

The Evolution of Accounting Theory in Response to Market Changes

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Abstract

The purpose of the study is to exam the evolution of accounting theory as a response to changes in the market. The social context of business has changed the historical context of accounting and this study will analyze the relations of to better understand why accounting standards have achieved their present state of evolution.

1. Introduction

The ability for a firm to generate income is a critical process to determine performance. As firms grow in complexity, it become increasingly challenge to accurately determine earned income. Both economists and accountants have conceived effective approaches to for determining income. Economists consider income as a whole of society, whereas accountants view income as a result of business transactions. Difference between the two arise when determining net worth. Accountants determine net worth on an historical cost by the formula of assets – liabilities = net worth; whereas the economist’s determination is current value of tangible assets + discounted value of future net receipts – liabilities. (Mitchell, 1968). Therefore, identifying a firm’s residual value of its revenue over its related cost will be different based on the two concepts.

Economic income is the net cash flows plus a change in present value or market value of a firm. It recognizes all gains and losses, realized or unrealized. Bedford’s (1957) study discussed the following criticisms of accounting by economists:

1. Accountants fail to distinguish clearly between capital gains and normal income.
2. Conventional income accounting takes no heed of changes in general price levels.
3. Accountants refuse to recognize changes in the value of assets as such changes accrue.
4. Accountants allocate common costs to periods of time and to products.
5. Accountants do not recognize all the assets or expenses of a company.

Accounting income is the enhancements of assets or the decrease of liabilities that increase equity. The assumptions used by accountants are based on the following concepts (Mitchell, 1968):

- The going concern
- Objectivity

- Realization of revenues
- Stable monetary unit

These accounting concepts establish differences from an economist's perspective. For example, economist rejects the going concern as a basis for income determination since a firm is valued annually. Accounts receivable is only considered at the discounted present value by an economist. While, accounts receivable from an accountant standpoint is considered ongoing and there is no need to decrease the asset to present value. Objectivity is another difference between the two concepts of income. Accountants measure the effects of business transaction on verifiable evidence, whereas the economist makes measurements on the basis of expectations. (Mitchell, 1968). The economist relies on subjectivity for determination of income since the economist must predict the total future income of a firm.

Ryan's (2007) study explained, "The concept of individual economic income cannot be used for measurement of profit for a past period as the concept is based on the capitalization of expectations and excludes "separate but correlated" concepts of profit and capital needed for capital maintenance." These perspective concludes that accounting income is the appropriate approach for the concept of income. Economic income is not utilized in financial reporting because of the volatility in the market which is continuously changing. Investors are generally not concern with stock price until the stock is sold and efficient market does not require the market price to be a true value at every point in the market as long as the market is unbiased. Both of the conceptual frameworks have produced evidence of value that is suitable for some dealings and there is much inter-relationship between the two.

2. Concept of capital maintenance

The concept of capital maintenance seeks to determine how a firm maintain capital and define profits. The premise of this concepts is to ensure the protection of capital for shareholders and the allocation dividends are out of profits. There are two concepts of capital maintenance: financial capital maintenance is when the net asset value is greater than or equal to the balance at the beginning of the fiscal year; physical capital maintenance refers to the operational output produced compared to the beginning of the year. SFAC No 5. defined earnings as the change in net assets exclusive of investments by owners and distributions to owners, asset and liabilities would be measured directly, and changes to them would flow through the income statement. Therefore, the SFAC No. 5 definition would flow through the income statement and earnings represents a balance sheet approach to the measurement and report of revenues and expenses. (Brainmass, n.d.).

2.1 Financial maintenance concept

A firm's monetary value of assets is considered for financial maintenance concepts. Gamble's (n.d.) study explained financial capital maintenance concept has the following characteristics:

1. The exchange transaction is the major test admissibility of data to the accounts, and events deemed equivalent to exchanges are also recorded;
2. The dominant measurement basis is historical cost at the date of a transaction;

3. The dollar is the standard measurement;
4. The matching concept plays an important role with respect to the amount that appear on the statement of income;
5. The statement of income discloses the inflow and outflow of economic goods and services; the difference between the inflow and the outflow of economic goods and services is operating income;
6. The capital maintained is the unadjusted monetary investment of stockholders.

The major strength of this concept is the reliance on financial statements which provides comparability between other firms. The concept also provides a conservative approach since income is not recognized until realized. A weakness of this concept is its dependency on the value of the dollar which is historically unstable. (Gamble, n.d.).

