



THE AUDITOR'S REPORT

Special Issue on Fraud Detection

Volume 24, No. 2, Winter 2001

AUDITING SECTION/AMERICAN ACCOUNTING ASSOCIATION

REPORT OF THE PRESIDENT

It was great to see so many of you at the Seventh Auditing Midyear Conference where we celebrated the 25th anniversary of the Auditing Section. For those of you who could not be there, what a conference it was! Friday evening we had a gala dinner/dance. Between the dinner and the dancing was a program where all of our past presidents were honored. Twenty of the twenty-four past presidents were present. Karen Pincus (our current past-president) served as Master of Ceremony and reviewed each president's term by highlighting accomplishments and by relating a few funny stories. A special tribute was given to Fred Neumann, our first president. Fred received a hand-drawn self-portrait with an inscription thanking him for being our "lead-off" president. The evening was topped off with a champagne toast and dancing. It was a wonderful event, planned and orchestrated by Linda McDaniel (The University of North Carolina at Chapel Hill), Midyear Conference Program Chair.

In addition to the 25th anniversary celebration, the Midyear Conference had its usual outstanding program of papers, panels, and plenary sessions. The Friday morning plenary session featured Rick Causey, Executive Vice President and Chief Accounting Officer for Enron Corporation. Rick spoke of the major changes in Enron over the past several decades. The audience was treated to a fascinating discussion of how Enron has decentralized its organizational structure and employed technology to keep up with the fast pace of change in the energy business. In the Friday afternoon plenary session, Robert Elliott of KPMG gave a thought-provoking and fast-paced presentation on "21st Century Assurance." For those of you who missed his presentation, Bob's slides are available on the Auditing Section's web page.

The program included 47 papers covering a broad range of research, education, and practice issues. There were also five panel sessions. I heard many people say that the panel session on "Independence and Non-Audit Services" was one of the best panel sessions they had attended at any conference. Other panel sessions covered the 150-hour rule, International Accounting and Auditing Standards, and Internal Auditing Standards. The program attracted a record number of attendees (over 270).



Stanley F. Biggs

The day before the Midyear Meeting, Rick Tubbs (The University of Iowa) led the second annual doctoral consortium. Over 40 doctoral students attended the all-day consortium where they were treated to research presentations and an editors' panel. It was another great success. Dan Simunic will chair next year's consortium, so be sure to encourage your doctoral students to attend.

The section owes a great deal of thanks for the outstanding job that Linda McDaniel and her planning committee did in organizing such a terrific conference! I always wonder how next year's conference can top the previous one, but somehow it always does. So don't miss next year's Midyear Conference, which will be held January 2002 in Orlando. Next year's Program

Chair, Jeff Cohen (Boston College) already has a number of interesting ideas for the conference in his plans.

One of the most important things we do at the Midyear Conference is to present awards. This year we gave our four annual

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SUMMER ISSUE DEADLINE

The deadline for material to be included in the Summer 2001 issue of *The Auditor's Report* is May 1, 2001. The preferred, but not mandatory, format is Word files attached to email messages. Please send all material to the Editor at the address below by the deadline to ensure timely publication of the issue:

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The address of the Auditing Section's Home Page
on the World Wide Web is:

<http://raw.rutgers.edu/raw/aaa/audit/>

President's Report

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awards and two special awards. While, you can read about each of these awards elsewhere in the newsletter, I want to briefly mention the two special awards. On the occasion of our 25th anniversary, the Executive Committee and the Program Planning Committee reviewed the history of our section and decided that two special recognition awards were warranted. At the Friday luncheon, we gave a "Lifetime Achievement" award to Robert Elliott. Bill Kinney gave a summary of Bob's achievements and the section presented Bob with a hand-drawn self-portrait. At the opening plenary session, the Section gave Bernard Milano and the KPMG Foundation an Award of Merit. With Bernie's leadership the KPMG Foundation has provided significant support of the auditing education and research. Please look for more details of these announcements in this newsletter.

When I assumed the presidency of the Section, I indicated that one of my priorities would be to survey auditing/assurance services courses to find out what changes are taking place in our courses. The task of conducting this survey was given to the Education Committee chaired by Eric Johnson (University of Indianapolis). The committee has completed a survey of over 300 syllabi. The preliminary results have been compiled in a paper that was presented at the Midyear Meeting Forum. We are looking forward to seeing the final results soon.

Another priority for my presidency was to evaluate the Section's committee structure. During the fall semester, I surveyed current and past committee chairpersons and at the Executive Committee meeting in Houston we made some needed changes to our committees. First, we decided to streamline and strengthen the Regional Chair position and the Membership Committee. We will be combining the two committees into one that will be called the Membership and Regional Chairs Committee. There will be an overall chairperson and a chairperson for each region. The committee will have specific responsibilities for proposing auditing paper and/or panel sessions at each regional meeting. In addition the committee will be responsible for developing membership-enhancing activities at the national level as well as the regional level. Second, many responses to my survey indicated that committees were becoming too large. Thus, we established a maximum committee size of 7, unless there is a good reason to have a larger committee. A number of other minor changes were also made. We believe that these changes will strengthen our committee structure.

The planning for auditing sessions at the AAA Annual Meeting in Atlanta is underway. Robin Roberts (University of Central Florida) has received a large number of papers and several proposals for panel sessions. In addition, I am currently finalizing an agreement with an important executive from a major corporation in Atlanta to serve as the speaker for the Auditing Section luncheon at the Annual Meeting. This person will talk about

technology and how it is affecting the company and its internal and external auditors. I hope to see you at the luncheon in Atlanta.

Congratulations to the new officers who were elected at the Business Meeting in Houston. Joe Carcello (University of Tennessee) will be our new Vice President—Academic and Rick Tubbs (The University of Iowa) will be our new Treasurer. They will begin serving their terms of office in August 2001.

Let me close by thanking all of you who are doing a great job on the Section's committees. I would also like to give a special thanks to the other members of the Executive Committee (Abe Akresh, Mike Bamber, Mark Beasley, Audrey Gramling, and Karen Pincus) who have worked so hard on the Section's business. The Section is fortunate to have such a dedicated and talented group of people.

Thank you again for giving me the privilege of serving as President of the Auditing Section and please contact me if you have any questions or comments about the Auditing Section.

Stanley F. Biggs

President, Auditing Section

CALL FOR PAPERS

ISSUES IN ACCOUNTING EDUCATION

SPECIAL EDITION ON QUALITY OF EARNINGS

The American Accounting Association requests submissions to be published in a special edition of *Issues in Accounting Education*. The submissions must address some aspect of earnings quality and may be in financial accounting, managerial accounting, international accounting, auditing, systems, or tax. The format of submission is open. Papers may take the form of descriptions of class projects, games, cases, or other type of educational resources. Instructional resources designed for any level—sophomore through graduate—will be considered. The overriding requirement is that the reader be provided with ideas or materials about the quality of earnings that he or she can take into the classroom.

Walter Teets, Gonzaga University, will serve as special editor for this issue. Publication date for the special edition will be May 2002. To be guaranteed consideration, submissions must be received by September 30, 2001. Papers submitted expressly for the special edition should so state in the cover letter and need not be accompanied by a submission fee. All other policies and procedures as outlined in the journal will apply.

Submissions should be sent to:

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FRAUD: A REVIEW OF ACADEMIC LITERATURE

AAA Auditing Standards Committee

Kay W. Tatum, Chair; Brian Ballou; Joseph V. Carcello; Peter R. Gillett;
George Krull; Konrad W. Kubin; Larry E. Rittenberg; Roger Simnett

Introduction

The AICPA's Auditing Standards Board formed the Fraud Task Force to consider revising SAS No. 82, *Consideration of Fraud in a Financial Statement Audit*, and/or recommend other related standard-setting initiatives. After its September 2000 meeting, the task force (chaired by David Landsittel with academic members Mark Beasley and Zoe-Vonna Palmrose) asked the AAA's Auditing Standards Committee to prepare a review of the academic fraud literature. The committee prepared a report that summarized 25 articles and classified them according to questions posed by Landsittel and Bedard (1997) after the issuance of SAS No. 82. The following report is based on the report that was presented to the task force at its December 2000 meeting.

Issue 1: Is the concept of a separate fraud risk evaluation appropriate?

- Zimbelman (1997). This study found that auditors who separately assess fraud risk spend more time reading fraud cues (i.e., red-flag risk factors) compared to those who make a combined evaluation of risk of both fraud and error, implying that more attention might be paid to red-flag cues under SAS No. 82. Budgeted hours for audit testing were higher using a separate assessment of fraud risk, in both high- and low-fraud risk scenarios, and participants did not choose different audit procedures in response to differences in perceived risk. The results suggest that SAS No. 82 may not lead to increased fraud detection.
- Knapp and Knapp (2000). This study examines the effects of audit experience and explicit fraud risk assessment instructions on the effectiveness of analytical procedures in detecting financial statement fraud. Explicit instructions to assess fraud risk led to better performance. Audit managers were more accurate in their fraud risk assessment than audit seniors. Managers with explicit instructions performed significantly better than other groups, showing that experience and explicit instructions interact.

Issue 2: What are the most important factors that may be indicative of fraud?

- Albrecht and Romney (1986). This study tests the relative incidence of 87 red flags across fraud and no-fraud observations. Only about one-third of these red flags were found to be significant predictors of fraud. A large number of the red flags found to be good predictors pertained to personal characteristics of management (e.g., key executives living beyond their means, key executives who are "wheeler-dealers," etc.). Moreover, many company-specific factors (e.g., business operations deteriorating significantly, etc.) were either insignificant or untestable.
- Loebbecke, Eining, and Willingham (1989). This paper presents the results of a survey of audit partners from KPMG who have had experiences with fraudulent financial reporting and with asset misappropriations. The authors develop a fraudulent financial reporting assessment model, which incorporates a reasoning process in evaluating the likelihood of fraud. The model posits that fraudulent financial reporting is a function of conditions, managerial motivation, and attitude. The authors suggest a separate assessment of the likelihood of errors, fraudulent financial reporting, and asset misappropriation.

The authors found two factors—decision-making domination by one person or a small group acting in concert and weak internal controls—in 75 percent of the observations. The primary indicators of conditions suggesting heightened risk of fraud were: dominated decisions, the presence of one or an aggregation of transactions that have a major effect on the financial statements, related party transactions, weak internal control, and difficult-to-audit transactions. The primary indicators of managerial motivation for fraud were: industry decline, inadequate profits, emphasis on earnings projections, and significant contractual commitments. The primary indicators of an attitude predisposing one toward fraud were: dishonest management, undue emphasis on earnings projections, personality anomalies, prior year fraud, lies or evasiveness, and an aggressive attitude toward financial reporting.

Fraudulent financial reporting was found to be more common than asset misappropriations and much more likely in public than private companies. Fraudulent financial reporting was more common among manufacturing, transportation, and technology/communications firms, and less common among educational and other institutions.

- Pincus (1989). Auditors using a red flags questionnaire considered a more comprehensive and uniform set of potential fraud indicators than auditors who were not using a questionnaire. However, questionnaire use did not lead to more effective fraud detection; non-users outperformed the questionnaire users in a fraud case.
- Hackenbrack (1993). Factors related to incentives to commit fraud (e.g. pressure to increase the stock price and earnings-based management incentive compensation) were rated as highly important by auditors, along with a domination by a manager.
- Dechow, Sloan, and Sweeney (1996). Firms subject to SEC enforcement actions for overstating earnings desired to (1) raise external financing at low cost, and (2) avoid violations of debt covenant restrictions. They also were (3) less likely to have an audit committee, (4) more likely to have a company founder as CEO, (5) more likely to have a board dominated by insiders, and (6) less likely to have an external stockholder monitoring management. The results did *not* support the notion that managers manipulate earnings to obtain larger earnings-based bonuses or to sell their stockholdings at inflated prices.
- Summers and Sweeney (1998). This paper examines whether insider trading is a useful predictor of financial statement fraud. The authors find that insiders reduce their holdings of company stock in the presence of fraud. Insiders reduce their stock position by

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Fraud: A Review of Academic Literature

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engaging in significant selling activity. There was not a significant difference between fraud and nonfraud firms in stock purchases by insiders. Note that insider trading is not mentioned in SAS No. 82 as a risk factor.

