puts banks on notice to ensure nearly flawless Call Report data aggregation and validation processes, and because all or part of those processes are currently performed manually, bank managers have a choice: dedicate more resources and money to manual processes, or XBRL-enable the systems used for preparing the information.

Allocating more money and manpower to manual processes adds expense without adding value. Deploying XBRL over business information systems involved in Call Report production benefits banks by lowering reporting costs through automation and, even more critically, resolving one of the most pressing reporting problems banks face: accessing information contained in numerous data sources that are incompatible with each other and with reporting and analytical software.

In most banks, consolidating information is not only a manual process, it is a daunting task with piles of paper printouts from all of the various and sundry data stores located throughout the bank. Many companies in many industries confront this same problem, which is an outgrowth of having a range of different operating areas with different information needs and requirements as part of a single organization.

Government also confronts this problem: Agencies use disparate software, making information-sharing among them inefficient, untimely, and inaccurate — a recipe for poor decision making. In addition, because information-sharing is ardu-

ous and slow because of differing systems requirements, government agencies (like company operating areas) tend to be isolated from each other. Frequently, several undertake the expense of entering and attempting to maintain the exact same information. The results? Redundant effort and, worse, the exchange of outdated, erroneous data with other relevant operating areas or agencies.

The situation is even worse in the banking industry as a result of relatively higher historical merger and acquisition activity that has produced systems and data sources from formerly separate companies within a consolidated environment. Usually, systems were incompatible before the organizations were joined, so the layers of incompatibility have mushroomed over time as mergers and acquisitions continued.

**Beyond warehousing** To overcome the disparate data-store problem, banks and other companies often resort to moving information into yet another data store, a "warehouse." Does this make sense? Not really. It is expensive, adds third-party risk, and cannot rapidly or easily accommodate prospective changes needed in the internal information environment.

Moving information from the data stores into the warehouse, and then moving information out of the warehouse for reporting, analysis, and management decision making takes incremental resources, effort, and layers of expensive special-purpose software. In addition, there is vulnerability to the third-party vendors servicing the complicated structure because data movement would be impaired if any one of them stopped supporting a particular product or products. In contrast, XBRL enables information in disparate data stores to be standardized for re-use in management or regulatory reports without special-purpose software or proprietary information standards.

XBRL also allows faster utilization of the data used to create non-financial performance metrics. For example, the data used to create summary indices such as "customer satisfaction" and "customer retention" are difficult or impossible to gather when systems in various operating areas are incompatible and consolidation processes are manual. Yet, this type of information can be critical for assessing a company's performance.

With XBRL, information needed to routinely monitor critical non-financial information becomes as easily and instantly available as information used for statutory reporting. So, internal XBRL deployment not only increases the number of data points that can be used in any particular management analysis, it also increases the variety of information that can be incorporated routinely into management decision-making processes.

#### **XBRL VS. PROPRIETARY XML**

The Internet as we know it today is actually a gigantic, superefficient fax machine. While it increases the speed with which documents can move, it does not make the information in documents any easier to extract and use in analytical or reporting software than it was in physical paper documents.

What the Internet is missing is universal, software-neutral, non-proprietary standards for presenting, accessing, and moving information safely and securely. Those standards, collec-

tively called "Web Services," are now being deployed and the result will be an unprecedented level of direct communication ability between formerly incompatible software within and across organizations in all information supply chains, not just business reporting.

The foundation of Web Services capabilities is its universal language, Extensible Markup Language (XML). XML is the starting point for creating specific-purpose languages; XBRL is XML for corporate reporting.

XML-based languages, including XBRL, describe different kinds of data and text through "tags." Tags give information an identity and context that can be recognized and understood by

national, and international levels under the umbrella of XBRL International. The developers' focus is on creating a universal information format for business reporting over the Internet. The open, collaborative XBRL standards are key to effective information exchange among corporate reporting supply chain members. With over 200 organizations around the world involved in the collaboration, XBRL is by far the leading candidate for use by all supply chain participants.

In contrast to XBRL's open, collaborative standards, proprietary information standards typically found in vendor-supplied software present barriers to information exchange between different applications. XBRL is the universal format for

#### With XBRL, you will be able to extract whatever specific information you want from any company report, simply by requesting it.

disparate software products. By enabling universal communication across all forms of business information software, XBRL promotes instant information accessibility through direct exchange.

For example, a company publishing XBRL-enabled financial statements on its website can present the information in a traditional format. However, even if information appears in a traditional paper document, the information is not locked into the document. Users can extract whatever specific information they want simply by requesting it — right from their XBRLenabled analytical software.

Try it yourself To see what XBRL-enabled reporting looks like, you can access a publicly available demonstration created by Microsoft, PricewaterhouseCoopers, and NASDAQ. This pilot contains XBRL-enabled financial statements from 21 companies for the last five years. It enables you to extract specific information for any period, literally in seconds, right into an XBRL-enabled Excel analytical spreadsheet. You can try out this XBRL-enabled reporting and analytical environment for yourself at www.nasdaq.org/xbrl.

Be forewarned: Once you experience this pilot, you will not want to go back to today's reality. You will be able to extract whatever specific information you want from any company report simply by requesting it — right from XBRL-enabled analytical software. The data appear, the analysis is completed, and the graphs drawn all in a matter of seconds.

**Open standards** XBRL's universal application to disparate software is just one of its important features. Another is that it is an open standard developed collaboratively by over 200 corporate reporting supply chain participants including accountants, software vendors, regulators, aggregators/distributors, companies, and industry organizations working on the regional,

business reporting that enables interoperability of information. The primary potential competitors to the XBRL standard for business reporting in the Web Services environment are proprietary XML standards developed by individual members of the corporate reporting supply chain. Individual supply chain members may develop their own XML standard and demand that other members use it.

The alternative path for such members is to work collaboratively with the XBRL consortium to ensure that their unique needs are included within the XBRL standard. A proprietary approach to information standards increases costs for both the consumers and producers of information. A proprietary standard means all users must modify their applications to incorporate that standard.

Regulators are a clear-cut example of supply chain members in a position to develop and impose their own standards. However, justifying use of taxpayer dollars for such undertakings will be difficult when suitable open standards exist. Moreover, forcing a private taxonomy on regulated entities, and thus adding to their reporting burdens, has little value when communication among supply chain members, other than the regulator, is based on the open public standards. A proprietary approach by a single regulator also will adversely affect its ability to share collected data with other relevant regulators and government agencies.

