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RESEARCH ON PROFESSIONAL RESPONSIBILITY AND ETHICS IN ACCOUNTING

EDITED BY

CYNTHIA JEFFREY

Iowa State University, Ames, USA

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Series Editor: Cynthia Jeffrey

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LIST OF CONTRIBUTORS

<i>Nader Asgary</i>	School of Business, SUNY College at Geneseo, USA
<i>Patricia C. Bancroft</i>	Accounting and Finance Department, Bridgewater State College, USA
<i>David F. Bean</i>	Hagan School of Business, Iona College, USA
<i>Richard A. Bernardi</i>	Gabelli School of Business, Robert Williams University, USA
<i>N. S. Bonu</i>	Department of Accounting and Finance, University of Botswana, Africa
<i>Alireza Daneshfar</i>	Accounting Department, School of Business, University of New Haven, USA
<i>Mary S. Doucet</i>	Department of Finance and Accounting, California State University Bakersfield, USA
<i>Thomas A. Doucet</i>	Department of Finance and Accounting, California State University Bakersfield, USA
<i>E. G. Kitindi</i>	Department of Accounting and Finance, University of Botswana, Africa
<i>Raef A. Lawson</i>	School of Business, University at Albany, State University of New York, USA
<i>Lois S. Mahoney</i>	Department of Accounting and Finance, Eastern Michigan University, USA
<i>Dawn W. Massey</i>	Charles F. Dolan School of Business, Fairfield University, USA
<i>Mark C. Mitschow</i>	School of Business, SUNY College at Geneseo, USA

<i>Elizabeth Vallery Mulig</i>	Department of Financial and Information Systems, Columbus State University, USA
<i>Thomas J. Phillips Jr.</i>	School of Professional Accountancy, Louisiana Tech University, USA
<i>Robin W. Roberts</i>	School of Accounting, University of Central Florida, USA
<i>John T. Sennetti</i>	Huizenga School of Business & Entrepreneurship, Nova Southeastern University, USA
<i>Michael K. Shaub</i>	School of Business and Administration, St. Mary's University, USA
<i>Tara J. Shawver</i>	Accounting and Finance Department, King's College, McGowan School of Business, USA
<i>L. Murphy Smith</i>	Department of Accounting, Texas A&M University, USA
<i>Hema Rao</i>	Department of Accounting, Finance and Law, School of Business, SUNY-Oswego, USA

EDITORIAL INFORMATION

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BUSINESS STUDENTS' WILLINGNESS TO ENGAGE IN ACADEMIC DISHONESTY AND WHISTLE-BLOWING

Raef A. Lawson

ABSTRACT

Declining ethical standards among students has become a widespread concern. This paper presents the results of a survey examining students' attitude towards the need for ethical behavior in an academic setting and their inclination to engage in whistle-blowing when becoming aware of cheating by others. The results of this study indicate that while students are generally upset with cheating in their classes, a significant proportion of them nonetheless engage in such behavior. They are also generally reluctant to engage in peer reporting of such dishonesty, although they are more likely to do so the more upset they are about cheating, the more they believe that appropriate action will be taken by the course instructor, and if they have not cheated personally in the past.

INTRODUCTION

Academic dishonesty appears to be a growing problem throughout our educational system. Collinson (1990), in a 1988 survey of college freshmen found that 37%

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admitted to having cheated on a test in high school, up from 30% in the previous year. In addition, 57% of these students admitted to having copied another student's work, up from 52% in the previous year. These percentages are similar to those in a poll cited by Nazario (1990), which indicated that 47% of the undergraduates surveyed would cheat on an exam. Even more disconcerting is the result of a survey of students at the University of Delaware, which indicated that 78% of the freshmen acknowledged having cheated (Collinson, 1990). Additional support for the idea that cheating is increasing over time is provided by Davis et al. (1992), who present a series of studies which indicate an increase in cheating by undergraduate and graduate students from 23% in 1941 to 76% in 1980. However, concerns have been raised regarding the methodology used in this last study (Crown & Spiller, 1998, p. 695).

It would be difficult for such widespread instances of cheating to take place without the cheaters' peers knowing that such behavior was taking place. Given the low level of reporting of cheating, there appears to be a general reluctance to report academic dishonesty. The question thus arises as to the attitude of students regarding this type of behavior by their fellow students. Are students upset with cheating by their fellow students? If so, are they likely to report such dishonesty? And finally, what factors affect the likelihood of such behavior?