2.3 Physical maintenance concept

Productivity of a firm is essential for sustainability. It has been defined as the ability of a firm to produce and distribute a given quantity of goods and services during a specific time period. (Gamble, n.d.). The recognition of income does not occur until provision has been made to replace assets and is reported by depreciation and cost of goods. In addition, both realized and unrealized holding gains are added to distributable income. Some of physical capital maintenance concept characteristics include the following (Gamble, n.d.):

1. Historical and selected expected transactions are the major test for admissibility of data to the accounts;
2. The dominant measurement bases are historical costs at the date of a transaction and replacement cost for fixed assets and inventories at the balance sheet date;
3. The dollar is the standard unit of measurement;
4. The matching concept plays a dominant role with respect to income determination;
5. The statement of income discloses the portion of an entity's income that can be distributed without impairing its physical capacity; specific price changes of fixed assets and inventory are excluded from income;
6. The capital maintained is the current market value of operating assets.

The major strength of this concept is that it recognizes the replacement of assets contribute to the long-term survival of the firm. It also promotes dividends payout to stockholders without impairing the ability to replace assets. A weakness of physical maintenance concept is the expectation of input and output prices will remain constant. In addition, there is a standard of measurement problem with difference between historical and replacement costs of operating assets not representing real holding gains and not considering interest on stockholders' contributions. (Gamble, n.d.).

2.4. What constitutes an appropriate approach?

The financial capital maintenance constitutes the better approach. Lee's (n.d) study revealed the following issues with physical capital maintenance approach: the needs of external report users, the accounting treatment of holding gains, coping with changing asset structures and technologies, accounting for price decreases as well as increases, the feasibility of using current values in financial reports, and alternatives to current cost accounting. Accounting principles are based in objectivity and the difficulty of defining and changes in physical capital makes financial capital maintenance a more effective methodology.

3. Principles-based versus rule-based accounting

The complexity of financial markets has increased the difficulty of financial reporting. Performances reviews have become essential such as quarterly reporters to estimate possible earnings. As a result, positive earnings performance becomes key focus for management. Accounting practices that product favorable alternatives are selected to impact reported profits. As more companies prefer specific accounting practices, it become more difficult to establish uniformity or comparability. Shortridge and Myring's (2004) article explained, "Principles-based accounting provides a conceptual basis for accountants to follow instead of a list of detailed rules." Whereas, rule-based accounting is a compliance approach that companies have satisfied designated GAAP's rule. Rule-based accounting has been criticized has the method that allowed companies like Worldcom and Enron to achieve accounting fraud by portraying an underlying economic reality. For example, accounting engineering is an issue with rule-based accounting for leased assets not appearing on corporate balance sheets.

The Sarbanes-Oxley Act of 2002 required the SEC to conduct a study regarding the adoption of principles-based accounting systems by United States companies. The study concluded an adoption of objectives-oriented, principles-based accounting standards in the United States that would have the following attributes (Anderson, 2003):

1. In applying a particular standard in practice, accountants and auditors focus the accounting and attestation decisions on fulfilling the accounting objective of the standard. This minimizes the opportunities for financial engineering designed to evade the intent of the standard.
2. Each standard is drafted with objectives set by an overarching, coherent conceptual framework meant to unify the accounting system as a whole.
3. The objectives-oriented approach has exceptions which are contrary to a pure principles-based system.
4. The objectives-oriented approach has bright-line tests, which are contrary to a pure principles-based system.
5. The objectives-oriented approach articulates the class of transactions to which they apply and contain sufficiently detailed guidance so that preparers and auditors have a structure in which to determine the appropriate accounting for company transactions.

The recommended approach would offer some structure to a principles-based system. Guidance is essential to ensure limited confusion and ambiguity. This becomes important when litigation occurs to define complex accounting rules.

3.2 What constitutes an appropriate approach?

The benefit of principles-based accounting is that it offers a broad approach to several different situations. Shortridge and Myring's (2004) concluded broad principles avoid the pitfalls associated with precise requirements that allow contracts to be written specifically to manipulate their intent. In addition, principles-based accounting would require more professorial judgment from accountants and could reduce consistency across financial reporting.

