THE EDUCATOR'S FORUM

Does Accounting Belong in the University Curriculum?

Stephen A. Zeff

THE CASE

In this paper, I deal with the question of whether accounting education properly occupies a place in the university. I take as my text a passage from Henry Rand Hatfield's classic article, "An Historical Defense of Bookkeeping," which was given as an address 65 years ago to the Annual Meeting of the American Association of University Instructors in Accounting, the predecessor of the American Accounting Association. Hatfield had actually given the same paper at a meeting of the Kosmos Club, a society of Berkeley scholars, shortly before delivering it to the AAUIA. His mission was to defend the respectability of accounting as a proper subject to be taught in the university, a point that touched the nerve of accounting academics in 1923. He opened his address with the following words:

I am sure that all of us who teach accounting in the universities suffer from the implied contempt of our colleagues, who look upon account-

ing as an intruder, a Saul among the prophets, a pariah whose very presence detracts somewhat from the sanctity of the academic halls [Hatfield, 1924, p. 241].

If one may judge from the contents of financial accounting textbooks today, one can verily ask in the 1980s whether accounting is a proper subject for a university curriculum.

Beginning with the textbook for the first financial accounting course and continuing through the intermediate and advanced accounting textbooks, the subject is offered as if a tedious cata-

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This paper is based on an address delivered at the 73rd Annual Meeting of the American Accounting Association, on August 17, 1988, in Orlando, Florida. The author is grateful for the comments of the two anonymous reviewers.
logue of practice were being inputted into computer memory. Accounting is not presented as an interesting subject that figures importantly in the calculations of managers, investors and creditors, and government policy makers but instead as a collection of rules that are to be memorized in an uncritical, almost unthinking way. Typically, a problem facing the profession's practitioners is asserted (not argued), the official solution is exposit, journal entries and sample financial statements illustrating the official solution are presented, and the students are then put through the hoops of numerical problems that test their capacity to apply the official solution to hypothetical situations. Authors do not ask why the problem arose, why the official solution was preferred over alternatives (and what were the alternatives?), and whether the official solution spawned any further problems. More often than not, at least in the textbooks, the official solution is not even subjected to evaluation or criticism. In the controversial area of accounting for research and development costs, on which academics seem to be at odds with the Financial Accounting Standards Board (FASB), only about half of the current intermediate textbooks raise any question over the propriety of the FASB's standard.

Is such an approach to acquainting students with a field of professional endeavor consistent with the liberal tradition of universities? It is true that Hatfield taught and wrote in an era when there were no official solutions. Nonetheless, he drew upon court cases and the published opinions of leading professionals and academics, yet he was never dogmatic or doctrinaire. What would he say about our textbooks today?

QUALITIES

Alfred North Whitehead has written of the mission of the university as follows:

The way in which a university should function in the preparation for an intellectual career, such as modern business or one of the older professions, is by promoting the imaginative consideration of the various general principles underlying that career. Its students thus pass into their period of technical apprenticeship with their imaginations already practised in connecting details with general principles. The routine then receives its meaning, and also illuminates the principles which give it that meaning. Hence, instead of a drudgery issuing in a blind rule of thumb, the properly trained man has some hope of obtaining an imagination disciplined by detailed facts and by necessary habits.

Thus, the proper function of the university is the imaginative acquisition of knowledge [1929, pp. 144–145]. Universities are dedicated to the cultivation of the intellect, and the essence of a liberal education is the broadening of that intellect. How might this mission be translated into specific qualities of a university education in accounting? I suggest several.

Above all, a historical perspective is essential. When learning a subject, a student's natural curiosity turns to the origins of thought and practice. In this way, one proceeds from the simpler to the complex, from the past to the present, establishing relevance and stimulating interest in the phenomena under
study. Yet one is unable to find a single financial accounting textbook—introductory, intermediate, or advanced—that purports to explain the historical source of present-day accounting thought or practice. It is hardly a secret that accounting records were kept and financial statements were prepared many years, indeed decades and even centuries, before standard setters issued their first pronouncements. From what beginnings has present-day practice been inherited?

The twin preoccupations of the income tax and the declaration of dividends have been perhaps the most powerful forces shaping the realization concept, the historical cost convention, and the systematic recording of depreciation (see, e.g., Storey [1959], Yamey [1960, pp. 10-18], and Chatfield [1977, chaps. 17 and 18]). That the English accounting profession was preoccupied in the latter half of the nineteenth century with the affairs of failing enterprise is said to have contributed to an environment in which conservatism was the predominant attitude [Parker, 1965, pp. 158-160].1 The growth in popularity of “lower of cost or market” for valuing merchandise inventories, undeniably an instrument of conservative accounting, has been traced to the almost continuous fall in prices in the United Kingdom following the boom year of 1873 [Parker, 1965, p. 160].

If we were to explain the historical origins of present-day accounting practice, our students would be in a much better position to determine whether inherited practice continues to meet the requirements of contemporary society.

When snippets of history are found in our textbooks, they typically consist of a chronology of episodes devoid of meaningful discussions of cause and effect, and bereft of thoughtful development of the historical line. In short, the presentations are perfunctory.

It is not only historical perspectives that are missing from the way in which accounting is presented. In the textbooks, standard setters’ pronouncements are presented in neat packages, without drawing attention to inconsistencies or contradictions. For example, even though the accounting treatments for goodwill and research and development are typically covered in the same chapter, I am unable to find a single textbook whose authors suggest that the mandatory expensing of R&D may be incompatible with the mandatory capitalizing of goodwill. A major reason given for expensing R&D is its tenuous relation with the expected future stream of revenues. Yet the relation between goodwill and future revenues is much more difficult to establish.

Another desirable quality is the interpolation of nonaccounting factors that have influenced the development of accounting practice. This quality is related to that of historical perspective, but it focuses on contemporary influences. Standard setters are acutely sensitive to the fact that their agenda of

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1 One close student of the early accounting profession in the British Isles wrote, “It might be said that the accountancy profession was born through bankruptcies, fed on failures and frauds, grew on liquidations and graduated through audits” [Robinson, 1964, p. 30]. Among the early leaders of the American accounting profession at the turn of the century were chartered accountants who had immigrated from the United Kingdom (including Edwin Guthrie, James T. Anyon, Arthur Lowes Dickinson, and George O. May). Their influence on accounting practice and thought was considerable.
issues, as well as the roll call of possible solutions to accounting problems, is buffeted by the diverse and changing self-interests of managers, government policy makers, and auditing firms. Yet I suspect that the vast majority of accounting teachers seldom refer to these motivations and their effects on accounting practice. In a recent study, I found that the treatment of economic consequences in a number of intermediate textbooks was improved over eight years ago, but I also found that a significant number of textbook presentations that could usefully have reported the self-interests and lobbying activities of participants in the standard-setting process were strangely silent on the subject [Zeff, 1988]. It is as if the impact of its environment were irrelevant to the teaching of accounting—hardly the hallmark of a subject in the liberal tradition.

Still another desirable quality would be a recognition of the impact of accounting on the economy and on society. What is the evidence, and what are the beliefs, tending to suggest that figures contained in accounting reports influence the decision-making behavior of managers and public policy makers? What has been the nature and extent of this influence, and has it been, on balance, salutary or harmful? Researchers have examined and discussed the nature and extent of this impact in numerous published studies, yet textbooks hardly touch on the subject.

A further desirable quality is elaboration of the international dimension of accounting. Disclosure standards as well as norms of measurement are contextually rooted in different cultures and political and economic systems. The standard-setting process itself tilts toward the public or the private sector depending on national political values and institutions. Through a study of accounting, one can acquire an understanding of many facets of economic, political, and social life in different countries. The quality of financial reporting is frequently traceable to a country’s degree of economic development, including the maturity of its securities market. It is the rare financial accounting textbook, however, that permits students to believe that accounting, and the approaches to standard setting, are not uniform around the world.

Finally, it is desirable in any field of liberal learning that students be equipped with a critical faculty for evaluating alternatives and making decisions (see Staubus [1975]). As Sterling has argued [1973], an assessment of the effectiveness of current practice should draw upon the accounting theory literature, including the analyses and findings from relevant research inquiries. A spirited and critical examination of extant practice—one that goes beyond the incantation of ritual explanations offered in support of that practice—is an indispensable part of the education of future professionals. Yet financial accounting textbooks seldom draw on the writings of accounting theorists or invoke the findings of accounting researchers. A curriculum that dwells on current practice, without instilling a critical faculty, is more suited to the preparation of technicians than professionals.

These are qualities that are consonant, in my view, with “the imaginative acquisition of knowledge.” Their
observance enables students to learn principles and to understand the role of accounting in organizations, in cultures, and across generations. An education imbued with these qualities prepares students for an intellectual career in a profession of importance to society.

CAUSES

These are the qualities that I find to be lacking in financial accounting textbooks. Why has this state of affairs come about? I offer two explanations.

First is the Uniform CPA examination, which is typically taken by students during the concluding semester or quarter of their final year of university study. I know of no other country in which the professional qualifying examination is taken during the candidate's period of educational preparation in the university. I have argued in favor of rescheduling the CPA examination to the month of August, thus relieving the pressure on university courses of instruction. In the field of law, the bar examination is uniformly given during the last days of July and the first days of August, and all graduating law students take a bar prep course during the summer months. In Canada, the Uniform Final Examination (UFE) for prospective chartered accountants is given in September. Moreover, Canadians must complete two years of practical experience and a course of study offered by their provincial institute prior to being admitted to the UFE.

Pressure has been brought on accounting faculty in the United States to teach to the CPA examination, and this pressure has been communicated to the textbook publishers and authors. That the CPA examination has historically emphasized the details of practice, and accepted rationalizations of that practice, to a considerable degree explains the emphasis on unthinking absorption of practice rules in financial accounting education.

But the CPA examination is not the entire explanation. There is a climate of conformity in the United States which encourages the belief that current accounting standards constitute the final word on the subject. The Securities and Exchange Commission is a powerful governmental agency, and it uses its full power in the arena in which accounting standards are set. Once the private-sector standard-setting body has spoken, the SEC compels compliance on the part of registrant companies, at the risk of companies' losing their share trading privileges or being unable to issue securities in interstate markets. In other countries, such as the United Kingdom, companies may use practices other than those officially approved by the standard-setting body, accept a possible qualified report from their auditor, and endure whatever comment might be excited in the financial press. In the U.S., by contrast, the availability of such an option does not, as a practical matter, exist. The climate created by this system, coupled with the litigiousness of American society, tends to discourage companies and auditors from experimenting with alternatives to recommended practice, and, apparently, to discourage textbook authors and teachers from discoursing on such alternatives since they are not found in practice. Until the standard-setting
body alters accounting practice, the matter, it seems, is closed.

ABDICATION

One may fairly conclude that, as textbook authors and educators, we have abdicated our leadership position to the standard setters. We present what the standard setters have decided is proper practice, not what we think students should know about our field. If recommended practice is altered by the standard setters, our textbooks are changed overnight and a new order is established.

Two examples of this phenomenon may be cited. Prior to the issuance of FASB Statement No. 34, on the capitalization of interest [FASB, 1979], intermediate textbooks gave no more than a nod to the possibility of such practice; their discussion was largely confined to the treatment of interest by rate-regulated public utilities, and rarely was a numerical illustration presented of how it might be accomplished. It required an FASB Statement to persuade textbook authors that interest capitalization was a live issue, and in short order it appeared in all the intermediate textbooks, complete with numerical examples. William A. Paton, an outstanding textbook author who challenged students to think analytically and critically about their subject, treated interest capitalization at length as long ago as 1918 [Paton and Stevenson, pp. 438-446] without the need of a precipitating official pronouncement.

The second example is the reflection in textbooks of the FASB's decision in Statement No. 89 that the supplementary disclosures recommended in Statement No. 33, on changing prices, should be encouraged but no longer required [FASB, 1986]. Even though the subject of changing prices is perennially important in our field, several of the recent revisions of introductory financial accounting textbooks have either dropped their discussion of the effects of changing prices on accounting, or have collapsed it into a few pages. I do not blame the standard setters for this effect; they do not purport to tell us what to present in our textbooks. Nonetheless, we have allowed the standard setters to determine our agenda. Perhaps, as I have suggested sarcastically to my friends at the FASB, the Board should insert a concluding section in future standards, labeled "educational implications," in which they offer advice to educators on how their teaching should be affected by the pronouncement. They might say something such as, "Although we no longer require this kind of accounting, it is nonetheless an important subject which you should continue to teach." Yet I would like to think that, as professional educators, we are capable of deciding for ourselves what should be taught in our courses, without teaching just the pronouncements.

Professor W. T. Baxter, the founding father of academic accounting in the United Kingdom, wrote a classic article 35 years ago in which he despaired of the impact of "recommendations on accounting theory" on the quality of education of future accounting professionals. He wrote

[Such recommendations] are likely to weaken the training of accountants; the conversion of the subject into cut-and-dried rules, approved by authority and not to be lightly questioned,
threatens to reduce the value of accounting as a subject of higher education almost to nil [Baxter, 1953, p. 410].

By “recommendations on accounting theory,” Baxter referred to official pronouncements on the conceptual framework, our body of theory. He was right. In all of the intermediate textbooks, the conceptual framework is the same. It is the FASB’s conceptual framework, not that of the textbook authors or of anyone else. But Baxter failed to anticipate that, in this country at least, the issuance of pronouncements on accounting practice would produce the same effect that he foresaw for recommendations on theory. Through our unquestioning acceptance of the solutions embodied in final pronouncements as the constituted body of thought and practice to be taught in our courses, we have succeeded in converting the educational process into an indoctrination in officially prescribed accounting.

MISSION

What should be done? As educators and authors of textbooks, we must decide what should be taught in our courses and curricula, and not allow these questions to devolve upon writers of the CPA examination and the standard setters. Our textbooks should be leaders, not followers, in accounting thought and practice. We should place emphasis on concepts, and not on the details of practice. Concepts are enduring; practice is not. In our teaching, we should stimulate students to think of accounting as an activity that addresses questions of importance to society, for policy makers at both the micro and macro levels continually make decisions on the basis of information supplied through the accounting process. We should challenge students with the very issues that bedevil the standard setters and other leaders in the field, so that they might themselves one day play a leading role in the improvement of the discipline.

Steps in this direction would “illuminate the principles” and liberate students from “a drudgery issuing in a blind rule of thumb.”

Hatfield would be pleased.

REFERENCES


RECENT TRENDS IN ACCOUNTING EDUCATION AND RESEARCH IN THE USA: SOME IMPLICATIONS FOR UK ACADEMICS*

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INTRODUCTION

My aim in this paper is to draw attention to several discouraging trends in US accounting education and research, and to raise the spectre of similar trends occurring in the UK. Recent developments in the UK which portend the possible importation of these trends are the following:

1. Concern among leaders of the accounting profession over the effectiveness of the standard-setting process, including such considerations as the rate of productivity of standards and the means of securing a greater degree of compliance on the part of companies (‘Dearing to Head ASC Review Body’, 1987).

2. An action taken by the Institute of Chartered Accountants of Scotland (Black, 1987) and a white paper issued by a working party of the Education and Training Directorate of the Institute of Chartered Accountants in England and Wales (Training the Business Professional, 1988), which point towards the exercise of a greater degree of rigour in the accreditation of tertiary accounting curricula, in order that students might receive exemptions from certain parts of the respective institutes’ examinations.

3. The increased tendency to obtain a doctorate at the outset of one’s academic career, and the apparent trend, as reflected by the ‘research gradings’ given by the University Grants Committee, to impose more rigorous standards in the evaluation of academic research.

I will begin by reviewing the US standard-setting system in order to suggest the nature of the impact it has had on accounting education. I will then turn to the effect of the Uniform CPA Examination on the texture

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*This paper is based on the author’s ICAEW Plenary Address at the National Conference of the British Accounting Association, on 14 April, 1988 at Trent Polytechnic, Nottingham.
†The author gratefully acknowledges the helpful comments of Professors Philip W. Bell, David Solomons, Bala G. Dharan, George Foster, William W. Cooper, and Wilfred C. Uecker on an earlier draft of this paper. Responsibility for the views expressed herein rests solely with the author.

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of accounting education. While the institutional environments in the USA and the UK are quite different, analogies may be drawn between the two to suggest that the trends toward (1) a strengthening of the standard-setting process and (2) a more rigorous enforcement of accreditation standards could well produce undesirable effects on accounting education that are comparable to those experienced in the USA. Finally, I will discuss the impact on the accounting literature of recent trends in accounting research.

EDUCATION

US Standard-Setting Context
Two factors in the standard-setting environment, which have had a considerable impact on the content of accounting education, are (1) the great number of detailed pronouncements, and (2) the climate of conformity engendered by the policies of the Securities and Exchange Commission (SEC).

Pronouncements emanate from a number of authoritative bodies (see Solomons, 1986, chap. 2). The Financial Accounting Standards Board (FASB), which began operations in 1973, and the SEC, a federal government agency, are very active in the financial reporting field (see Skousen, 1987 and Miller & Redding, 1988). The Governmental Accounting Standards Board (GASB), a companion private-sector body to the FASB, commenced operations in 1984 and deals with the financial reporting standards for state governments and municipalities. In addition, the Accounting Standards Executive Committee (ACSEC), a committee of the American Institute of Certified Public Accountants (AICPA), was formed in 1973 following the demise of the Accounting Principles Board, and it maintains an active agenda of topics in financial reporting, mostly along industry lines. From 1973 to mid-1988, these bodies issued an imposing number of technical documents on financial reporting, as follows:

FASB
- Statements of Financial Accounting Concepts 6
- Statements of Financial Accounting Standards 97
- Interpretations 38
- Technical Bulletins 47
- Invitations to Comment 11
- Discussion Memoranda 23

GASB
- Statements 8
- Discussion Memoranda 2

SEC
- Accounting Series Releases (about one-fourth of which deal with financial reporting) 162
I have omitted more than 20 research studies that have been sponsored and published by the FASB and GASB, as well as the many speeches by FASB/GASB board and staff members and by the SEC chief accountant and his staff. Virtually all of the Statements issued by the FASB and GASB were preceded by exposure drafts, but these also have been omitted from the foregoing tabulation. Hence, more than 470 pronouncements and pre-pronouncement documents (excluding exposure drafts) have been issued in the last 15 years alone, an average of more than 30 per year.

The number of FASB Statements of Financial Accounting Standards is perhaps misleading as an indicator of the quantity of full-fledged standards, since approximately 50 of the 97 issued thus far have been brief amendments of earlier pronouncements. Nonetheless, the volume of output of the FASB is remarkable. It has exceeded the output of the APB by a considerable margin, both in terms of number of pronouncements and length. That the FASB members are full-time, compared with the part-time APB, and the FASB's full-time technical staff exceeds 40, compared with perhaps a half-dozen full-time technical staff of the APB, constitutes a partial explanation of the increase in rate of production.

A more powerful explanation for the number and complexity of US accounting pronouncements is the SEC's thirst for black-and-white support for, or disapproval of, specific accounting practices. Registrant companies must be told that what they are seeking to do is proper or not. While the FASB's raison d'être is the demand for 'substantial authoritative support' from the SEC, the UK's Accounting Standards Committee operates in a largely unregulated environment. What will happen if the UK environment continues along the path of greater degrees of regulation? What will be the effect of the Dearing Committee report?

In addition to gaining an appreciation of the frequency and length of US financial reporting pronouncements, one must be aware that the policies of the SEC impose a reporting obligation on the some 11,000 corporations subject to its jurisdiction, which allow much less flexibility than do those of the securities commission in any other country. The SEC requires that companies use only those accounting practices for which there is 'substantial authoritative support', an undefined term that refers, in the first instance, to FASB Statements and Interpretations, and to those por-
tions of the Accounting Research Bulletins and APB Opinions that have not been amended or superseded (see SEC, 1973). If these sources are unavailing, the Institute’s Auditing Standards Board has enunciated a hierarchy of other sources of support, including AICPA Industry Audit and Accounting Guides, AICPA Statements of Position, FASB Technical Bulletins, and, at a lower level, a series of other sources, including accounting textbooks and articles (see Rubin, 1984; Auditing Standards Board, 1988).