Issue 3: Can the identified fraud indicators be weighted or put into a model?

- Hackenbrack (1993). High variability in the importance ratings assigned to various fraud risk factors was noted. Some of this variability appears related to the auditors' experience with large vs. small clients. Auditors assigned primarily to large client engagements place relatively more emphasis on risk factors relating to opportunity to commit fraud than do auditors assigned primarily to smaller companies.
- Bell and Carcello (2000). This paper presents the results of an attempt to develop a model useful in predicting the existence of fraudulent financial reporting. The model is based on 77 fraud instances and 305 nonfraud instances drawn from KPMG's audit practice. The model correctly classified 80 percent of the fraud cases while only misclassifying 11 percent of the nonfraud cases. The significant risk factors included in the model were: weak internal control environment, rapid growth, inadequate/inconsistent profitability, undue emphasis on meeting earnings projections, dishonest or overly evasive management, ownership status (private vs. public), and an interaction between a weak control environment and an aggressive attitude toward financial reporting.

Issue 4: When does a risk factor become a "red flag"?

- None of the articles reviewed directly related to this issue. However, see Bell and Carcello (2000) discussed in Issue 3.

Issue 5: Should auditors rely on controls when risk factors are present?

- Matsumura and Tucker (1992). Auditors are expected to better detect fraud when penalties for not detecting fraud are increased, when testing requirements are increased, or when clients' internal controls are strong. Managers are expected to be less likely to commit fraud when testing requirements are increased or when clients' internal controls are strong. An experimental market using accounting students and economic gains and losses to represent benefits and costs in this setting found results consistent with the expectations.
- Bloomfield (1997). Subjects acting as auditors make less accurate risk assessments when the auditor perceives that control risk is low (i.e., a client with strong internal controls), while legal liability for audit failure is high. Bloomfield notes that the severity of this effect may be mitigated if auditing standards imposed maximum levels of detection risk, and/or if auditors commit to some substantive testing regardless of their risk assessment.
- Caplan (1999). The study models the auditor's fraud investigation decision in a setting in which management is given two choices: whether to install weak or strong internal controls and whether to engage in fraudulent financial reporting. The study concluded that the use of control strength as a "red flag" in fraud risk assessment is reasonable even when management can override controls, and that, the audit failure rate is higher when internal controls are weak. When internal controls are weak, the auditor expects to find numerous errors. Because routine audit procedures do not distinguish between errors and fraud, the impact of fraud on audit evidence may go unnoticed.

Issue 6: What "lessons" for auditors have been identified by examining data on prior fraud litigation and SEC enforcement actions?

- Palmrose (1987). Economic downturns tend to be associated with increases in auditor litigation. Professional standards may not protect auditors from litigation. However, most business failures that occur without management fraud resulted in a dismissal of the case against the auditor (without the auditor making payments).
- Bonner, Palmrose, and Young (1998). The most common categories of fraud that resulted in SEC enforcement actions were (1) omitted or improper disclosures, (2) fictitious revenues, (3) premature revenue recognition, and (4) overvalued assets and undervalued expenses/liabilities. Fictitious transactions were also more likely to cause auditors being named as defendants.
- Erickson, Mayhew, and Felix (2000). Failure to detect fraud can be attributed to failure to understand the client's business/industry. A detailed analysis of publicly available working papers and depositions from Lincoln Savings and Loan unveiled persuasive evidence that auditors became so entrenched in accounting for complex transactions that they failed to understand the viability of the transactions in Lincoln's industry and economic environment.

Issue 7: How can the profession promote more "professional skepticism" among auditors?

- Bernardi (1994). Except for auditors with a high degree of sensitivity to ethical situations, auditors are insensitive to information about client integrity and competence when conducting a substantive audit procedure. This conclusion was supported in a behavioral experiment using managers and seniors from five of the then Big 6 firms. Further, fraud detection was higher for managers and for those with an increased prior belief about fraud.
- Hoffman and Patton (1997). This paper examines whether the extent of dilution (i.e. the extent to which auditors' judgments are influenced by irrelevant information) in the fraud risk context is affected by accountability to superiors. Results show that auditors' judgments exhibit the dilution effect regardless of accountability. While accountability does not exacerbate the dilution effect, it is associated with more conservative fraud-risk assessments.

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Fraud: A Review of Academic Literature

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- Braun (2000). Time pressure reduces the likelihood that auditors will detect cues that could lead to discovery of fraudulent financial reporting. Experienced auditors under time pressure in an experiment were more focused on accumulating evidence regarding frequency and amount of misstatements at the expense of attention given to qualitative aspects of misstatements indicative of potential fraud. Further, evidence suggested that those under low levels of time pressure considered a broader range of cues while executing detailed tests.

Issue 8: Would a requirement for management reports on controls or an auditor opinion on controls provide an effective deterrent to fraud?

- Hermanson (2000). This study investigates the demand for reporting on internal control by surveying 1,350 people across nine user groups. Respondents agreed that both voluntary and involuntary management reports on internal control motivate management to improve controls and audit committees to increase their oversight of internal control. Respondents were neutral about whether management reports on internal controls provide substantially greater protection against material fraud.

Issue 9: Can new technologies be used to improve fraud detection (e.g., electronic sensors, software, expert systems, modeling)?

- Eining, Jones, and Loebbecke (1997). Auditors using a model that provided a suggested fraud risk assessment perform better than those using the checklist and those making unaided decisions. However, those using the expert system with constructive dialogue outperformed all other groups. The importance of management fraud assessment stems from its potential effect on subsequent audit planning decisions. In this regard, auditors using the expert system make decisions concerning additional audit actions that are more consistent with their risk assessments than auditors in the other groups.
- Green and Choi (1997). This study examines the relative effectiveness of neural networks (NN) as a means of detecting financial statement fraud in the revenue and collection cycle of publicly held manufacturing and merchandising companies. Three NN models are developed and applied to a sample containing both fraudulent and nonfraudulent financial statements. The study's results support future use of NNs as a fraud-risk assessment tool.

Issue 10: Are communications "hot lines" an effective deterrent to fraud?

- Hooks, Kaplan, and Schultz (1994). An open communication environment can assist in deterring fraud. Whistle-blowing was found to be an important factor in fraud prevention and detection, since potential perpetrators of fraud were less likely to proceed if the prospects of being reported were increased.
- Schultz and Hooks (1998). The authors predict that an individual knowledgeable about fraud is more likely to disclose it to an auditor when there is a close relationship with the auditor and the individual does not stand to benefit from the fraud. The results of a classroom experiment involving auditing students acting in a scenario involving these factors were consistent with this prediction.

Issue 11: Can analytical procedures be better used to detect fraud warning signals?

- Calderon and Green (1994). This paper examines the use of financial analysts' forecasts in performing analytical procedures directed toward identifying fraudulent financial reporting. The authors find that financial analysts' forecasts provide relatively accurate signals of fraud in the presence of fraudulent financial reporting. However, financial analysts' forecasts are ineffective in signaling the absence of fraud when fraud is not present.
- Hassell (1994). This paper identifies two limitations of the Calderon and Green (1994) study. First, analysts' forecasts are not intended to predict fraud. Second, analysts' forecasts may not be independent of management because of personal relationships between analysts and company employees.
- Summers and Sweeney (1998). This paper (discussed in Issue 2) also considers the explanatory power of a number of financial characteristics in predicting fraud. Fraud companies have a higher level of inventory relative to sales, are growing faster, and have a higher return on assets than nonfraud companies in the year prior to the beginning of the fraud.

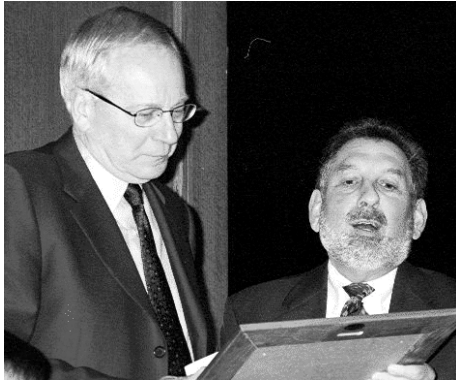
Issue 12: Is there a significant relationship between corporate governance and fraud?

- Beasley (1996). This paper examines whether a significant relationship exists between board of director composition and financial statement fraud (both fraudulent financial reporting and asset misappropriation, although approximately 90% of the observations involved fraudulent financial reporting). Results supported a significant negative relationship between the percentage of outside directors (i.e., nonmanagement) and the likelihood of financial statement fraud. This result does not depend on how an outside director is defined. Results did not show a significant relationship between audit committee existence (or composition) and the likelihood of financial statement fraud. However, the results showed a negative relationship between the percentage of stock held by outside directors and the likelihood of financial statement fraud. Similarly, a negative relationship existed between the tenure of outside directors and the likelihood of financial statement fraud. A direct relationship between the number of other directorships held by outside directors and the likelihood of financial statement fraud was also observed. Finally, those firms with smaller boards were less likely to experience fraud.
- McMullen (1996). Companies that have audit committees were found to have a lower incidence of: (1) shareholder litigation alleging management fraud, (2) quarterly earnings restatements, (3) SEC actions, (4) illegal acts, and (5) auditor turnover.

AWARDS PRESENTED AT 2001 MIDYEAR MEETING IN HOUSTON, TX

2001 Distinguished Service Award

The Auditing Section presented its Distinguished Service in Auditing award to Dan M. Guy. This award is presented annually to recognize outstanding career achievements that have a lasting and significant impact on the field of Auditing, as evidenced by service to the auditing profession or the Section or by significant contributions in scholarship.



Dan Guy (left) accepts the Distinguished Service in Auditing Award from Abe Akresh (right).

Dave Landsittel, Tom Powell, Bob Sack, and Jerry Sullivan. From 1979 to 1996, Dr. Guy served as AICPA Director of Audit Research, Vice President–Auditing and Vice President–Professional Standards and Services. During his tenure, the AICPA issued over 40 Statements on Auditing Standards (including SAS 39, 47, the expectation gap series, and 82), most of the attestation standards, and many audit guides; Dan developed the audit risk alert series, the Auditing Practices Release series, the compilation and review alerts, and the concept of user-friendly standard setting. Dan has published over 50 articles, 13 continuing education courses for CPAs, 9 books including an auditing text in its fifth edition and an audit sampling text in its fourth edition, and just recently a guide on professional ethics for CPAs. Dr. Guy's Ph.D. is from The University of Alabama at Tuscaloosa.

2001 Outstanding Auditing Education Award

The Auditing Section named Ken T. Trotman (The University of New South Wales, Australia) the 2001 Outstanding Auditing Educator. Over more than two decades, Ken has helped students to master key auditing concepts, theories, and practices. He has relentlessly challenged his students to wrestle with the most vexing auditing issues and has consistently brought the very latest thinking from research papers into his classroom. Ken has educated an entire generation of Australian students at the undergraduate and graduate levels. Many of the finest accountancy educators in Australia were supervised or significantly influenced by Ken's research and methodological writings. And via his research, visiting appointments in the U.S., and many, many presentations around the world, Ken's reach truly has been global.

In recognition of sustained and superior contributions as a leading classroom instructor, supervisor and advisor to doctoral students, writer of articles and books for the academy and practice, and an innovative scholar, we are pleased to name Ken T. Trotman the 2001 Outstanding Auditing Educator. The 2001 Outstanding Auditing Educator Selection Committee consisted Karen Pincus (Chair), Jack Krogstad, Frederick L. Neumann, and Ira Solomon.

Notable Contribution to the Auditing Literature Award

The 2001 Notable Contribution to the Auditing Literature award was presented to D. Eric Hirst and Lisa Koonce for their paper "Audit Analytical Procedures: A Field Investigation" published in the Fall 1996 issue of *Contemporary Accounting Research*. Hirst and Koonce recognized a growing gap between current audit practice and the tasks used in many experimental studies of analytical procedures. They conducted a field study in which they interviewed audit seniors, managers, and partners. The research provided a number of important insights into the practice of analytical procedures, many of which reject conventional wisdom of academics as to how these procedures are performed. These insights have been useful to audit educators, researchers, practitioners, and policy makers (e.g., the findings were presented to the Auditing Standards Board). The 2001 Notable Contribution to the Auditing Literature Award Selection Committee was composed of Vicky Hoffman (Chair), Kathryn Kadous, Tom Noland, Michael Willenborg, and Mark Zimbelman.