Many regulatory reporting requirements are based on Generally Accepted Accounting Principles and, therefore, to the extent that regulators can map their systems to publicly developed GAAP XBRL taxonomies, they are relieved of the burden and expense of developing and maintaining standards for those reporting elements.

In addition, regulatory involvement in collaborative, public XBRL standards-development efforts is highly desirable because it:

- benefits the standards through input of the regulatory perspective,
- enhances relationships between supply chain members through ongoing dialog about how best to convey information vital to the supply chain,
- promotes more effective regulatory processes for both information producers and consumers through the use of interoperable information standards,
- lowers the cost of regulation by spreading development and maintenance of technical and semantical standards among collaborators.

**Vertical standards** Integral to the collaborative standards development process is consideration of particular reporting needs within various industries, or "verticals." Just as XBRL enables managers to gather relevant performance-assessment information that falls outside the range of statutory reporting (e.g., "customer satisfaction and retention"), open collaboratively developed XBRL reporting standards for such metrics benefit all supply chain members. Because XBRL promotes a more seamless flow of data within and among supply chain members, it becomes possible to track information on non-financial metrics relevant to assessing the health of individual companies and entire industries.

Regulators have a particularly important role to play in vertical standards development because they are in a position to consolidate the information that they receive from industry members and offer valuable benchmarking data by which individual companies can perform additional, timelier self assessments. This may come in the form of peer-group analysis and comparative information. Regulators currently providing that service will be able to provide it concurrent with the filing by the regulated entity, rather than days, weeks, or months later. The sooner information is available for re-use, the greater its value to the regulatory process.

It is also important to realize that regulators themselves are a "vertical." Standards developed by one government agency could be offered to and used by other agencies. Regulators can and should work together to create standards for consolidating and aggregating information for specific operational and performance measurements needed within government.

#### A BETTER CORPORATE REPORTING SUPPLY CHAIN

An example of collaboration between regulatory agencies is the taxonomy now being developed for the FDIC's Call Report Modernization Program, which will also be used by other FFIEC agencies. There is no reason that other government agencies cannot also join this collaboration to achieve their own "e-government" goals.

By adopting XBRL, regulators are also initiating the adoption process in the supply chain by promulgating information standards that are relevant and beneficial to every corporate reporting supply chain participant. Management gets more access to information residing in company systems and can easily and quickly incorporate it into the decision-making process, which

means better-run companies. Business partners can re-use shared information more effectively and quickly so that operations become more efficient not just within companies but between companies. Accountants will be able to serve clients and the market far better because there will be more information and more time available to perform risk assessment analyses. Creditors can make more timely decisions based on a larger pool of borrower data. Investors get improved access to information reported by companies, as demonstrated in the NASDAQ pilot, so those reports become more relevant for decision making. Other regulators and government agencies gain more timely access to a larger pool of accurate, relevant information for analysis and policy decisions.

The big picture is that the Internet continues to provide a powerful platform for the exchange and use of information. But what we are accustomed to today only scratches the surface of the information-sharing opportunities available to corporate reporting supply chain participants. To realize those benefits and more, a collaborative approach is needed among the supply chain participants.

#### **CONCLUSION**

Ten years ago, only a handful of visionaries could have foreseen the impact of the Internet on the entire business world and the information-exchange community. Today, a decade later, we are on the brink of a new Internet revolution that will redefine the "business reporting" paradigm through a new reporting standard, XBRL, and new capabilities for moving information more quickly and securely over the Internet. This revolution will not take 10 years to affect business communication — it is already unfolding. Regulators have been at the forefront of adopting the new XBRL standard, but their involvement in determining the effectiveness of this standard goes far beyond meeting their own challenges and imperatives.

Regulated entities are more than likely to deploy XBRL in their own systems, beginning with those that feed management information and then expanding beyond those systems to other consolidation problems posed by disparate systems and data stores that exist in most companies. Internal XBRL adoption by companies increases the trust that all company stakeholders can place in information that companies report and also serves to increase the quality of management decision making.

Business information consumers of all stripes — managers, investors, regulators, business partners, and creditors — are the biggest winners of all with XBRL because they are the ones who, right now, are stuck digging through the hundred-page-plus annual report to find the facts of interest to them. Data "hunting and gathering" is largely a manual, high-cost, low-value process that results in less informed decisions. If the facts are presented in a way that allows easy access and consumption, then the costs and time associated with using information will be significantly lower and more analysis on more facts will be performed. XBRL presents the facts in an instantly consumable, easily reusable manner. For investors, regulators, and all other stakeholders who are mostly concerned with "facts," XBRL is a welcome addition to the information revolution.

#### The SEC needs reporting processes for the Information Age.

## New Technology Can Help Avoid A Second Enron

By R.T. McNamar

The Cato Institute

O SUGGEST THAT ENRON WAS JUST about a Houston company's accounting fraud is like suggesting the Cold War was just about the shooting down of Francis Gary Powers; it misses the big picture. Enron was about accounting and securities fraud, and bad corporate management, but it was about much more than that. It involved a systematic failure of America's institutions of capitalism.

Enron's management failed. Enron's board of directors failed. Enron's internal audit function failed. Enron's external auditors failed. Enron's attorneys failed. Enron's commercial and investment bankers failed. The credit rating agencies failed. Wall Street's securities analysts failed. The business press reporting on Enron failed. In other words, the institutions of American capitalism that many had touted, indeed even preached about to the rest of the world, simply all failed.

In Enron, the greatest failure of American free market capitalism was the failure of the Securities and Exchange Commission. As the government's watchdog over public companies to ensure adequate and timely disclosure of relevant corporate information, the SEC simply failed in all aspects. It was not a watchdog, or a lapdog, or even involved in Enron, except in several negative ways. The watchdog did not bark. To quote Gertrude Stein, "There was no 'there' there."

If there is a major positive to come out of Enron's failure and its damage to American capitalism, it is the opportunity for the SEC to alter dramatically how it monitors periodic corpo-

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rate filings and screens them for irregularities that may deserve an investigation. If the SEC seizes this opportunity, it would take an important step in ensuring that another Enron is not taking place.