WHISTLE-BLOWING

While the phenomenon of collegiate cheating has been extensively researched, in this paper we examine the above questions in a whistle-blowing framework. Integration of the literature in these areas can yield additional insights into students' decisions regarding whether to report peers who engage in such behavior.

As Burton and Near (1995, p. 17) note, "student cheating and reporting of that cheating represents one form of organizational wrongdoing and subsequent whistle-blowing, in the context of an academic organization." The extent to which students will engage in whistle-blowing is uncertain, as "organizational members have been well socialized to believe that organizational dissidence is undesirable" (Miceli & Near, 1984, p. 704). Students who view instances of cheating may thus be reluctant to report such behavior. This was the case in a study by O'Clock and Okleshen (1993, p. 685), which found that business students "considered 'not reporting others' to be generally acceptable behavior."

MODELS OF WHISTLE-BLOWING BEHAVIOR

Several models of whistle-blowing behavior have been proposed. Miceli and Near's (1992, chapter 2) five stage model of whistle-blowing includes the

occurrence of a triggering event, a pre-whistle-blowing decision-making process, the making of a whistle-blowing report, reaction to the report, and assessment by the whistle-blower of the outcome of the complaint and decision-making regarding future actions, if any. They identify critical characteristics in the whistle-blowing process, including “characteristics of the individual that affect his or her approach to the whistle-blowing case, the situation (including the context and process of the case), the organization that committed the alleged wrong, and the relative power of the parties over one another as well as their dependence on the wrongdoing itself” (Miceli & Near, 1992, p. 48).

Hooks, Kaplan and Schultz (1994) present a model that integrates the whistle-blowing literature with internal control and audit guidance. Their model, covering a similar area as Miceli and Near’s second stage, includes three stages: recognition that a significant wrongdoing has occurred, assessment of whether the act should be reported, and choosing what action to take. They discuss various moderating situation and personal factors.

In this study we examine the effect of a variety of the personal and organizational characteristics discussed in these models on whistle-blowing by students in an academic setting.

OBSERVER’S ATTITUDE TOWARD ACADMIC DISHONESTY

Whether a student’s ethical beliefs and moral development influences that student’s propensity to engage in whistle-blowing is uncertain. Arguing for such a relationship is Brabeck’s (1984, p. 52) conclusion that “whether or not one blows the whistle . . . is related to one’s moral judgment level.” Arguing against such a relationship is the study of factors that affected business students’ perceptions of ethical classroom behavior by Allmon et al. (2000, p. 421), which found that “it seems likely that the salience and intensity of classroom or job demands are so great that individuals’ reflective ethical positions are overwhelmed.”

Sherrill et al. (1971) found that students who cheat evidenced a more positive attitude toward cheating than those who did not, and were also less concerned about cheating as a problem. Turning this relationship around, it can be argued that if a student is upset with cheating by his peers, then the student may be less likely to personally engage in such behavior. Also, if a student has previously cheated, that student may be less likely to report similar cases of academic dishonesty by his peers. After considering the evidence and the context of this study, we hypothesize:

H1. Students who have engaged in academically dishonest behavior will be less likely to report such behavior by their peers than students who have not engaged in such behavior.

H2. The more upset a student is by cheating by other students in the class, the more likely the student will be to report instances of academic dishonesty.

ORGANIZATIONAL RESPONSIVENESS

Individual ethical decision-making needs to be examined in the context within which the decision process takes place. As noted above, [Allmon et al. \(2000\)](#) found that ethical decision-making was not well correlated with ethical values because of conflicting organizational pressure. Similarly, [Barnett and Vaicys \(2000\)](#) found that perceived environmental dimensions had significant moderating effects on ethical behavior intentions.

One factor affecting an organization's ethical climate is how the organization manages rewards and punishment. In a study of factors affecting ethical decision-making, [Trevino and Youngblood \(1990\)](#) found that outcome expectancies have a direct influence on ethical decision-making behavior. Their data suggested that these expectancies can be influenced by rewards and punishments, and that stronger effects from punishing unethical behavior can be achieved with harsher punishments. Similarly, [Ford and Richardson \(1994, p. 216\)](#), reviewing four studies involving rewards and sanctions, concluded that "an individual's ethical beliefs and decision making behavior will increasingly become congruent with top management's beliefs as defined through their words and actions as rewards provided for compliance congruence is increased." Thus one way to reduce unethical behavior is to make the sanctions for unethical behavior severe enough so as to reduce the desirability of the behavior, while at the same time rewarding ethical behavior.