Outstanding Dissertation Award

Kevan L. Jensen received the 2001 Audit Section Outstanding Dissertation Award with his submission of "Conflicting Accountability and Auditor's Decision Behaviors." This important thesis represents one of the first attempts to empirically investigate how auditors assess and make trade-offs when individuals or parties who hold them accountable have divergent preferences. Prior accountability work focuses predominantly on how persons respond when they are held accountable to a single individual or party. His experimental investigation provides evidence that conflicting accountability causes auditors to exert greater effort and to think more creatively about integrative solutions, which provide some benefit to multiple parties. The audit research community and profession both will reap benefits from Kevan's dissertation efforts, which were guided by the oversight of his dissertation committee co-chaired by Robert Knechel (University of Florida) and William Messier (Georgia State University). Professor Jensen currently is an assistant professor at the University of Oklahoma, and he received his Ph.D. from the University of Florida. The 2001 Auditing Section Outstanding Dissertation Award Selection Committee was composed of Sarah Bonner (Chair), Chris Hogan, Roger Martin, and Mark Peecher.

HAVE YOU SEEN...?

Troy Hyatt, Seattle University, and Brad Reed, Southern Illinois University Edwardsville

“The Effects of Experience and Explicit Fraud Risk Assessment in Detecting Fraud with Analytical Procedures,” by C. A. Knapp and M. C. Knapp, *Accounting, Organizations and Society*, (Vol. 26, No. 1, 2001): 25–37.

This paper reports on the results of an experiment designed to examine the effects of audit experience and explicit fraud risk assessment instructions on auditors’ ability to use analytical procedures to effectively assess the risk of fraudulent financial reporting. Fifty-seven audit managers and 62 seniors from six international CPA firms participated in the experiment (which was conducted prior to the issuance of SAS No. 82 that requires explicit fraud-risk assessments). The experiment used a $2 \times 2 \times 2$ between-subjects design with two experience levels (senior and manager), the presence vs. absence of fraud in the financial statements evaluated by participants, and the presence vs. absence of explicit instructions in the case materials that asked auditors to perform preliminary analytical procedures with the specific objective of assessing the risk that financial statement fraud was present in the financial statements (auditors in the no- explicit-instructions condition were simply asked to perform preliminary analytical procedures). The financial statements used in the case were based on an actual company that had issued fraudulent financial statements that were subsequently restated and reissued under requirements of the SEC. Results indicate that managers were more effective in using the analytical procedures to assess the risk of financial statement fraud than were seniors (i.e., managers assessed the risk of fraud as high when fraud was present and low when fraud was absent, while the seniors’ risk assessments did not significantly differ between the two conditions). In addition, results show that auditors’ fraud-risk assessments were more effective when they were explicitly instructed to perform preliminary analytical procedures with the objective of assessing the risk of financial statement fraud than when they were not so instructed. Finally, the participants who made the most effective fraud risk assessments were the managers who were given the explicit instructions.

“The Effect of a Bidding Restriction on the Audit Services Market,” by K. Hackenbrack, K. L. Jensen, and J. L. Payne, *Journal of Accounting Research*, (Vol. 38, No. 2, 2000): 355–374.

This paper investigates the audit price and quality effects of a Florida law that existed between 1969 and 1992 that required nonprice competition and prohibited price competition among auditors. Essentially, the law required auditees to rank order prospective auditors based on nonprice preference factors and then negotiate a contract (including fee) only with the highest ranked auditor. The stated purpose of the law was to ensure that auditees contracted with auditors based on ability instead of price. The authors examined data from 675 municipal audits (141 in Florida and 534 from other southeastern states that did not restrict bidding). The mu-

nicipal audit market was selected because these auditees are located entirely within relevant regulatory jurisdictions. Results indicate that municipalities in Florida (the bidding-restricted market) paid higher audit fees than municipalities in states without bidding restrictions. Additionally, Florida municipalities, on average, engaged larger audit firms, engaged more specialized auditors (as measured by the number of municipal clients audited by the firms), and were more likely to receive recognition for excellence in financial reporting than municipalities in other states. The authors conclude that the bidding restrictions in Florida created an environment that impeded the entry of lower quality and lower priced auditors and induced the entry of higher quality and higher priced auditors.

“The Meaning of a Defined Accounting Concept: Regulatory Changes and the Effect on Auditor Decision Making,” by J. J. F. Hronsky and K. A. Houghton, *Accounting, Organizations and Society*, (Vol. 26, No. 2, 2001): 123–139.

This study reports on the results of an experiment designed to assess whether the change in definition of “extraordinary items” in Australian accounting standards affects auditor decision making. The old definition was criticized for being not specific enough and thereby allowing too much flexibility in its interpretation. The new definition added an important phrase that states items classified as extraordinary cannot be of a recurring nature. Forty auditors who had at least three years of experience (and a mean of five years) and worked for four of the Big 6 firms in Australia participated in the experiment. Subjects were provided with either the old or new definition of extraordinary items and then were asked to make a decision as to whether 10 different situations should be classified as either an operating item or an extraordinary item. Subjects also completed a semantic differential to ascertain their meaning of the extraordinary item definition they were provided. Results indicate that the measured connotative meaning of the old and new definitions were significantly different. Also, there was a significant difference in the classification decisions (extraordinary vs. operating) for 4 of the 10 cases. Results show that the change in classification decision was influenced by the variability in measured meaning of the extraordinary item definition provided. The authors suggest that their experimental approach could also be used to evaluate the potential impact of proposed accounting standard changes.

“Modeling the Audit Opinions Issued to Bankrupt Companies: A Two-Stage Empirical Analysis,” by J. R. Casterella, B. L. Lewis, and P. L. Walker, *Decision Sciences*, (Vol. 31, No. 2, 2000): 507–530.

Auditors have the responsibility to determine whether they believe their clients will continue as a going concern during the next year. Consequently, users and regulators often believe that

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Have You Seen...?

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an audit failure has occurred if an unmodified opinion is issued for a company that subsequently files for bankruptcy within one year. Prior research has shown that the audit opinion is not a reliable predictor of bankruptcy filings. However, after companies file for bankruptcy there usually is a period of reorganization, and after this period companies either liquidate or reemerge for business. The authors contend that if reorganization through bankruptcy can be viewed as not violating the going-concern assumption, then perhaps auditors may be "exonerated" for issuing an unmodified opinion for those companies that successfully reorganize. Building on prior research, the authors develop an audit opinion prediction model and test it using 100 companies that filed for bankruptcy between 1982 and 1992. Consistent with prior studies, the authors find that the audit opinion does not predict bankruptcy filings. Contrary to expectations, results also indicate that the audit opinion does not predict bankruptcy resolutions.

"Determinants of Audit Fees: Evidence from the Companies Listed in Bahrain," by P. L. Joshi and H. Al-Bastaki, *International Journal of Auditing*, (Vol. 4, July, 2000): 129–138.

Although many studies have examined the determinants of audit fees in a variety of Anglo-Saxon countries, none has examined this issue in a Middle Eastern country. The purpose of this paper is to examine audit fee determinants in Bahrain. Results are based on all 38 companies that are listed on the Bahrain Stock Exchange. The study's results confirm those found in other countries. Specifically, audit fees in Bahrain are positively associated with client size (log of total assets), client risk (long-term debt to total assets), the complexity of client operations (clients with foreign operations), and client profitability (return on assets). However, no association was found between audit fees and the timing of the client's fiscal year end. The paper concludes by offering suggestions for future research.

"The Association of Formal and Informal Public Accounting Mentoring with Role Stress and Related Job Outcomes," by R. E. Viator, *Accounting, Organizations and Society*, (Vol. 26, No. 1, 2001): 73–93.

This study investigates the associations between mentoring (formal and informal), three measures of role stress (role conflict, role ambiguity, and perceived environmental uncertainty), and two measures of job outcomes (job performance and turnover intentions). The relationships are examined using structural equation modeling based on survey responses received from 794 auditors (seniors through senior managers) from the Big 6 and other national firms in the U.S. Some of the study's more significant findings are as follows. Results indicate that auditors who have informal mentors consistently report lower levels of role ambiguity. However, results are mixed for the effects of informal mentors on auditors' reported role conflict and perceived environmental uncertainty (for some subgroups of respondents these role stress measures decreased, but for other subgroups they increased). Auditors who have informal mentors also reported higher job performance compared to auditors without a mentor. The study also found limited positive effects due to formal mentors.

"An Experimental Study of Auditor Analytical Review Judgments," by K. Z. Lin, I. A. M. Fraser, and D. J. Hatherly, *Journal of Business Finance & Accounting*, (Vol. 27, No. 7 and No. 8, 2000): 821–857.

This study examines auditors' analytical review judgments. The authors investigate how auditors' analytical review judgments are influenced by factors that are listed in the U.K. standard SAS No. 410 that guides the auditors' performance of analytical review. The authors use a within-subject repeated measures experiment to determine the auditors' reaction to changes in five independent variables. The auditors' response is measured with two dependent variables, the likelihood of material error and audit hours. The authors designed the experiment to contrast the importance of configural (expectation) effects with the importance of the independent variables listed in the auditing standard. The authors find that the independent variables listed in the auditing standard are much more important than the configural effects in explaining the auditors' analytical review judgments.

"Do Companies Successfully Engage in Opinion Shopping? Evidence from the U.K.," by C. Lennox, *Journal of Accounting and Economics*, (Vol. 29, 2000): 321–337.

Prior research has noted that audit reports do not generally become more favorable after companies switch auditors, leading some to argue that companies do not successfully engage in opinion shopping. However, most prior research has compared pre- and post-switch audit reports while this study tests for opinion shopping by predicting the opinions companies would have received had they made opposite switch decisions. The paper has two key findings. First, auditor changes occur more often after companies receive modified opinions. Second, switching auditors increases the probability of a change in audit opinion. These two results imply that companies receive modified reports less frequently than they would under opposite switch decisions. While observed audit opinions do not generally improve, the reports companies would have received under opposite switch decisions are predicted to be significantly less favorable, suggesting that companies do successfully engage in opinion shopping.

"The Effects of Industry Specialization on Auditors' Inherent Risk Assessments and Confidence Judgements," by M. H. Taylor, *Contemporary Accounting Research*, (Vol. 17, No. 4, 2000): 693–712.

The author of this study examines how auditor risk assessments for a bank differ between a group of banking specialist auditors and an equally experienced group of nonbanking auditors. The study gathers risk assessments for these two groups of auditors for two different accounts. The first account, loans receivable, is an industry-specific account while the second account, property plant and equipment, is a nonindustry-specific account. The author finds that for the industry-specific account the nonbanking auditors are more conservative in assessing inherent risk than are the banking auditors. For the nonindustry-specific account, the difference between risk assessments for the two groups of auditors is not as great. Because of the importance of

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Fraud: A Review of Academic Literature

(continued from page 5)