#### **BACKGROUND**

Enron was a true bipartisan failure on the part of the SEC. A Democrat, Arthur Levitt, chaired the Commission from 1993 to 2001 when the seeds of Enron's collapse were planted and sprouted. A Republican, Harvey Pitt, chaired the Commission from 2001 until 2002, when the collapse finally occurred. Democrats controlled Congress until 1995, when both houses swung to the Republicans, and then the Democrats briefly regained the Senate in 2001.

Many supporters of the SEC contend that congressional failure to provide adequate appropriations for the SEC is the root problem of its failure. In fact, my research suggests that there was a policy management failure on the part of the SEC leadership and an oversight failure on the part of Congress. Lawmakers and their staff did not ask the right questions of the Commission for a decade.

**Every four years** The Enron 10(k) for 1997, which was filed in April 1998, was the last Enron periodic filing to be examined by an SEC staff member until the Commission reacted to comments in the press about the firm's problems and opened an enforcement investigation during the third quarter of 2001. Enron went bankrupt in the following quarter. In short, the SEC's failure to examine the Enron filings represents a stunning failure of public policy oversight.

Worse, that failure was in compliance with the SEC's stated

and congressionally approved policy of only reading a public company's periodic filings once every four years, or reviewing 25 percent of all of the corporate filings each year. That was considered adequate. Enron shows that it was not.

Mark-to-market accounting In a no-objection letter dated January 30, 1992, Walter P Schuetze, chief accountant of the SEC, granted Enron permission to use mark-to-market accounting for its gas trading operations, Enron Gas Services, beginning the first quarter 1992. Enron responded that after "further review," it was going to begin using mark-to-market accounting for the first period of 1991 and that the "impact on earnings was not material." In fact, it was material. The year 1992 marked the beginning of the end at Enron, and the SEC never challenged the companywide use of mark-to-market accounting over the next nine years.

Mark-to-market accounting is a valid accounting technique. Banks and insurance companies mark to market their bonds and equity portfolios quarterly for their public reports, and do it daily for internal management reports. They indicate the increases and decreases in the current market value of the portfolio. The underlying accounting theory is that the current market value is a better measure of the liquid asset's value than its historical acquisition cost. It is most often used for assets for which a third-party valuation is readily available from the newspapers, Internet, Bloomberg, etc.

Gas contracts are relatively uniform contracts for the future delivery of natural gas at stated volumes, prices, purity, and geographic location for delivery. Hence, the gas contracts are relatively easy to price and compare, similar to U.S. Treasury bonds. Mark-to-market accounting is not used for unique assets, project finance projects, and ongoing sales operations that do not have relatively uniform marketable assets that can be easily priced in the open market by looking at the Internet, newspaper, or trade journal publications for current market prices.

Based on the SEC no-objection letter on mark-to-market accounting for its gas trading business only, Enron used mark-to-market accounting for all aspects of its business for SEC reporting and its public disclosures to securities analysts. Enron's SEC filings were not straightforward and obfuscated the fact that Enron was using mark-to-market accounting for all of its businesses.

There is no indication that the SEC ever responded to Enron's February 11, 1992 letter or objected to Enron adopting mark-to-market accounting a year earlier. Indeed, it does not appear that the SEC ever understood the materiality to Enron's earnings. The shift in accounting techniques permitted Enron to show earnings in 1991 that were similar to earnings it reported in 1990. In fact, the 1991 earnings would have been down if Enron had not booked two very large gas supply contracts late that year and marked them to market.

In retrospect, even though it was apparent that Enron was trying to hide what it was doing, the SEC never challenged the firm's companywide use of mark-to-market accounting. That is a nine-year period of failure by the SEC, seven of which were while Arthur Levitt was chairman and two while Harvey Pitt was chairman.

**PUHCA** The Public Utility Holding Company Act of 1935 was passed to protect consumers from the complex holding company structures and cross-share ownerships of many of the electric and gas utilities in the 1920s. Essentially, if a company is classified as a utility, it must file a number of additional forms for review by the SEC before issuing public securities. (The forms require the company to detail the ownership structures and percentages of ownership and inter-company debt between the parent holding company and its subsidiaries.) In October 1993, Enron petitioned the SEC to declare that power marketers were not utilities under the Act. In response, the SEC issued a no-action letter on January 5, 1994.

When Enron acquired Portland General Electric in 1995, it argued that it was not operating in interstate commerce, but only in the state of Oregon. In fact, Enron reincorporated in Oregon from Delaware, where it had previously been incorporated. Consistent with its past precedents, the SEC found that Enron was not a public utility in interstate commerce. This was a classic case of the lawyers running the SEC based on what had been done before and ignoring the reality of what Enron and PGE were doing. This is another example of SEC failure in regulating Enron.

As later noted by the Senate Government Oversight Committee staff report on Enron, if the SEC would not have exempted Enron from PUHCA, the firm would have been required to prepare much more detailed reports explaining the ownership connections between the parent and its many subsidiaries. The reports would have been filed and (presumably) read by the SEC utilities group. Many questions would have been raised about the nature of the ownership relations and Enron's off-balance-sheet use of the Special Purpose Entities.

#### **XBRL AND THE SEC**

Shortly after the accounting scandals at Enron and WorldCom, Congress passed the Sarbanes-Oxley Act. One of the purposes of the Act was to address the deficiencies of the existing SEC corporate filing and review process. It did so in two ways:

- Under Section 408, the Act mandates "Enhanced Review of Periodic Disclosures by Issuers," and requires the SEC to review the filings "on a regular and systematic" basis. It then enumerates six review criteria that the Commission must consider.
- Under Section 409, the Act authorizes (but does not mandate) that the Commission initiate real-time issuer disclosures from issuers of securities.

Those changes may appear to be subtle, but they are notable alterations to how the SEC had been operating.

**XBRL** By chance, there is a new classification system that, if the SEC adopts it, will permit the Commission to alter its filing and analysis of periodic corporate reports in a transforming way. eXtensible Business Language Reporting (XBRL) is a new private sector scheme developed to improve the consistency, accuracy, and quality of financial reporting in the business sector. XBRL is owned by a non-profit company, which in turn is owned by over

200 member companies around the world. About 50 of the member companies are U.S.-based. Any company can join the consortium and all of them pay their own expenses to work on the project. XBRL is freely licensed to anyone who wants to use it.