Accounting practices for which there is ‘substantial authoritative support’ are denominated as ‘generally accepted accounting principles’, with only rare exceptions. Registrant companies wishing to use alternative practices and thus risk a qualified auditor’s report are virtually enjoined from doing so by the SEC. In almost all other countries, a listed company may depart from standard accounting practice by giving full disclosure of its departure, including its effect on the financial statements, and the auditor may qualify his report. In the USA, corporations subject to the SEC must conform to accounting practices enjoying ‘substantial authoritative support’, and auditors’ qualifications have been tolerated by the SEC only in regard to financial statements where the effects of material uncertainties are not reasonably determinable. In the SEC’s eyes, financial statements that contain material departures from accounting principles for which there is ‘substantial authoritative support’ are inherently susceptible to mislead investors and creditors.

It is no surprise, therefore, that companies engage in intensive lobbying efforts to persuade the FASB of the propriety of favoured accounting practices, since they will have very little recourse once the FASB has spoken as the preeminent source of ‘substantial authoritative support’. The issue of ‘economic consequences’ is pressed especially hard in the USA. For example, companies that are concerned about possible technical default on debt securities owing to a thin capitalization may not escape the impact on their debt-equity ratio of an adverse redefinition of liabilities merely by continuing to use the superseded accounting practice and disclosing their departure from standard practice in the footnotes. Their only option is to dissuade the FASB from adopting the standard.

The heavy hand of centralized, bureaucratic regulation of financial reporting invariably leads to persistent queries from the regulator as to whether certain accounting practices being used by some registrants are or are not proper practice. The SEC continually raises such issues, and they are promptly added to the FASB’s agenda. More often than not, these highly specific inquiries eventually become the basis for a Technical Bulletin, an Interpretation, or a Statement, all of which constitute ‘substantial authoritative support’ for the regulator.

In 1984, the FASB set up an Emerging Issues Task Force which seeks
to determine whether the existing accounting literature can support a consensus for treating novel accounting problems without the necessity for the board to issue a Statement or Interpretation. A major consideration when establishing the Task Force was that the board's lengthy 'due process', which may include the issuance of a Discussion Memorandum or Invitation to Comment, followed by a public hearing and the issuance of an exposure draft, can consume up to two years of deliberation time. The Task Force was intended to shorten the process considerably. It meets about every six weeks to discuss the accounting response to emerging issues. Its members include the senior technical partners of the big eight accounting firms, technical partners from three other firms, financial executives from four major companies and banks, and the FASB's director of research and technical activities who serves as chairman. The SEC's chief accountant and the chairman of AcSEC attend as observers but have the right of the floor. Usually, two or three FASB members sit in on the meetings. Throughout January 1988, the Task Force had disposed of 171 issues, distributed among the following subject areas:

- financial instruments—45
- financial institutions—26
- income tax—22
- business combinations—18
- pensions and other employee benefits—13
- off-balance sheet financing—12
- inventories, fixed assets and leasing—11
- real estate—7
- other—17

A consensus was reached on about 60 per cent of the issues discussed, although in a few instances the board has issued a Technical Bulletin to reverse the consensus.

Questions have been raised as to whether the deliberations of this influential body satisfy the board's standards of due process. It seems likely that the Task Force's resolution of numerous fast-breaking accounting issues will, in many instances, obviate the necessity for the board to issue its own official pronouncements. The Task Force itself has emerged as a very influential body in the setting of accounting standards (see Wishon, 1986).

The accounting standards environment in the USA has become particularly intense in the last two decades. The conglomerate merger wave of the 1960s led companies to become even more preoccupied with short-term earnings performance. How their companies were viewed by the securities market became a matter of first priority to top management. At a time when companies were becoming more aggressive advocates of favoured accounting practices, the increasingly competitive market for auditing services seemed to discourage major accounting firms from taking conspicuous positions on controversial issues of the day, for fear of offend—
ing current or prospective clients (see Zeff, 1986). It has been suggested that some accounting firms would rather request a consensus position from the Emerging Issues Task Force than take an unpopular position on a controversial accounting practice with a client, when other firms might be more conciliatory. The firms are, to a greater extent than ever before, looking for rules.

As noted above, ‘economic consequences’ lobbying is a frequent phenomenon in the US standard-setting environment. In addition to the impact of accounting figures on bond contracts and compensation agreements, there is a growing awareness, both at the micro- and macro-levels, that figures influence the behavior of managers, investors, government policy makers, and union leaders, among others. In the highly regulated US environment, preparers look for loopholes in the standards which would allow them to avoid having to make any adverse modifications in their financial statements. For their part, the standard setters, anticipating this ‘loopholing’ behavior, write the standards in a legal style, almost as if they were drafting income tax legislation.

In sum, the US financial reporting environment is characterized by a multitude of authoritative pronouncements, many of which are lengthy and detailed. The policies of the securities commission create a climate in which the body of enunciated standards is regarded as the final word on the subject, allowing few avenues for alternative treatment. All the while, companies that feel strongly about the freedom to use favoured accounting practices take part in intensive lobbying of the standard-setting body. For their part, the public accounting firms are reluctant to draw attention to their views on controversial accounting issues lest they offend actual or prospective clients.

How does the UK financial reporting environment differ from that in the USA? While one does not find a climate of conformity in the UK similar to that in the USA, the trend is in that direction. The standard-setting programme, launched in 1969-70 by the Institute of Chartered Accountants in England and Wales, and to which the other major accounting bodies in the British Isles joined later, presupposed a greater degree of compliance than was the expectation under the former programme of issuing ‘Recommendations on Accounting Principles’. The Statements of Standard Accounting Practice (SSAPs) have been expressed in more definitive language than were the ‘Recommendations’, and it was hoped that companies and auditors would submit to a greater degree of discipline in their observance. Incorporation of the EEC’s Fourth Directive into UK companies legislation in 1981 represented a further step toward achieving compliance. Now, in the light of the failure of SSAP 16, on current cost accounting, and the swirl of controversy over SSAPs 22 and 23, on accounting for goodwill and for acquisitions and mergers, the Dearing
Committee has been constituted to recommend reforms that would strengthen the standard-setting process and the means of securing compliance with approved standards. The resources available to the standard-setting body are also at issue.

If, as is likely, the resulting reforms endow the standard-setting body with a more handsome budget and larger staff support, more numerous and more detailed standards are likely to follow.

If, as is also likely, a means is found for securing a greater degree of compliance with standards, the UK financial reporting establishment will have taken a further step in the direction of the legalistic American approach to regulating the contents of financial reports.

**How have textbook authors responded?**

Perhaps the most conspicuous index of accounting educators' response to the proliferation of financial accounting pronouncements in a climate of conformity is the increasing girth of the 'intermediate' accounting textbooks. The trend in the number of pages in 'intermediate' textbooks over the years is evident from data presented in Appendix A. Owing to such variables as the type size, margin widths, and the amount of page space consumed by diagrams, illustrations, and boxed examples, a comparison of number of pages among textbooks is admittedly a crude proxy for length. Nonetheless, for the same textbooks the number of pages has been increasing, with only few exceptions, from edition to edition.

The hefty textbooks have come to resemble encyclopaedic handbooks. As the number of accounting pronouncements grows, authors and their publishers respond to the apparent desire of instructors to cover all of the important utterances of the standard setters. In the latest editions of the 'intermediate' textbooks, the indexes typically cite upwards of forty FASB Statements, and it is not unusual to find citations as well to FASB Interpretations and Technical Bulletins. Quite a number of the most complex pronouncements, such as those on leases, earnings per share, and pensions, are covered in mind-numbing detail.

When standard setters make important alterations in standards, such as with pensions and the statement of changes in financial position, the discussion of the superseded standard disappears. The treatment of the new standard is, more often than not, unaccompanied by any substantive discussion of its historical development, including the reasons why the standard was changed.

Typically, the authors do not point out contradictions between inconsistent standards, even when they both appear in the same chapter (for a similar argument, see Sterling, 1973, p. 50). An example is the mandatory amortization of goodwill, on the one hand, and the mandatory expensing of research and development costs, on the other. A reason given for not
capitalizing and amortizing R & D costs is that they cannot feasibly be
matched against future revenue streams. But what about goodwill, whose
revenue stream is even harder to discern! The textbooks are silent on this
contradiction.

The devotion to recommended practice exists even in the introductory
books. Since the FASB decided, in Statement 89, to make the sup-
plementary disclosure of the effects of changing prices voluntary instead
of mandatory, several of the recent revisions of introductory financial
accounting textbooks have either dropped their discussion of the subject
or have scaled it down significantly. Although few would deny that the
subject of changing prices is of perennial importance, textbook authors
seem to fixate on recommended practice.

Thirty-five years ago, Will Baxter prophesied that recommendations
on accounting theory:

are likely to weaken the training of accountants; the conversion of the subject into cut-
and-dried rules, approved by authority and not to be lightly questioned, threatens to
reduce the value of accounting as a subject of higher education almost to nil.
(Baxter, 1953, p. 410).

The deterioration of which Baxter warned has come about in the USA
not by instruments of the conceptual framework but by detailed practice
standards in an environment of strict enforcement.

An implication for UK accounting educators is that the steady growth
in the number of detailed and highly specific accounting pronouncements,
 together with an apparent movement by the UK profession to strengthen
the system of securing compliance by companies and auditors, could well
lead to a similar outcome to what has occurred in the USA. Textbooks
and other teaching materials could begin to resemble codifications of
recommended practice, and accounting education programs in tertiary
institutions could become exercises in indoctrination.

Influence of the Uniform CPA examination
Since 1917, the American Institute of (Certified Public) Accountants has
given the Uniform CPA Examination twice each year. Although indi-
viduals become Certified Public Accountants by complying with the
requirements of one or more of 54 jurisdictions (including the 50 states),
in the last several decades all of the jurisdictions have relied on the AICPA’s
Uniform CPA Examination to test candidates’ accounting knowledge.
At each of the semiannual sittings, more than 70,000 candidates sit the
Examination, and between 50 and 60% of each of the four sections of the
Examination (Accounting Practice, Accounting Theory, Auditing, and
Business Law) consists of multiple-choice questions. The remainder are
problem-type and short essay questions.
A large percentage of students completing US undergraduate programs in accounting sit the Uniform CPA Examination during their final year of university study. This intrusion of the Examination on the academic year intensifies students' single-minded desire to orient their university studies toward successful completion of the 2½-day Examination. In contrast to the Professional Year Programme of the Institute of Chartered Accountants in Australia, as well as the courses offered by all but one of the Canadian provincial institutes of chartered accountants, the organized profession in the USA does not play a role in the preparation of candidates, either for the Examination or for professional practice. The burden of such preparation falls entirely upon the universities and colleges (supplemented by proprietary CPA coaching courses that are often taken during the final year of a candidate's study in a tertiary institution).

The Institute officials who develop the Examination prefer to ask questions that are capable of being graded by objective standards, and much of the Examination tests the candidates' knowledge of 'generally accepted accounting principles' (including the latest pronouncements) and their application to concrete cases. When developing the Examination, the officials heed the contents of the textbooks and other materials that are used in university-level accounting courses throughout the United States. At the same time, faculty members who stray too far from the kind of instruction that students feel they need to pass the Examination come under pressure to emphasize 'mainstream' accounting knowledge. In this sense, a 'vicious circle' exists between university accounting education and the Uniform CPA Examination. Commercial publishers, for their part, seek to cater to the mass of the textbook market, and they are exceedingly reluctant to experiment with novel textbooks that will not capture a sufficient share of the market. Hence, it is difficult to influence the nature and content of accounting courses (at least in financial accounting) through the writing and publication of innovative textbooks.

Accounting faculty members have succumbed to these pressures, from Institute examiners on the one hand and from students on the other. They are veritably caught in the middle. And commercial publishers, who are the potential agents of change, are fearful to innovate. As a result, financial accounting is taught as if it were in a strait-jacket. Students are indoctrinated in the rules of extant practice and are seldom exposed to the historical background or institutional framework that has shaped current practice. Accounting is made to seem as an objective, highly structured corpus of settled knowledge, when, in fact, the body of accepted practice is constantly changing and the supposedly hard-and-fast practices are ringed with vagueness and subjectivity, and frequently are susceptible to a wide latitude of interpretation (again, see Sterling, 1973). The Uniform CPA Examination, like most professional qualifying examinations, emphasizes
detailed, objective information over general, subjective knowledge, for it is much easier to grade and defend the assessments. At the same time, students seem to prefer a sure grasp of details over an understanding of the fundamentals and the dynamics of accounting change. It is the age-old struggle between the practical and the theoretical. The proliferation of pronouncements has served to exacerbate the problem, as the time devoted in the past to the contextual issues so essential to a well-grounded understanding of the accounting whole is largely pre-empted by the detailed study of the welter of pronouncements of one kind or another which must be learned. Disquisitions on practice have driven discussions of theory, history, societal relevance, and the institutional framework out of financial accounting. Instruction has become more of a regimen for digesting the details of authoritatively recommended practice, and less of a quest for the conceptual underpinnings of the field. With few exceptions, the knowledge acquired by students is descriptive. Arguments for accounting reform are perfunctorily presented, if they are presented at all.

We all, I fear, are the worse for it. Owing to this approach to professional education, future practitioners will behave more as the servants of authority than as the leaders of change. We have begun to see a submissive tendency in this direction in the literature created by US accounting practitioners and their firms (Zeff, 1986).

There was a time, in the 1950s and 1960s, when accounting textbooks were used by practitioners as an important source of authority in areas where pronouncements had not been issued or were less than definitive. Today, we are treated to the spectacle of several commercial publishers obtaining the services of a CPA firm to assure potential adopters that the authors have performed their roles competently. Appendix B contains a sample of several such opinions that have been reproduced in the opening pages of introductory financial accounting textbooks. Unhappily, it is a sign of the times. Textbooks are seen as the vehicle by which the rules of accounting practice are transmitted to students. And an auditing firm is retained to attest that the authors have communicated the rules accurately.

Some academics, to be sure, use cases, articles, and news reports from the financial press to supplement or supplant the textbook. But one's impression is that the vast majority of US accounting teachers use only the textbook, perhaps supplemented by a company's annual report and a thick volume of FASB pronouncements.

An implication for UK educators is that the increasing degree of rigour with which professional bodies' accreditation standards are enforced could well lead, as has the CPA examination in the USA, to a greater emphasis being placed in accounting curricula on the hard core of recommended practice, with less emphasis on the broader issues that can make accounting a field of liberal learning.
RESEARCH

An unmistakable trend in US accounting research during the past 25 years has been the increasing use of formal empiricism and mathematical model building (Whittington, 1986; Bell, 1987). A major stimulus behind this trend was the campaigns conducted by the Ford Foundation and the Carnegie Corporation of New York in the 1950s and 1960s to encourage US business schools to raise the standards of their educational programmes and intensify the rigour of their research. The two foundations sponsored major studies of American business education which criticized the intellectual insularity of the business schools. They recommended that their research become grounded in supporting disciplines such as statistics, mathematics, psychology, and sociology, and that these fields should be brought into the business schools, and especially into their doctoral programmes. Research, they said, should be conducted at a high analytical level, with hypothesis formation and testing playing a central role (see Dyckman & Zeff, 1984, pp. 231–233).

Prior to the 1960s, the predominant credentials of US accounting academics were the Master of Business Administration degree and the CPA certificate. Academic research was, in the main, normative deduction and description of practice. But conditions were changing. As Davidson has written:

The previous decade [i.e., the 1950s] had seen substantial advances in the development of statistical techniques and quantitative analysis. The emergence of the computer indicated that large new data bases of financial information would be readily accessible to researchers; also new information and theories on motivation and other aspects of behavioral science were developing. Research in accounting was beginning to capitalize on these advances in related fields. A more scientific approach to accounting research was clearly on the horizon.

(Davidson, 1984, p. 282.)

At the University of Chicago, where Davidson and his colleagues founded the Journal of Accounting Research (JAR) in 1963, the advent of capital market research in the neighbouring field of finance excited interest among young accounting researchers. JAR led the way in encouraging and publishing the results of hypothesis-testing empirical research, which was a novelty in the field of accounting (Dyckman & Zeff, 1984).

During the 1960s, enrolments in accounting doctoral programmes expanded, spurred by the efforts of the two foundations. By the close of the decade, the foreign-language competency tests in doctoral programmes were being replaced by course work in supporting disciplines, including computer technology. The young faculty members emerging from these programmes began filling the journals with articles reflecting the new empiricism and mathematical modelling.
Two consequences, one favourable and the other unfavourable, have emerged from the new wave of empirical and model-building research. On the favourable side, the new research methods and methodologies enabled accounting academics to understand the world in which accounting is practiced better than was ever possible before. Powerful research tools led to insights that could not have been imagined in the earlier era. Model-building research in such areas as signaling, information economics, agency theory, and experimental markets not only yields empirical insights into how the interactions among different agents affect their actions, in the context of information production decisions, but also leads to the interpolation of normative prescriptions.

On the unfavourable side, there has been a tendency for accounting researchers to become more enamoured of their research methods and methodologies than of the potential of their findings to contribute usefully to the stock of knowledge in the discipline. As I wrote in my valedictory editorial as Editor of *The Accounting Review*:

"[M]ore than occasionally the questions being addressed in manuscripts seem to be contrived in order that novel research methods might be given some exercise. When modeling problems, researchers seem to be more affected by technical developments in the literature than by their potential to explain phenomena. So often it seems that manuscripts are the result of methods in search of questions, rather than questions in search of methods."

(Zeff, 1983, p. 134.)

A reason for the methods-driven, instead of problem-driven, trend in accounting research is that US doctoral programmes have, since the early 1970s, been dropping seminars in accounting theory and on the history of thought and practice. Such courses had been useful in acquainting students with the environment and institutions in accounting, as well as with previous research efforts to study the field and develop reforms. During the same period, an increasing number of students have been entering accounting doctoral programmes from previous studies in mathematics, economics, finance, and other fields which do not impart a knowledge of accounting. Even the doctoral students whose previous studies were in accounting were uninformed about the theory, history, and context of the field, since, as has been suggested in the previous section, their accounting course work at the undergraduate level consisted of a diet of accepted practice. At the doctoral level, students are schooled in methods and methodologies. When they leave the programme, their attachment is not so much to accounting as to favoured research methods. It is not unusual to overhear assistant professors saying that the first time they learned what accounting was about was when they taught their first course in intermediate accounting!

It can also be argued that the adoption of physics instead of medical
science as the model for research in accounting has led to a focus by researchers on 'understanding only' and not also on 'understanding for use'. Blueprints for research in accounting sometimes fail to recognize the potential contribution of research to address the problems arising out of practice. We often confine ourselves to approaches that are intended to discover uniformities and regularities (i.e., physical laws) rather than trying to improve our ability to deal with problems that confront those who practice the field (see Cooper & Zeff, 1987).

Another unfavourable effect, one that could not reasonably have been expected, has been an intolerance for research approaches other than one's own, and especially of classical approaches to addressing questions. Demski has commented on this 'brand loyalty' by cautioning that no research method possesses a 'universal comparative advantage' (Demski, 1987, p. 93). Research is, as Demski says, an interactive process, in which 'each approach offers a different angle of investigation' (Demski, 1987, p. 93). Yet one observes an unhealthy trend in the behavior of some researchers, who vaunt the superiority of their own approaches to research, while deprecating that of others.

Classical methods, such as historical research, have suffered the most in recent years. Historical research methods, notwithstanding the respect they are accorded in universities' departments of history, are dismissed as 'unscientific' in the accounting departments of many leading business schools. In any of the most prestigious US accounting doctoral programmes, it would be a foolhardy student who would avow an interest in historical research. Historical research methods, subjective and highly judgemental as they are, have failed to attract a following among leading US accounting researchers, and one fears that historical research, at least in the most highly regarded accounting departments, is a dying species. A clear implication of this variant of 'brand loyalty' is that a large body of data that are susceptible to historical research, but not to any of the research methods currently held in favour at the major schools, will pass from the scene without being studied by accounting researchers.