Both principles-based and rules-based accounting require further study to determine the appropriate approach for accounting reporting. Unfortunately, accounting firms such as Arthur Andersen failed to utilize professional judgment while serving a consultant to Enron and encouraged the use of special purpose entities. This is a clear indication of the significance of accounting rules to guard against questionable behavior. As the market continues to change, additional regulations are necessary to prevent accounting misrepresentations. Our focus might not need to be on accounting reporting, but on how we evaluate a company's performance.

4. Proper accounting treatment of investment in human capital

Human capital is essential to the performance of a firm and it is increasingly becoming challenging to retain talented employees. Training offers the ability to retool employees to achieve the firm's objectives. Employee training is considered an intangible asset for firms. "In corporate entities, intangible assets are important for ensuring growth and stability, which in turn enables meaningful employment and career growth opportunities that boost the economic growth and stability of nations." (Samudhram, Sivalingam, and Shanmugam, 2010). As organizations change policies or identify new methods for responding to environment conditions, organizational training is a continuous process to progress the organization forward. There is substantial cost associated with training employees and as organizations seek to efficiencies, technology has become an appropriate tool for developing a large workforce. Samudhram, Sivalingam, and Shanmugam (2010) defined human capital, "The combination of factors possessed by individuals and the collective workforce of the firm, including skills, knowledge and technical ability.

Organizational learning should be designed to increase performance. Therefore, learning outcomes are required to be linked to organizational objectives. Elkeles and Phillips (2007) explained a critical step for organizational learning is determining the appropriate investment. The book detailed five specific strategies for determining the investment level:

- Let others do it and avoid the investment altogether
- Invest the minimum or invest only what is absolutely necessary
- Use benchmarking to guide the appropriate investment
- Spend too much on learning and development either intentional or unintentionally

- Use a measurement system to understand the value of learning and development compared with the investment

Prager and Vece's (2009) study postulated seven critical steps to slimmed-down ROI:

1. Identify and isolate the key skill or competency that most directly relates to the key business driver.
2. Tie the key skill or competency to one or two key metrics.
3. Create an ROI survey to get the data from participants, their managers and clients quickly and simply.
4. Implement the survey.
5. Calculate the costs of the program, as fully loaded as possible to preserve validity of the research.
6. Calculate the results from the survey.
7. Calculate ROI by dividing program costs by the key metric measured.

The combination of these two strategic methods are essential to employ ROI.

The proper accounting treatment of investment in human capital is recognized by two types of models: cost-based and the value-based models. Cost-based model includes costs incurred for human capital and opportunity cost to the firm whereas value-based model includes both monetary and non-monetary cost. These cost are considered human capital expenditures. Some companies include human capital-based disclosures in annual reports.

4.1 Do trained employees meet that definition of assets?

An asset is a resource that has economic value or will produce economic value in the future. Employees' positions within a firm are designed to produce a future economic benefit. Lyle's (2012) study explained learning organization includes at least three characteristics:

1. It develops both individual and collective knowledge;
2. It uses learning to improve performance and boost competitive advantage; and
3. It continuously enhances its capacity, through reflexive praxis, to adapt to its external environment.

Training employees or establishing organizational learning enables firms to enhance long-term growth and sustainability.

4.2 The value of a trained employee and accounting treatment

The establishment of organizational learning is a necessary investment for enhanced performance. Even talented employees require training in current and emerging trends regarding the industry. Without investments in employee development, the organization will become static and competition will absorb their market share. Boyle's (2012) study revealed,

“On any given day more than 5,000 students undergo classroom training at AT&T. More than 22,000 courses are available via classroom, virtual, e-learning, mobile, gaming and interactive virtual learning. AT&T also has developed training to improve specific skills for sales and call center employees that increase customer satisfaction. Content spans delivery platforms and includes a new website with resources to increase customer satisfaction.”

As a result, AT&T can enhance customers’ satisfaction by continuously developing employees to be knowledgeable.

It is difficult to quantify the value of a trained employee. Salaries do offer an indication of value and expected performance within firms. Since labor is a significant cost to firms, low-wage level is often justified to ensure profitability. In addition, firms are reluctant to disclose employee development methods due to maintaining competitive advance. Samudhram, Sivalingam, and Shanmugam (2010) concluded, “Critical researchers have convincingly and repeatedly argued that accounting does not produce an objective representation of economic reality, but rather provides a highly contested and partisan representation of the economic and social world.” Further study is necessary to determine an appropriate method for reporting human capital.