In essence, XBRL is a uniform standard for the electronic distribution and comparison of business reports. It enables users to compare the financial performance of a company against a group of companies and know that the data are comparable. It has been described as an Excel spreadsheet that is preloaded on a web server with all of the other companies in its industry. For example, in the retail sector in XBRL, "sales per square foot" will now be uniform in their comparison, whereas previously, companies could and did have different definitions of such matters as what space (restrooms? stockrooms?) should be included in the square footage.

In terms of its effect on financial reporting, XBRL has been analogized to bar coding for financial statements or the introduction of containerization in world trade and shipping. Another description is that XBRL will do for financial reporting what the Dewey Decimal System did for libraries. Those analoCall Report, to XBRL. Assuming the schedule is met, a major test will occur the first quarter of 2004, and all banks will begin filing in XBRL during the third quarter of 2004. In other words, the private sector is addressing the failures of the SEC for a decade, and improving transparency in corporate reporting so that the capital markets can function more efficiently. The government has failed to do that.

#### "TRUST" REPORTING

I developed for the SEC a new XBRL web-based corporate filing and screening system. This proposal was then reviewed with senior SEC staff, and was refined and improved with their cooperation. The Commission is likely to consider it this fall.

My recommendation is called "Transparent Reporting Using Standardized Terminology," or "TRUST" for short. It is essentially an XBRL-based reporting system for the SEC to use in reviewing periodic corporate reports filed by public companies. The flow charts in Figures 1 and 2 demonstrate the current SEC filing and screening system and the TRUST system.

TRUST provides the SEC with an opportunity to revise its fil-

#### If the XBRL-based TRUST system had been in place prior to Enron's collapse, the firm's corporate filings would have been flagged for SEC review.

gies all seem to be apt. Mike Willis of Pricewaterhouse Coopers, who also is the head of the International Steering Committee of XBRL. has claimed. "The effect that XBRL will have on the business community will be more significant than the transition from paper and pencil analysis of financial information to the use of electronic spreadsheets."

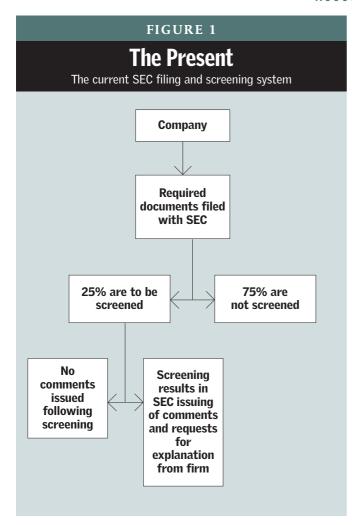
The standards or taxonomies underlying XBRL are expected to be available for testing and use in the fall of 2003. The standards for the banking sector are already virtually completed, and commercial and industrial standards covering 97 percent of the economy are scheduled to be completed in the fall of 2003.

Five of the six major accounting firms that audit virtually all of the public companies in the United States have led the development of XBRL, its taxonomies, and the accompanying industry standards developed by the private sector industry working groups. The accounting firms are KPMG, Ernst & Young, PricewaterhouseCoopers, Grant Thornton, and BBDO Sideman.

XBRL has been entirely developed in the private sector, and there is no government money or even government sponsorship involved. Indeed, XBRL is being adopted by the government from the private sector. The Federal Examinations Council (comprised of officials from the Federal Reserve, the Office of the Comptroller of the Currency, the Federal Deposit Insurance Corporation, and the Office of Thrift Supervision) announced last June that the government would convert the basic bank report to the government agencies, known as the ing and screening process for all periodic public company filings like the 10(k) and the 10(q). It enables the Commission to screen electronically all of the filings and determine which ones are consistent with industry standards and which individual companies' filings require additional explanation before the SEC can sign off on them. It is like posting to the company's website, except that XBRL makes the data available for computer analysis and manipulation once it is posted. It does not have to be entered into a spreadsheet by hand.

If Enron had filed in XBRL, its reported revenues, cash flows from operations, and profits would have been compared against industry standards. Its growth rate and the growth rate of its purported cash flows from operations would have been so far above the industry norms that it would have been flagged for an SEC staff review. It looked too good to be true, and an examination by the SEC's Corporate Finance Department would have showed that it was too good to be true. In other words, using XBRL, the comparison to industry standards would have prioritized the Enron work for the SEC staff.

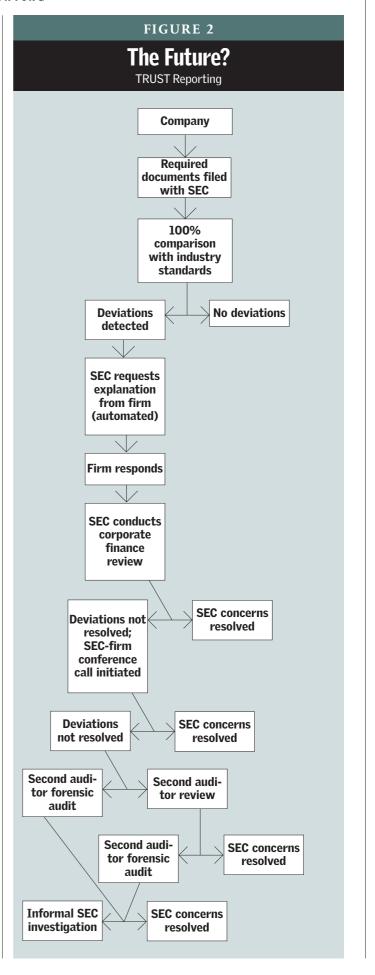
**Second review** Using XBRL, the SEC would be able to identify deviations from industry norms or standards. The SEC could then "comment" on the deviations and request an explanation electronically. Those deviations that the SEC determines are material and not adequately explained by the companies through an electronic e-mail would then be reviewed by the



Corporate Finance Staff, which would attempt to resolve the questions through a conference call with the firm's financial officers. That process would resolve most filing issues.

For questions that would not be resolved in the conference call, the SEC could request a second audit firm to audit the filings in dispute. This would not be a complete second audit, which would be too expensive. But, by focusing on the disputed issue, the second audit firm would recommend a resolution to the SEC and the company. Hopefully, that would lead to resolution of the matter. If resolution does not occur, the SEC would have the option of ordering a forensic audit of the company by the second auditor on the disputed matter. That should resolve the matter in virtually all cases that do not become SEC enforcement investigations.