The responsiveness of an organization to wrongdoing can also affect individuals' propensity to engage in whistle-blowing. [Miceli and Near \(1984, p. 703\)](#) indicate that "providing convincing evidence that corrective action will be taken appears to be important to whistle-blowers." [Hooks, Kaplan and Schultz \(1994\)](#) reach a similar conclusion. [Miceli and Near \(1992, p. 148\)](#) further state that "in organizational settings, if observers of wrongdoing do not believe that powerful authorities – when notified – will be willing and able to correct the wrongdoing, then whistle-blowing is not a feasible or reasonable option for them." Of interest here is the effect of students' belief that a course instructor would take appropriate action if notified that cheating had occurred on students' propensity to engage in

whistle-blowing. The failure of faculty members to take appropriate action, or to indicate that such action would be taken, would be expected to have an adverse impact on students' propensity to engage in whistle-blowing.

In an academic setting, certain behaviors are clearly forbidden, including cheating on exams and plagiarizing papers. Penalties, or a range of penalties, are typically prescribed for these actions. However, it is not always clear that faculty will enforce these penalties, or that students believe that faculty will take appropriate action when cheating occurs. In the case of academic dishonesty, faculty members are typically given wide discretion in determining how to handle specific instances of cheating. In order to discourage unethical behavior students must believe that appropriate sanctions must be taken. If faculty members fail to apply severe enough sanctions, [Trevino and Youngblood's \(1990\)](#) results suggest that they will fail to modify outcome expectancies and thus fail to influence behavior. In a similar manner, in order to encourage whistle-blowing behavior, the severity of the sanction chosen needs to be viewed by students as being appropriate for the given situation. We thus hypothesize:

H3. Students' propensity to engage in whistle-blowing will be positively related to their belief that appropriate action will be taken in cases of academic dishonesty.

The likelihood that a given sanction is perceived as being appropriate may be affected by what is perceived by the potential whistleblower as being an appropriate action. [Miceli and Near \(1992, p. 60\)](#) note that little is known at this time "about how observers of perceived wrongdoing generate alternative courses of action, or how they come to view these alternatives as appropriate." They observe, however, that it is likely that the potential whistleblower considers the potential costs and benefits of each potential action. In evaluating the cost of an action, it may be the case that the prospective reporter believes that there will be a greater personal involvement required (and resultant cost) in a situation where a more severe penalty is called for than in one where a more lenient penalty is appropriate. For example, in an academic context, there may be less involvement required by a student who reports an instance of copying homework than when he reports cheating on a final exam, which would probably carry a more severe penalty.

On the other hand, in weighing the "benefits" of a given action, if the potential whistle-blower believes that only a relatively mild sanction will be imposed for the unethical behavior, the expected potential "benefit" is less likely to exceed the cost of whistle-blowing, and we would thus expect an inverse relationship between the severity of the expected penalty and the likelihood of whistle-blowing.

Given the lack of prior research in this area, and the above discussion, we propose the following exploratory hypothesis:

H4. Students who believe more lenient penalties are appropriate for cases of academic dishonesty will be more likely to report peers engaged in such behavior than those who do not.

DEMOGRAPHIC VARIABLES

Another question of interest regards which demographic factors affect students' propensity to engage in academically dishonest acts or to engage in whistle-blowing. A variety of demographic variables have been found to be related to students' ethical beliefs, including academic major, grade level, grade point average, and gender.