Another classical research method in accounting, normative deduction derived from decision models (in contrast to the study of the actions of decision makers), has also become a casualty of the rush toward the new empiricism and mathematical modeling. While the normative prescriptions emerging from the modelling work mentioned above may one day occupy the attention of accounting policy makers and other decision makers, the current focus of interest throughout the standard-setting world is on conceptual frameworks based on normative decision models—a part of what I have called 'traditional normative research' (see Dyckman & Zeff, 1984). Yet traditional normative research has become anathema in the leading US doctoral programmes. In my view, an indispensable element
in an agenda for accounting research is rigorous inquiry, of a normative kind, into the usefulness of accounting information. Both the decision-model and decision-maker approaches to accounting theory development are relevant and vital, and both should be encouraged. (For further discussion of the two approaches, see Committee on Concepts and Standards for External Financial Reports, 1977, Chap. 2.)

As the standards for granting tenure in US universities have been elevated in recent years, the recognizable quality of one's research has become even more important. Research that reflects the use of methods and methodologies that are widely applied in the other social sciences may be more favourably assessed by colleagues in other disciplines. The incentive to engage in this genre of research may be particularly strong in the UK context, if the practice of giving 'research gradings' (on the basis of interdisciplinary rankings) continues to be a major determinant of funding allocations.

In the 1980s, an increasing number of UK accounting researchers are taking doctorates (albeit mostly in programmes without the large component of course work that one finds in the North American version), and much of the work being done by UK accounting researchers seems to be following trends in the USA. One hopes that UK researchers will not likewise cordon themselves off into narrow specialisms, leading to a fragmentation of the literature. One also hopes that they will retain a healthy tolerance for research approaches other than their own.

NOTES

1. Sterling (1973) has eloquently described the circularity in present-day accounting education. Whereas in most disciplines, he wrote, research influences education which influences practice, in accounting one finds that practice influences education which influences practice. Research is outside the loop; it is seldom taught in accounting programmes.

2. Both the number of accounting doctoral programmes and the number of doctorally qualified accounting academics began to rise significantly. Of the 82 doctoral programmes currently offered in US universities, 51 awarded their first degree since 1960. And of the 3,341 accounting doctorates conferred through 1985 in the USA, 2,821, or 84%, have been given since 1965 (Hasselback, 1978; 1987).

3. There are at least two reasons for the abandonment of these courses. First, the time needed to teach methods and methodologies has become so large as to leave little time, if any at all, for instruction in the substance of the field. Second, there are very few faculty members, especially at the leading doctoral-granting universities, who have the knowledge or desire to offer such courses.

REFERENCES

Auditing Standards Board (1988). 'Omnibus statement on auditing standards—1987: The meaning of “Present Fairly in Conformity with Generally Accepted Accounting
Principles' in the independent auditor's report', *Statement on Auditing Standards No. 52*, April, American Institute of Certified Public Accountants.


Dates: Received 9 December 1988.
### APPENDIX A

**Data on the Trend in the Number of Pages Contained in Intermediate Accounting Textbooks (Authors are those shown in the latest edition of the textbook)**

<table>
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*Number of pages has been restated to reflect a change in the length and width of the textbook page in later editions.
We have examined the text of Principles of Accounting, Third Edition, by Needles, Anderson, and Caldwell, together with its accompanying Instructor's Solutions Manual. Our examination, which was directed at this work's technical and mathematical accuracy, internal consistency, and the appropriateness and accuracy of references to professional and other pronouncements, was made in accordance with standards established by the American Institute of Certified Public Accountants and, accordingly, included such procedures as we considered necessary in the circumstances. Our examination was carried out during the composition process and before final page proof. In our opinion, the material in this book is technically and mathematically accurate and internally consistent, and references to professional and other pronouncements are accurate and appropriate.

Arthur Young & Company

October 3, 1986

Author's note: The reproduction of this auditor's report was included in the Preface to the textbook.
A Study of Academic Research Journals in Accounting

As in many academic fields, the number of journals in accounting has been expanding. The trend has been for journals to become more specialized, both in terms of subject matter and research method. The demands on the limited number of able peer reviewers have mounted correspondingly, and it is not unusual today for academics to be serving on from three to five active editorial boards. At the same time, with ever more straitened budgets, libraries have not been able to keep pace with this growth, and many of the journals of recent vintage are apparently not received by major research libraries. Worst, some of these same journals are not even included in print indexes and electronic databases. In this regard, the literature published in these young journals runs the risk of falling into obscurity, the work being largely unknown to most of those who do not actually see the journals.

This paper reports on a census of the academic research journals in accounting, a review of recent trends in journal formation, a study of library subscription profiles to the journals included in the census, and an examination of the degree to which the census journals are indexed in print and electronic databases. At the conclusion, there is an attempt to forecast the continued evolution of academic research journals in accounting in the electronic age.

It is hoped that the results reported in this paper, together with the author’s observations, will provide useful guidance to authors, editors and publishers.

THE STATE OF JOURNALS IN 1996

As of June 1996, the author could identify 77 academic research journals in accounting, edited in the English language, which are listed in Exhibit I. The criteria for inclusion are given at the outset of the exhibit and are discussed below. This number compares with 42 such journals reported in Zeff (1988). Of the 42 journals identified in 1988, one had, unknown to the author, been discontinued in 1986 and four that should have been on the list were omitted. Since five of the journals

1 Zeff (1988, 8) included journals “that are published in the English language and in which accounting academics regularly constitute—or, for announced journals, are expected to constitute—a significant fraction of the authors.” In the author’s view, the 1988 and 1996 studies reflect the use of essentially the same criteria, thus enabling a meaningful comparison.
2 The discontinued journal was The Accounting Forum, and the omitted journals were: Kent/Bentley Review (title later changed to Journal of Accounting and Computers), Journal of Cost Management, QIT Accounting Research Journal (title later changed to Accounting Research Journal), and the International Journal of Intelligent Systems in Accounting, Finance & Management.

This paper served as the basis for the Coopers & Lybrand Lecture delivered on May 7, 1996 at the University of Wales, Aberystwyth. The author is grateful to the librarians, department heads, editors and other colleagues who assisted with the gathering and interpretation of the data. He is also grateful to Balia Dharan, Michele Daley, Ilia Dichev, Bill McCarthy and David Cooper for useful comments on an earlier draft. As a result of comments received during June from Robin Roslender, two journals, one edited in Indonesia and one edited in Sweden, were added to the list in Exhibit I.
listed in 1988 were only announced and did not actually make their first appearance until after 1988, the corrected percentage increase from the number actually operating in 1988 was 92.5%, from 40 to 77.

The year in parentheses following each journal listed in Exhibit I represents the year in which the first issue of the journal was published. The country designation for each journal is explained below.

The research supporting the census was carried out by fax, email, and telephone, as well as by visits to libraries, during February and March 1996, with updatings made in April, May and June. The listings in The Serials Directory (1995) and in Vargo and Vargo (1994), coupled with intelligence received from colleagues around the world, were indispensable sources. Where the author was dubious about the year in which the first issue of a journal was published (the data for which were often not easily obtained and verified) or about the standing of a periodical as an "academic research journal in accounting," he corresponded with the editor and, in most instances, was sent inspection copies of recent issues.

In the term "academic research journal in accounting" there were three operative variables:

- does it publish academic research?
- is it a journal or a periodic conference proceedings?
- does its subject matter include accounting, and is there a significant presence of accounting academics on its editorial staff and among its authors?

Accounting is demonstrably not a self-contained field. Research treatments of the subject merge, sometimes imperceptibly, with work in neighboring disciplines, such as finance, economics, psychology and management science. Yet lines must be drawn, else an endeavor to classify journals quickly becomes unmanageable. One of the author's criteria in the last of the three operative variables, above, was that the journal title should contain such words as Accounting, Auditing, Taxation, Systems (or other accounting-related terms), or variants thereof. The accounting subfields of taxation and systems and information technology (IT) present especially difficult problems in sorting out journals as between "accounting" and another field. The author consulted with senior accounting academics who are specialists in those subfields in order to come to appreciate the perceptions of the accounting research community. Consultation of this kind was also important in deciding whether a journal was "academic" or "professional"—which is not always an easy distinction to make.

Two of the journals did not begin as academic research journals, but instead were at one time predominantly a news periodical or a professional journal and, without changing title, became research journals. After examining a number of issues of these journals at around the time when their character changed, and securing competent advice from those who are acquainted with the history of the journals, the author made an estimate of the year in which each publication was converted to an academic research journal. That year signals the commencement of the journal for purposes of the census.

Journals Currently in Operation

As indicated in Exhibit I, nine of the 77 journals are sponsored by the American Accounting Association (AAA) or one of its sections. In addition, almost half of the journals are put out by commercial publishers. Fourteen journals are published by JAI Press Inc. alone (including all of the "Advances in" and "Research in" titles), which has been especially receptive to academics' suggestions for new journals. The possible future role of academic

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3 Excluded from the list of journals in Exhibit I is The Academy of Accounting and Financial Studies Journal, a U.S. periodical that was announced in May 1996. It is stated in the announcement that the first two issues of this periodical will dedicated to the "top papers, as determined by the referees" from those accepted for presentation at a series of international conferences.

4 In addition to the seven "Advances in" and three "Research in" journals, other journals published by JAI Press Inc. are: Journal of International Accounting, Auditing & Taxation; Research on Accounting Ethics; The International Journal of Accounting; and Accounting Education: A Journal of Theory, Practice and Research.
associations and commercial publishers in the era of electronic journals is discussed in the final section of the paper.

Already there are two electronic journals in the academic accounting literature. A journal launched in late 1995, the Journal of Financial Information Systems, published at Sheffield Hallam University in the U.K., is the first electronic journal in accounting to contain articles. It publishes articles as soon as they have successfully emerged from peer review, rather than according to a fixed calendar schedule. The first such article was published in March 1996. Another electronic journal, edited at the University of Rochester, disseminates by email the abstracts of selected preprints, i.e., manuscripts that have not yet been published in journals. The first issue of the journal was distributed in May 1995, and the journal’s advisory board is composed mostly of journal editors.

The geographical mapping of the 77 journals is presented in Exhibit II. The association with countries is determined by the location of the editor(s) of highest rank, not the publisher. For example, the Journal of Accounting and Economics is classified as an American journal, although its publisher, Elsevier Science, is in the Netherlands. Where two co-editors are located in different countries, as with four journals, the countries are shown jointly. The European Accounting Review, with editors currently in three countries, is classified as “Europe.”

Forty-two of the 77 journals, or 55 percent, are American, and two further journals are “half-American.” The United Kingdom is a distant second, with 13 full journals and one “half.” The American accounting academic market is, by far, the largest. James R. Hasselback, the compiler of the Prentice Hall Accounting Faculty Directory, reports that his 1996 edition lists 6,470 U.S. faculty, while The British Accounting Review Research Register 1994 (Gray and Helliar 1994) lists 1,486 academics. One should take into account, however, that 41 of the 102 departments catalogued in the Research Register are in universities recently converted from polytechnics, whose faculty have not traditionally been important contributors to research journals. Also, while the allocation of research funds to U.K. academic departments or schools is determined on the basis of a government-sponsored “research assessment exercise” conducted every three to four years (Whittington 1993), thus placing a critical emphasis on published research, in the U.S. the very survival of untenured academics in their department is determined by their research productivity (with emphasis placed on publishing in high-prestige U.S. journals). These differences tend to suggest a demand for space in U.S. journals, in relation to the demand for space in U.K. journals, that is out of proportion to the ratio of academics in both countries.

Factors operating in the U.S. to raise the supply of journal space to the level of demand have been the predisposition of JAI Press to launch research journals, and the active role of the AAA and its sections in founding journals of interest to their members; the combined effect of these two factors explains the existence of 22 of the 42 U.S. journals.

Australia, with approximately 1,000 academics listed in the 1994–95 edition of the Australia and New Zealand Directory of Accounting Academics and Academic Journals (Ratnatunga 1994), is in third place, with six full journals and two “halves.”

Discontinued Journals

Exhibit III lists seven journals that have gone out of existence. Only one of the seven discontinued journals, Accounting Research, was published by a commercial house, yet the decision to abort the journal was made by the

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5 Communication to the author from James R. Hasselback, dated March 15, 1996.
6 In the 1994 and 1995 volumes of The Accounting Review, 43 percent of the cover articles were written exclusively by assistant professors (defined here to include doctoral students), and a further 32 percent were written by assistant professors co-authoring with others—a total of 75 percent involving assistant professors.
7 Of the 14 journals published by JAI Press Inc., 13 are edited in the U.S. and one is edited in the U.K.
8 It may be of some interest that the ratio of Australian journals to the number of Australian academics approximates the ratio of U.S. journals to the number of U.S. academics.
Institute of Chartered Accountants in England and Wales, which inherited the journal from the Society of Incorporated Accountants, its sponsor, as part of an integration scheme carried out in 1957. Four of the discontinued journals were published by academic departments that lost interest in the enterprise. One was published by a U.K. accountancy body whose interest in the journal did not last long, and another was a venture undertaken by one of the AAA’s regional groups, but financial support was minimal and, for personal reasons, the editor was unable to continue.

**GROWTH IN JOURNAL NUMBERS SINCE 1987**

Of the 17 journals operating in 1980, only four commenced publishing prior to the 1970s: *The Accounting Review* (1926), *Journal of Accounting Research* (1963), *Abacus* (1965) and *The International Journal of Accounting Education and Research* (1965). By 1986, 15 more journals were added to the roll, following which the number of new journals each year continued to register an increase. Exhibit IV shows graphically the number of journals operating in each year from 1980 onward, and reflects both the additions and subtractions (owing to discontinuation). As detailed in Exhibit V, between four and seven journals commenced publication in each year from 1987 to 1992, following which three to four journals were added in each year from 1993 to 1996. A total of 48 journals commenced publication in the ten-year period from 1987 to 1996, an increase of 150 percent over the 32 operating in 1986.

What accounts for this steep rate of increase during the last decade? Explanations are several. Partly owing to the absence of a high-prestige journal that avowedly caters to all topical areas and research methods falling under the head of accounting, broadly construed, authors with a commitment to a subject (e.g., education, systems) or method (e.g., history or critical studies) have founded their own journals. Some of this journal development would have occurred anyway, as authors with deeply felt research agendas or strong opinions about trends in the literature and journal performance will found journals so as to stimulate certain lines of inquiry.

In an endeavor to organize one’s thinking about the recent trends in founding new journals, the author would suggest that 38 of the 50 journals established since 1987 (including the two journals announced in 1995–96 but not yet having begun publication) may be classified into niches or “affinity groups” as follows:


**Forum for articles of predominantly regional interest or to stimulate research by academics in regional institutions** (5): *De Ratione; Pacific Accounting Review; The European Accounting Review; Asian Review of Accounting; Accounting and Business Review.*

**Education and faculty issues, and instructional resources** (5): *The Accounting Educators’ Journal; Accounting Education: An International Journal; The Journal of Accounting Case Research; Accounting Perspectives; Accounting Education: A Journal of Theory, Practice and Research.*

**International focus** (5): *Advances in International Accounting; Journal of International Financial Management & Accounting; Research in Accounting in Emerging Economies; Journal of International Accounting, Auditing & Taxation; Journal of International Accounting Research.*


**Management accounting** (4): *Journal of Cost Management; Journal of Manage-
ments Accounting Research; Management Accounting Research; Advances in Management Accounting.

Critical studies (4): Critical Perspectives on Accounting and Auditing & Accountability Journal, while generalist in character, have established an affinity, while Accounting Forum and The International Journal of Accounting and Business Society have signaled an affinity.

History (2): Accounting History; Accounting, Business & Financial History.

Statistical and quantitative work in accounting and finance (2): Advances in Quantitative Analysis of Finance and Accounting; Review of Quantitative Finance and Accounting.

This classification of new journals into affinity groups inevitably reflects the choice of emphasis favored by the author. Several of the journals could well have been classified in other groups: e.g., The European Accounting Review could as easily have been assigned to "International focus." Accounting, Auditing & Accountability Journal and Critical Perspectives on Accounting also have an affinity with "History," and the latter journal could well have been associated with "Bridge between research and practice/policy." It should be mentioned that the two journals grouped under "Statistical and quantitative work in accounting and finance" were founded by the same editor (a finance academic).

The research methods staked out by some of the new journals are history, behavioral research, quantitative analysis, critical studies, and analytical and empirical research (e.g., Review of Accounting Studies). One new journal, The Southern Collegiate Accountant, has a somewhat complicated mission to promote work other than the mainstream run of social science research in accounting, and imposes a requirement that those who would nonetheless submit papers in this mainstream genre must be in departments that do not have a doctoral program.

Among the factors that have influenced the focus and content of a number of the new journals is the growth of interest in such areas as management accounting research, international and comparative research, and research on education and faculty issues, as well as the continued maturation of systems and IT research. Further, the increasing interest in encouraging accounting research in the English language in such regions as Southern Africa, Southeast Asia, Asia-Pacific and the European Continent has spawned several new journals.

**SOME IMPLICATIONS OF THE INCREASE IN JOURNALS**

While the appearance of journals carrying a richer variety of research is to be welcomed, one can hardly be insensitive to the issue of the adequacy of editorial resources to meet this demand. Because of the frequent use of co-editors, there must be about one hundred accounting academics who are steering research journals. Hundreds of additional academics serve as associate editors or members of editorial boards. The management of research journals and the peer review of manuscripts are not matters to be taken lightly, least of all as seen by submitting authors, and one can be, to a degree, skeptical of the sufficiency of competent editorial resources to serve so many journals. In addition to jour-

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9 While the editors of most non-association journals remain in their positions for lengthy periods (e.g., Vernon K. Zimmerman has been the editor of The International Journal of Accounting since its commencement in 1965, and Anthony G. Hopwood has been the editor of Accounting, Organizations and Society since its commencement in 1976), most association journals provide for a frequent rotation of editors. The AAA imposes a three-year maximum on the terms for the editors of its three Association-wide journals. The AAA sections have periods of tenure ranging between three and six years—but closer to three than six. The British Accounting Association sets a tenure of 3-4 years for the editor(s) of The British Accounting Review. The Canadian Academic Accounting Association allows a tenure of from three to seven years for the editor of Contemporary Accounting Research. The Accounting Association of Australia and New Zealand has adopted a five-year term for the editor of Accounting and Finance. Whether such short terms are desirable is open to debate. The American Economic Review and the Journal of Economic Literature, the flagship journals of the American Economic Association, have had only
nal growth, several pre-existing journals have, since the mid-1980s, increased the number of issues they publish each year. All of this adds to the collective editorial burden.

Without question, a factor that contributes to the acceptance of a new non-association journal is the standing of the members of its editorial staff, which explains why well-known researchers are in demand by so many journals. Another strategy, especially well used by *Contemporary Accounting Research* (even as an association journal), is to publish in one issue the proceedings of an annual conference at which leading researchers give papers and serve as discussants of others.

The author has made an informal survey of the current editorial boards of 22 of the higher-profile journals listed in Exhibit I and has found the following: one academic serves on the editorial staff of as many as eight journals, one serves seven journals, two are on the staff of six journals, six are on the staff of five journals, 13 are on staff of four journals, and 21 are on the staff of three journals.10 These numbers do not reflect accounting academics' editorial board service for journals in finance, economics, psychology or management science (among others) as well as for journals in taxation, systems, etc. that are not included in Exhibit I. Ad hoc assignments are also omitted.

The author knows of several accounting academics who claim to have reviewed upwards of 30 manuscripts for research journals in 1995. This is a very heavy cost for academics to incur, and one can only speculate on the impact of such service on the academics' own research programs. Not only does such a reviewing load likely contribute to slower turn-around time at journals (especially the younger ones, which established reviewers may place at the end of the queue), but it raises a potential question about the possible dominance by a small number of academics of peer research assessment in certain lines of topical or methodological inquiry. For editorial board members with multiple journal obligations, moreover, the time may have come for editors to inquire in advance, by email or fax, whether the academic can free up time to review a paper in a timely manner.