REFERENCES

- Albrecht, W. S., and M. B. Romney. 1986. Red-flagging management fraud: A validation. *Advances in Accounting* 3: 323–333.
- Beasley, M. S. 1996. An empirical analysis of the relation between the board of director composition and financial statement fraud. *The Accounting Review* 71 (October): 443–465.
- Beasley, M. S., J. V. Carcello, and D. R. Hermanson. 1999. *Fraudulent Financial Reporting: 1987–1997, An Analysis of U.S. Public Companies*. New York, NY: COSO.
- Bedard, J. C., R. Simnett, and J. A. Devoe-Talluto. 2000. Auditors' consideration of fraud: How behavioral research can address the concerns of standard setters. *Advances in Accounting Behavioral Research* (forthcoming).
- Bell, T. B., and J. V. Carcello. 2000. A decision aid for accessing the likelihood of fraudulent financial reporting. *AUDITING: A Journal of Practice & Theory* 19 (Spring): 169–184.
- Bernardi, R. A. 1994. Fraud detection: The effect of client integrity and competence and auditor cognitive style. *AUDITING: A Journal of Practice & Theory* 13 (Supplement): 68–84.
- Bloomfield, R. J. 1997. Strategic dependence and the assessment of fraud risk: A laboratory study. *The Accounting Review* 72 (October 1997): 517–538.
- Bonner, S. E., Z-V. Palmrose, and S. M. Young. 1998. Fraud type and auditor litigation: An analysis of SEC accounting and auditing enforcement releases. *The Accounting Review* 73 (October): 503–532.
- Braun, R. L. 2000. The effect of time pressure on auditor attention to qualitative aspects of misstatements indicative of potential fraudulent financial reporting. *Accounting, Organizations and Society* 25: 243–259.
- Calderon, T. G., and B. P. Green. 1994. Analysts' forecasts as an exogenous risk indicator in analytical auditing. *Advances in Accounting* 12: 281–300.
- Caplan, D. 1999. Internal controls and the detection of management fraud. *Journal of Accounting Research* 37 (Spring): 101–117.
- Dechow, P. M., R. G. Sloan, and A. P. Sweeney. 1996. Causes and consequences of earnings manipulation: An analysis of firms subject to enforcement actions by the SEC. *Contemporary Accounting Research* 13 (Spring): 1–36.
- Eilifsen, A., and W. F. Messier. 2000. The incidence and detection of misstatements: A review and integration of archival research. *Journal of Accounting Literature* (forthcoming).
- Eining, M. M., D. R. Jones, and J. K. Loebbecke. 1997. Reliance on decision aids: An examination of auditors' assessment of management fraud. *AUDITING: A Journal of Practice & Theory* 16 (Fall): 1–19.
- Erickson, M., B. W. Mayhew, and W. L. Felix. 2000. Why do audits fail? Evidence from Lincoln Savings and Loan. *Journal of Accounting Research* 38 (Spring): 165–194.
- Green, B. P., and J. H. Choi. 1997. Assessing the risk of management fraud through neural network technology. *AUDITING: A Journal of Practice & Theory* 16 (Spring): 14–28.
- Hackenbrack, K. 1993. The effect of experience with different sized clients on auditor evaluations of fraudulent financial reporting indicators. *AUDITING: A Journal of Practice & Theory* 12 (Spring): 99–110.
- Hassell, J. M. 1994. An academic perspective on "Analysts' forecasts as exogenous risk indicators in analytical auditing." *Advances in Accounting* 12: 301–305.
- Hermanson, H. 2000. An analysis of the demand for reporting on internal control. *Accounting Horizons* 14 (September): 325–341.
- Hoffman, V. B., and J. M. Patton. 1997. Accountability, the dilution effect, and conservatism in auditors' fraud judgments. *Journal of Accounting Research* 35 (Autumn): 227–237.
- Hooks, K. L., S. E. Kaplan, and J. J. Schultz, Jr. 1994. Enhancing communication to assist in fraud prevention and detection. *AUDITING: A Journal of Practice & Theory* 13 (Fall): 86–117.
- Knapp, C. A., and M. C. Knapp. 2000. The effects of experience and explicit fraud risk assessment in detecting fraud with analytical procedures. *Accounting, Organizations and Society* (forthcoming).
- Landsittel, D., and J. Bedard. 1997. Fraud and the auditor: Current developments and ongoing challenges. *The Auditor's Report* (Fall): 3–4.
- Loebbecke, J. K., M. M. Eining, and J. J. Willingham. 1989. Auditors' experience with material irregularities: Frequency, nature, and detectability. *AUDITING: A Journal of Practice & Theory* 8 (Fall): 1–28.
- Matsumura, E. M., and R. R. Tucker. 1992. Fraud detection: A theoretical foundation. *The Accounting Review* 67 (Fall): 753–782.
- McMullen, D.A. 1996. Audit committee performance: An investigation of the consequences associated with audit committees. *AUDITING: A Journal of Practice & Theory* 15 (Spring): 87–103.
- Nieschwietz, R. J., J. J. Schultz, Jr. and M. F. Zimbelman. 2000. Empirical research on external auditors' detection of financial statement fraud. Working paper.
- Palmrose, Z-V. 1987. Litigation and independent auditors: The role of business failures and management fraud. *AUDITING: A Journal of Practice & Theory* 6 (Spring): 90–103.
- Pincus, K. V. 1989. The efficacy of a red flags questionnaire for assessing the possibility of fraud. *Accounting, Organizations and Society* 14: 153–163.
- Schultz, J. J., Jr., and K. Hooks. 1998. The effect of relationship and reward on reports of wrongdoing. *AUDITING: A Journal of Practice & Theory* (Fall) 17: 15–35.
- Summers, S. L., and J. T. Sweeney. 1998. Fraudulent misstated financial statements and insider trading: An empirical analysis. *The Accounting Review* 73 (January): 131–146.
- Zimbelman, M. F. 1997. The effects of SAS No. 82 on auditors' attention to fraud risk factors and audit planning. *Journal of Accounting Research* 35 (Supplement): 75–97.

Have You Seen...?

(continued from page 8)

inherent risk assessments in planning an audit, the author notes that the observed difference in risk assessments is likely to lead to different audit approaches. The study also finds that the nonbanking auditors are less confident in their risk assessments than are the banking auditors, even for the nonindustry-specific account of property, plant, and equipment.

“Auditor Quality and the Accuracy of Management Earnings Forecasts,” by P. M. Clarkson, *Contemporary Accounting Research*, (Vol. 17, No. 4, 2000): 595–622.

A sample of one-year ahead management earnings forecasts, included in IPO prospectuses from the Toronto Stock Exchange, is analyzed to determine forecast accuracy. Forecast accuracy is then analyzed to investigate the association between auditor quality and forecast accuracy and also the association between forecast accuracy and the type of assurance (audit or review) provided by the auditor. Contrary to prior research, the authors find that after controlling for business risk, the relationship between forecast accuracy and auditor quality is not significant for review-level assurance engagements. However, when data from the audit-level assurance regime is analyzed it is found that Big 6 auditors are associated with smaller absolute forecast errors than non-Big 6 auditors.

“Auditors’ Recognition and Disclosure Materiality Thresholds: Their Magnitude and the Effects of Industry,” by E. R. Iselin and T. M. Iskandar, *British Accounting Review*, (Vol. 32, No. 3, 2000): 289–309.

The objective of this research is to study auditors’ recognition and disclosure thresholds within the context of industry, which is divided into the industry of the firm and the industry specialization (experience) of the auditor. The study uses a judgmental experiment to study the individual judgments about losses from a decline in the market value of land and buildings. The authors find that auditors have a recognition threshold that is lower than their disclosure threshold. The mean disclosure threshold is 8.7 percent of net profit, while the mean recognition threshold is 5.7 percent. The study finds that the thresholds of specialists in the higher risk finance industry were lower than thresholds of specialists in the lower risk retail industry. Thus, in the higher risk industry more information is available for decision-making purposes. Finally, auditors appear to use the thresholds from the industry in which they specialize in an industry in which they do not specialize, where the thresholds may be inappropriate.

EDITOR’S REPORT

Auditing: A Journal of Practice & Theory

Arnie Wright

December 31, 2000

Manuscript Flow	7/1/00– 12/31/00	7/1/99– 12/31/99	7/1/99– 6/30/00
<i>Submissions:</i>			
New	22	49*	86**
Resubmissions	20	39	28
Available for decision	42	88	114
Decisions made	31	69	101
Out for review or awaiting decision	11	19	13
<i>Acceptance rates:</i>			
Accepted for publication	11	11	15
Returned for revision	4	16	34
Rejected	16	42	52
<i>Review times:</i>			
Avg. reviewer days (avg. for all MS, not just first round)	36	39	44
Avg. turnaround (avg. for all MS, not just first round)	79	81	111

* These numbers include 20 submissions for the Waterloo Conference, held November 4–6, 1999. Out of these submissions 5 were accepted and 15 were rejected.

** The new submissions include 24 manuscripts submitted for the ISAR Conference. Out of these submissions 16 were rejected and 8 were returned for revision.

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2001 MIDYEAR MEETING BUSINESS MEETING
American Accounting Association—Auditing Section
Statement of Cash Receipts, Disbursements, and Cash Balance (Note 1)
1st Three Months of FY (2000)—Ended November 20, 2000 (1999)

	FY 00 9/1/99–11/30/99 (ACTUAL)	FY 01 9/1/00–11/30/00 (ACTUAL)
RECEIPTS:		
Membership Dues (Note 2)	\$ 5,491.00	\$ 6,588.50
Journal Subscriptions	6,625.00	8,875.00
Sales of Publications/Royalties	212.19	311.57
Journal Submission Fees	400.00	1,650.00
CPE (net)	120.00	750.00
Reimbursements (Note 3)	—	15,754.37
Midyear Meeting Registration (Note 4)	2,780.00	9,265.00
Miscellaneous Receipts	484.60	409.92
TOTAL RECEIPTS	<u><u>\$16,202.79</u></u>	<u><u>\$43,604.36</u></u>
DISBURSEMENTS:		
Awards	\$ 101.65	\$ —
<i>AJPT</i> —Printing/Distribution (Note 5)	4,590.00	10,682.37
<i>AJPT</i> —Editorial Support	—	—
Newsletter: <i>The Auditor's Report</i> (Note 6)	787.21	452.12
Midyear Meeting	482.88	—
Meeting Rooms—Annual Meeting	—	—
Committee Travel	—	—
Miscellaneous Expenses	167.10	243.61
TOTAL DISBURSEMENTS	<u><u>\$ 6,128.84</u></u>	<u><u>\$11,378.10</u></u>
Cash Increase (Decrease)	\$10,073.95	\$32,226.26
Beginning Cash Balance as of Sept 1	\$62,222.09	\$41,850.01
Ending Cash Balance	<u><u>\$72,296.04</u></u>	<u><u>\$74,076.27</u></u>

Notes:

- ¹ The Statement of Cash Receipts, Disbursements, and Cash Balance was compiled from the monthly financial reports received from the American Accounting Association national office.
- ² As of November 30, 2000 (1999) there were 1,509 (1,569) full members and 131 (128) associate members; 1,204 (1,244) were U.S. members and 436 (453) were foreign members.
- ³ FY 2001 receipt reflects reimbursement from the University of Waterloo for the Waterloo 1999 Supplement of *AJPT*.
- ⁴ The difference from prior year is attributable to more Midyear 2001 registration fees collected this year relative to prior year via online registrations received prior to November 30, 2000.
- ⁵ The expenses for the current year reflect the printing, distribution, and mailing costs (\$10,682.37) for the Waterloo 1999 Supplement of *AJPT*. Note that the AAA Staff charges (\$5,075.00) for that issue were allocated to the Section in August 2000. The Section received reimbursement for these costs—see Note 3. Prior year expenses relate to the AAA Staff charges for the setup of the Fall 1999 issue of *AJPT*.
- ⁶ Current year costs reflect mailing costs for the Fall 2000 issue of *The Auditor's Report*. Printing costs and AAA staff charges for that issue will appear on the December 2000 statements. Prior year expenses reflect both printing and AAA staff charges for the Fall 1999 issue.