Grade Level

Mixed evidence exists regarding the relationship between grade level and students' ethical beliefs. In a study of the ethical development of students using the Defining Issues Test, Jeffrey (1993, p. 86) found that "senior students in [both the accounting and business majors] were found to have higher levels of ethical development than entering students." Davis and Welton (1991, p. 451) similarly observed "an ethics maturation process from students' initial exposure to business courses through the graduate level" and concluded that "the students' perceptions of proper ethical behavior matures toward society's expectations during college life." Stevens (1993), in studying the ethical evaluations made by business students and their faculty, concluded that the seniors in the study were more ethically oriented than the freshmen. On the other hand, Beltramini et al. (1984, p. 199) found no significant differences in the ethical concerns of students across academic classifications. Thus, the first studies cited would support the idea that there is a positive relationship between grade level and students' beliefs regarding academic dishonesty, while the last study cited would not lend support to this proposition. It may be the case that this difference in beliefs regarding academic dishonesty will affect students' propensity to engage in whistle-blowing behavior. After considering the results of the just-cited studies, we propose:

H5. Students' propensity to engage in whistle-blowing will be positively related to their grade level.

Grade Point Average (GPA)

Previous studies have provided evidence that those students who do well academically tend to cheat less than other students. Zastrow (1970, p. 157), in an examination of the results of five studies concerning undergraduate college students' propensity to cheat concluded "cheating is less prevalent among students with high grades." His own study of graduate students provides inconclusive evidence in this regard: he notes that all of the students in his study had cheated sometime during their school years. Crown and Spiller (1998, p. 689), in a review of empirical research on collegiate cheating, similarly conclude that "research continues to find a significant negative relationship between cheating and G.P.A." The relationship between GPA and cheating may reflect a higher level of moral development in students with better grades. These students might similarly be expected to be more likely to engage in whistle-blowing. We thus hypothesize:

H6. Students' propensity to engage in whistle-blowing will be positively related to their grade point average.

Gender

Previous studies have reported conflicting evidence regarding the effect of gender on the proclivity to act in an ethical manner. Miesing and Preble (1985) and Arlow (1991) concluded that females are more ethical. Similarly, Beltramini et al. (1984) and Peterson et al. (1991) concluded that female students are more concerned about ethical issues than their male counterparts. However, Stanga and Turpen (1991) conclude that their study does not support the existence of gender differences in ethical judgments. In a recent review of empirical studies regarding ethical decision making, Ford and Richardson (1994, p. 206) found that seven studies "reveal females are likely to act more ethically than males; at least in some situations While seven studies found that sex had no impact on ethical beliefs . . ." Crown and Spiller (1998, p. 685) conclude "the relationship between gender and cheating appears to have become more tenuous in the past 20 years." There is, therefore, mixed evidence with respect to the effect of gender on ethical beliefs and ethical decision-making.

Of particular interest is the effect of gender on the propensity to engage in whistle-blowing. Jones and Gautschi (1988, p. 245) found that women "display a greater tendency to take action when they perceive a questionable business practice." The available evidence thus provides mixed evidence regarding the

relationship between gender and the propensity to engage in academic dishonesty, and possibly the propensity to engage in whistle-blowing. We thus hypothesize:

H7. Female students will be more likely to engage in whistle-blowing behavior.

School

A student's attitude toward cheating and toward engaging in whistle-blowing may vary depending on the school that the student attends. Schools of a denominational nature might be expected to attract student with a different level of moral development than other schools, and the training of students at those schools would be expected to be different as well. In a similar manner, students from small, private universities, which may have a greater emphasis on codes of conduct, might be expected to have higher ethical standards than those from larger public schools. Given the lack of prior studies to support an hypothesis in either direction, and after considering the context of this study, we propose the following exploratory hypothesis:

H8. Students from smaller, private universities will be more likely to engage in whistle-blowing than those from larger, public schools.

METHOD

For this study students at three business schools in New York were surveyed. These schools were units of a large state university and two medium-sized private colleges. The students were enrolled at both the graduate and undergraduate levels. A breakdown of students by sex, grade level, and grade point average is presented in [Table 1](#).

Participation in the study was voluntary. Administering the survey in classroom groups assured anonymity. This guarantee of anonymity was important in that the survey requested information of a sensitive nature.

Procedures

In order to examine student beliefs regarding what constituted ethical behavior in an academic setting, students were administered a survey in class and asked to express their opinion regarding two types of cheating: (a) copying answers on a midterm examination; and (b) plagiarizing a paper. For both scenarios

Table 1. Demographic Characteristics of the Sample ($N = 237$).