Another concern that might be raised by the proliferation of "niche journals" is the increasing "balkanization" of the research literature, to the point where the work published in most of the younger journals is not noticed (to say nothing of cited) in the larger literature. This concern could be dispelled if the journals were widely circulated or if access were provided to the journals via print indexes and especially electronic databases, with their resourceful search programs. This matter is treated below.

This is not to imply that all "niche journals" are narrowly focused. Some cast a broader net than do some of the ostensibly generalist journals.

**SUBSCRIPTIONS TO THE JOURNALS BY 12 MAJOR LIBRARIES**

To what extent do major libraries subscribe to the journals listed in Exhibit I? In reality, this constitutes a market test.11 

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Footnote 9 (Continued)

three editors each since 1969. To be sure, an editor can stay too long. The author is of the belief that an editorial term of three and even four years is too short a period for most editors to acquire sufficient confidence and experience to play a role in creating literature, instead of being solely a recipient of submitted work. Editorial terms should be linked to performance, not to how much time has expired on a clock. Not all researchers possess the temperament or management skill to be effective editors. We must make the most intelligent use of our editorial resources, subject, of course, to the willingness of an editor to continue in service.

10 Comparative figures for a much earlier period may not be too useful. In 1980, for example, only nine of the 17 journals disclosed editorial boards. Only one academic served on as many as four editorial staffs, and four served on the staffs of three journals.

11 Many authors have conducted surveys of "perceptions" of the quality of accounting journals. While such studies may yield meaningful results for the few journals that are the most widely known and followed, their findings may be markedly less meaningful for the journals for which widespread familiarity may not be assumed. A study published in the *Journal of Political Economy* (Hawkins et al. 1973) vividly illustrates this concern. In their study of economists' perceptions of the quality of 87 journals, the authors included two fictitious but plausibly titled journals in the list sent to respondents, one of which, the "Journal of Economic and Statistical Theory" (J.E.S.T.), was ranked 24th among the 87 journals!
Exhibit VI, the results of a survey of 12 major libraries—five in the U.S., five in the U.K., and two in Australia—are shown. Where a university maintains a departmental library in addition to its university library, both libraries were included in the survey. Individual faculty subscriptions to journals were not included unless the journals were stored in a departmental library. The survey was limited to 67 journals, excluding the seven journals that commenced publication in 1995 or 1996 as well as the two journals that were announced in 1995–96 but are not yet in operation (see Exhibit V). These nine journals were excluded since not all of them would have had time to come to the attention of departments and libraries.12

The disparity of the results across libraries was somewhat greater than expected: from 49 journals received by the University of Illinois at Urbana-Champaign (in the author’s view, perhaps the best accounting library in the world) to 22 received by the University of Texas at Austin and the University of Wales, Aberystwyth. As regards the two major universities in Sydney, Australia, the difference between 42 for the University of New South Wales and 29 for the University of Sydney is probably attributable to the broader array of faculty research agendas at the former than at the latter. Other factors that help explain such differences are budgetary constraints, faculty alertness to the evolving periodical literature, and the close proximity of other libraries. For example, the National Library of Wales, a copyright library, is located on the campus of the University of Wales, Aberystwyth.

There are, of course, supplements to on-campus libraries: faculty subscriptions, inter-library loans and nearby libraries (as well as the electronic databases mentioned below), but the convenience of a library at close hand cannot be gainsaid.

An even more interesting result of the library survey is the grading of journals according to how many libraries subscribe to each. The findings are shown in Exhibit I, indicated by the number to the left of each journal. As shown by the bar graph in Exhibit VII, the journals are distributed into three modal groups: 15 that are received by 11 or 12 libraries, 13 that are received by six or seven libraries, and 29 that are received by between zero and three libraries. The 15 journals received by 11 or 12 libraries are, for the most part, ones that rank near the top of most perception and citation studies:13

The 15 journals at the two lowest rungs of the library subscription list are, in the main, ones that commenced publishing between 1989 and 1994 and ones that focus chiefly on work associated with regional authors:

<table>
<thead>
<tr>
<th>No.</th>
<th>Journal Name</th>
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<tbody>
<tr>
<td>1</td>
<td>Accounting and Business Review</td>
</tr>
<tr>
<td>2</td>
<td>Accounting Educators’ Journal</td>
</tr>
<tr>
<td>3</td>
<td>Advances in Quantitative Analysis of Finance and Accounting</td>
</tr>
<tr>
<td>4</td>
<td>Indian Journal of Accounting</td>
</tr>
<tr>
<td>5</td>
<td>Journal of Accounting and Computers</td>
</tr>
<tr>
<td>6</td>
<td>Research Bulletin of The Institute of Cost and Works Accountants of India</td>
</tr>
<tr>
<td>7</td>
<td>Research in Accounting in Emerging Economies</td>
</tr>
<tr>
<td>8</td>
<td>Contemporary Accounting Research</td>
</tr>
<tr>
<td>9</td>
<td>The International Journal of Accounting</td>
</tr>
<tr>
<td>10</td>
<td>Issues in Accounting Education</td>
</tr>
<tr>
<td>11</td>
<td>Journal of Accounting and Public Policy</td>
</tr>
<tr>
<td>12</td>
<td>Journal of Accounting &amp; Business Research</td>
</tr>
<tr>
<td>13</td>
<td>De Ratione</td>
</tr>
<tr>
<td>14</td>
<td>The Southern Colleague Accountant</td>
</tr>
<tr>
<td>15</td>
<td>Asia-Pacific Journal of Accounting</td>
</tr>
<tr>
<td>16</td>
<td>Asian Review of Accounting</td>
</tr>
<tr>
<td>17</td>
<td>The Irish Accounting Review</td>
</tr>
<tr>
<td>18</td>
<td>Journal of Accounting &amp; Business Research</td>
</tr>
<tr>
<td>19</td>
<td>The Journal of Applied Accounting Research</td>
</tr>
<tr>
<td>20</td>
<td>De Ratione</td>
</tr>
<tr>
<td>21</td>
<td>The Southern Colleague Accountant</td>
</tr>
</tbody>
</table>

12 Also excluded was The International Journal of Accounting and Business Society, which came to the author’s attention in June, after the survey was conducted.

13 For example, in a perception study of senior U.S. accounting faculty, Brown and Huenfer (1994, table 3) found that 12 of the 15 journals in the 12/11 list were ranked among the 20 most prestigious academic research journals in accounting. The Journal of Business Finance & Accounting was 21st, and Issues in Accounting Education was 24th. The British Accounting Review was not included in the authors’ study, owing, apparently, to their criterion for inclusion: “We attempted to select journals that would be reasonably likely outlets for the research of U.S. accounting academics.” (Brown and Huenfer 1994, 227)
Most of the journals in the 1/0 list are not published by major commercial houses. Hence, it falls to the editors to promote their journals at academic conferences and through mailings.

It is interesting to take note of the record of the eight AAA journals (included in the survey) in penetrating the major library market:

<table>
<thead>
<tr>
<th>Association-wide journals:</th>
<th></th>
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</thead>
<tbody>
<tr>
<td>Accounting Horizons</td>
<td>12</td>
</tr>
<tr>
<td>The Accounting Review</td>
<td>12</td>
</tr>
<tr>
<td>Issues in Accounting Education</td>
<td>11</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Section journals:</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Auditing: A Journal of Practice &amp; Theory</td>
<td>10</td>
</tr>
<tr>
<td>Behavioral Research in Accounting</td>
<td>7</td>
</tr>
<tr>
<td>Journal of Management Accounting Research</td>
<td>7</td>
</tr>
<tr>
<td>The Journal of Information Systems</td>
<td>6</td>
</tr>
<tr>
<td>The Journal of the American Taxation Association</td>
<td>5</td>
</tr>
</tbody>
</table>

Contrary to one's expectation for a taxation journal, the five recipients of The Journal of the American Taxation Association are not the five U.S. libraries. The journal is received by four of the five U.S. libraries and by the University of Lancaster. The Journal of Information Systems is received by more libraries than any other systems or IT journal. The Journal of Management Accounting Research has the same count of library subscribers as Management Accounting Research (U.K.), although not at all the same libraries. Three libraries subscribe to neither.

**INCLUSION OF THE JOURNALS IN PRINT INDEXES AND ELECTRONIC DATABASES**

In the most surprising finding of the study, only somewhat more than half of the 68 journals begun by 1994 were included among the source publications in the two leading print indexes and in the leading electronic databases. The data are shown in Exhibit VIII.

As regards the print indexes, only half of the 68 journals are included in the Accounting Literature Index, and a marginally better 54 percent are reflected in the Accounting & Tax Index (formerly the Accountants' Index).

No more than 56 percent of the 68 journals form part of the electronic databases of Heck's Financial Accounting Literature Database, the Accounting & Tax Index or LEXIS-NEXIS. A paltry 21 percent, 13 percent and 10 percent of the journals are accessible in the electronic services known as ABI/INFORM Research & Business Periodicals Research, InfoTrac and the Social Sciences Citation Index, respectively.

Twenty-three journals, listed in Exhibit VIII, of which as many as ten commenced publication prior to 1990, are not indexed or included in electronic databases anywhere. All but three of these 23 journals are received by three or fewer of the 12 libraries in the survey reported above. All of the eight journals that are not received by any of the 12 libraries appear in this list.

The implication for authors submitting to the 23 journals is clear: articles in these journals are largely a matter of private information revealed only to those who actually see these journals, or to those who may see citations to articles therein in more widely accessible journals. It would seem to be an obligation of journal editors to seek the inclusion of their journals in print indexes and electronic databases. Otherwise, authors may have good reason for preferring to publish elsewhere.

To be sure, a number of bibliographies and literature reviews or taxonomies are available, but not uncommonly their coverage tends to be confined to a relatively small set of “high profile” journals. A few examples of bibliographies and taxonomies may be illustrative. The survey in Management Accounting Research: A Review and Annotated Bibliography (Klemstine and Maher 1984, 3) was drawn from only six journals “because they are/were generally regarded as the major academic journals.” In Prodhan and Al Najjar’s (1989, 3) Accounting Research Database, the classification of main articles published from 1976 to 1985 was limited to Accounting and Business Research, The Accounting Review, Journal of Accounting Research, and Journal of Business Finance & Accounting, since “These

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14 One hopes, of course, that the editors of the print indexes and electronic databases will be receptive to such approaches.
journals are among the most widely regarded, and reflect mainstream accounting research.” Brown et al.’s (1994, viii) grandly subtitled Accounting Research Directory: The Database of Accounting Literature, a citation database whose preparation involves an examination of each cited article in order to provide four taxonomies according to research type, is limited to “seven leading accounting journals.”

As a final note on Exhibit VIII, the 1994–95 edition of Vargo and Vargo’s annually revised Author’s Guide to Accounting and Financial Reporting Publications is a much more inclusive source of references to the 68 journals, covering 49 of the journals. Yet 19 of the journals somehow escaped the attention of the compilers of this guidebook, notwithstanding their obvious effort at being comprehensive. Perhaps the editors were unresponsive to inquiries about their journals.

THE FUTURE OF JOURNALS

The future of journals is in electronic compilation and transmission. In accounting, a journal of financial information systems and a journal of abstracts—both electronic—are already in operation, as reported in Exhibit I. The field of accounting will not advance as fast as mathematics, physics and astronomy—three fields having among the highest rates of computer-literacy—in converting from solely print journals to ones that are entirely electronic. But the lower cost, the efficiency and speed of communication, and the power of electronic search commands—especially with their promise of linking scholars across disciplines—will inevitably drive accounting in the same direction.

It seems probable that the advent of electronic journals may further increase the number of academic research journals in accounting. With electronic transmission, either via email or on web sites, the costs of production and distribution attendant to a print journal may be reduced by a large fraction (see Okerson and O’Donnell 1995, chap. XIII). The entire editing operation, including communications between the editor and the author and reviewers, can be performed electronically. If accounting goes the way of high-energy theoretical physics and establishes a comprehensive database of preprints, once a journal has accepted a version of a preprint it can simply announce that the indicated version has been validated by peer review. A transmission of the accepted article would be unnecessary. Controls, of course, would be needed to assure that manuscripts validated by peer review are not tampered with by others.

It also seems likely that, in an era of electronic journals, the number of submissions to high-prestige journals will increase, as authors abandon their concern about the limited space in these journals to accommodate all worthy candidates for publication. Even though the traditional words of caution, “space is at a premium,” will no longer be relevant, editors and reviewers should nonetheless be expected to use the same standards of quality and length of a manuscript in relation to its substantive contribution.

Controls, and security in general, are a pivotal issue. For the many accounting journals currently put out by commercial publishing houses, a means must be found—even if production and distribution costs are reduced to a small fraction of today’s level—of generating revenue for electronic journals. It might be done by receiving or reading charges, but then there is the problem of unauthorized retransmission to a massive network of readers at lightning speed—and, of course, there is the problem of hackers. Currently, a publishers lobby (with support from a Commerce Department Working Group) is seeking a revision of the U.S. copyright and criminal laws to place a limit on re-transmission. The proposal has provoked controversy among librarians and

15 The journals covered in Brown et al. (1994) are The Accounting Review; Accounting, Organizations and Society; Auditing: A Journal of Practice & Theory; Contemporary Accounting Research; Journal of Accounting and Economics; Journal of Accounting Research, and Journal of Accounting, Auditing & Finance. One finds that Prodhan and Al Najjar’s four journals “among the most widely regarded, [which] reflect mainstream accounting research” (1989, 3) and Brown et al.’s (1994, viii) “seven leading accounting journals” have only two journals in common.
educators, as the boundaries of "fair use" could be adversely affected.\footnote{16 In August 1995, Sen. Patrick Leahy (Democrat of Vermont) introduced S.1122 "to make it a criminal offense to willfully infringe a copyright by reproducing or distributing copies with a retail value of $5,000 or more" (Intellectual Property and the National Information Infrastructure 1995, 229). As of the end of April 1996, the bill had not been scheduled for hearings by the Judiciary Committee.}

Most electronic journals today are provided free of charge, as commercial publishers and academic associations experiment with the new technology and await legal protection of their rights. The role that traditional publishers will play in the world of electronic journals is still very much in dispute (see, e.g., Odlyzko 1996 and Fisher 1996).

The significant savings in the production and distribution costs of electronic journals (in comparison with print journals) may reduce subscription fees to a point where libraries and individual users can economically gain access to a wider range of journals. As electronic journals become more the rule than the exception, one might begin to see more extensive databases of both preprint and published work in the field. It is a dismaying prospect that, with sophisticated search techniques, few readers, other than the author and peer reviewers—and those attending a seminar or conference at which the paper is presented—might actually see most papers in their entirety. The literature might become, as one commentator has suggested, a "vast, undifferentiated database, rather than a collection of discrete editorial streams" (Nunberg 1994, 7).

For some time, however, it seems likely that many journals will be available in print and electronic versions; hence, the cost savings associated with electronic transmission will be deferred. Indeed, it has been suggested that it is unlikely that even the hard sciences will abandon traditional print-and-distribute publication. Journals such as Science or Nature provide readers with an opportunity for making serendipitous discoveries about topics whose relevance to their own work they may not have suspected, a kind of reading that tends to be discouraged by electronic journals, where search procedures generally presume that readers know in advance what they are interested in. (Nunberg 1994, 7)

One hopes that, at the least, the electronic medium will succeed in reversing the trend toward the isolation of younger journals, so that the work published in these new vehicles can come to the attention of a much wider audience. By this means, the work published in these journals will enter the mainstream of peer assessment.

EXHIBIT I

Academic Research Journals in Accounting (in the English Language)
In Alphabetical Order

Criteria for inclusion: Use of the words Accounting, Auditing, Taxation, Systems (or other accounting-related terms) in the journal title, and a significant presence of accounting academics among the editorial staff and among the authors of published articles.

The number shown to the left of each journal signifies the number of the 12 surveyed libraries (see Exhibit VI) that receive the journal. A "—" indicates a journal that, owing to the recency of the year in which it began publication, was excluded from the survey.

The country or countries associated with each journal signify the residence of editor(s) having the highest rank. The year in parentheses following each journal signifies the year of its first publication as a research journal. For a serial publication that has been converted to a research journal from a news periodical or a professional journal, without a change in title, the term "converted circa" is used to denote the approximate year of change.

Stephen A. Zeff
Rice University

ABSTRACT: This paper documents and discusses the evolution of management control, which includes management and financial accounting, in the Harvard Business School (HBS) from 1908 to 1980. Primary emphasis is placed on the roles of the key movers, Ross G. Walker and Robert N. Anthony. The successive alterations in the configuration and content of the MBA courses in the Business School, based on a reading of the course catalogues, faculty papers and other documents on file in Baker Library, and interviews and correspondence with many of the principals, together with an examination of the series of text- and casebooks published by HBS accounting faculty, are the factual basis for this historical study. Concomitant developments at Massachusetts Institute of Technology and the University of Chicago are also brought into the analysis. An appendix contains a complete list of the HBS accounting faculty during the time span under study.

Keywords: Harvard Business School; management control; management accounting; institutional history; Ross G. Walker; Robert N. Anthony.

Data Availability: Data are available from the author upon request, although the documents in Baker Library's historical collections may be used in published research only with its permission.

INTRODUCTION

The ascendancy of management control at the Harvard Business School occurred over a period of decades. In order to appreciate the stages in the development in thinking by the faculty across the years, it is instructive to review the evolution of the accounting curriculum from the beginning of the Business School in 1908 to the 1970s. The two leaders in the transformation from accounting to management control were Ross G.
Walker and Robert N. Anthony, the former having been the latter’s mentor. Together, they established the concept of control, in stages, from the 1930s to 1982, when the latter retired from the faculty. Beginning in the 1950s, the Control faculty, led by Anthony, published a series of books containing textual material and cases that diffused its teaching and research philosophy around the globe.

The focus of this paper is therefore mainly on the evolution of the accounting cum control curriculum, and how and why it changed. Harvard Business School was not alone in forging this development. Comparable development in the United States was noticeable at Massachusetts Institute of Technology (MIT), across the Charles River. And the University of Chicago was, without question, a major contemporary leader as well. The essence of this movement was to emphasize concepts and the management use of accounting information over technique.

The paper begins with a digression in which three leadership roles identified with the Business School prior to the Second World War are sketched. The author believes that these roles are little known and deserve to be better known. The discussion then proceeds to trace the evolution of the Business School’s accounting curriculum until the 1930s and 1940s, when the control concept made its debut. The narrative then turns to the evolution of the first-year Control subject—installed in 1946, combining accounting and statistics—together with the expanding set of elective courses, eventually to include information systems and finally focused on management control. Robert Anthony’s 1965 book, Planning and Control Systems: A Framework for Analysis, is seen as a major milestone in this evolution.

Then the counterpart developments at MIT and the major initiatives taken over a period of decades at the University of Chicago are examined. In the course of discussing the leadership efforts at these business schools, attention is drawn to the important role of textbooks as vehicles for making more widely known the new approaches to conceptualizing and teaching management accounting and management control.

This paper does not pretend to be a comprehensive review of the evolution of the literature on management accounting and control.

**EARLY HBS LEADERSHIP ROLES IN ACCOUNTING**

The Harvard Business School, while not the first business school to be founded in a U.S. university, was the first to offer instruction entirely at the graduate level. It pioneered in the development of teaching cases and in the case method of instruction.

Prior to the Second World War, the Business School played a leadership role in American accounting in three important contexts.

First, in November 1908, the year in which the Business School was opened, William Morse Cole, the assistant professor of accounting who had previously taught accounting in the department of economics, published the first textbook on accounting principles in the United States. The book, Accounts, Their Construction and Interpretation—For Business Men and Students of Affairs, discussed the norms underlying the preparation of financial statements and also had chapters on the features of accounting in specialist fields, such as railroads, banks, and municipalities. In this book, he was the first accounting author ever to propose a funds statement, which decades later became a required financial statement in company annual reports. He subsequently labeled it the “Where-got-gone statement” (1915, 445).