2001 MID-YEAR BUSINESS MEETING
American Accounting Association - Auditing Section
Statement of Cash Receipts, Disbursements, and Cash Balance for
Years Ended August 31, 1999 and 2000 (Note 1)

	FY 99 9/1/98–8/31/99 (ACTUAL)	FY 00 9/1/99–8/31/00 (ACTUAL)
RECEIPTS:		
Membership Dues (Note 2)	\$ 22,365.50	\$ 24,834.00
Journal Subscriptions	13,720.00	16,703.20
Sales of Publications/Royalties (Note 3)	2,582.79	1,150.28
Journal Submission Fees	4,850.00	4,300.00
CPE (net)	907.86	2,100.00
Reimbursements (Note 4)	30,121.20	16,319.49
Midyear Meeting Registration	20,890.00	18,345.00
Miscellaneous Receipts (Note 5)	3,076.74	2,957.81
TOTAL RECEIPTS	<u>\$ 98,514.09</u>	<u>\$ 86,709.78</u>
DISBURSEMENTS:		
Awards	\$304.95	\$417.84
<i>AJPT</i> —Printing/Distribution (Note 6)	34,466.83	35,055.10
<i>AJPT</i> —Editorial Support	20,000.00	20,000.00
Newsletter: <i>The Auditor's Report</i> (Note 7)	8,853.87	9,477.59
Midyear Meeting	37,883.34	36,944.49
Annual Meeting Costs (Note 8)	1,067.52	2,539.64
Committee Travel	1,160.66	732.48
Council Fee	1,000.00	—
Miscellaneous Expenses	1,628.11	904.72
TOTAL DISBURSEMENTS	<u>\$105,365.28</u>	<u>\$107,081.86</u>
Cash Increase (Decrease)	<u>\$ (6,851.19)</u>	<u>\$ (20,372.08)</u>
Beginning Cash Balance	<u>\$ 69,073.28</u>	<u>\$ 62,222.09</u>
Ending Cash Balance	<u>\$ 62,222.09</u>	<u>\$ 41,850.01</u>

Notes:

- ¹ The Statement of Cash Receipts, Disbursements, and Cash Balance was compiled from the monthly financial reports received from the American Accounting Association national office.
- ² As of August 31, 2000, there were 1,177 U.S. members and 417 foreign members; 1,469 were full members and 125 were associate members. As of August 31, 1999, there were 1,199 U.S. members and 429 foreign members; 1,506 were full members and 122 were associate members. By November 2000 there was an increase to 1509 full members and 131 associate members.
- ³ The royalty payments are received without definite certainty and are thus volatile from year to year.
- ⁴ FY 2000 receipts represents reimbursement to the Section from KPMG for the 2000 Midyear meeting cost deficit of \$10,309.41 and for the 2000 Inaugural Auditing Section Doctoral Consortium costs of \$6,010.08. The FY 1999 receipts include reimbursement from the University of Waterloo for the costs associated with publishing the Waterloo 1998 Supplement of *AJPT* of \$12,554.31 and the KPMG reimbursement for the 1999 Midyear meeting deficit of \$17,566.89.
- ⁵ Reflects the new allocation of interest income from the AAA headquarters to the Section, effective 1999.
- ⁶ Expenses for the period ended August 31, 2000 include costs associated with printing and distributing the Fall 1999 and Spring 2000 issues of *AJPT* (\$29,980.01) and for the AAA staff charges for setting up the Waterloo 1999 Supplement (5,075.00)—the related printing and mailing costs for the Waterloo 1999 Supplement were charged to the section in September 2000 (reimbursement of costs received in October 2000). Expenses for the prior year period ended August 31, 1999 included costs associated with three issues of *AJPT*—Fall 1998; Spring 1999; and the Waterloo 1998 Supplement. Note, the average printing, mailing, and postage costs for each issue have increased from \$7,664.61 per issue for 1999 to \$9,973.55 per issue for 2000, and average AAA Staff Support charges for each issue have increased from \$3,708.000 per issue for 1999 to \$5,039.00 per issue for 2000.
- ⁷ Expenses in both years reflect costs associated with printing and distributing three issues of *The Auditor's Report*.
- ⁸ Current year expenses primarily reflect travel and speaker's fee costs for Section Luncheon speaker for 2000 Annual Meeting.

Auditing for Fraud: Implications of Current Market Trends and Potential Responses

Toby J. F. Bishop, Partner, Arthur Andersen

Introduction

The confluence of high stock market capitalizations for corporations and a greater willingness of senior managers to “cook the books” poses a challenge to the accounting profession. Unless the incidence of undetected material financial statement fraud is reduced significantly, a series of frauds with multi-billion dollar losses for investors can be expected, along with an increase in lawsuits (and associated damages) against professional services firms. In time this could threaten the viability of private sector auditing. However, significant changes in the way we audit for fraud could contribute to a solution. Implementing the recommendations of the Panel on Audit Effectiveness (POB 2000) may help, but further work is needed to develop new tools and techniques that will deliver a quantum leap in fraud detection rates. Other industries offer some ideas that could be adopted by the profession. However, given the inherent difficulty of detecting fraud, the most effective way for auditors to reduce undetected fraud is to press corporations to improve their fraud prevention measures.

The Environment

Financial statement fraud has always been a challenge for auditors. Public expectations of auditors (reasonable or otherwise) continue to exceed performance, partly due to the inherent limitations of auditing and the fact that fraud involves intentional deception. According to the Treadway Commission (1987), “Users...expect auditors to search for and detect material misstatements, whether intentional or unintentional, and to prevent the issuance of misleading financial statements.” The “expectation gap” may have been reduced by the auditing standards issued in 1988 and by SAS No. 82 in 1997 (AICPA), but the gap remains a gulf. As Albrecht and Willingham (1993) stated, “The public has always expected auditors to detect all financial statement fraud.” If the profession cannot reduce the public’s expectations it should focus on reducing the incidence of undetected fraud by greatly improving prevention and detection measures.

In the last decade financial statement fraud has affected approximately 300 public companies in the U.S. (Beasley et al. 1999), costing millions of investors billions of dollars. One recent case involved investor losses of approximately \$20 billion. Some factors suggest that such large losses may be indicative of a new environment—one that creates more risk for auditors. First, market capitalizations can be much greater these days. This is due to megamergers spurred by global competition and due to higher stock prices caused by investor speculation, stock pricing based on growth opportunities rather than past profits, and higher P/E ratios. Second, markets now absorb information about earnings surprises much more quickly (Ip 1998). Financial statement fraud may now destroy 50 percent of market capitalization overnight and 80 to 90 percent overall. This makes it easier to associate larger stock losses with particular events.

Indicators about the frequency of financial statement fraud are ambiguous. However, surveys of the willingness of managers to “cook the books” suggest intentional misstatement is far more common than most people think. A survey of attendees at a conference sponsored by *CFO* magazine found that 45 percent had been asked to misrepresent financial results and 38 percent of that group did so (Barr 1998). A similar *Business Week* survey found that 67 percent of CFOs had been asked to misrepresent results and 12 percent did so (Shuster 1998). No professional services firm in the world has pockets deep enough to absorb litigation costs of the size and frequency that these trends suggest. In addition, political pressure from irate investors would drive regulators to take increasingly aggressive actions. The accounting profession should recognize this new environment and consider viable options for reducing the incidence of undetected material fraud not just incrementally but radically.

Ideas from Other Industries

General Electric has adopted a quality program called Six Sigma, which pursues a challenging goal—3.4 defects per million opportunities (DPMO) as compared to a more traditional level of quality of four sigma, which is 6,210 DPMO. The book *Six Sigma* (Harry and Schroeder 2000) describes how in 1996 CEO Jack Welch told shareholders that to achieve Six Sigma quality by the year 2000 “will require us to reduce defect rates 10,000-fold—about 84 percent per year for five consecutive years—an enormous task, one that stretches even the concept of stretch behavior.” GE’s 1999 annual report states that its Six Sigma program “produced more than \$2 billion in benefits in 1999, with much more to come this decade.” The report emphasizes that “The objective is not to deliver flawless products and services that we think the customer wants when we promise them—but rather what customers really want when they want them.”

The Six Sigma program could provide a tool to reduce the incidence of fraud. Based on information from the *Wall Street Journal*, which reported 25 new cases of alleged material financial statement fraud at U.S. public companies in 1999, and *Who Audits America* (Harris 2000), which list 8,873 audits of U.S. public companies, the rate of such frauds is 2,818 DPMO—better than the traditional overall defect levels of most successful companies but well short of Six Sigma.

(continued on page 14)

Auditing for Fraud: Implications of Market Trends and Potential Responses

(continued from page 13)

The airline industry provides a stunning example of how quality can be improved over time to reach exceptional levels. In 1999 there were 11,160,000 U.S. scheduled airline flights of airplanes with ten or more seats and only two major accidents (NTSB 2000), or 0.18 DPMO, where major accidents are defined as those involving destruction of the airplane, multiple fatalities, or one fatality and substantial damage to the airplane. In 1996, NASA reported that “The history of aviation safety has been characterized by major quantum jumps in safety brought about by advances in technology, followed by years of marginal improvements” (NASA 1996). According to Boeing (2000), in 1959 the rate of hull loss and/or fatal accidents among U.S. and Canadian operators was 25 DPMO, so the reduction in accident rates since then is dramatic. This has been achieved through a massive and consistent focus on accident prevention. A number of safety breakthroughs and institutional protocols contributing to this improvement could be applied to auditing. First, cockpit automation presents pilots with a greater volume of information, but in a way that can be more easily scanned and understood. It also uses computers to perform some maneuvers automatically. These techniques could be used to automate certain audit tasks such as the analysis of financial statements and the benchmarking of business performance. The results could be integrated with other relevant information and presented to help the auditor make particular judgments, e.g., fraud risk and bankruptcy risk. Other systems could help auditors deal with information overload by serving up at the point of demand guidance to facilitate decision making.

Second, flight management systems enable pilots to better manage the conduct of a flight, changing the pilot’s role to that of strategic planner and flight manager. General and flight-specific data is programmed into the system, which computes appropriate control settings and flight activities. These computations are adjusted if necessary during flight, based on data gathered from onboard sensors. Similarly, enhanced audit management software could help audit teams to program audit activities based on general requirements and client-specific activities. Audit activities could be adjusted “in-flight” based on data gathered during the audit, such as indicators of heightened fraud risk. Such systems could help auditors ensure that all relevant audit procedures are performed and that information from different audit areas is checked for inconsistencies.

Third, ground proximity warning systems and long-range radar alert pilots to potential danger in time for them to take evasive action. Comparable tools can be used to analyze financial statements, comparing their characteristics with those of financial statements that have historically been associated with material fraud and flagging items that indicate potential “proximity” to fraud. Other tools could be developed to evaluate key aspects of a company’s corporate governance and compensation practices, providing a long-range warning about corporate environments that may be conducive to fraud.

Fourth, flight simulators have “revolutionized pilot training and have been the single most important safety advance in training,” enabling pilots to gain experience in handling various situations that they might otherwise encounter for the first time in a real aircraft with real passengers onboard. Some of these flight situations are so rare that the majority of pilots may never encounter them, yet they must be ready to recognize them and react appropriately. Similarly, most auditors do not encounter material financial statement fraud during their careers. However, audit simulations conducted in laboratory settings mimicking the real world could enable auditors to build skills in identifying and detecting fraud. Such simulations could be delivered efficiently by using web-based training modules.

Fifth, aviation safety improvements have been supported by investigations into airplane accidents and the accumulation of extensive data, enabling the identification of common factors that justify focused research and recommendations for improvements. Although legal, business, and economic issues have impaired the availability of financial statement fraud data, the profession should explore the feasibility of constructing a shared database containing factual information relating to all cases of publicly reported material financial statement frauds. Such data is vital to support research which could ultimately reduce the incidence of fraud.

Finally, and arguably most important, the aviation industry has made a priority of installing and regularly evaluating appropriate preventive controls. The accounting profession could adopt more fully this approach and evaluate the anti-fraud controls established by the companies we audit. The auditor could be required to report, at least to the audit committee, on the existence, effectiveness, and potential improvement of the company’s internal controls designed to prevent and detect fraud. Many companies today fall well short of best practices in this area and research suggests that reports would lead to improved controls (Hermanson 2000). Amending auditing standards to require such an evaluation and communication would support auditors in implementing this sensitive measure. Given the narrow focus of the report, the incremental cost should be greatly outweighed by the benefits to investors.

Concluding Comments

Changing the nature of the audit to better address fraud and getting companies to improve their anti-fraud controls will be difficult, for there will be many who resist it. Robert Frey, President of Cin-Made Corporation, suggests why:

People hate change. Change of any kind is a struggle with fear, anger, and uncertainty, a war against old habits, hidebound thinking, and entrenched interests. No company can change any faster than it can change the hearts and minds of its people, and the people who change fastest and best are those who have no choice (Harry and Schroeder 2000, p. 265).

If the investing public is to have a much safer investing experience, where financial statement fraud is as rare as major jetliner accidents, then corporations and auditors have no choice. In the public interest, we must both change and change now.