In the case of Enron, even a cursory review of its 10(k) or 10(q) disclosures by a second auditing firm would have raised serious questions as to their adequacy in describing Enron's business and the off-balance-sheet transactions Enron employed. If a second firm had been asked to review any one of Enron's 10(k) filings from 1992 to 2001, the auditors would have produced a critique of the disclosures that would have caused the SEC Corporate Finance Department to initiate a serious investigation into what was going on. That would have almost undoubtedly led to enforcement actions that would have halted Enron's questionable practices several years before 2001.



The Second Auditor Review policy has been praised by all who have examined it, including senior SEC staff and non-government experts on corporate reporting. In fact, Bill McDonough, the new chairman and CEO of the Public Company Auditing Oversight Board that was created under Sarbanes-Oxley, said about the Second Auditor Review, "That puts all of the incentives in the right places for everyone."

At this time, it appears that the SEC is preparing to announce that it will convene an SEC Round Table Discussion on "tagged reporting" with private sector participants. That is the normal SEC process and is similar to its recent SEC Round Table Discussion on Hedge Funds. The discussion is expected to occur before the end of 2003. After the SEC Round Table, the Commission will make a formal decision on TRUST. Discussions with SEC officials indicate that it is highly likely that TRUST will be the basis for a complete overhaul of the SEC's filing and screening process. Implementation could begin in 2004.

**Benefits of TRUST** The TRUST recommendation is fully consistent with (and in some places surpasses) the requirements of

Accounting Principles, were manufactured through an elaborate Ponzi scheme and accounting fraud that the SEC did not even attempt to detect. Neither the SEC nor GAAP reporting worked to ferret out Enron to provide private sector market discipline. I recommend that the SEC should study the addition of non-GAAP performance metrics to the SEC GAAP reporting requirements, a recommendation also endorsed by the American Enterprise Institute and the Brookings Institute.

**Need for transparency** According to a July 2002 CNN/USA Today poll, 77 percent of the public believes that CEO greed and corruption caused the recent U.S. financial meltdown. A survey of Main Street Investors conducted that same month found that 71 percent of investors say accounting fraud is rampant. That is the real cost of the SEC's failure in Enron, and it is in no small part influenced by the constant coverage by the business new programs on cable television 24 hours a day, seven days a week.

Free capital markets cannot operate properly without transparency and confidence in the information they have. The current GAAP accounting and SEC reporting systems do not serve

## Current GAAP accounting and SEC reporting do not serve America's contemporary needs for transparent capital markets with trustworthy information.

the Sarbanes-Oxley Act. Indeed, Section 408 of the Act requires that the latest available technology be used to make filings meaningful and useful to the SEC. The TRUST proposal permits the SEC to screen 100 percent of its filings; the Sarbanes-Oxley Act requires only that 33 percent be reviewed annually. What is more, TRUST can work in "real time," thus satisfying the important requirement contained in Section 409.

The TRUST system would provide the SEC with the screening tools that it needs to monitor corporate filings and comply with the congressionally mandated criteria for screening under Sarbanes-Oxley. The use of industry standards developed by the private sector increases the probability that they will be more accurate and effective than those that would be developed by the government. The system's greatest contribution is that the incentives for the SEC, the primary audit firm, and the chief financial officers of publicly traded firms are all aligned to avoid the use of the Second Auditor Review, which would trigger adverse consequences, discipline, or even dismissal of the CFO and the auditor involved.

Last, at the macro level, the contribution of the TRUST system is that it would begin to close the "expectations gap" between the auditing firms and the needs of capital market participants for improved transparency. It moves away from earnings per share as the exclusive measure used by the investment community to gauge corporate performance. Enron's earnings, which supposedly followed Generally Accepted

America's twenty-first century needs for transparent capital markets with trustworthy information. Fortunately, the private sector has been working to correct that problem. The SEC's adoption of TRUST will go a long way toward making GAAP reporting consistent and useful.

#### Much of today's business world evolves around values that do not appear on balance sheets.

## Beyond GAAP

BY ROBERT E. LITAN

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PEN MOST CORPORATE FINANCE textbooks and look for the discussion of how stocks are valued, and this is what you are likely to find: The price of a stock at any given time is the market's forecast of the present discounted value of the firm's cash flow. Read most sell-side analysts' reports and most newspaper articles, however, and you find that earnings per share, computed under Generally Accepted Accounting Principles (GAAP), is the key to a company's value. Stock market strategists regularly appear on television business programs or are quoted in newspapers telling individual investors that the overall price/earnings ratio in the market is either higher or lower than the historic ratio at this stage of the business cycle, and that means either that stocks will go up or they will go down.

Thus, it appears that financial professionals, who pay attention to discounted cash flows, are using a different method of valuing stocks than individual investors, whose sources of information are the financial reports published by public companies and the analyses published in the newspapers or presented on television. The result for individual investors can be devastating. The recent Enron collapse is a case in point. While the firm was reporting falsely inflated GAAP earnings, its stock was falling precipitously in relation to the rest of the energy industry. Investors who paid attention to Enron's GAAP earnings were likely to have been puzzled by this decline, and stayed with the company in the belief that the market would eventually come to its senses. However, investors who were sophisticated enough to do the necessary cash flow projections — as the finance texts suggest — would have seen that Enron's cash flow was negative while it was reporting over \$800 million in GAAP earnings.

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The lesson here is that most investors are not fully armed to venture into the business of understanding the future prospects — or even the current condition — of public companies. The reason for this is that until now the Securities and Exchange Commission has focused almost entirely on the development and improvement of financial disclosure using GAAP, paying virtually no attention to cash flow analysis and other methods of valuing companies. That has left the impression with investors and media commentators that GAAP financial results. such as earnings per share, are a true reflection and the best measure of the success or failure of companies.

There are a number of major flaws in this concept. First, GAAP financial statements are inherently malleable. Concepts such as reserves, depreciation, extraordinary items, and nonrecurring expenses provide management — human nature being what it is — with ample opportunity to adjust or manage earnings. That can produce good results in bad years and during good years — store earnings in a "cookie jar" for later use when results would otherwise be weak. That is not necessarily dishonest. Many of the judgments management is required to make are predictions about the future, and in cases of uncertainty about this inherently uncertain subject, management assumes the best case from the standpoint of producing the current year's GAAP results.