5. Assets valuation and presentation on financial statements

Financial statements offer insight into a firm’s operations, fiscal priorities, assets, obligations, and potential earnings. Understanding a firm’s assets valuation requires knowledge of both internal use of assets and external changes of asset values in the market. There are three significant financial statements that summarizes a firm’s assets: balance sheet, income statement, and statement of cash flows. Balance sheet communicates the firm’s assets, financing, debt, and equity. Assets include fix and current assets, financial investments, intangible assets. Income statement communicates revenues and expenses of the firms and the income produced. Statement of cash flow communicates sources and uses of the firm’s operating, investing, and financing activities. Financial statements are very effective in categorizing a firm’s asset but are limited in reporting uncertainty for asset value long-term.

Păvăloaia’s (2013) study explained, “The market value is the estimated amount for which a property should exchange on the date of valuation between a willing buyer and a willing seller in an arm’s-length transaction after proper marketing wherein the parties had each acted knowledgeably, prudently and without compulsion.” The difficulties with valuation is the dynamic nature of the market allow for several opportunities for changes. Prices of assets can change as a result of demand, resource constraints, competitors’ influence, and governmental policies. Kang’s (2011) study discussed there are some unique challenges for an entity reporting service assets for determining the fair value of economic benefit of a contract yet to be performed.

DiFabio’s (2009) study revealed financial statements have three objectives:

1. Portrays a cohesive financial picture of an entity’s activities

2. Disaggregates information so that it is useful in predicting an entity's future cash flows
3. Helps users assess an entity's liquidity and financial flexibility.

According to DiFabio's (2009) study, several changes are required to financial statements for an accurate reflection of the information for investors. Some of these changes include:

- Greater emphasis should be placed on the cash-flow statement by reorganizing it to better distinguish between the cash generated from the activities of the business; the cash required to be reinvested into the business to sustain and grow it; and the cash available to creditors and investors
- The balance sheet should be recast to reflect the sources of capital, the financing and uses of capital as well as the investing
- The earnings statement should be "reorganized to reflect the business' stream of activities rather than continue to utilize an outdated manufacturing model
- A single statement of comprehensive income that would include a subtotal of profit or loss or net income and a total for comprehensive income for the period

Several changes are necessary for accounting reporting with the increase efforts towards convergence. Although financial statements have been utilized as a tool for engineering accounting reporting fraud, financial statements are needed to arise toward decision-making. Assets valuation will continue to become a challenge as assets become more intangible.

Human resource systems can support the overall function of accountants with assessing operations and financial achievement. The growth of technology has offered enhancements in consolidating roles and eliminating duplication. Berry's (1994) study explained human resource systems can offer the following enhancements for accountants:

- Systems now link operational data on productivity and performance to individual and aggregated HR data. These data include past training, demographic information, work history, or other characteristics of human assets.
- Systems help management accountants not only to identify and analyze employment cost factors, but to understand how performance and productivity differ among regular, temporary, part-time, and other contingent workers.
- Systems relate relevant human characteristics to the work of the organization. Managers can analyze how to match people to jobs and achieve business goals. Training costs were minimized, incidents of lateness and absenteeism declined, benefits costs plummeted in affected functions, and performance improved.
- Staffing systems publicize job openings online and permit managers to submit their computerized resumes--perhaps after an online approval by a supervisor.
- Succession planning systems allow managers to review instantly any changes in the succession plan, job requirements for specific positions, and their personal developmental needs for future promotions.
- Online skill inventories or "competency libraries" identify relevant skills, work experience, qualifications, knowledge, and other requirements. Managers can learn electronically what they have to do to supercharge their careers.

- Performance appraisal systems provide employees with real-time information on corporate performance measurements. Continuous performance improvement becomes a "way of life" rather than an annual chore.

6. Assets valuation and presentation on financial statements

According to Pool's (2000) study, "Total quality management (TQM) integrates quality in all functions throughout the organization and considers every interaction between the various elements of the organization. Thus, the overall effectiveness of the system is the synergistic effect of the individual outputs." Employee motivation has a direct correlation with organizational performance and implementing value added employee incentives will have a substantial impact on the organization. Advancements in technology has allowed further integration of TQM. Elliot's (1992) study concluded, "Information technology (IT) is changing everything. It represents a new, post-industrial model of wealth creation that is replacing the industrial model and is profoundly changing the way business is done. Because of these changes in business, the decisions that management must make are very different from former decisions." The role of accountants has become more involved in the strategic positioning of the performance of the firm and information technology has assisted with assessing long-term forecasting.

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