(continued on page 15)

Auditing for Fraud: Implications of Market Trends and Potential Responses

(continued from page 14)

About the Author

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REFERENCES

- Albrecht, W. S., and J. J. Willingham. 1993. An Evaluation of SAS No. 53, *The Auditor's Responsibility to Detect and Report Errors and Irregularities*. In *The Expectation Gap Standards: Progress, Implementation Issues, Research Opportunities*. New York, NY: AICPA.
- American Institute of Certified Public Accountants (AICPA): Auditing Standards Board. 1997. *Statement on Auditing Standards No. 82: Consideration of Fraud in a Financial Statement Audit*. New York, NY: AICPA.
- Barr, S. 1998. Misreporting Results. *CFO: The Magazine for Senior Financial Executives* (December): 36–48.
- Beasley, M. S., J. V. Carcello, and D. R. Hermanson. 1999. *Fraudulent Financial Reporting: 1987–1997*. New York, NY: Committee of Sponsoring Organizations of the Treadway Commission.
- Boeing Company (The): Commercial Airplanes Group. 2000. *Statistical Summary of Commercial Jet Airplane Accidents: Worldwide Operations 1959–1999*. Seattle, WA: The Boeing Company. See www.boeing.com/news/techissues/.
- Harris, S. P. 2000. *Who Audits America*, 43rd Edition. Menlo Park, CA: Data Financial Press.
- Harry, M., and R. Schroeder. 2000. *Six Sigma: The Breakthrough Management Strategy Revolutionizing the World's Top Corporations*. New York, NY: Doubleday.
- Hermanson, H. M. 2000. An Analysis of the Demand for Reporting on Internal Control. *Accounting Horizons* (September): 325–341.
- Ip, G. 1998. Big News on Your Stock? Hold On to Your Hat. *The Wall Street Journal* (April 27).
- National Aeronautical and Space Administration (NASA). 1996. *The History of Aviation Safety*. Washington, D.C.: NASA. See www.aero-space.nasa.gov/library/toc.htm.
- National Commission on Fraudulent Financial Reporting (NCFFR) (Treadway Commission). 1987. *Report of the National Commission on Fraudulent Financial Reporting*. New York, NY: NCFFR.
- National Transportation Safety Board (NTSB). 2000. *1999 Aviation Accident Statistics*. Washington, D.C.: NTSB. See www.nts.gov/aviation/stats.htm.
- Public Oversight Board (POB), Panel on Audit Effectiveness. 2000. *Report and Recommendations*. Stamford, CT: POB. See www.pobauditpanel.org.
- Shuster, S. 1998. The Seventh Annual Business Week Forum of Chief Financial Officers. *Business Week* (July 13).

Institute of Internal Auditors (IIA) CALL FOR PAPERS 14th Annual Education and Training Colloquium June 24, 2001, Buenos Aires, Argentina

The IIA invites you to participate in its 14th Annual Education and Training Colloquium Conference by submitting an abstract. We welcome submissions in all areas of internal auditing. Contributions are invited from internal auditing scholars, researchers, educators, and practitioners worldwide. The submission requirement is a one-page, double-spaced abstract of the paper in Word (English language). Submissions must be received by February 1, 2001 and must include a title page with the following information: (1) Paper Title, (2) Authors and affiliations including contact author's complete address, phone numbers, and email address. Submissions may be emailed to lsheets@theiia.org or hard copy to Lucy Sheets; The Institute of Internal Auditors; 249 Maitland Avenue; Altamonte Springs, Florida 32701-4201.

Any questions should be addressed to either of the above. All submissions will be peer reviewed.

Accepted Papers: along with notification of acceptance, the corresponding author will receive typing instructions and other submission materials. Authors are encouraged to be concise, final papers are limited to 20 pages. Abstracts will be accepted contingent upon receipt of complete paper by May 1, 2001.

Participant Obligation: The submission of an abstract for this colloquium means that at least one of the authors will attend the meeting and present the paper.

Summary of Important Dates

Deadline for Submission of Abstracts	February 1, 2001
Acceptance/Rejection Notifications	after March 1, 2001
Deadline for Submission of Final Camera-Ready Papers	May 1, 2001

Contact for Additional Information

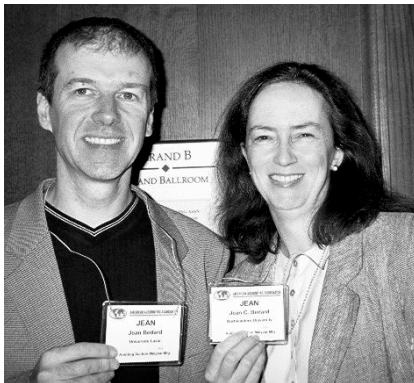
Doug Ziegenfuss
Office: (757) 683-3514
Email: dziegenf@odu.edu

Seventh Annual Midyear Auditing Section Meeting



Some Midyear Meeting attendees from 'down under,' 'up over' and in between.

The Auditing Section celebrated its 25th anniversary at its 2001 Midyear Meeting January 11–13, in Houston, Texas. The meeting featured the continuing tradition of an interesting and well-attended CPE session. In addition, there were numerous panels and presentations as well as outstanding plenary sessions and a special tribute to all of the Sections' past presidents. This year's meeting also included the second annual doctoral consortium directed by Rick Tubbs (University of Iowa). Special thanks go to KPMG for its continuing sponsorship of the



Jean Bedard (Universite Laval), left, and Jean Bedard (Northeastern University), right, responding to the question, "Will the real Jean Bedard please stand up?"

Midyear Meeting, and to the Program Committee: Linda McDaniel, Chair (The University of North Carolina at Chapel Hill), Jeff Cohen (Boston College), Joanna Ho (University of California, Irvine), Jean Bedard (Northeastern University), Jerry R. Strawser (University of Houston), Roger D. Martin (Indiana University), and Dana Hermanson (Kennesaw State University).

CALLS FOR NOMINATIONS

Distinguished Service Award in Auditing

The Distinguished Service in Auditing Award Selection Committee is seeking nominations from the Section's membership for the award to be given at the Auditing Section Midyear Conference in January 2002. This award recognizes outstanding and sustained service to the auditing profession or the Auditing Section. The distinguished careers of past recipients of the award (Bob Roussey, Dave Landsittel, Jerry Sullivan, Don Leslie, Ken Stringer, Robert Mautz, Robert Elliott, W. W. Cooper, Jim Loebbecke, John Willingham, Jay Smith, William Kinney, Fred Neumann, Bob Sack), and members of the first Practice Advisory Council (Tom Powell, Chair, and Dan Guy) represent the type of contribution to the profession that exemplifies this recognition. Nominations should be sent by July 1, 2001 to:

Abe Akresh

U.S. General Accounting Office

Accounting and Information Management Division

441 G Street, NW, Room 5S15

Washington, D.C. 20548

[Email is preferred—akresha@gao.gov]

Outstanding Auditing Educator Award

The Outstanding Auditing Educator Award Selection Committee is seeking nominations from the Section's membership for the award to be given at the Auditing Section Midyear Conference in January 2002. This award is given annually and recognizes outstanding contributions to the field of auditing education. Prior recipients of this award include Andy Bailey, Ira Solomon, William Kinney, Jack Krogstad, Glen Berryman, Fred Neumann, Howard Stettler, William Felix, Al Arens, Jim Loebbecke, Nick Dopuch, and Ken Trotman. Nominations should be sent by July 1, 2001 to:

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BERNARD MILANO AND THE KPMG FOUNDATION RECEIVE THE AUDITING SECTION'S AWARD OF MERIT

In recognition of their long-standing support of Auditing Education and Research, the Auditing Section gave Bernard J. Milano (President and Trustee of the KPMG Foundation) and the KPMG Foundation an Award of Merit at the Midyear Conference in Houston on January 12, 2001. Over the past three decades, the KPMG Foundation has provided financial and other support for: research (e.g., Research Opportunities in Auditing Program), the development and free distribution of educational materials (KPMG/UIUC Case Development & Research Program), KPMG Professorships, faculty research (KPMG Faculty Research Fellowships), doctoral students (Ph.D. Project and the Auditing Section Doctoral Consortium) and research conferences (e.g., the Auditing Section Midyear Conference). Behind all this support has been the guiding hand of Bernie Milano. Auditing research and education has had no greater friend than Bernie Milano and the KPMG Foundation.



Participants attending one of the sessions at the second annual Auditing Doctoral Consortium.

2001 AUDITING DOCTORAL CONSORTIUM

The second annual Auditing Doctoral Consortium was held the day before the Midyear Auditing Section Conference at the conference hotel in Houston, Texas. The Auditing Section and KPMG International sponsored the event. Thirty-nine students from Australia, Belgium, Germany, Japan, the Netherlands, and the United States attended. The purpose of the consortium was to stimulate students' research by (1) exposing them to the very latest ideas from leading researchers in auditing, and (2) providing opportunities for networking with other Ph.D. students, established auditing researchers, and editors of journals that publish auditing research.

The program included faculty presentations related to different research paradigms in auditing by Mark DeFond, Steve Kachelmeier, Rachel Schwartz, and Ira Solomon and an editor's panel that consisted of Mike Bamber, Dan Simunic, and Arnie Wright. Bernie Milano from KPMG attended much of the consortium. In spite of the intensity of the program that covered a time period of nine hours including breaks and lunch, participants judged the consortium to be a success in terms of achieving its purpose. Almost all students also attended the Midyear Conference.

The consortium's planning committee was composed of Rick Tubbs (chair), Dan Simunic (chair-elect), and Mike Bamber (past chair). Next year's planning committee is chaired by Dan Simunic.

The AAA Announces *Studies in Accounting Research #33, Empirical Research in Auditor Litigation: Considerations and Data (2000)* now available.

Studies in Accounting Research #33 provides guidance for conducting empirical research on auditor litigation and for using data on auditor litigation in teaching. To facilitate research and teaching, the monograph includes a CD-ROM with a database. The database contains over 1,000 client observations with audit litigation involving the Big 5 and their legacy firms. Non-Big 5 firms are included on joint litigation. The database includes litigation over allegations of audit failure on audits from 1960 through 1995, as long as legal actions were filed by the end of 1995.

The database contains an extensive amount of information about the client observations. For example, it includes information on clients and auditors, accounting and auditing issues, legal characteristics and issues, regulatory actions, and litigation resolutions. All information is from public sources available through early 1999.

The database is designed for use with Microsoft® Access. It should be easily usable by academics, practitioners, and students alike. While the database as published provides a rich source of litigation-related information, it is also designed so that users can customize it to meet their particular needs. For example, it can be updated with further information about the observations or with additional observations, such as audit litigation filed after 1995.

The monograph makes a number of suggestions for using the database in a variety of research settings. The database is designed for stand-alone use or it can be used in combination with data from other sources. The discussion of research considerations and applications encompasses both the usefulness and the limitations of the database.

In addition, the database and the information it contains should be a welcome addition in teaching graduate and undergraduate courses on financial accounting, financial statement analysis, and auditing along with other courses on legal, governance, regulatory, and institutional issues. The discussion of teaching applications includes suggestions on opportunities for bringing litigation-related topics into the classroom through supplementing lecture materials, promoting active learning, developing new teaching cases, extending and enriching existing case materials, and designing student projects, assignments, and other educational activities.

Studies in Accounting Research #33, Empirical Research in Auditor Litigation: Considerations and Data, is authored by Zoe-Vonna Palmrose, PricewaterhouseCoopers Auditing Professor at the University of Southern California. It can be purchased from the American Accounting Association for \$15 (members) or \$20 (non-members).

Auditing Section Names Robert K. Elliott as Lifetime Achievement Award Recipient

The Auditing Section of the American Accounting Association named Robert (Bob) K. Elliott as a recipient of the Lifetime Achievement Award at the sections' Midyear Meeting in Houston, TX January 12, 2001. In presenting the award, William R. Kinney (The University of Texas at Austin) reviewed Elliott's 35-year career as a CPA. The following is an excerpt of Professor Kinney's introduction of Bob Elliott:

In his 35-year career as a CPA, Bob Elliott has led the profession as the AICPA's chairman, chairman of the assurance services committee, and member of the ASB and business reporting, SEC, and AECC committees. Through his writing, speeches, and personal influence he has generalized our thinking about the CPA's essential role of independently improving the quality of information for decision makers.

At his firm, KPMG, Bob saw the need for research to improve audit technology and understand the essence of the profession. Through his firm and personally, he has increased quality of skills and diversity on campus and the profession through KPMG's Research Opportunities in Auditing program and the Ph.D. project.

Bob conceived and led KPMG to implement the ROA program in 1976—the year that our Auditing Section began. He recognized the value of conceptual, behavioral, and empirical auditing research before most professors did, and he provided the tools to do research through access to data and personnel at his firm as well as funding.

It is difficult to imagine our success as auditing scholars and the Auditing Section's success without Bob Elliott's leadership. He constantly reminds us to focus on conceptual foundations in measurement, professional care, and independence in a changing environment—and the need to work together for the common good. His lifetime achievement, as commemorated by this award, has immeasurably enhanced what we have (and can) achieve.