Second, Thomas H. Sanders, a professor of accounting at the Business School, played a series of leading roles in the establishment and enforcement of accounting principles
during the formative decade of the 1930s. In August 1934, as research director for the Committee on Statistical Reporting and Uniform Accounting for Industry, he drafted an important paper, “Reports to stockholders” (Sanders 1934), for presentation to the Department of Commerce. During 1934–35, when the Securities and Exchange Commission (SEC) came into being, he commuted between Boston and Washington as an unpaid consultant to the SEC on the development of its forms and accounting regulations. This service occurred before the SEC created the Office of the Chief Accountant.¹ In 1938, Sanders was the principal author, together with Henry Rand Hatfield and Underhill Moore, of A Statement of Accounting Principles, a report sponsored by the Haskins & Sells Foundation that recommended proper practice in the preparation of financial statements. And in 1939–41, he was the American Institute of Accountants’ first director of research after it established a committee to recommend “generally accepted accounting principles” for use by publicly traded companies.

Third, in 1936–37, the terms of the Arthur Lowes Dickinson Fund, set up by Price, Waterhouse & Co. in 1924 to support research in the Business School, were changed to provide that “in addition there may from time to time be appointed, for one year, a man outstanding in Accounting who shall deliver at the Graduate School of Business Administration one or more lectures, and shall be designated as Dickinson Lecturer” (Sanders 1943, vii). This became the first endowed lectureship in the field of accounting in the United States, and very likely in the world. Annually until its discontinuance in 1955, with a three-year interruption during the war, a Dickinson Lecture in Accounting was given at the Business School, and each lecture was published by Harvard University Press or in the Harvard Business Review. Dickinson, an Englishman, had been a leader of Price, Waterhouse and in the accounting profession both in the United States and Great Britain, and he died in February 1935 at age 75. The inaugural lecturer was George O. May, the senior partner of the U.S. firm of Price, Waterhouse and undoubtedly the moving spirit behind setting up the lectureship. May had been much influenced by Edwin F. Gay, the first Dean of the Business School, and he treasured his relationship with the School. In 1969, the Dickinson Fund, fortified by contributions from all of the Big Eight accounting firms, was used to establish the Arthur Lowes Dickinson Professorship of Accounting, with Walter F. Frese becoming the first occupant of the chair.

**EVOLUTION AND INFLUENCE OF HBS COURSES IN ACCOUNTING AND CONTROL**

**Early Development**

From 1908 to 1920, one man, Professor William Morse Cole, taught all of the generalist accounting courses, with the assistance of a part-timer during only two of the years.² His Accounting Principles course, which was required of all entering MBA students, dealt with the “the fundamental and universal principles that accountants must use in their work,” which was stated in the course catalogues from 1914–15 until 1936–37, four years after

¹ The first Chief Accountant was appointed in December 1935. That Sanders quickly became an authority on SEC accounting may be seen in his articles, “Influence of the Securities and Exchange Commission upon accounting principles” (1936) and “Accounting aspects of the Securities Act” (1937).

² From 1915 to 1930, William J. Cunningham, a professor of transportation, taught a course in Railroad Accounting. The reader should consult the Appendix for a list of the faculty who taught accounting at the Business School from 1908 to 1980.
Cole retired. Yet the user of accounting data was regularly said to be the operating manager, not owners or outside interests.

As early as 1912–13, the course catalogue said, “Persons doing satisfactory work in the courses in accounting should without difficulty pass the examinations for the C.P.A. degree” It was not until after 1949–50 that the course catalogue no longer cited one or more courses in which problems would be selected of the type appearing on the CPA examination. The discontinuation of this emphasis might have been due to the intake of older students, namely war veterans, following the resumption of civilian instruction in 1946.

In 1921–22, the course catalogue for Assistant Professor Thomas Sanders’ Industrial Accounting said that accounting should be considered as “a means of executive control,” which was the first time that “control” appeared in a description of the accounting courses. Most of the content of the course involved cost accumulation and analysis. In 1923, Sanders published a 600-page textbook, Problems in Industrial Accounting, with A. W. Shaw Company. In the book, Sanders emphasized principles and then applications. It contained impressive bibliographies and about 150 cases (which he called problems). The last chapter, “Executive problems involving the use of cost data,” consisted of 15 management-oriented cases. A reviewer of his book commented that the problems were attuned to the viewpoint of the executive and not that of the clerk (French 1924, 314). This was one of the earliest Harvard text- and casebooks. In a slender textbook, Industrial Accounting, published in 1929, Sanders distinguished “cost accounting” from “industrial accounting,” his preferred term. The former, he said, was limited in some minds “to the simple matter of adding up a few items of expense to get the total cost,” while the latter signified “the science of the control of business operations through cost analysis” (Sanders 1929, vi).

In 1922–23, Professor D. Earle Burchell, who taught accounting in the Business School for only a few years at the beginning of the 1920s, near the end of his long career, offered a course in Industrial Management and Control in the Industrial Management group of courses, with a description that included the following sentence, “This course approaches industrial management from the standpoint of owners and executives, using accounting and statistics as a means of analysis and budgetary control.” This was the first reference to “budgetary control” in the accounting offerings. In 1946, as will be seen, accounting and statistics were combined again in the new first-year subject, Control.

In 1925–26, for the first time, an accounting course, Auditing and Accounting Procedure, taught by Professor J. Hugh Jackson, explicitly referred to outside interests in accounting reports. Accounting was said to be of interest to “the credit man or banker” or to “investment banker.” All previous references were to owners or internal management.

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3 First cited in HBS Course Catalogue, 1914–15 (final edition), p. 18. HBS Archives. Baker Library Historical Collections. Harvard Business School. (All future footnote references to HBS Course Catalogues in this paper should be interpreted as carrying the full citation, “HBS Archives. Baker Library Historical Collections. Harvard Business School.”) The author acknowledges that published course descriptions may not necessarily reflect what actually was taught in a course in a given year, but they are the best available evidence.

4 HBS Course Catalogue, 1912–13, p. 156.

5 The last such reference to the CPA examination appeared in the description for the course titled Specialized Accounting Problems, in the HBS Course Catalogue, 1949–50, pp. 58–59.

6 HBS Course Catalogue, 1921–22, p. 41.

7 In 1930, Sanders produced a revised version of the book, in collaboration with Paul B. Coffman, which was published by McGraw-Hill Book Company, Inc.

8 HBS Course Catalogue, 1922–23, p. 57.

9 HBS Course Catalogue, 1925–26, p. 46.
Until the latter 1930s, the Accounting Principles course continued to be concerned with the preparation of the balance sheet and operating statement, mainly for the use of management. From 1929–30 onward, the Industrial Accounting course continued to focus heavily on cost accumulation and analysis, and was oriented toward “the type of information which is to be supplied to financial, sales, and production executives as an aid in the furtherance of their executive policies, to the soundness of that information, and to its significance for management purposes.”10

Rose Walker’s Budgetary Control Course and its Influence

Beginning in 1937–38, following Professor Ross G. Walker’s return in 1935 from a five-year assignment as treasurer of a woolen mill,11 three of the course offerings in accounting reflected a major shift in focus, and Walker himself seems to have been the driving force. First, the description for the Accounting Principles course, with Walker a member of the teaching team, said, “The purpose of this course is to develop a capacity to use accounting materials and accounting reasoning in the solution of business problems. Accounting is treated not as a separate subject, but as an integral part of business administration.”12 Walker has been called “an intensely practical thinker” who, according to a colleague, helped bring accounting “out of the green-eyeshade era to become a tool of general management” (quoted in Cruikshank 1987, 242). The nuanced emphasis in the new course description suggested that the manner of preparation and use of a company’s financial statements were not an activity of interest solely to the accounting profession.

Then, in the second half of 1938–39, Walker debuted his “experimental” research course, Aspects of Budgetary Control.13 “In this course,” the catalogue reads, “budgetary control is interpreted as a formal technique of coordinating factors of operations with expected business activity. The following three aspects of the subject are considered: (1) budgetary organization and general procedure; (2) definition and control of operating expenditures; (3) integration of the various curves of operating costs with the problem of effective managerial selection of product and price. ... The emphasis throughout is upon the managerial need for basic data as to costs that are not only dependable, but have been digested to the point where all that remains is the determination of policy.”14 Walker was hardly the first accounting academic to focus on budgetary control. In 1922, James O. McKinsey, at the University of Chicago, published a 474-page textbook, Budgetary Control, with The Ronald Press Company.15 But Walker went well beyond McKinsey in carrying the budget into a plan of action.16

One of Walker’s students in the Aspects of Budgetary Control course was Robert S. McNamara (MBA ’39), who later said that Walker’s course had a “tremendous influence

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10 HBS Course Catalogue, 1929–30, p. 36. For a general review of the evolution of the courses on accounting, see Hansen (1939).
11 Walker had joined the Business School faculty in 1926.
12 HBS Course Catalogue, 1937–38, p. 47.
15 The Fleshers (1996, 411) have written that McKinsey’s book “provided impetus for the spreading of industrial budgeting,” and that in 1945 it “was included on a list of the 12 most indispensable books in the field of management.”
16 McKinsey wrote (1922, 4), “In the past, budgetary control has been considered primarily in connection with governmental units.” Interestingly, Walker previously had an interest in governmental budgeting. Prior to his industry leave, he wrote an article, “The governmental budget as an instrument of control” in the June 1926 issue of The Accounting Review. He was then at The University of Iowa.
on my behavior” as President of Ford Motor Company and as Secretary of Defense.\textsuperscript{17} Robert N. Anthony recounted a conversation with McNamara in the 1950s, when the latter was at Ford: “Bob described the [control] system he had installed in Ford, and I congratulated him on it. He replied, ‘Thanks, but you know full well that this system is based on what we both learned from Ross Walker’” (Anthony 1989, 2).\textsuperscript{18}

Walker offered the course one more time, in the second half of 1939–40, when Robert Anthony (MBA ’40) was a student.\textsuperscript{19} Anthony has traced his interest in management control to Walker’s course (1952, vii), following which Walker invited him to remain at the Business School after graduation and become his research assistant. In 1989, Anthony recalled the Walker of 1940: “Ross Walker’s lectures contained the main ingredients of today’s [Control] course—an emphasis on management uses of information and on behavioral considerations in the management control function” (1989, 2). Anthony accepted Walker’s invitation, and he and McNamara (following an unsatisfactory stint at Price, Waterhouse & Co. in San Francisco) shared an office and taught courses in accounting at the Business School in 1940–42.\textsuperscript{20}

Professor Abraham Zaleznik, who joined the faculty of the Business School’s production unit in the late 1940s, well before Walker’s retirement in 1958, referred to “the kindly but persuasive Professor Ross Walker, who was a subtle practitioner of transforming the mentality of students from the passive to the active frame of mind.” Zaleznik observed that “the subject of Control shifted the emphasis from the standards of the accounting profession to the needs of the manager for information necessary to foster rational behavior” (2005, 53).

During the second half of both 1940–41 and 1941–42, Walker was scheduled to teach Budgetary Control again, with the following course description (in part): “In this course industrial budgeting is interpreted as comprising the policies and techniques of formal managerial planning and coordination. The instruction emphasizes the practical integration of operating factors looking toward the maximum effectiveness of management in making the business enterprise a profitable undertaking. Managerial policies are thus seen in terms of concrete expectations, as projected in definitely planned results for the business as a whole. A serious effort is made to give adequate attention to the questions of administrative psychology which are connected with budgetary planning under practical working condition. ... Accounting costs are, of course, seen as a special case in the broad area of managerial costing. An important teaching point is the need of the businessman for basic data as to costs and revenues, which are not only dependable guides as to the proper choice of managerial alternatives, but which require no further development or interpretative restatement in order to serve as a basis for administrative action.”\textsuperscript{21} But the only second-year electives he actually offered during those two terms were Industrial Accounting and Budgeting in February–June 1941 and Industrial Accounting in February–June 1942.\textsuperscript{22}

\textsuperscript{17} Interview with Robert S. McNamara, September 4, 2007.
\textsuperscript{18} It has been said that Professors Thomas H. Sanders and Edmund P. Learned, in marketing, also were influential in McNamara’s thinking. See Trewitt (1971, 34).
\textsuperscript{19} The HBS Course Catalogue for 1939–40 lists Aspects of Budgetary Control for the second half of the year, but Walker signed grade sheets at the end of that term for Budgetary Control. Communication to the author from the MBA Registrar at HBS, dated February 15, 2008. This shortened title suggests that the course was no longer “experimental.”
\textsuperscript{20} In 1942, Anthony entered service in the Navy, and McNamara became an instructor in the Statistical School (see below).
\textsuperscript{21} HBS Course Catalogue, 1940–41, p. 54.
\textsuperscript{22} Communication to the author from the MBA Registrar at HBS, dated February 15, 2008.
Finally, in the first half of 1940–41, Walker completed his redesign of the accounting offerings. Together with Professor W. Arnold Hosmer and Assistant Professor Thomas H. Carroll, he launched a course entitled Administrative Accounting, which, the catalogue reported, “looks at the reporting problem from the point of view of the controllership function in management, in which function the emphasis is upon the specific administrative purpose to which accounting data may be addressed, as contrasted with the characteristic general-purpose objectives of conventional accounting. Thus the problem materials of the course deal with the accounting prerequisites to particular executive action in business administration.”

The three instructors thus contrasted accounting data required for evaluating past performance, which is required for reporting to outside interests, with “the data required for choosing from alternative courses of action in planning for future operations.” This aim, they said, “is occupied with the materials needed by management in its ever-present quest for the maximum favorable combinations of such operating variables as price, product, and cost.” This course was scheduled to be offered again during September 1941–January 1942 term but was not in fact given.

Walker’s elective courses clearly placed emphasis on supplying accounting information for the purpose of the taking of executive action on planning and control decisions. With respect to the term “control,” Walker wrote, “Always when I use the word control, I am not thinking solely of the negative aspect of placing a limit on action, but also of its affirmative sense of assuring an adequate supply of the means of successful operation.”

Walker, although unquestionably an influential figure in the Business School, was little known to academics outside the School. He wrote no books and few articles in his long career. Perhaps his most important article-length work, in 1938, did not appear in a journal but instead in a little-noticed collection of writings by Business School faculty and published by Harvard University Press. In the essay, he explained how “time and aggressive experimentation” had brought “the principle of pre-costing operating expenditures to its practical conclusion as a technique of control.” He added, pointedly, that “this principle is to be credited with much that has been done to free the executive from his old dependence upon the rigid cost data of conventional accounting, the essential objective of which is always a broad stewardship and not analysis of alternative courses of action” (1938, 190).

National Defense and Wartime Course Programs: A New Course in Management Controls

From 1941 to 1945, the Business School ran courses for the Army, Navy, and Army Air Forces (AAF), and for other branches of the federal government. It also trained employees to become supervisors in essential war production and retrained executives displaced from their peacetime occupations to transfer their skills to war industries (see Cruikshank 1987, 209–273; Fraser 1943; Two Important Changes 1941; Hosmer 1946). It all began in September 1941 with the 12-month program for the Industrial Administrator degree, which was designed to train men for jobs of immediate usefulness in government

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23 HBS Course Catalogue, 1940–41, p. 52.
24 Communication to the author from the MBA Registrar at HBS, dated February 15, 2008. See footnote 26, below, for an explanation of the non-offering of some scheduled courses during this period.
service or in industries related to National Defense. One of the required courses in that program was Accounting Control. The first half of the course dealt with the preparation of “balance sheets, income statements, and specialized operating reports. In the second half of the course, the emphasis is on methods of control and on the effects of accounting policies on balance sheet amounts, working capital position, and income. Throughout the course the point of view is primarily that of the controller or other officer directing accounting activity.”

In June 1943, the faculty voted to suspend civilian instruction for the MBA program altogether to devote the School’s energies entirely to the war effort. A number of faculty taught in the Statistical School (known as the “Stat School”) for the AAF Statistical Control Division, including, at the outset, Robert McNamara, who then became “instrumental in organizing the statistical control system for the Eighth Air Force” (Faculty notes 1943, 83). In February 1946, he joined Ford Motor Company as the most prominent of the “Whiz Kids” (see Shapley 1993, ch. 3; Byrne 1993).

Management Controls Course

Professor Richard F. Vancil, who joined the faculty in 1958, has written that, during the first half of the 1940s, when the Business School was mobilizing to train military officers and civilian executives, “Its mission was to enhance their analytical skills, helping them to optimize the management of scarce resources available for the war effort. ... Adapting, the faculty poured old wine into new bottles and called it ‘Management Control.’ ... A dozen or more faculty members had been involved in designing and teaching the Management Control course during World War II, but three stood out: Ross G. Walker, Edmund P. Learned, and Charles A. Bliss” (1989, ix, x). Cruikshank records that Dean Wallace B. Donham told Learned that he wanted the Management Control course in the new Industrial Administrator degree program “to be a combination of the control concepts represented by [Professor Richard] Meriam in Industrial Management, by Walker in the advanced accounting field, and by you and Bliss in Marketing and Statistics” (Cruikshank, 1987, 242). Furthermore, Donham told Learned, “I want you to accept the leadership and to blend into the new course of Management Control a combination of human relations concepts and management control concepts. You may draw upon Professor Walker, Professor Meriam, and Professor [Fritz] Roethlisberger.” The resulting course, known as Management Controls, was given for the first time as a requirement in the third term of the Industrial Administrator degree program for its sessions which began in September 1941 and June

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26 During the Depression years, Dean Wallace Donham was looking for ways of keeping his faculty together by reversing the decline in income. His proposal for a Bachelor of Business Administration degree was rebuffed by the faculty. The Industrial Administrator degree program was seen as the way out of the Business School’s financial predicament. The financial exigencies during the late 1930s and early 1940s were likely an explanation for why certain scheduled MBA courses were not actually offered. See Edmund P. Learned, “History of Management Control 1943–1945,” pp. 1–3 (Edmund P. Learned Papers 1927–1985, box 8, folder 5, used with permission of HBS Archives. Baker Library Historical Collections. Harvard Business School).

27 HBS Course Catalogue for Industrial Management Engineering, A Twelve Months’ Course Leading to the Degree of Industrial Administrator, June 15, 1942 to June 12, 1943 [and] September 24, 1942 to September 18, 1943, p. 9.

28 The author is grateful to Robert S. Kaplan for drawing his attention to this source. Charles A. Anderson, a member of the HBS business policy faculty in the 1940s, recalls that Ross Walker was the one principally responsible for bringing the accounting and control idea into the new course. Interview with Charles A. Anderson, August 21, 2007.

1942, and also as an elective in the MBA program in 1942–43. In the budgeting section of the new course, Ross Walker made use of the cases he had designed for his Budgetary Control course. A course entitled Personnel and Management Controls was taught in the Business School’s War Industry Training Program in 1942–43 and again in 1944–45. A Management Controls course was included in the first two offerings of the Business School’s new 13-week Advanced Management Program, in the fall 1945 and spring 1946,\(^{30}\) which was an outgrowth of a special, 15-week retraining course the Business School had designed in 1943 for the U.S. Office of Education (see Copeland, 1958, 126–130).

In the offering of Management Controls in the Industrial Administrator degree program in 1942–43, emphasis in the catalogue description was placed on the transmission of business policies through “the human organization” and the need “to assist management in the size-up of human problems in the organization.”\(^{31}\) The first of these two points, but not the second, was included in the description for the Management Controls course in the 16-month MBA program, mounted in conjunction with the Reserve Officers’ Training Corps, in 1942.\(^{32}\) George F. F. Lombard, then an assistant professor who was one of the instructors in the course, wrote, “Management Controls pulls together the human and technical problems of an administrator and emphasizes the fact that at the point of action they are but different aspects of a single total situation” (G.F.F.L. [George F. F. Lombard] 1943, 10).

Management Controls was a unique course, an experiment in capitalizing on the comparative advantage of the Business School’s wide array of disciplines.