Second, GAAP earnings are necessarily statements about the past, and are not a reliable guide to what firms are likely to earn in the future. Competitive conditions and many other factors will inevitably introduce variability and unpredictability into corporate earnings. The fact that some companies have stable earnings growth over many years does not necessarily mean that they have overcome those obstacles; unfortunately, it may actually mean that they have developed ways to manage their earnings so as to give the appearance of stable, steady growth. Steady growth in earnings, in other words, could as easily be a warning sign as an indicator of financial strength. In the real world, earnings and cash flows should fluctuate, often widely, in response to the ups and downs of the business cycle and to the correct judgments and mistakes of a firm's management. Poring over the details of the financial statements of the immediate past may offer no more guidance to the future than the proverbial Ouija board.

So today's stock-picker is left with few resources on which to make a decision. GAAP financial statements can be one useful source of information, but not sufficient. Another very useful picture could be developed from cash flow data, which helped analysts see through Enron's manipulations, but even sophisticated discounted cash flow analysis requires assumptions about the future, and thus is only a limited guide to future corporate values.

**Assets and shadows** At this point, it is important to note that financial reports of all kinds are only like the shadows on the wall in Plato's cave: they are derivative representations of reality, not reality itself. Reality itself is the health of the underlying business, and we have, as yet, no direct measurements for that.

It has always been difficult to estimate the likely success of a company in the future, but developments over the last quarter century have made the task immeasurably more difficult. Once upon a time, the assets of most companies were tangible: you could touch them, feel them, and value them with reasonable accuracy, at least at historical cost. Even if historical cost was inaccurate, those assets had a current market value that could be estimated by investors and analysts. Thus, as a general matter in those halcyon times, one could look at the balance sheet of a company and get a fairly good idea of what it was actually worth. And indeed, until the early 1980s, the market-to-book value ratio of the S&P 500 companies was about 1-to-1. However, shortly thereafter, that ratio began to climb, so that by the year 2000, just before the stock market break, it had reached more than 6-to-1. It has since fallen back somewhat, but remains well above the 1-1 ratio of two decades ago.

What is the reason for the sudden and dramatic change in the relationship between market and corporate book values? The answer seems to be today's information-based economy, where the earning power of corporations increasingly rests on intangible assets — not machinery, equipment, land, or rolling stock, but on things that cannot be touched, like patents, trademarks, brands, and software designs. That is a vast and consequential change, the significance of which has not yet been fully understood by analysts, media commentators, or the Securities and Exchange Commission itself.

Most of the value of contemporary corporations does not appear on their balance sheets. It is important to understand how that happens. When a company's research staff develops a new product — say, a new software application — the salaries and soft costs that went into the development process are generally written off against current revenues. Thus, when the product is ready for sale and begins to generate revenue, its value does not appear on the balance sheet. It is a revenue source without a corresponding asset. If this asset were like a machine that turns out widgets, under GAAP the depreciation of the machine — which the manufacturer would have purchased from a third party — would be written off against the revenue from the widgets, producing GAAP earnings.

But in the case of the software program, there is nothing on the balance sheet to be depreciated. Because there is no asset, there is no depreciation. The revenue from the sale of the software program, at least as far as the balance sheet is concerned, seems to come from nothing. No wonder, then, that the ratio of market-to-book values has risen substantially; corporations are now producing revenues and earnings with assets that do not even appear on their balance sheets, and shareholders are trying to value those companies without the assistance of a cost-based balance sheet.

That fact also explains the very high price/earnings ratios that are common in today's market. Traditional P/E ratios were based on earnings after depreciation of the assets used to produce them. Now, earnings for many companies have been substantially divorced from costs. The costs of developing the software program that is now generating earnings in our hypothetical were written off long ago, and will not return. The earnings that the company's current products are generating are thus not limited by the need to acquire more assets, and will not be subject to depreciation. No wonder P/Es are higher than historical values. Investors are seeing earnings that do not depend on the acquisition of the costly assets that were formerly necessary.

Thus, GAAP financial reports are significantly flawed. GAAP is cost-based. It was developed at a time when most of the earnings generated by corporations and others were generated with tangible assets — assets that had readily determinable costs. The goal in GAAP reporting is to match revenues with costs, thus producing a bottom-line earnings number. When the costs of revenue-producing assets cannot be determined because the earning asset is internally produced by the company's employees and has no determinable cost, GAAP reports are useless or misleading. In an environment in which internally generated intangible assets are the principal source of corporate revenues, GAAP balance sheets are no longer a sufficient guide to company values, and GAAP earnings are no longer matched with the costs of producing them. The result is the enormous gap (excuse the pun) between balance sheet values and market values in today's equity markets, and by the growth in P/E ratios in relation to historic ratios.

#### BETTER ACCOUNTING FOR INTANGIBLES?

At first blush, it would seem that if one of the core shortcomings of current accounting is that it does not adequately take account of intangible assets, and thus their earning power, then the most sensible response would be to fix the accounting system. Such a fix would, presumably, require firms to place market values on their intangible assets for balance sheet purposes, and to find appropriate ways of amortizing those assets if their value to the firm appears likely to decline over time. After all, corporations contemplating acquisitions or mergers should, and to some extent do, make such estimates of target firms. Why not simply mandate the reporting of such estimates, not just in takeover situations, but routinely as a matter of course?

The answer is that placing a value on internally generated intangibles such as computer software applications or pharmaceuticals is not feasible. There are few, if any, organized markets for such assets, which tend to be unique in any event, and there are no objective ways for firms or their auditors to verify those values (unless the assets are purchased or valued at cost). The value of an internally developed software program or pharmaceutical design cannot be determined until it begins to generate revenue; even then, its value depends on future sales, which can only be guesswork. The estimates would have to be based on uncertain and readily manipulated estimates of expected cash flows and the interest rates at which those flows would be discounted. Furthermore, it is very difficult and often impossible for anyone to estimate the externality value of intangibles — their value in use within a firm compared to their value in exchange if they were bought and sold in a market.

**Investment or expense?** AOL's experience with accounting for the costs of a major marketing effort provides a good illustration of how difficult it would be to account for or otherwise place a value on internally generated intangible assets. In the mid-1990s, AOL began an aggressive program of enlisting subscribers by sending out free diskettes to a wide range of potential consumers. The company's theory was that the larger its subscriber base, the more valuable its system would be to advertisers, and — as a network industry — to later subscribers. In other words, a large subscriber base was seen as a significant intangible asset. Under that logic, as AOL incurred costs for sending out diskettes, it treated those costs as investments in a productive asset and capitalized them on its balance sheet. As a result of that treatment, the company showed earnings in the years 1994 through 1996 because a substantial portion of its marketing costs was not being written off against revenues.