In his acceptance remarks, Mr. Elliott responded, "It was very special for me to receive such an honor as the Lifetime Achievement Award from an organization that is so special to me and has been for many years. My wife, Lee, and I were overwhelmed by Bill Kinney's remarks and the members' reaction to them. It is the highlight of my professional career, and I will always remember it with pleasure and gratitude." We in the Auditing Section again congratulate Bob Elliott on his outstanding commitment and service to the profession.



Bob Elliott receiving the Lifetime Achievement Award. From left to right: Lee Elliott, Bill Kinney, Bob Elliott, and Stan Biggs.

NOTABLE CONTRIBUTIONS TO THE AUDITING LITERATURE AWARD

The Auditing Section seeks submissions for the Notable Contributions to the Auditing Literature Award. The award will recognize a published work of exceptional merit that has made, or has the potential to make, a direct contribution to auditing or assurance research, education, and practice. To be eligible for submissions, a work must have been published during the ten-year period ended December 31, 2000, and at least one of the authors of the published article, chapter, book, or monograph must be a current member of the Auditing Section. Selection of the award winner will be made by the Auditing Section's Notable Contributions to the Auditing Literature Award Committee. The award is presented at the 2002 Midyear Meeting of the Auditing Section.

A work may be submitted either by the author or another individual with an interest in auditing research, education, or practice. Submissions must include five copies of (1) a nomination letter stating why the work is deserving of special recognition, and (2) the submitted work. Submissions should be sent by July 1, 2001 to:

Professor W. Robert Knechel
Fisher School of Accounting
Warrington College of Business
University of Florida
Gainesville, FL 32611
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An Overview of Research on Auditors' Detection of Financial Statement Fraud

Mark F. Zimbelman, Brigham Young University

"No problem confronting the (auditing) profession is as demanding, or as difficult to resolve as the problem of management fraud and its detection by auditors....(T)he profession must accept responsibility for the detection of fraud...(and) develop means of increasing significantly the likelihood of detecting fraud." [Public Oversight Board, 1993, p. 42]

Introduction

The purpose of this article is to provide an overview of academic accounting research on financial statement auditors' detection of fraudulent financial reporting (hereafter fraud).¹ Research on auditors' detection of fraud is extremely motivated for at least three reasons. First, policy makers, academics, government officials, and practitioners have expressed concern over auditors' performance in detecting fraud for several decades (e.g., see Accounting Series Release No. 19, 1940, p. 4 and Mautz and Sharaf, 1961, p. 113). Importantly, fraud detection continues to be a priority in the profession as indicated by the recent issuance of SAS No. 82 (AICPA 1997) and the fraud research projects funded by the Auditing Standards Board.² Second, significant audit policies have been adopted to influence auditors' behavior with respect to fraud during the past two decades. Thus, significant opportunity exists for research to inform audit policy with respect to detecting fraud. Third, auditors' detection of fraud is extremely important to both the profession and society. One indication of the validity of this claim is the Securities and Exchange Commission's active involvement in policy making to address audit failures involving fraud.³

The remainder of this article is organized as follows: the next section describes the challenging setting that auditors face in attempting to detect fraud; next, a few characteristics of this setting are highlighted and extant and future research issues related to these characteristics are considered; and, finally, concluding comments regarding the future of research on auditors' detection of fraud are offered.

The Setting

Detecting fraud is an extremely challenging task for the auditor. First, when fraud exists, auditee management has likely undertaken complex efforts to deceive the auditor. Clever teams of highly motivated, knowledgeable managers who often have considerable political capital that can be used to influence their employees and auditors, develop fraud schemes. Furthermore, audits involve extensive complexity spread across time, people, geography, and economic conditions. Typically, an auditor's first consideration of fraud occurs in the client acquisition/decision (Shelton, Whittington, and Landsittel 1999), which often involves auditors with considerable expertise who assess numerous interrelated risks (e.g., business, engagement, fraud and audit risk). Once the client acceptance decision is made, less experienced auditors strive to conduct the audit efficiently and effectively. Conducting the audit involves (re)assessing inherent risk,

control risk, and fraud risk, developing a detailed audit program, gathering evidence of varying reliability, communicating with one another, and reaching an opinion based on a large body of interrelated evidence. Auditors typically perform these tasks using various decision tools. In reality, few auditors will encounter fraud and those that do may not become aware of it until years later, if at all. Additionally, these auditors must cultivate positive client relations (especially with client personnel most likely to perpetrate fraud) and their mixed accountability may lead them to make judgments that are less skeptical than one might expect. Thus, there is little wonder that the typical fraud goes undetected for more than three years. Finally, some management fraud may cure itself in times of economic prosperity, thus inducing greater uncertainty.

Given this setting, numerous questions arise. Some major issues include: How do auditors and auditees respond to and anticipate one another's behavior (i.e. strategic interaction)? How should and do auditors assess fraud risk and how do these assessments affect audit plans? What audit methods can be used to optimize audit decisions for fraud detection?

Strategic Interaction

A key characteristic of fraud and its detection is that both parties must anticipate their opponent's response to be successful. Auditees must hide the fraud in a way that the auditor will fail to detect it and auditors must look for fraud where the auditee has hidden it. Failure to consider that management may be acting strategically, e.g., falsifying audit evidence, may result in ineffective levels of skepticism and audit failures. Most experimental research on fraud has not directly examined auditors' and auditees' abilities to anticipate and respond to one another's behavior. A few recent studies (Bloomfield 1997; Zimbelman and Waller 1999) present research rooted in behavioral game theory (Camerer 1990). These studies are motivated by the assumption that fraud introduces behavior that cannot be understood using theories and experiments framed in a decision theoretic context (Kinney 1975). Future experimental research should attempt to discover how boundedly rational auditors' decisions can be optimized within a game theoretic context. For example, how can skepticism be elevated at a reasonable cost?

¹ While the term "fraud" is often defined to include employee theft or defalcation, its use in this article is limited to acts resulting in management fraud or fraudulent financial reporting. A stream of related, but neglected, research exists in the earnings management literature (e.g. Phillips 1999). This vast body of research is beyond the scope of this article (see Healy and Wahlen [1999] for a review). In excluding earnings management research, I acknowledge the difficulty in distinguishing these topics and encourage efforts to meld these bodies of research.

² See www.aicpa.org/news/p032299a.htm for the AICPA's press release on these projects.

³ For a more comprehensive review of empirical research on auditors' detection of fraud see Nieschwietz, Schultz, and Zimbelman (2000).

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An Overview of Research on Auditors' Detection of Financial Statement Fraud

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What proportion of audit procedures should be randomized? Should rotation for whole audit teams or firms occur periodically? How will auditees and auditors respond if all audits require forensic audit procedures as proposed by the Panel on Audit Effectiveness?⁴

Auditor Performance in Fraud Risk Assessment and Audit Decisions

Humans have difficulty achieving accuracy when making complex decisions. As described above, auditors are confronted with numerous stimuli and many seemingly conflicting objectives. Research suggests that this environment may lead to detrimental effects with respect to fraud detection (Braun 2000). Prior research suggests at least two ways that fraud risk assessment and detection may be improved to deal with this complexity. Both involve dealing with the notion of procedural knowledge, which develops over many trials (e.g., Bonner and Walker 1994; Herz and Schultz 1999). Procedural knowledge frees greater cognitive resources to consider knowledge germane to the immediate task. Studies show that requiring auditors to explicitly assess fraud risk results in changes to the *extent* but not the *nature* of audit plans (Zimbelman 1997; Glover et. al. 2000) and that a specific instruction that the fraud risk task is primary affects auditors' decisions in interpreting audit evidence (Knapp and Knapp 2000). More research is needed to discover additional effects of focusing auditors' attention on the tasks of fraud risk assessment and detection.

A second response to the complexity inherent in fraud-related decision contexts is to bring greater expertise to the decision task. While research in this area is sparse, some findings suggest that auditors with general experience perform better in fraud-related judgments (Knapp and Knapp 2000). More research is needed to determine the effect on fraud detection of experience across varied settings (e.g., audit structure) and under the demands of strategic interaction. As a substitute for experience, auditors may be able to provide effective training to improve fraud detection. For example, unaudited audit decision making may be improved by training auditors to avoid the pitfalls of bounded rationality (Johnson, Jamal, and Berryman 1991). Additionally, new audit methodologies might be used to alter auditors' cognitive representations to improve their fraud detection.

Audit Methodologies and Decision Aids

Recent revisions in audit methodology may affect auditors' detection of fraud (Bell et al. 1997; Lemon, Tatum, and Turley 2000). These new approaches require that auditors gain a deeper understanding of the economic and regulatory forces affecting their clients' risks and opportunities. In theory, this knowledge helps auditors understand the economics underlying clients' transactions, which may be crucial for detecting fraudulent transactions (Erickson, Mayhew, and Felix 2000). More research is needed to determine the effects of these new audit methodologies on fraud detection.

As for decision aids, fraud risk models offer the potential for allocating audit effort to detect fraud in an efficient manner.

Empirically derived models generally classify fraud cases more accurately than unaudited auditors (Bell and Carcello 2000) but classify nonfraud engagements as slightly more likely to have fraud than unaudited auditors (Nieschweitz, Schultz, and Zimbelman 2000). Hansen et al. (1996) assigned different costs to these two misclassifications and derived an "optimal" model suggesting that audit firms might implement a model using cost-benefit criteria. In this area of research, new sources of data are needed as many of the extant studies used the same data set. A few recent studies tested the predictive ability of new sources of fraud cues (Beasley 1996; Summers and Sweeney 1998). Additionally, research should determine how reliance on these models can be accomplished because research outside of auditing suggests auditors may be unlikely to rely on these decision aids for fraud detection (Arkes, Dawes, and Christensen 1986). Research could fruitfully explore ways to increase auditors' propensity to rely on these models. Extensions are needed for work like that of Eining, Jones, and Loebbecke (1997) who found that auditors achieved better results using expert systems vs. other models. Research is also needed to determine potential litigation consequences that may accompany the use of fraud decision aids and how these consequences may be mitigated.

Concluding Comments

In sum, solving the challenges of detecting fraud will likely remain a priority for the profession for many years. Thus, research will be highly valued by both academics and professionals as long as academics carefully design studies that consider prior research findings and the setting that auditors face to investigate issues that will assist policy makers in their efforts to reduce the costs of fraud. Even so, one challenge remains for academics interested in conducting fraud research. Because of fraud's high profile in litigation against auditors, some audit firms are very reluctant to participate in fraud research. For example, even after committing to support the Auditing Standards Board on SAS No. 82 research projects, the firms were reluctant to participate. Once academics design meaningful studies, cooperation from auditing firms may be the key predictor of meaningful progress in this area.

⁴ See www.pobauditpanel.org.

REFERENCES

- Accounting Series Release No. 19. 1940. In the matter of McKesson & Robbins, Inc., Securities and Exchange Commission.
- American Institute of Certified Public Accountants (AICPA): Auditing Standards Board. 1997. *Consideration of Fraud in a Financial Statement Audit*. Statement on Auditing Standards No. 82. New York, NY: AICPA.
- Arkes, H. R., R. M. Dawes, and C. Christensen. 1986. Factors influencing the use of a decision rule in a probabilistic task. *Organizational Behavior and Human Decision Processes* 37: 93–110.
- Beasley, M. S. 1996. An empirical analysis of the relation between the board of director composition and financial statement fraud. *The Accounting Review* 71: 443–465.