**Debut of First-year Control, and Certain Elective Accounting Courses: 1946–47**

**First-Year Control Subject**

During the war years, the Business School faculty completed a major curriculum reform of the MBA program (see Cruikshank 1987, 264–272), which resumed operation in February 1946. Ross Walker was a member of the Educational Policy Committee, which oversaw the reform. Under the new program, the required first-year curriculum was composed of a single course, Elements of Administration, which was divided into six parts, “each handled from a managerial point of view rather than as abstractions divorced from the setting of administering an enterprise.”\(^{33}\) The “administrative point of view” had become paramount by then. One of the parts, or subjects, was Control, which the curriculum review committee had called “Administrative Accounting and Statistics” in one of its early drafts. It combined Accounting Principles with Business Statistics—as Vancil has written, “in order to link data with analysis” (1989, x). These two previous courses were to be integrated in Control, not just merged with boundaries between them, and all members of the teaching faculty were to teach the entire subject. In effect, therefore, Ross Walker’s notion of achieving control through the budgetary process became the touchstone for the new offering. Robert Anthony was a leading instructor in the subject from the outset.\(^{34}\)

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30 HBS Course Catalogue, 1945, pp. 48, 51–52.
31 HBS Course Catalogue for Industrial Management Engineering, A Twelve Months’ Course Leading to the Degree of Industrial Administrator, June 15, 1942 to June 12, 1943 [and] September 24, 1942 to September 18, 1943, p. 13.
32 HBS Course Catalogue, 1942, War Training Program, p. 55.
33 HBS Course Catalogue, 1946, p. 28. The one course with six (later seven) parts was dropped after 1950–51, when the “parts” became the courses.
34 In 1963, Anthony became the first holder of the Ross Graham Walker Professorship of Management Controls (Robert Anthony and the Ross Walker Chair 1964).
Charles Bliss, aided by groundwork done earlier by Edmund Learned, led the way for statistics to join with accounting in the new offering. The catalogue description affirmed that all of accounting, not just the costing side, should be responsive to the needs of management: “The emphasis throughout is upon the wise use of figures and accounts toward some governing purpose, and upon securing an understanding of their limitations as data supporting actual administrative decision [sic].” Accounting reports to outside interests were not mentioned, but, as noted below, management’s oversight when preparing such reports became an important dimension. It was stated in the Business School’s Alumni Bulletin that “the purpose of the course should be primarily to give ‘management skill’ and, secondarily a technical skill; the reverse is not the purpose of the course” (The course in Control 1947, 12). Faculty had been concerned for some years that quite a number of MBA students had a “strong distaste for figures,” and the decision was made to emphasize management uses rather than data-gathering procedures.

How was Control named? No one knows definitively, but the Harvard Business School Bulletin related a story, perhaps apocryphal, as follows: “Dean [Donald K.] David was talking with a group of the Faculty about the matter when suddenly he banged the table with his hand and burst out: ‘Well, damn it, we’re talking about control. How do you use figures to control a business enterprise?’” (Taking the mystery 1961, 27–28).

In a memorandum about Control apparently written in 1945, Ross Walker wrote:

I believe it to be unwise to have accounting and statistics taught in an atmosphere of “pure technique,” or of a mere record of past events, quite apart from the drama, the discipline, and the critical search for significant and appropriately measured facts which are characteristic of the plan of action, or of the need for decision in choosing a course of action.

He said that the new course “is by no means, in my opinion, a futile repetition of the ‘old way of doing.’” He then ticked off six “important new things” that this novel mixture of accounting and statistics offers:

- It completes the quantitative foundations of the budget and the accounts, by providing not only the absolute data of the historical record, but also the relative dimensions of those data as a guide to choice of course of action and to intelligent evaluation of actual results.
- It provides as a foundation the working tools, the arithmetic, and the vocabulary.
- It explains the origin of accounting concepts in why the things happen from which the concepts originate—hence is critical in the managerial-operating versus the professional accounting sense of the term.

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35 Anthony (1956, viii–ix) credits Walker and Bliss as “the two men who were largely responsible for creating and developing [Control].”
36 HBS Course Catalogue, 1946, pp. 31–32. See also The course in Control (1947).
37 See “Excerpt from MBA Report of Educational Policy Committee—February, 1945,” p. 1–2 (Ross G. Walker Papers 1935–1966, box 9, f.9–8, used with permission of HBS Archives. Baker Library Historical Collections. Harvard Business School). Beginning in 1946, the catalogue description of the Control course said, “By repeated exposure to the quantitative aspects of business problems in their administrative setting, the minds of students with the familiar dislike for figures will be opened to their practical common-sense usefulness and the conventions which have long since been adopted with respect to them.” HBS Course Catalogue, 1946, p. 32. It is interesting to speculate whether the emphasis on accounting information for management decisions might have been rationalized in the minds of some as necessary to overcome students’ aversion to figures.
38 As early as 1919, E.I. du Pont de Nemours & Company used “Executive Committee Control Charts” to plan, control, and motivate its people. See Johnson and Kaplan (1987, ch. 4).
It constantly seeks to tie figures to purposes and to the cost of the figures themselves.

It emphasizes future versus past action, and future data versus past data.

It weaves statistical method, tool, strategy, and interpretation into the fabric of management in a cumulative design of functional aims.\(^{39}\)

The Control subject therefore carried forward Walker’s view, expressed for the first time in the Accounting Principles course description in 1937–38, that accounting, including financial accounting, was “an integral part of business administration.” Professor Melvin T. Copeland, in his historical account of the Business School, \textit{And Mark an Era}, singled out Ross Walker for his work in “fostering the control point of view” at the School, but he also said, “Some of the experiences of members of the Faculty in the military programs of instruction also contributed to the development of the concept which took form in the new course in Control” (1958, 158). Among the influential wartime experiences would have been the development and offering of the Management Controls course and the faculty’s involvement in the Stat School. As for the Management Controls course itself, it, together with the Human Relations course and the Stat School, formed the basis of the new Administrative Practices and Procedures course, a full-year requirement in the new curriculum, which Edmund Learned directed.\(^{40}\) This new course was said to be primarily concerned with “getting things done through people” (Postwar courses 1947, 120).

Copeland has written that “the most significant innovations in the new first-year program [in 1946] were the courses in Control, Administrative Practices, and Public Relationships and Responsibilities” (1958, 126).

\textbf{Elective Courses}

An elective course, Corporate Accounts and the Public, offered by Thomas Sanders, centered on “accounting as a factor in questions of public policy [i.e., reporting to the several regulatory bodies, including the SEC] and administration.”\(^{41}\) A second elective course, Financial Accounting, taught by Professor W. Arnold Hosmer, was said, in the catalogue, to have as one objective “to provide means for acquiring skill in accounting analysis, especially in the adaptation of accounting as an instrument of administration to particular managerial situations.”\(^{42}\) The following year, the one-term Financial Accounting course became Financial Accounting I and II, spanning two terms. The catalogue description for the second course, with Hosmer and Associate Professor Russell H. Hassler as instructors, included the following: “Accounting reports to senior executives and directors are largely in the form of financial accounting statements.”\(^{43}\) These financial accounting courses, therefore, focused on management uses as well as external reporting issues.

Industrial Accounting I and II were taught by Professor Clarence B. Nickerson. The reviewer of his 1954 book, \textit{Cost Accounting: Text, Problems, and Cases}, published by McGraw-Hill Book Company, commented that “There is a bare minimum of procedural

\(^{39}\) The quotations from Walker appear in “Introductory Statement,” pp. II–1 to II–2 and II–6 to II–7 (Ross G. Walker Papers, box 9, f.9–8, used with the permission of HBS Archives. Baker Library Historical Collections. Harvard Business School).

\(^{40}\) Memorandum to The Long-term Committee and The Transition Committee from the Joint Drafting Subcommittee [of the Educational Policy Committee] on the proposed four-term MBA program, ftn. 3, undated but evidently written between 1943 and 1945 (Educational Policy Committee Records, 1943–45, used with permission of HBS Archives. Baker Library Historical Collections. Harvard Business School).

\(^{41}\) HBS Course Catalogue, 1946, p. 42.

\(^{42}\) HBS Course Catalogue, 1946, p. 44.

\(^{43}\) HBS Course Catalogue, 1947–48, p. 46.
training. Nor does the book bring out to any extent the theory supporting many practices discussed. It will be most valuable as an exposition of how cost accounting can serve management” (Burke 1955, 165). The catalogue for 1947–48 stated that his two courses “are both designed to meet the needs, not only of financial and accounting officers directly responsible for accounting and cost work, but also of executives who use accounting data in handling administrative problems.”

Subsequent versions of First-year Control

From 1948–49 to 1958–59, the catalogue description of Control began, “Control emphasizes the figure aspects of administration. ... [accounting and statistical method] are not studied as ends in themselves but as preliminary scaffolding necessary to the task at hand, the imaginative use of figures in operating management situations.” But it was difficult to find instructors who could teach both accounting and statistics. Statistics faculty struggled to teach accounting, and most accounting faculty lacked a solid background in the nascent field of Bayesian statistics. Robert K. Jaedicke, who was an assistant professor at the Business School in 1958–61, recalls, “Howard Raiffa and Bob Schlaifer used to teach us statistical decision theory so we could teach it to the first years!! One step ahead of the class if we were lucky.”

It would seem that the Business School was, in at least two respects, in advance of the reports sponsored by the Ford Foundation and Carnegie Corporation, which were published in 1959. They both recommended that business education should draw much more heavily on quantitative analysis and the behavioral sciences (Khurana 2007, ch. 6). The Control course brought statistical decision theory directly into play with accounting, and human relations had become an important element in the required Administrative Practices and Procedures course. Nonetheless, the Business School appointed a committee with Robert Anthony as chairman to review the required first-year curriculum in the light of the two reports (Harvard Business School Professor 2006).

Beginning in 1963, as a result of the Anthony committee’s first-year curriculum reform, the unitary course Control was replaced by four subdivisions of a course entitled Managerial Economics, Reporting, and Control (known as MERC) I–IV. MERC I was primarily financial accounting, MERC IV was primarily management control, and MERC II and III were concerned with economic analysis of management decisions and statistical decision theory. This four-part set represented a more efficacious division of labor for the faculty. Students were required to take all four parts of the course. MERC lasted until 1970, when the singular course called Control was reinstated, without any statistics or managerial economics.

In 1963–64, for the first time, managerial economics, by name, became explicitly a part of the Control course, yet topics in managerial economics had found their way into the course in the 1950s. The origin of managerial economics, both the term and the field of study, may be traced to Joel Dean’s path-breaking book, Managerial Economics, published in 1951 by Prentice Hall, Inc. Its aim was to show how microeconomic theory could be used to make managerial decision making more rational. In the final chapter, Dean

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48 In 1968, the MERC course was reorganized into a two-part set, I and II, with the same coverage over the same number of months of study.
proposed an analytical framework for capital expenditure analysis, which he called capital budgeting and which gave prominence to the term.\textsuperscript{49} The subject of capital budgeting was soon brought into the Control course.

In 1954, Robert Anthony was an expert witness opposite Joel Dean in an antitrust case involving United Shoe Machinery Corporation, which turned on the application of present value. Anthony later wrote, “This litigation made me a convert to present value, and I wanted to build our capital budgeting material [in Control] around this concept. Some of my colleagues resisted strongly. They said that present value might be appropriate for a court case, but it was much too esoteric to use in ordinary business decisions” (1989, 8). Present-value tables had been available for many years, but because they were applied mainly to financial assets, such as mortgages, typically their rates did not exceed about 6 percent. Faculty members were scared off by the need to use logarithms to make present-value calculations. Anthony’s research assistant (and later a faculty colleague), Charles Christenson, solved the problem by constructing a comprehensive set of present-value tables (Anthony 1989, 8).\textsuperscript{50} In the Control course, net present value shortly superseded the internal rate of return, but Anthony lamented that the Finance faculty “quickly saw the glamour of net present value” and succeeded “in wresting the topic away from the Control faculty” (1989, 9). It was not long before managerial economics became a staple in managerial accounting, managerial cost accounting, and managerial finance courses throughout the country (Shillinglaw 1991, 231).\textsuperscript{51} The course catalogue for 1963–64 made it clear that the field of Control “is not designed with the vocational objective of training controllers. Rather, the major objective is to provide a rigorous and systematic approach to control as one major aspect of management.”\textsuperscript{52}

Some Developments in the Elective Course Work in Financial Accounting

In 1957–58, Walter F. Frese, then a visiting professor, took over the teaching of Financial Accounting I and II. The following year, as a full professor, he placed his stamp on the course. He changed the catalogue description to emphasize the subjectivity of accounting policy choice, without saying so explicitly. The “underlying objective” of the course, per the catalogue, “is to develop an understanding of the significance, potentialities, and limitations of accounting as a means of communication and control with respect to the financial condition and operation of business.”\textsuperscript{53} He had a large influence on David F. Hawkins, who took Frese’s course in 1958. Hawkins recalls that Frese shifted the way in which the Business School taught financial accounting from an emphasis on accounting principles to a study of the financial accounting process, so as to engage managers in the process of setting their company’s “accounting policy” as part of its overall strategy.

\textsuperscript{49} Dean elaborated on this framework in \textit{Capital Budgeting}, published in 1952 by Columbia University Press. For a further discussion of Dean’s work, see Johnson and Kaplan (1987, 163–165). Two earlier pioneering works in capital budgeting were Grant (1930) and Terborgh (1949). A book that carried capital budgeting into business schools’ curricula, which has gone through many editions, was Bierman and Smidt (1960). As will be seen below, Anthony’s first major textbook also spread the word about capital budgeting.

\textsuperscript{50} This was confirmed in a communication to the author from Charles Christenson, dated December 3, 2007. For the expanded table of the present value of a single amount, see Christenson (1955).

\textsuperscript{51} Shillinglaw was employed by Joel Dean Associates from 1952 to 1955. He claims credit for coining “discounted cash flow” while he was with the firm. Communication to the author from Gordon Shillinglaw, dated February 21, 2008. He used the term for the first time in a publication in Shillinglaw (1955, 277). For a history of the use and discussion of discounted cash flow, see Parker (1969, ch. 3).

\textsuperscript{52} HBS Course Catalogue, 1963–64, p. 41.

\textsuperscript{53} HBS Course Catalogue, 1958–59, p. 122.
The integrity of financial reporting was uppermost to Frese, namely, which reporting methods best portrayed economic reality. In his Financial Accounting II, he pressed the importance of management’s participation in the work of the Accounting Principles Board.\(^{54}\)

In 1962–63, Hawkins, then an assistant professor, began teaching Financial Accounting I and II together with Frese,\(^{55}\) and in 1968–69 he took over the course entirely.\(^{56}\) In the 1970s, Financial Accounting I was retitled as Problems in Corporate Reporting and then as Corporate Financial Reporting.

**HBS Text- and Casebooks Spread the New Teaching Philosophy**

Beginning in 1956, several of the faculty members teaching in Control and in some of the accounting electives published text- and casebooks that made HBS materials available to instructors elsewhere and which could be used to good effect in teaching courses on the management use of accounting information. These were influential books even though, as will be noted below, they were not the first textbook treatments to break from the tradition in U.S. cost accounting textbooks. Until then, all but a few of the textbooks on cost accounting were focused mainly on stereotyped costing procedures and usually only perfunctorily on the ways in which management decisions could be improved by the use of cost analyses. In his “Reminiscences” article in 1989, Anthony expatiated on the “fundamental ways” in which cost accounting, as it had largely been taught prior to the 1950s, differed from management accounting:

First, cost accounting texts dealt entirely with numbers, while management accounting recognizes that human beings use the numbers. Cost accounting texts emphasized cost finding; the objective was to find the cost of manufactured products. The criterion was “truth”—accounting for the true cost of manufacturing. Cost accounting texts were written for students who planned to become cost accountants.

Management accounting texts emphasize the use of accounting information by managers. The objectives are to assist managers and influence their behavior (1989, 3).

**Anthony’s Management Accounting**

The first textbook to reflect the teaching philosophy in the Control course was Anthony’s *Management Accounting: Text and Cases*, published in 1956, which covered both financial and management accounting.\(^{57}\) In the preface, he specifically stated that the book was “an outgrowth of experience in teaching the course called ‘Control’ in the Harvard Business School (although the coverage of that course is much broader than the coverage of this book)” (1956, viii). Aptly, the title of Anthony’s Chapter 1 was “Management’s use of accounting information.” He maintained that the company’s financial statements were used to convey information to outside parties but “are also valuable to management as a general indication of the over-all status and progress of the enterprise” (1956, 3). Anthony set out to show in three chapters how the funds statement, the balance...

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\(^{54}\) Interviews with David F. Hawkins and Thomas R. Piper, March 6, 2008. Frese was a member of the Accounting Principles Board from 1962 to 1967. For Frese’s views on the importance of management participation, see Frese and Mautz (1972). There were many “free choices” in Generally Accepted Accounting Principles in the 1950s and 1960s, thus allowing considerable scope for management to set its accounting policies.

\(^{55}\) HBS Course Catalogue, 1962–63, p. 46. Robert T. Sprouse taught the course the following two years.

\(^{56}\) HBS Course Catalogue, 1968–69, p. 59.

\(^{57}\) Because of this dual coverage, beginning with the sixth edition of the book, published in 1979 (with James S. Reece as coauthor), the title was changed to *Accounting: Text and Cases*. 

*Journal of Management Accounting Research, Special Issue 2008*
sheet, and the income statement may be useful to management. Although such a pedagogical approach is accepted in many quarters today, it was virtually unknown in accounting textbooks published in the 1950s and earlier.

The reviewer of Anthony’s book in The Accounting Review greeted it as a “pleasant surprise,” saying, “It is a text shorn of much debit and credit detail with an emphasis upon how accounting information can be used in the management process” (Odmark 1957). In the 1950s, most financial accounting textbooks intended for first-year students were laden with bookkeeping detail, were supplemented with a practice set, and exacted an absorption of Generally Accepted Accounting Principles.

In the book, Anthony said, “Since costs can be controlled only by the people who are responsible for incurring them, an essential concept of control is that of the responsibility center” (1956, 269). In this respect, he adopted a term that was first used in 1952 by an Arthur Andersen & Co. partner (Anthony, 1989, 10).

Dulman (1989, 581–582) affirms that the textual material and cases in Anthony’s book, together with a comprehensive report on the buy-lease decision he prepared for the National Shoe Manufacturers Association (Anthony, 1954)58 (relating to the antitrust case mentioned above) and Charles Christenson’s extensive present value tables (which Anthony incorporated in his textbook), contributed in a major way to the diffusion of modern capital budgeting methods.59 Haka (2007, 705) writes that Anthony’s Management Accounting was “the first widely used business textbook to advocate DCF [discounted cash flow] methods.” She adds, “Spurred by the writings of Joel Dean and Robert Anthony, and led by the oil and chemical industries and large professional bodies such as the National Association of Accountants, most large multidivisional corporations adopted decentralized capital budgeting systems based on DCF methods.”

In the third edition of Management Accounting, published in 1964, Anthony employed the term, “goal congruence” (1964a, 362). Charles T. Horngren believes that this was the first use of the term in the accounting literature (1989, 28, fn. 4), yet the concept had been used earlier by others (see Becker and Green [1962] and Benston [1963]).60 By this term, Anthony meant that the control system “should be structured so that the goals of people in the organization are, so far as feasible, consistent with the goals of the organization as a whole” (1964a, 362). By 1969, other cost and management accounting textbook authors were citing the concept themselves, yet its use soon became controversial (see Parker 1976).

Anthony’s emphasis on the importance of employee motivation was already evident in the 1950s. In 1955, he was a forceful member of an American Accounting Association (AAA) Committee, which issued a statement on cost concepts useful to management for planning and control purposes (Committee on Cost Concepts 1956).61 He later said, proudly, that this was the first statement by an AAA committee to accord formal recognition to the behavioral aspect of accounting. He further said, “While previous reports on cost had focused on such concepts as ‘truth’ and ‘accuracy,’ this was the first to emphasize ‘motivation’” (1973, 56). He called for the behavioral aspect of accounting to “be researched jointly by accountants and social psychologists” (56). He wrote:

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58 Harry V. Roberts, a reviewer of the revised edition in 1955, wrote, “To my knowledge it is the best generally available discussion of the lease or purchase decision” (1955).
59 By the early 1950s, almost all financial accounting textbooks contained present value tables, but they went only as high as 6 or 7 percent. It was unusual for cost accounting texts to contain the tables.
60 Becker and Green employed the term, “goal acceptance” (397). The author is grateful to Jacob Birnberg for drawing his attention to these articles.
61 For his view on the committee’s report, see Anthony (1957).
One of the most insidious half-truths floating around our profession today is the idea that the manager is a resource allocator. Such an attitude implies that the management process is fundamentally a matter of economics without taking into account that a vital component of the management process is that of working with people. This behavioral aspect is at least as important as the economic aspect (55). 62

Anthony’s book, with coauthors, is now in its 11th edition.