The SEC disagreed with that treatment, however, arguing that the marketing costs should be written off as incurred. After considerable discussion, the company capitulated and restated its financial statements, showing losses for the years 1994-1996.

Which treatment was correct? It is undeniable that a large subscriber base could be an enormously valuable asset to a company like AOL. However, the actual value of the asset could not be determined until after it was in place and began to generate revenues. As it turned out, the subscriber base that AOL developed through its diskette distribution program was hugely valuable. For a time, it made AOL the dominant player in the Internet world, and if its management had not made a number of mistakes in later years, its subscriber base would have put it far ahead of any potential competitors. By requiring that AOL write off its subscriber development costs in the years incurred, the SEC caused AOL to show losses instead of gains. Investors, seeing those losses, might justifiably have concluded that the company was failing in its growth efforts. However, the company was not failing. In reality, through its subscriber development efforts, it was building a very valuable asset completely off its balance sheet — a fact that was, ironically, obscured by the SEC's attempt to compel what it considered to be better disclosure. Investors who were frightened away by the losses lived to regret their decision; investors who understood, somehow, that AOL was building a very valuable asset that was not on its balance sheet were ultimately rewarded.

This is not necessarily a criticism of the SEC. If AOL's efforts at creating a large subscriber base had failed — if many had signed up because of the free diskettes, but few had actually used the service — the SEC's judgment would have been correct. Investors who had been frightened off by the losses would have had the satisfaction of seeing their decision vindicated, and those who stuck with the company would have suffered.

There was really no way to tell which treatment was correct at the time the decision had to be made. Only later events would enable anyone to say with certainty whether it made more sense to treat AOL's subscriber development costs as an investment (hence capitalized) or as an expense (hence written off in the year incurred). That is a recurring problem with intangible assets, because they frequently have no inherent or ascertainable value for accounting purposes until they generate revenues or are sold to third parties in arm's length transactions. Obviously, that is no way to run either a railroad or an accounting system. The fact is that GAAP cannot be fixed so that companies can include the value of internally generated intangible assets on their balance sheets at a particular value. Any such value would be guesswork, and would tend to distort GAAP results rather than improve them.

#### WHAT ABOUT BETTER GAAP?

Nor can GAAP be updated or improved so as to avoid those difficulties. One commonly suggested reform, for example, is to bring U.S. GAAP closer into line with the International Financial Reporting Standards (IFRS) set by the International Accounting Standards Board. Advocates of IFRS claim that its broad principles are superior to the detailed rules of GAAP, which critics claim invite firms such as Enron to structure transactions that will circumvent the detailed letter of the rules, and in the process violate their spirit. In contrast, the broader principles of IFRS, it is said, require firms to concentrate their reporting on the fundamental substance of transactions.

In fact, the Financial Accounting Standards Board (FASB) — the U.S. body that decides what constitutes GAAP — seems to have sided with the GAAP critics by announcing that it plans to harmonize U.S. GAAP with IFRS by 2005. The implicit message: Efforts will be made to bring U.S. GAAP more in line with the principles-based approach of the international standards.

That, however, will not solve the problem associated with intangible assets. Although IFRS is principles-based, it still relies on costs to establish asset values. It will still be impossible to establish whether a particular cost is an expense or an investment when it can arguably be said to have contributed to the development of an intangible asset. It will also still be impossible to place a reliable objective value on an internally developed software application until it actually begins to generate revenues. A principles-based system, in other words, would still not know what to do with AOL's subscriber development costs when it came time to decide whether to capitalize them or write them off, or how to treat other intangibles that have not been purchased from third parties.

#### A WHOLE NEW SYSTEM

As difficult as the AOL problem is, it does not fully describe the difficulties associated with developing a suitable system for evaluating intangible assets. Intangible assets come in two main categories: those that are owned by the company and could theoretically be sold, and those that are not even owned by the company and could not even in theory be valued on the company's balance sheet.

In our initial discussion of intangible assets, all the items noted — patents, trademarks, brands, and software designs — could at least in theory be sold and thus at some point attain a balance

sheet value. Even the subscriber base developed by AOL could eventually have been given a value, if necessary. But there is a whole other category of intangible assets that are not even owned by the company and thus could not even theoretically be valued and placed on its GAAP balance sheet. Examples of such intangibles are employee know-how or technical proficiency, customer satisfaction, alliances with other companies, consumer perceptions of product or service quality, and management skill. Those intangibles turn out, on investigation, to be the real sources of values in companies, and to the extent that they can be accurately assessed, the investor will have at least the possibility of evaluating the likely prospects of a company. Unfortunately, however, there exists today no comprehensive set of measures or indicators with which an investor can make this assessment.

So what is the poor investor — or stock-picker — to do? Better financial information does not seem to be the answer. There is a limit to how useful historical financial data can be in enabling stock-pickers to attempt to project future earnings or cash flow; neither GAAP financial statements nor cash flow analyses are likely to be particularly good at predicting the future. Those financial methods are only derivatives for attempting to understand the prospects of the underlying business. When we discuss intangible assets and the sources of corporate profitability, we are coming closer to understanding the underlying business. Thus, we believe stock-pickers could do better if they had different and better non-financial information that may be far more illuminating than last period's earnings or cash flow, even if those things could be derived reliably. At the very least, such information could usefully supplement GAAP earnings and cash flow data in order to provide a more complete picture of corporate prospects. For that reason, we believe it is time to move beyond GAAP to the brave new world of non-financial indicators of future financial performance.

#### **MORE AND BETTER NON-FINANCIAL INFORMATION**

In today's information economy, the real values of a company may not even appear on its balance sheet. In fact, some of the

most important assets—like customer and employee satisfaction, alliances, and management skill – do not even belong to the company in any proprietary sense, but do produce the company's earnings. For stock-pickers and others, there is no way to evaluate those factors, just as there is no way to put a value on intangible assets such as pharmaceutical designs, subscriber lists, and software applications that at least belong to the company. While it may be misleading for firms to place values on those important assets without having liquid markets to validate the estimates, certain non-financial indicators could shed much light on the nature and quality of those assets for specific firms. What investors can learn is not necessarily the monetary value of those assets — the kind of value that might be put on a balance sheet — but the degree to which the company's business model is succeeding. Combined with financial information, it would provide a valuable index to the company's likely success in the future.