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- Bell, T. B., and J. V. Carcello. 2000. A decision aid for accessing the likelihood of fraudulent financial reporting. *AUDITING: A Journal of Practice & Theory*, (Spring): 169–184.
- Bell, T., F. Marrs, I. Solomon, and H. Thomas. 1997. *Auditing Organizations through a Strategic-Systems Lens: The KPMG Business Measurement Process*. New Jersey: KPMG Peat Marwick LLP.
- Bloomfield, R. J. 1997. Strategic dependence and the assessment of fraud risk: A laboratory study. *The Accounting Review* 72: 517–538.
- Bonner, S., and P. Walker. 1994. The effects of instruction and experience on the acquisition of auditing knowledge. *The Accounting Review* 69: 157–178.
- Braun, R. L. 2000. The effect of time pressure on auditor attention to qualitative aspects of misstatements indicative of potential fraudulent financial reporting. *Accounting, Organizations and Society* 25 (3): 243–259.
- Camerer, C. 1990. Behavioral game theory. In *Insights in Decision Making: A Tribute to Hillel J. Einhorn*, edited by R. M. Hogarth. Chicago, IL: University of Chicago Press.
- Eining, M. M., D. R. Jones, and J. K. Loebbecke. 1997. Reliance on decision aids: An examination of auditors' assessment of management fraud. *AUDITING: A Journal of Practice & Theory* 16 (Fall): 1–19.
- Erickson, M., B. W. Mayhew, and W. L. Felix. 2000. Why do audits fail? Evidence from Lincoln Savings and Loan. *Journal of Accounting Research* (Spring): 165–194.
- Glover, S. M., D. F. Prawitt, J. J. Schultz, Jr., and M. F. Zimbelman. 2000. A comparison of audit planning decisions in response to increased fraud risk: Before and after SAS No. 82. Working paper, Brigham Young University.
- Hansen, J. V., J. B. McDonald, W. F. Messier, Jr., and T. B. Bell. 1996. A generalized qualitative–response model and the analysis of management fraud. *Management Science* 42: 1022–1032.
- Healy, P., and J. Wahlen. 1999. A review of the earnings management literature and its implications for standard setting. *Accounting Horizons* (December): 365–383.
- Herz, P. J., and J. J. Schultz, Jr. 1999. The role of procedural knowledge in accounting judgment. *Behavioral Research in Accounting*: 1–26.
- Johnson, P. E., K. Jamal, and R. G. Berryman. 1991. Effects of framing on auditor decisions. *Organizational Behavior and Human Decision Processes* 50: 75–105.
- Kinney, W. 1975. A decision theory approach to the sampling problem in auditing. *Journal of Accounting Research* (Spring): 117–132.
- Knapp, C. A., and M. C. Knapp. 2000. The effects of experience and explicit fraud risk assessment in detecting fraud with analytical procedures. *Accounting, Organizations and Society* (forthcoming).
- Lemon, W. M., K. W. Tatum, and W. S. Turley. 2000. Developments in the audit methodologies of large accounting firms.
- Mautz, R., and H. Sharaf. 1961. *The Philosophy of Auditing*. American Accounting Association, Monograph No. 6.
- Nieschwietz, R. J., J. J. Schultz, Jr., and M. F. Zimbelman. 2000. Empirical research on external auditors' detection of financial statement fraud. *Journal of Accounting Literature* (forthcoming).
- Phillips, F. 1999. Auditor attention to and judgments of aggressive financial reporting. *Journal of Accounting Research* (Spring): 167–189.
- Public Oversight Board. 1993. In the Public Interest: A Special Report by the Public Oversight Board of the SEC Practice Section, AICPA. Stamford, CT: Public Oversight Board.
- Shelton, S., R. Whittington, and D. Landsittel. 1999. Fraud risk assessment: An analysis of practices of auditing firms. Working paper, DePaul University.
- Summers, S. L., and J. T. Sweeney. 1998. Fraudulent misstated financial statements and insider trading: An empirical analysis. *The Accounting Review* (January): 131–146.
- Zimbelman, M. F. 1997. The effects of SAS No. 82 on auditors' attention to fraud risk factors and audit planning decisions. *Journal of Accounting Research* (Supplement): 75–97.
- _____, and W. S. Waller. 1999. An experimental investigation of auditor–auditee interaction under ambiguity. *Journal of Accounting Research* (Supplement): 135–155.

Outstanding Auditing Dissertation Award

The Auditing Section seeks nominations for its annual Outstanding Auditing Dissertation Award. The author of the dissertation judged to make the most outstanding contribution to auditing knowledge, among those dissertations nominated for consideration, will receive the award. Selection of the award winner will be made by the Section's Outstanding Dissertation in Auditing Committee. A dissertation can be nominated by either the author or one or more members of the dissertation committee. Nominations will be considered complete when the following materials have been submitted:

- a letter from the dissertation chairperson stating that the dissertation has been completed and accepted by the degree-granting institution between January 1, 1999 and December 31, 2000 (dissertations can be nominated more than once)
- five copies of a nomination letter stating why the dissertation is deserving of special recognition; and
- five copies of a paper from the dissertation that meets the criteria for papers submitted to *AUDITING: A Journal of Practice & Theory* (refer to the latest issue for requirements related to length and other matters, e.g., submission of experimental instruments).

Please submit all materials to:

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Submissions must be received by June 1, 2001. The award is presented at the 2002 Midyear Meeting of the Auditing Section.

Recent Developments in International Auditing Standards

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The purpose of this article is to provide an update on international developments in auditing. Keeping abreast of these developments is important as the profession continues to transition towards significantly more internationalization. Most countries today adopt in totality, or in slightly adapted form, the International Standards on Auditing (ISAs). One of the primary drivers for this move towards the ISAs is the possibility that they will be adopted by the International Organization of Securities Commissions (IOSCO). If IOSCO approves the use of ISAs then, for any cross-border filings or listings, the audit may be undertaken in accordance with ISAs rather than having to meet the auditing standards of each jurisdiction. This article details the most recent developments with regard to IOSCO approval of the ISAs, as well as outlines the other initiatives of the International Auditing Practices Committee over the past two years.

IOSCO Accreditation

IOSCO accreditation of the ISAs has been prolonged, with initial discussion about this initiative beginning in 1995. To date, IOSCO has concentrated its efforts on the endorsement of the International Accounting Standards. However, IOSCO representatives recently advised IFAC that the IOSCO Working Party No. 1 is drafting a work plan for endorsing the ISAs, which is expected to be submitted to the IOSCO Technical Committee early in 2001 with the hope that a program for endorsement will be developed soon afterward. In the meantime IAPC staff members are developing a list of what might be considered a core set of audit standards, which they intend to present to IOSCO to establish agreement on what should be the priority projects necessary for a speedy endorsement.

Assurance Services

In 1997 the IAPC issued an exposure draft (ED) on assurance services, setting out guidance and standards for professional accountants when providing a broad range of assurance services. The overwhelming majority of respondents commended the IAPC for being forward-looking in developing a framework, given its importance to the future of the profession. There were, however, some concerns expressed including doubts about the ability of the profession to effectively communicate the level of assurance provided. In 1999, the IAPC released a revised exposure draft entitled "Assurance Engagements." One of the primary revisions from the 1997 ED was the move from providing assurance on a continuum, to providing assurance at only the high and moderate levels.

In early 2000 the IAPC issued the first International Standard on Assurance Engagements (ISAE), based on this 1999 ED. The IAPC is aware of issues outstanding with regard to assurance services, and in particular it has recently commissioned research

at the international level on how best to communicate the different levels of assurance provided in these engagements.

Confirmations

During 1999 the IAPC revised ISA No. 501 on external confirmations. Previously this ISA dealt only with the confirmation of accounts receivable, but recognized that external confirmations can supply evidence regarding many other financial statement items. The superseded standard was also seen to be procedural in nature and not consistent with ISAs currently being issued by the IAPC under the audit risk model. One of the major differences was the presumption that accounts receivable would be confirmed. Under the audit risk model approach, confirmations are only undertaken when the auditor believes they will provide valid and reliable audit evidence in testing the assertions at risk.

The Audit Risk Model

In line with recent developments in new audit methodologies, the IAPC is currently examining the appropriateness of the audit risk model with respect to the concept of business risk. In particular the IAPC is carefully monitoring the following developments:

- The report from The Panel on Audit Effectiveness of the Public Oversight Board (POB).
- The recommendations of a joint research project undertaken by the profession in Canada, the U.K. and the U.S., "Changing Audit Methodologies and their Impact on the Audit Risk Model and Auditing Standards."

The IAPC project is working from the premise that, although the audit risk model is essentially sound, modifications are required. As well as outlining how business risk will be incorporated into the current model, it is expected that there will be changes to related standards such as those on audit planning and audit evidence.

Fraud and Error

The IAPC issued an ED on fraud and error in March 2000, with comments to be received by June 2000. One of the differences between this ED and SAS No. 82 is that the ED does not require a separate assessment of fraud risk, suggesting that the IAPC is not convinced about the potential benefits arising from a separate assessment. The IAPC recognizes that SAS No. 82 is presently being revisited, but that any amendments to SAS No. 82 will not likely be implemented in the near term. The IAPC also believes that its current ED significantly enhances the guidance provided in the existing ISAs and anticipates that a revised ED, incorporating the concerns raised above, will be presented for approval in early 2001. IAPC will continue to monitor relevant developments arising from the review of SAS No. 82.

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Environmental Reporting

IAPC is also working on an ED on environmental reporting and this ED is expected to deal with high-level assurance only, and with the limited available guidance about the subject matter and criteria that would support a high level of assurance, this ED. Environmental reporting is a difficult area, and as the first guidance issued under the umbrella of the ISAE, this ED will provide a test of that standard's operation.

In its environmental deliberations the IAPC has given consideration to recent significant developments affecting environmental reporting, and in particular the implications of the new "Dow Jones Sustainability Group Index" (SGI) of stocks. This index is applied to industry groups, and the criteria include how well entities are managing environmental issues, human rights, and corporate social responsibility. Also, consideration has been given to the concept of "sustainability reporting" under the Global Reporting Initiative (GRI). Supported by the UN Environment Programme, the GRI seeks to make sustainability reports as routine and credible as financial statement reporting in terms of comparability, rigor, and verifiability.

Information Technology

The IAPC Subcommittee on Information Technology is currently revising ISA No. 401 "Auditing in a Computer Information Systems Environment" and International Auditing Practices Statement IAPS No. 1008 "Risk Assessments and Internal Control—CIS Characteristics and Considerations." The Subcommittee has already reviewed IAPS No. 1001 "CIS Environments—Stand-Alone Microcomputers," IAPS No. 1002 "CIS Environments—Online Computer Systems," IAPS No. 1003 "CIS Environments—Database Systems," and IAPS No. 1009 "CIS Environments—Computer Assisted Audit Techniques." These were all issued as EDs during 2000. The comments received from the exposure process are due for consideration in early 2001.

The IAPC acknowledges that the current advancements in information technology call for the development of further guidance for auditors where emerging technology is bringing about changes in the business environment. Therefore the IT subcommittee is also considering developing guidance, for example, on audit issues arising from the use of customized networks, electronic commerce, and financial reporting on the Internet. The IAPC is aware that the U.S. and Canada have commenced work on a joint project regarding electronic reporting on the Internet.

POB Panel Report

The IAPC has recently considered the final report issued by the U.S. POB Panel on Audit Effectiveness. As an immediate response to concerns raised in this report, the International Federation of Accountants (IFAC) has agreed to establish its own Public Oversight Board and Compliance Committee.

Other Changes to ISAs over the Past Two Years

The IAPC recently revised ISA No. 570—*Going Concern*. The revised ISA No. 570 is effective for audits of financial statements for periods ending on or after December 31, 2000, and requires the auditor to evaluate management's assessment of the entity's ability to continue as a going concern. It also requires the auditor to inquire of management about its knowledge of events or conditions beyond the period of assessment used by management that may cast significant doubt upon the entity's ability to continue as a going concern.

ISA No. 260 on communication of audit matters with those charged with governance was also recently issued. It requires the auditor to communicate "audit matters of governance interest" arising out of the audit of the financial statements with those charged with governance of the entity. The matters to be communicated outlined in the ISA are similar to matters the auditor communicates to audit committees in an audit conducted in accordance with U.S. auditing standards. However, the international standard applies to audits of all entities, not just those that have an audit committee.

Conclusion

Globalization will continue to be one of the major forces motivating the activities of IAPC. Gaining IOSCO accreditation for ISAs is one of its most urgent tasks. Information technology and governance are also major concerns at this current time since the guidance in the ISAs is deficient for addressing the challenges created by advances in information technology. The challenge to the committee is to come up with standards that can weather the continuing evolution in this area, and to be more responsive to future developments. Developments in the area of corporate governance are primarily being driven by developments in specific countries, in particular the U.S. The IAPC will need to keep abreast of these developments, and review their applicability to the international level. This area may provide an interesting challenge for the IAPC, as it is not clear that the IAPC stakeholders are ready for international standards on corporate governance.

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