Harlan and Vancil on “Accounting Policy”

A casebook published in 1961 exemplified a novelty, first identified in 1942, in the teaching approach to accounting at the Business School. 63 Cases in Accounting Policy, by Neil E. Harlan and Richard Vancil, pointed toward the management decision of how to choose an accounting policy when Generally Accepted Accounting Principles did not give a definitive answer. 64 This was prior to the 1970s when, in times of frequent unwelcome takeover bids and the pressure wrought by consensus analyst forecasts of income statement figures, company managers aggressively managed earnings by attuning their accounting policies to strategic and tactical aims. During the comparatively serene 1950s and 1960s, management’s choice of an accounting policy was, it seems, rather more objectively taken, with the aim of providing better information to outside parties. While Harlan and Vancil said that “a primary role in the formulation of the underlying accounting policy is assumed by the company’s chief accounting officer or by its independent public accountants,” they made it clear that “the ultimate responsibility for such a decision rests with management” (1961, 2). Hence, management’s interest in the company’s financial statements was not only for the feedback it provided when assessing performance but also when making choices of accounting policy. The Harlan and Vancil book was the first publication to deal squarely with this management decision-making issue. By the 1970s, a spate of casebooks on accounting policy choice began to appear.

Hawkins’ Corporate Financial Reporting

In 1971, David Hawkins published Corporate Financial Reporting: Text and Cases, also with Irwin. 65 By then, any altruism of managements’ motivations when deciding on accounting policy was being called into question. Hawkins’ book, for which, he said, “Professor Walter Frese provided the pedagogical and corporate-reporting-philosophy foundation” (1971, xiv), followed in the genre marked out by Harlan and Vancil in their casebook ten years before. In his text- and casebook, Hawkins invited the student “to assume the

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62 Anthony, unlike other management accounting researchers, did not point to Chris Argyris’ 1952 monograph for The Controllership Foundation, The Impact of Budgets on People, as important research. In fact, he was critical of Argyris’ research because, he said, it was clear from an article drawn from the monograph that it was a study of three companies’ manufacturing plants that “used the old-fashioned imposed type of budget, one dictated by top management without the full participation of the operating personnel.” Therefore, Anthony said, Argyris was bound to find “that the budget did not produce good results in these three companies” (1960, 68).

63 For the previous reference to “accounting policy” in an HBS course, see the extract from the course description for Accounting Control, above. For an “accounting policy” course offered at MIT as early as 1934–35, see below.

64 The publisher of the Harlan and Vancil book was Prentice Hall, Inc. After decades in which The Ronald Press Company was the leading U.S. publisher of accounting books, Richard D. Irwin, Inc. and Prentice Hall, Inc. seized the initiative as the leaders following the war, and they created new markets. Prentice Hall also published Russell H. Hassler and Neil E. Harlan’s Cases in Controllership in 1958 (which grew out of the course Hassler created in 1952–53, Administration and Review of Accounts). Hassler and Harlan said that their book was not about “what controllers do,” but “is designed to show what the controller function, in its broadest management sense, is” (1958, 4).

65 In 1969, Anthony had succeeded the late Willard J. Graham as the consulting editor of Irwin’s series of books on accounting.
role with a real sense of the professional and personal involvement of top management in a particular situation responsible for issuing financial data to the public” (1971, xiii).

Anthony and Herzlinger’s Textbook on Nonprofits

In 1975, Irwin brought out Robert Anthony and Regina E. Herzlinger’s Management Control in Nonprofit Organizations, which the reviewer in The Accounting Review said was a book “focusing attention on a vital but heretofore neglected area” (McKinney 1976, 934). Herzlinger writes that the book “revolutionized the curriculum in many schools of public administration and public health.” Previous textbooks in the field had focused on “fund accounting.” The book by Anthony and Herzlinger shifted the focus to issues of control and introduced case-based instruction in a setting where most of the instruction had been conducted with lectures.

Other HBS Text- and Casebooks

Between 1962 and 1965, Irwin published three additional books by the Control faculty: Managerial Economics: Text and Cases (1962), by Harlan, Christenson, and Vancil; Management Control Systems: Cases and Readings (1965), by Anthony, John Dearden, and Vancil (mentioned again below in the section on courses in information systems); and Management Accounting Principles, by Anthony (1965a). Most of the Irwin books have gone through numerous editions. In 1964, Addison-Wesley Publishing Company, Inc. put out Anthony’s Essentials of Accounting, a programmed text, which also came out in many editions.

No other business school has been the source of as many textbooks on accounting and information systems (see below) as HBS.

While text- and casebooks propagated the HBS approach to teaching accounting, it seems that few other business schools, during the first 15 years after the Control course was launched, instituted a single course in which accounting, statistics, and managerial economics were covered (Taking the mystery 1961, 28). It must have been seen as too much for a single course and for the instructors.

One such school was Carnegie Institute of Technology’s Graduate School of Industrial Administration (GSIA). In 1968, Yuji Ijiri and Robert S. Kaplan taught Quantitative Controls in Business, which had previously been offered by William W. Cooper, a course whose coverage included both accounting and statistics. Kaplan put an end to this combined coverage, and instead accounting and statistics came to be taught in separate courses. Kaplan recalls, “my experience was that even though both accounting and statistics were measurement and aggregation approaches that provided useful management information from more atomistic data, the two fields had different conceptual foundations and techniques. I couldn’t see the gain from teaching the two courses together; that is, there was no theorem or practice in statistics that helped to explicate a theory or practice in accounting, and conversely.”

ICCH

A very important means of disseminating business cases, written at HBS as well as elsewhere, was the Intercollegiate Case Clearing House (ICCH). It was launched in 1957

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66 Communication to the author from Regina E. Herzlinger, dated April 5, 2008.
67 One should not overlook the book by a HBS doctoral graduate in accounting who moved to the management department of Northwestern University: Richard L. Smith, Management Through Accounting, published by Prentice Hall, Inc. in 1962. Only one edition, however, appeared.
by a $120,000 Ford Foundation grant to the American Association of Collegiate Schools of Business (AACSB) and was based at the Harvard Business School (The American Association 1966, 15). ICCH, together with the Business School faculty’s casebooks, have made a rich supply of case material available to academics around the world.

Howard Raiffa’s Institute of Basic Mathematics in 1959–60

In 1959–60, Howard Raiffa, a mathematician who joined the Business School faculty in 1957 and who pioneered the development of statistical decision theory, led a year-long Institute of Basic Mathematics for Application to Business, held at the Business School and financed by the Ford Foundation, to educate business school faculty from around the country in the new mathematical tools. It was said to have produced a major impact on those who attended (Khurana 2007, 265). Raiffa’s Institute was one of the outgrowths of the Ford Foundation-sponsored report published in 1959, mentioned above.

Anthony’s Planning and Control Systems, the Course Work in Information Systems, and its Broader Impact

In 1965, the Business School published Robert Anthony’s Planning and Control Systems: A Framework for Analysis. His framework juxtaposed and conceptualized the three processes of strategic planning, management control, and operational control, and information systems could be seen as the “fourth leg” of his framework. His book did much to establish management control as a field of study. Robert Beyer, a senior partner in the accounting firm of Touche, Ross, Bailey & Smart, reviewed the book for The Journal of Accountancy, and wrote that it was “a major contribution to the field of management planning and control systems” and was “a pioneering effort” (1966, 87). Gordon B. Davis, a pioneering academic in information systems, has written that Anthony’s framework “was clearly the most influential organization model for planning and designing a portfolio of applications for computer systems in organizations.” Anthony’s book, he said, “was one of the most widely cited in the research literature as Management Information Systems developed into a field of academic study.”

In his book, Anthony wrote that, while there were a number of books with “Accounting Systems” in their titles, “they do not discuss the use of accounting information in management control or operational control processes, but rather techniques for collecting and summarizing information as efficiently as possible” (1965b, 98). He used as an example a textbook entitled Accounting Systems for Management Control, which, he said, occupied only 100 of its 450 pages with the management control process, the rest dealing with “information handling.”

Perhaps stimulated by the early development of the ideas that led to Anthony’s 1965 book, John Dearden and Richard Vancil, among others on the Control faculty, joined Anthony to begin developing a stream of courses on management information and control systems. Dearden and Walter Frese offered the first full systems course, Management Information Systems, during the spring term of 1962–63, “with special emphasis on the way

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69 See also Copeland (1958, 237).
70 Anthony previewed his thinking in an article, “Framework for analysis” (1964c).
71 Yet Johnson and Kaplan (1987, 168–169) say that Anthony’s framework was “foreshadowed more than a decade earlier by Herbert Simon’s investigation of the controllership function in decentralized organizations.” The earlier study was Simon et al. (1954).
that [modern data-processing] techniques influence the information available to manage-
ment” (in the course description).73 The offering was, at least in part, an outgrowth of a
new full-year course taught by Dearden in 1961–62, Cost Administration, which concerned
“cost accounting, expense budgets, and management information systems.” The systems
end of the course covered “cost accounting systems, computers and related data process
techniques, and the application of computers in management information systems.”74 In a
1994 interview, Dearden, who had come to HBS in 1959 following ten years as a cost
accountant in Ford Motor Company’s finance department, said, “When I first came to
Harvard, programming and computers were just emerging. Since I was one of the few
people who knew about this technology and its application to business from my work at
Ford, I developed a course in management information systems” (quoted in Harvard Busi-
ness School Professor 2004). Prior to coming to HBS in 1957, Frese had held several
positions in the U.S. Government, including director of the General Accounting Office’s
(GAO) accounting systems division.75 While at the GAO, he headed an interagency joint
accounting improvement program. The main outcome of this program was legislation re-
quiring all federal agencies to develop and adopt business-style accounting and budgetary
control systems.76

The 1963–64 offering of Management Information Systems, taught by Dearden alone,
carried the following passage in its description, “This course seeks to develop an under-
standing of how modern, data-handling equipment and processes can be used to provide
management with more relevant, more timely, and less costly information. ... The emphasis
in the course is on the manager’s problems rather than the technician’s problems.”77 The
tenor of this course carried forward the thinking of the Control faculty that the primary
focus should be on the management use of information, not on data-gathering techniques.
The course became a staple in the second-year curriculum until 1976–77, with evolving
course descriptions and an array of instructors. Beginning in 1977–78, the subject seemed
to bob in and out of the curriculum under somewhat different titles, reflecting, apparently,
the emphasis preferred by different instructors.

In 1963–64, Anthony offered Planning and Control Systems for the first time, with the
same title as his forthcoming book. The description included the following sentence:
“among the topics discussed are measurement of divisional performance, transfer pricing,
considerations relevant to setting up investment centers and profit centers, the control of
managed costs (such as research/development and administrative costs), long-range plan-
ning systems, and techniques for appraising internal investment opportunities.”78 The course
adapted freely from managerial economics and reflected the emerging interest in decen-
tralization (see below).

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73 HBS Course Catalogue, 1962–63, p. 50.
management information systems. HBS Course Catalogue 1962–63, p. 44.
75 “Walter F. Frese, Resume of Education and Experience,” p. 2 (Walter F. Frese Papers, GC 407, used with the
76 Communication to the author from Charles Christenson, dated March 17, 2008.
77 HBS Course Catalogue, 1963–64, p. 43.
78 HBS Course Catalogue, 1963–64, p. 43. Computers may have been a mystery to most HBS students in 1963–
64. In their January 10, 1964 issue, the editors of The Harbus News, the student-run weekly newspaper, ran a
long article, “Computers—Some history and background,” which began, “What is a computer? How does a
computer differ from a calculator?” (p. 2).
In 1964–65, Anthony gave the first course entitled Management Control Systems, and it too became a standard-bearer among the electives. This course seemed to be mostly a continuation of his Planning and Control Systems under a new title.

In 1965, Anthony, Dearden, and Vancil published, with Irwin, Management Control Systems: Cases and Readings, which immediately placed teaching materials reflecting the HBS approach into the hands of instructors at other institutions. The book has gone through a dozen editions, testifying to the extent of its impact. The following year, Dearden and F. Warren McFarlan published, again with Irwin, Management Information Systems: Text and Cases, which synthesized the group’s work thus far and laid the foundation for the next several decades of the general management approach to the management of information.

From 1965 to 1968, Anthony served as Assistant Secretary (Comptroller) in the Department of Defense under his former accounting colleague, Defense Secretary Robert McNamara. While there, Anthony headed “a mammoth effort to develop and install a new accounting and control system that for the first time made it possible to evaluate the costs of similar initiatives among the different branches of the armed forces” (quoted in Harvard Business School Professor 2006).


John Dearden stirred up a hornet’s nest with his article, “MIS is a mirage,” in the Harvard Business Review, January–February 1972, in which he argued that management’s information needs are too heterogeneous and multi-layered to be served effectively by a single, totally integrated management information system. Instead, he said, a grouping of systems should be patterned on management’s diverse information needs. Haigh (2001, 48) has written that Dearden was the “most vociferous critic” of totally integrated management information systems.

In 1981, the systems faculty left their accounting colleagues in the Control group and formed their own teaching group.

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79 HBS Course Catalogue, 1964–65, p. 46.
80 The reviewer for The Accounting Review (Harwood 1966, 602) commented that the book was not on “systems” at all. He quoted from the authors’ page 11: “The formal management control system is only a part of the management control process, actually a relatively unimportant part.”
81 HBS Course Catalogue, 1964–65, p. 46.
82 HBS Course Catalogue, 1967–68, p. 60.
84 HBS Course Catalogue, 1969–70, p. 61.
Anthony, Dearden, and Vancil on Decentralization

In addition to Robert Anthony's writings, John Dearden and Richard Vancil wrote extensively on decentralization from the 1960s onward. In the 1950s, a literature on transfer pricing, decentralization, divisionalization, profit centers, and investment centers began to build. An important study in 1954 by Simon et al. advanced the following three-part characterization of the roles of management accounting: score-card, attention-directing, and problem-solving uses (1954, 3–4 and ch. 3). Shank (1989, 54) has written that the objectives implicit in these roles “still come through in today’s textbooks.”

This literature addressed, among other things, whether decentralization of profit responsibility was a sound course to follow and which performance measures were best suited to assess divisional profitability (see Dearden 1962b). One of the major works was David Solomons’ award-winning study, Divisional Performance: Measurement and Control, published in 1965 by the Financial Executives Research Foundation (FERF). In his study, Solomons cited several recent articles written by Dearden in the Harvard Business Review.87 For his part, Vancil published a major FERF-sponsored study, Decentralization: Managerial Ambiguity by Design, with Dow Jones-Irwin in 1979.88 Vancil’s research interests were then in what he called “management systems broadly defined, ... which includes organization design and measurement and then the process of management—the relationship between managers at the corporate and divisional levels in large corporations, and how these people work together.”89 Anthony, Dearden, and Vancil addressed these issues in the successive editions of their Management Control Systems: Cases and Readings (1965).

In 1959–60, Anthony offered a Research Seminar in Return on Investment,90 and in 1962–63 Anthony and Vancil taught Profit Planning and Control, which included a section dealing with “problems in the evaluation of performance of profit-responsible managers, and the effect that profit-center reporting has on the actions of these men.”91 In subsequent years, these topics relating to decentralization were taken up by Anthony and others in the control systems courses.

Given Anthony’s well-known view on the centrality of motivation, it was not surprising that he said in a 1965 conference that “purely mathematical models of transfer pricing are of little use because they leave out the behavioral aspects which are so important in any real transfer pricing situation” (1966, 265).

Assessment of Anthony’s Contribution

Robert Anthony was the leading figure in the Control group from the 1950s to 1982, when he retired from the faculty. Charles Horngren affirms that Anthony, through his textbooks and his influential study, Planning and Control Systems: A Framework for Analysis (1965b), “was a pioneer in emphasizing the importance of motivation issues in the design of management control systems.”92 Anthony’s longtime colleague, Charles Christenson, has written, “Bob did more than anyone else to introduce a conceptual structure to management control. ... His 1965 book, Planning and Control Systems, became the bible of the field” (quoted in Harvard Business School Professor 2006).

87 Solomons (234, fn. 2) praised Dearden’s Cost and Budget Analysis, published by Prentice Hall, Inc. in 1962.
88 For a review of Vancil’s study, see Colson (1981).
90 HBS Course Catalogue, 1959–60, p. 46.
91 HBS Course Catalogue, 1962–63, p. 54.
Reform of the DBA Program in Control

After becoming Business School Dean in 1970, Lawrence E. Fouraker wanted to build a more rigorous research component into the DBA program. Most of the previous DBA theses were of a case-study type or were historical studies. In 1975, at the request of the Control faculty, Fouraker hired William W. Cooper, one of the founding faculty at Carnegie-Mellon University’s GSIA, to help revise and coordinate the DBA program in accounting and Control. He began offering a Research Seminar in Planning, Accounting and Accountability Systems. The exposition of advanced quantitative methods in the seminar, together with guidance and supervision by Cooper—and by Joseph G. San Miguel in his own doctoral research seminar—led to several doctoral theses using such techniques as data envelopment analysis, statistically designed experiments, game theory, and empirical research methods to produce enriched findings in real-world management settings. One of the first such theses was by Vijay Govindarajan in 1978, entitled “Behavioral effects of audits in health care services—A study using ‘exploratory data analysis’ and classical statistical techniques,” which examined the control effects of audits on the behavior of professional health care providers. Cooper’s idea was to wed the Business School’s comparative advantage in field research with these analytical techniques, thus enhancing the generalizability of the findings.

In 1980, Cooper left for The University of Texas at Austin.

CURRICULAR DEVELOPMENTS AT MIT

A textbook published in 1951, Accounting: A Management Approach, by Ronald H. Robnett, Thomas M. Hill, and John A. Beckett (whose publisher, Irwin, was Robert Anthony’s publisher as well193) also adopted a focus on the management uses of accounting information. The three authors were at Massachusetts Institute of Technology (MIT). All three, as it happened, held MBAs from the Harvard Business School. Robnett had taught Accounting Control with Anthony and others at the Business School as a visitor in the second half of 1941–42.94 Together with Wyman P. Fiske, another Harvard MBA who had taught accounting at the Business School from 1923 to 1928, Robnett, and Charles H. Porter95 offered a number of management- and user-focused courses in accounting for MIT undergraduates in the 1930s and 1940s.96 Hill and Beckett began as assistant professors of accounting just after the war. Porter (not a Harvard MBA) was Professor of Accounting until his retirement in 1945.

Beginning in 1934–35, the MIT accounting faculty offered a course entitled Problems in Accounting Policy, whose course description said, “All problems will be approached from the administrative viewpoint, and the application of analytical methods to financial data will be stressed” (Catalogue 1934, 293).97 The course continued to be offered until

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93 As Anthony makes clear in his “Reminiscences” (1989, 2), Richard D. Irwin was an innovator, and his company became the largest publisher of business books.

94 Box BR7022, Box 9 Registrar, Grades 1938/39–1942/43, in folder labeled “Midyear 1942 June Grades” (used with permission of the HBS Registrar’s Office).

95 In 1935, Porter and Fiske published the textbook, Accounting, with Henry Holt and Company. Intended for students who were not planning a career in public accounting, the book’s treatment of bookkeeping technique was kept to a minimum. The authors’ aim was to emphasize “the interpretation of accounting data and to train the student in analysis” (1935, iii). The authors said that they had been using the material in the book as a basis for instruction at MIT for over five years (1935, iii).