Table 1 helps illustrate what we mean by listing various non-financial or non-traditional measures of performance that we and other commentators and expert reports have recommended in recent years. For example, the table suggests several indicators of current consumer satisfaction, e.g., product defect rates, return rates. Arguably, any or all of those measures may be far more indicative of a firm's ability to generate growth in earnings than the earnings growth rate in some recent period itself. After all, a firm may be able to increase its earnings for various reasons, but if product defect or return rates are high or rising, then relying on past earnings growth to

#### TABLE 1

**Intangible Assets** Possible non-financial or non-traditional indicators of performance

#### Value of the Customer Base

- Defect rate
- Return rate
- Customer reorder rates
- Percent (or number) of customers accounting for a certain percent of sales
- Percentage growth of business with existing customers

#### Value of the Workforce

- Quit rate
- Measures of educational attainment
- Hours of employee training

#### Innovation

- Percent of sales from new products or services developed recently
- Average time to bring a new idea to mar-
- Breakeven time (time for new product to cover development cost)
- Patents
- Research and development productivity (number of patents per R&D dollar)

#### **Marketing Effectiveness**

- Number of responses to solicitations, or the conversion rate at which customers responding to solicitations actually purchase goods or services
- Solicitation cost per new customer acquired, or new customer revenues per dollar of solicitation expenditures

#### **Other**

- Market share(s)
- Ranking in cross-industry benchmarking studies

SOURCES: Authors: "The Third Wave Breaks on the Shores of Accounting," by Robert K. Elliott, Accounting Horizons, Vol. 6 No. 2 (1992); "Costs and Benefits of Business Information Disclosure," by Robert K. Elliott ad Peter D. Jacobson, Accounting Horizons, Vol. 8 No. 4; Value Reporting Forecast, 2000, published by PricewaterhouseCoopers, and Improved Business Reporting Customer Focus, published by the American Institute of Certified Public Accountants, 2000.

predict continued growth in the future may be a serious mistake. In a classic case, Xerox Corporation was showing high levels of profitability while it held an enforceable patent on its copying technology, but what the financial statements did not reveal was that customers were highly dissatisfied with the quality of the Xerox product, and the company's profits were derived in substantial part from repairing its unreliable machines. When the patent expired, the company's customers fled to competitors, and investors who had thought the company's profitability was a reasonable forecast of future success were disappointed. If Xerox had been keeping track of and reporting its customers' views of its products, investors would have been forewarned.

For similar reasons, stock-pickers may want to pay special attention to various measures of the value of a firm's workforce, innovation, or marketing effectiveness. Any or all of those measures may also be more informative about the ability of the firm to generate future earnings growth than its recent bottomline earnings or cash flow figures.

#### **GETTING FROM HERE TO THERE**

If the various non-financial measures of firm performance depicted in Table 1 are potentially so useful, why do firms not routinely disclose them? We believe there are several reasons.

For one thing, there currently are no standards for deciding which measures should be developed or publicized, or how the results should be computed and presented. That problem is complicated by the fact that the appropriate measures undoubtedly will vary by industry. Developing indicators could be costly, especially in management time, and the payoff is not clear. While companies that exceed normal standards of disclosure probably have lower costs of capital, that is a distant incentive for a lot of near-term effort.

Second, companies may have concerns that if they start releasing what is now viewed to be unconventional data or information, they will be locked into releasing it consistently in the future because the market will expect it. They also have reason to fear that release of such information would create new risks of liability for alleged faulty disclosure. Perhaps even worse, some companies may fear that the release of information could assist their competitors.

Although we believe that those fears are real and have some basis, they could be alleviated through a careful standards-setting exercise. Moreover, it is imperative to provide better information for investors, especially as GAAP financial disclosure becomes less and less useful in an economy built on intangible assets.

**Third-party push** How can this best be done? Because appropriate non-financial measures of current and likely future financial health probably do vary by industry, it is best that they be developed on an industry-by-industry basis, although some measures are likely to be useful in many industries.

It is expecting too much, however, for industry trade associations or their more generic equivalents (such as the Business Roundtable or the Chamber of Commerce) spontaneously to undertake this exercise. Firms and their industries need a push by some third party. The FASB has a project in this area, but

there may be limits to what it can do. For one thing, the FASB sets financial reporting standards, and historically has not addressed the reporting of non-financial information (although it has sponsored research in the area). More importantly, the FASB is extremely busy with other projects, especially its planned overhaul of U.S. GAAP, and may not have the time or resources to sponsor or organize a series of industry-specific forums that would be necessary to help design appropriate non-financial indicators.

Accordingly, we recommend that the SEC — and its equivalents in other countries — assume this role, not through any formal rulemaking process, but as a convener of industry-specific and more generic cross-industry forums. Initially, the purpose of the meetings would be to identify useful non-financial indicators, which the media could help publicize. Over time, we believe there is a reasonable chance that investors, especially large institutional investors, would begin to demand that the firms publish how they are performing by those measures. At some point thereafter, regulators or standards-setting bodies could mandate the publication of the indicators that the market has made most popular.

The forums we advocate can and should build on the forward-looking thinking about non-financial measures that has already taken place, reflected in part in the list of indicators shown in Table 1. Most recently, the Organization for Economic Cooperation and Development (OECD) has launched an effort to identify useful non-financial indicators to measure company performance.

**Safe harbor** One important issue is whether lawmakers should enact some sort of "safe harbor" provision in the securities litigation laws to shield corporations from liability when disclosing non-traditional, non-financial information. Without such protection, and in the absence of a mandate that such information be disclosed, firms are not likely to produce the information. For that reason, we favor a limited safe harbor, one that would allow lawsuits only where the company (or its auditor) commits gross negligence in calculating, presenting, or auditing the information released.

Mandates are premature, but it is time for the SEC to begin the process. It is time to move beyond GAAP.

#### READINGS

- Following The Money: The Enron Failure and the State of Corporate Disclosure, by George Benston, et al. Washington, D.C.: AEI-Brookings Joint Center for Regulatory Studies, 2003.
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- *Intangibles*, by Baruch Lev. Washington, D.C.: Brookings Institution Press, 2002.