96 During 1945, when the Harvard Business School’s MBA program was closed down during the war, one of HBS’s accounting professors, Arthur W. Hanson, taught as a lecturer at MIT.

97 In its course catalogues prior to the 1960s, MIT did not indicate the names of the instructors for courses.
1953. This is an exceptionally early appearance of a course on “accounting policy.” In one of the accounting courses, Analysis of Business Statements, the MIT faculty used cases, which were not all that common in business schools then (Catalogue Issue 1937, 155).

The Robnett et al. textbook underscored the primacy of management as user when it said, “The first, and in many respects the most important, business interest served by accounting is management” (1951, 6). Anthony was aware of the approach to accounting instruction at MIT in the 1940s: he wrote (1989, 2), “At about the same time [as Harvard instituted the Control course], a similar course was introduced at MIT by Doc Robnett, Tom Hill, and John Beckett.” Yet there is no evidence in the MIT course catalogues that a course combining accounting and statistics, such as HBS’s first-year Control subject, was offered in the 1940s.98 From 1930–31 until the 1950s, MIT did offer an undergraduate course entitled Control Through Business Records (later called Problems in Accounting Control), but the stated course content did not parallel any of the work in Control at HBS (Catalogue 1930, 223).

Subsequent editions of the Robnett et al. textbook were written by Hill, Myron J. Gordon, Gordon Shillinglaw, and Philip E. Meyer. Both Gordon and Shillinglaw had taken PhDs in economics, and they taught at MIT from the mid-1950s to the early 1960s. But the Harvard Business School influence in the MIT teaching and in the textbook by Robnett, Hill, and Beckett cannot be gainsaid. It should also be mentioned that, unlike undergraduate programs in business at most other universities, MIT’s did not purport to prepare students for the Uniform CPA Examination. Its faculty opted to emphasize interpretation, analysis, and management uses.

In 1961, Irwin published a major textbook, Cost Accounting: Analysis and Control, by Gordon Shillinglaw, then still at MIT (just prior to leaving for Columbia University). In the preface, he wrote that the primary concern of his book, unlike cost accounting books then in print, was “with the management uses of cost accounting information. Other texts now available give primary emphasis to accounting procedures and to the relationship of cost to reported company income and the balance sheet valuation of inventories. ... Managerial needs have not been totally ignored, but they have typically taken second place to financial accounting requirements. In short, previous texts have been written primarily as technical manuals for the professional accountant-to-be, the future purveyor of cost accounting information” (1961, ix).99

INFLUENCE OF THE UNIVERSITY OF CHICAGO

Faculty members at the Harvard Business School were not the only pioneers in the development of management accounting as the successor to the traditional approach to cost accounting. Even earlier, there was important creative activity being done at the University of Chicago as well.

Classic Treatise by J. M. Clark (1923)

A famous early discussion of the concept of cost was written by an economist then at Chicago, John Maurice Clark, in his 1923 book, Studies in the Economics of Overhead

98 A unique course entitled Accounting, Production and Marketing, which was restricted to Sloan Fellows, was offered beginning in 1949–50 (Catalogue for 1949–1950 1950, 132).

99 Another book in this genre was Carl L. Moore and Robert K. Jaedicke, Managerial Accounting, published by South-Western Publishing Company in 1963. As mentioned above, Jaedicke taught at the Business School from 1958 to 1961.
Costs, published by the University of Chicago Press. Clark has told this writer that his main purpose in writing the book was to provide teaching materials in an area where there was much misunderstanding. In his famous Chapter 9, “Different costs for different purposes: An illustrative problem,” he counseled that “there is no one correct usage [of cost], usage being governed by the varying needs of varying business situations and problems” (1923, 175). He diplomatically suggested that “the accountant should know the meaning of cost from the standpoint of disinterested economic science, because it embodies, in a sense, that impossible goal to which his practical devices serve as approximations” (1923, x). He then proceeded to demonstrate how the concept of cost would be different in nine typical problem areas in the successive stages, from conception to abandonment, of a plant to manufacture a homogeneous product. Clark’s book seems to have been largely ignored by writers on cost accounting until 1938, when William J. Vatter, then a research assistant at the University of Chicago, wrote a chapter in which, without citing Clark, he made precisely the same argument, at the end of a tradition-encrusted cost accounting textbook, published by Business Publications, Inc. (predecessor of Irwin). Obviously, Vatter was profoundly influenced by Clark. Following Clark, he adopted the theme, “different costs for different purposes” in the chapter and then illustrated the argument with a series of case situations. Vatter later said that the editorial adviser to the publisher, Willard J. Graham (an accounting professor at Chicago), “insisted” that he write the chapter to be inserted at the end of the book.

In 1950, Carl Thomas Devine, then at the University of Southern California, published Cost Accounting and Analysis with The Macmillan Company. He may have been the first of the authors of a cost accounting textbook to treat the ramifications of Clark’s analysis (in Chapter 30, “Cost—Variations of the concept”).

McKinsey’s Managerial Accounting (1924)

In 1924, one year after the appearance of Clark’s book, James O. McKinsey, an associate professor of accounting at Chicago who later founded the consulting firm which bears his name, wrote volume I of a textbook entitled Managerial Accounting. McKinsey’s publisher was, like Clark’s, the University of Chicago Press. In the preface, McKinsey said he “regards this text as but a humble beginning in the development of accounting literature

100 For an incisive review of the book, 40 years later, see Davidson (1963). Also see Frank (1990). The Business School’s J. Hugh Jackson reviewed Clark’s book in the March 1925 issue of The American Economic Review, but he adopted the somewhat skeptical view of the accountant. Thomas H. Sanders, in his 1923 textbook, Problems in Industrial Accounting, referred several times to Clark’s book but did not build on his “different costs for different purposes.” Hence, members of the Business School’s accounting faculty were aware of Clark’s work, but it is not known whether they brought much of it into their accounting courses. In a colloquy with Ronald Edwards and Ronald Coase in 1939, Sanders seems to have been wedded to allocating costs to joint products for pricing purposes (Sanders 1939, 518–522).

101 Conversation with John Maurice Clark, September 1962.

102 Clark wryly observed, “it is not easy for people trained in this sort of accounting [i.e., allocating costs to all eventual products], where the whole is necessarily equal to the sum of the parts, to take up the very different kind of analysis involved in a study of differential costs” (1923, 207).

103 The book was Cost Accounting: Principles and Practice, by John J. W. Neuner, an associate professor at the College of the City of New York. The chapter was entitled, “A re-examination of cost accounting from the managerial viewpoint.” See also Vatter (1945).

from the managerial point of view” (1924, xiv). The book was virtually devoid of accounting technique and instead was a manual on what executives can learn from financial statements and how a business management can organize operations to achieve effective controls, including budgetary control. It was the first U.S. accounting textbook carrying this title.105 A second volume never appeared. In his review of the book, W. A. Paton said that McKinsey was “justified in insisting upon the importance of the managerial point of view for the college student of accounting. Certainly it has been true that our courses in accounting have been unduly influenced by the needs and interests of the public accountant in his rather narrow auditing capacity” (1925, 471).

Vatter’s Managerial Accounting (1950)

In 1950, Prentice Hall, Inc. brought out a “preliminary” edition of William Vatter’s Managerial Accounting (which was not reviewed in The Accounting Review).106 In sharp contrast to most cost accounting textbooks until then, Vatter’s book discussed data-gathering and classifying procedures entirely in the context of facilitating managerial decision making, not as if the concatenation of procedures were ends in themselves. He wrote that “The materials presented here have been designed to emphasize basic conceptions rather than merely to describe procedures” (1950, 510). Each chapter contained a logical explanation of why and how accounting analysis contributes to the making of decisions. He wrote, “One of the purposes of this book is to help the reader bridge the mental gap between dollars and cents shown in accounting statements and reports, and the things that are the real substance of managerial action” (1950, 5). Vatter adopted J. M. Clark’s notion of “different costs for different purposes” throughout. He wrote that “the meaning of a concept is to be found in the operations involved” (1950, 9). He distinguished the work of the accountant as statistician, that is, producing information for a unitary purpose, from that of tailoring accounting information to the particular class of decision to be made, the specific purpose at hand.107 In the late 1940s, prior to publication of the book, Vatter experimented with his manuscript in his accounting courses at the University of Chicago (Vatter 1950, v; Horngren 1991, 234).

Horngren’s Cost Accounting (1962)

Vatter’s impact became further evident in the Chicago PhD program. George J. Staubus, Charles Horngren, David Green, Jr., and George H. Sorter, among others, were Vatter’s doctoral students, and their writings were true to his influence. Staubus pioneered “decision usefulness” accounting,108 and Sorter and Horngren argued for “the relevant costing approach” to asset recognition (1962). Horngren had studied in a traditional undergraduate accounting curriculum and became a CPA, following which he completed an MBA at Harvard in 1952. He had thus been exposed to “the administrative point of view” of accounting, not just to the accountant’s point of view of accounting. At Harvard, his concept of proper accounting was shaken by an article he read that espoused the superiority of

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105 In the same year, James H. Bliss, a company controller, wrote Management Through Accounts, published by The Ronald Press Company, which had the main purpose of showing businessmen how to analyze and use financial statements and other data derived from the accounts.

106 Vatter was not convinced that the manuscript was ready for publication but acceded to the publisher’s blandishments to put it out in provisional format, in paperback and without an index. “The book was reprinted eighteen times before Professor Vatter called a halt in 1962” (Horngren 1991, 234). Vatter’s book was reprinted again in 1986 by Garland Publishing, Inc.


108 For a retrospective on his work, see Staubus (1999).
“direct costing” over the long-practiced absorption costing to determine product cost. Then he entered the Chicago PhD program, where he was treated to Vatter’s “relevant v. irrelevant costs,” which again struck Horngren as pure heresy. He taught Vatter’s book at Chicago and soon was won over by the need to emphasize decision making and concepts over accounting technique (Horngren 1999, 21–22). In 1962, Prentice Hall, Inc. brought out Horngren’s *Cost Accounting: A Managerial Emphasis*, which eventually came to dominate the field (with coauthors, is currently in its 13th edition). The book was dedicated to Vatter, as it was inspired by his *Managerial Accounting*. In the preface, Horngren wrote, “This book’s goal is to put cost accounting in focus as a highly developed quantitative device for helping managers to select and reach their objectives” (1962, vii). He said that the major theme of the book was “different costs for different purposes” (1962, vii). The reviewer of the book in *The Accounting Review* wrote, prophetically: “This is one of the new wave of cost accounting texts which are transforming the subject from a concentration on inventory costing systems into a dynamic study of accounting’s role in planning and control. This book is certain to have a major part in this transformation” (Enke 1963, 217).109

Horngren and Robert Anthony came to know each other during the Ford Foundation-sponsored four-week seminar, New Developments in Business Administration, held in July–August 1961 in Williamstown, MA. Anthony taught a one-week course, and Horngren taught a four-week course that was based on the manuscript for his cost accounting textbook.110

**Goetz’s Managerial Approach (1949)**

Another influence emanating from Chicago was the crusading work of a much underappreciated accounting academic, Billy E. Goetz. After 20 years as an academic and management consultant, he obtained a PhD from Chicago in 1949, and McGraw-Hill Book Company, Inc. published his doctoral dissertation under the title *Management Planning and Control: A Managerial Approach to Industrial Accounting* (1949). William Vatter is among those whose advice and assistance he acknowledged in the preface (1949, viii).111 The book was an academic appeal for the need to focus accounting on the decisional needs of management. He wrote bluntly: “Accounting is an expensive tool, of no value in itself. Its values are derived wholly from the importance of its [managerial] objectives and its success in attaining these objectives. ... The managerial objectives of accounting are to provide data to help management plan and control operations” (1949, 4). His criticism of the way cost accounting was being done was withering: “Because it is misconceived, is misdirected, and attempts the impossible, traditional cost accounting is at once overelaborate, inadequate, and misleading” (1949, 137). His book draws heavily on the economics and accounting literature to demonstrate his argument. Goetz chose his subtitle carefully: “Managerial is intended to exclude the legal-financial aspects of accounting. *Industrial* removes from consideration banks, governments, wholesalers, retailers, insurance companies, brokerage houses, and public utilities. *Accounting* eliminates engineering from the area analyzed in this study” (1949, 8). Goetz’s dissertation underpinned his textbook, *Accounting in Action*:

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109 Vollmers (1996) counters the argument that early cost accounting textbooks focused mostly on inventory costing. Nonetheless, the derivation of inventory cost for inclusion in financial statements was an important agenda item in many early cost accounting textbooks.
111 A claim of Chicago influence on Goetz may be tenuous, however. In his preface, he states, “This book has been in the making for twenty years. It has been written and rewritten, thrown away and started over” (1949, vii).
Its Meaning for Management (with Frederick R. Klein), published in 1960 by Houghton Mifflin Company. Goetz spent most of his remaining academic career at MIT.

Bierman’s Managerial Accounting (1959)

A doctoral student of William A. Paton’s, Harold Bierman, Jr., published Managerial Accounting: An Introduction in 1959 with The Macmillan Company, which was divided into two parts: financial and managerial accounting. Especially in the latter part, the author emphasizes management uses and distinguishes between relevant and irrelevant costs. Prior to joining the Cornell University faculty in 1956, he spent a fruitful year at Chicago, where William Vatter and his colleagues and PhD students helped shape his thinking. At Chicago, he taught from Vatter’s Managerial Accounting, which, he has said, was a “major influence” in the writing of his own book.112

The Influential Work of Demski and Hopwood

Two doctoral students at Chicago in the 1960s made major contributions to management control and broadly to accounting during their long careers. Joel Demski completed his doctorate in 1967, and Anthony G. Hopwood finished his in 1970. Horngren was Demski’s doctoral supervisor and played a “huge” role in his development.113 Demski’s subsequent research consisted of path-breaking work on applications of information economics and agency theory to accounting, demonstrating rigor and originality (see Feltham 2007). Hopwood, whose PhD dissertation was a benchmark for field research studies in accounting, founded the leading journal, Accounting, Organizations & Society, in 1976, and has been its editor and a leader in behavioral accounting research, drawing expansively on the social sciences and humanities.

EARLY INFLUENCE FROM GREAT BRITAIN

In the 1930s, two academics at the London School of Economics (LSE) wrote penetrating articles on the relevance of opportunity cost for business decisions: Ronald S. Edwards and Ronald H. Coase. As this paper is concerned with the developments in the United States, readers are invited to consult the discussion of the LSE initiatives in other sources.114 These writings did not seem to have any noticeable effect on teaching and textbook writing in the United States, other than perhaps at the University of Chicago.

David Solomons, a student at the LSE in the 1930s, was much influenced by Ronald Edwards. Solomons emigrated to the United States in 1959, joined the faculty at the Wharton School, and proceeded to make major contributions to both management and financial accounting (Zeff 1993, 103–104; 1995).

REVIEW OF THE CONTRIBUTIONS OF HBS’S INNOVATIONS IN ACCOUNTING AND CONTROL

The Harvard Business School was a major leader in the movement away from the traditional and narrow approaches to teaching financial and cost accounting. Previously, financial accounting was oriented almost entirely toward preparing students to become CPAs, and cost accounting toward preparing cost accountants. Managerial uses of accounting were mentioned in cost accounting textbooks, but usually only tangentially. Even today,

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112 Interview with Harold Bierman, Jr., September 26, 2007.
113 Communication to the author from Joel Demski, dated July 30, 2008.
most of the teaching of financial accounting in U.S. universities continues to be focused on prepping students to take the Uniform CPA Examination and to becoming CPAs. Cost accounting, however, has largely been supplanted by management accounting.

Beginning in the late 1930s, Ross Walker was the principal driver of the control orientation in the curriculum, and the Business School, through its teaching and text- and casebooks, brought both financial and management accounting firmly within the province of management. Robert Anthony and others struck the chord that the chief *raison d’être* of accounting was to facilitate management planning and control, both at the middle and upper levels. They developed cases to bring out the real-world applications of the uses of accounting to make decisions leading to management action, and one of the Business School’s major contributions was supplying academics around the world with a bountiful collection of cases that could illuminate the management uses of accounting. The authors of the text- and casebooks, as well as ICCH, by disseminating materials that were developed for their courses taught in the Business School, did much to hasten acceptance of the newly re-oriented field of management accounting.

While colleagues at MIT (all but one having been recipients of an MBA from the Business School) took similar strides toward focusing on the management uses of accounting in the 1930s and 1940s, and also published a textbook embodying their approach, their impact on academics at other universities did not match that of Harvard. Nor did they supply case materials.

Although the Business School was in the vanguard of change, William Vatter at the University of Chicago also played a major innovative role in the field of management accounting, directly through his *Managerial Accounting* (1950) and indirectly through Charles Horngren’s immensely successful *Cost Accounting: A Managerial Emphasis* (1962). Gordon Shillinglaw, first at MIT and then at Columbia, was also an important pioneer in this area, but his textbook, *Cost Accounting: Analysis and Control* (1961), did not sweep the market as did Horngren’s.

Another important innovative thrust by the Business School, not as well appreciated as that in management accounting, was in financial accounting. This was in two respects. First, the Business School, again under Ross Walker’s tutelage in the late 1930s, refocused the core Accounting Principles course primarily toward providing management with information to assess the effectiveness of its policies as well as in laying its plans, in addition to fulfilling management’s traditional obligation to report to owners and outside parties. This predominant emphasis on the management use of financial accounting reports has continued in the first-year Control course ever since its inception in 1946. Second, beginning in the 1950s, the accounting faculty came to identify management’s important role in choosing accounting policies that would effectively communicate its financial information—in the balance sheet and income statement—to outside parties. Both of these reorientations of financial accounting were strong elements in the Business School’s curriculum, and through its faculty members’ text- and casebooks came to be exported to business schools elsewhere.

Today, accounting policy choice is a major subject of accounting research.

Beginning in the 1960s, the innovative work in information and control systems, which emphasized the management uses of information and not processing techniques, became a major thrust, both in terms of teaching and text- and casebook writing. Also in the 1960s, the faculty began contributing to the increasingly busy literature on the impact of company decentralization on performance measurement.
APPENDIX

HBS Faculty Who Taught Accounting Prior to 1980—Arrayed by When They Joined the Faculty
(one-year visitors and part-time faculty are omitted)

William Morse Cole 1908–33 (died 1960)
William J. Cunningham* 1915–30 (died 1962)
D. Earle Burchell 1920–23 (died 1928)
J. Hugh Jackson 1920–21, 1923–27 (died 1962)
Arthur W. Hanson 1921–57 (died 1965)
W. Arnold Hosmer 1921–23, 1931–61 (died 1968)
Thomas H. Sanders 1921–52 (died 1953)
Wyman P. Fiske 1923–1928 (died 1972)
Paul B. Coffman 1927–36 (died 1990)
Clarence B. Nickerson 1932–73 (died 1991)
Thomas H. Carroll 1937–45 (died 1964)
Richard S. Claire 1940–45 (died 1969)
Robert S. McNamara 1940–42
Thornton F. Bradshaw 1942–43, 1946–51 (died 1988)
James K. Hart 1942–50 (died 1976)
Leo A. Schmidt 1942–47 (died 1989)
Neil E. Harlan 1951–64
Earl D. Bennett 1955–60 (died 2006)
Walter F. Frese 1956–72 (died 1987)
Charles J. Christenson 1957–96
John R. Yeager 1957–71 (died 1971)
Robert K. Jaedicke 1958–61
Richard F. Vancil 1958–96 (died 1996)
John Dearden 1959–90 (died 2004)
Erich A. Helfert 1959–65
James L. McKenney 1960–96 (died 2007)
David F. Hawkins 1962–
F. Warren McFarlan 1964–2004 (Baker Foundation Professor since 2004)
Francis J. Aguilar 1965–96
Brandt R. Allen 1967–70
Robert A. Howell 1967–72
William M. Zani 1968–72
William J. Bruns, Jr. 1969–2001

* Cunningham, a professor of transportation, offered a course on railroad accounting from 1915 to 1930. He retired from the faculty in 1946.
Accounting is defined to include information systems.

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Zeff


_Journal of Management Accounting Research, Special Issue 2008_