Sex	Number ^a	Percentage ^a
Male	129	55.4
Female	104	44.6
Grade level		
Lower division	86	37.4
Upper division	76	33.1
Graduate	68	29.6
Grade point average		
3.51–4.00	48	24.4
3.01–3.50	96	48.7
2.51–3.00	44	22.3
2.01–2.50	8	4.1
1.51–2.00	1	0.5

^aNumber and percentages based on cases with valid responses.

students were asked whether they would report a classmate who cheated in the manner specified (“whistle-blowing”). Students were also asked whether they would agree with the statement that they would be upset if other students in their class were engaged in the given behavior (“upset”), whether they believed that appropriate disciplinary action would be taken if the course instructor knew about the cheating (“organizational responsiveness”), and what action should be taken against a student who had been caught engaged in the given type of academic dishonesty (“consequence”). Finally, students were asked whether they had ever engaged in the specified act of cheating (“have cheated”).

Measures

Responses to the questions regarding the “whistle-blowing,” “upset,” and “organizational responsiveness” questions were collected using a five point Likert scale. A ranking of 1 indicated that the student strongly agreed with the statement; a ranking of 5 indicated that the student strongly disagreed.

Provided responses to the “consequence” questions included “nothing,” “warning,” “fail the test (or paper),” “fail the course,” “suspension,” and “expulsion” from the school. Responses to the “have cheated” question included “yes”; “no, but would if given the opportunity”; and “no, and would not because it is wrong.”

Demographic variables included gender, grade point average, year of college (1 = freshman, 2 = sophomore, 3 = junior; 4 = senior; 5 = graduate student), and school (public vs. private).

Statistical Analysis

Multiple regression analysis was used to determine the variables that are significant predictors of students' whistle-blowing behavior. Independent variables considered included the "upset," "organizational responsiveness," "consequence," and "have cheated" variables, as well as gender, grade level, school and GPA. The relationship between individual variables was further examined using Pearson correlation coefficients.

RESULTS

The results of the multiple regression analysis (see Table 2) indicated that whistle-blowing could be significantly predicted in the "plagiarizing paper" scenario by the "upset with cheating," "appropriate action would be taken," "penalty for cheating," and "school" variables ($F = 9.616, p < 0.001$). The variable "appropriates action would be taken," as well as the rest of the demographic variables (GPA, gender, year) where found to be not significant predictors of whistle-blowing.

Table 2. Results of Multiple Regression Analysis.

Variables	B	T	Sig. T
Dependent			
Would report cheating			
Independent			
Upset with cheating	0.420	5.724	0.000
Appropriate action would be taken	-0.235	-3.145	0.002
Penalty for cheating	-0.189	-2.425	0.016
Have personally cheated	0.145	1.256	0.211
GPA	-0.204	-1.000	0.319
Gender	0.186	1.230	0.220
Year	0.031	1.230	0.650
School	-0.449	-2.462	0.015
R^2	0.295		
Adjusted R^2	0.264		
F	9.616	Sig $F = 0.000$	

Nearly identical results were found for the multiple regression analysis of the data in the “cheating on midterm” scenario. A further analysis in which the data for the two scenarios was combined and a dummy variable (1 = “plagiarizing paper” scenario, 2 = “cheating on midterm” scenario) included yielded similar results, with the dummy variable being insignificant ($t = -1.079$, $p = 0.281$). As a result of these analyses, the remainder of this paper considers only the data from the “plagiarizing paper” scenario.

The results of the tests of each hypothesis follow, along with additional analysis of the data. The means and standard deviations of the responses to the five “ethics” questions, in addition to the demographic variables, are presented in [Table 3](#).

The mean of the responses to the statement “if other students in my class were plagiarizing papers, I would be upset” was 2.25. Of the students, a vast majority (64.1%) of the students agreed (33.3%) or strongly agreed (30.8%) with the statement. Results of a one-sample t -test indicates that the mean is significantly different from 3 (“no opinion”) at the <0.001 level of significance, indicating that the students would be upset by peer cheating. Given that engaging in academic dishonesty, by its very nature, gives an “unfair” advantage to the cheater, this result is not unexpected.

The proposition that students are reluctant to engage in whistle-blowing behavior is supported by the results of this survey. The average of the responses to the statement “I would report a classmate who plagiarized a paper” was 3.58. This mean was significantly above a value of 3.0 (“neither agree nor disagree”), indicating general disagreement with the statement.

As expected, there was a strong positive relationship between the degree to which students are upset by academic dishonesty and their attitude toward reporting instances of such cheating. As indicated in [Table 3](#), this relationship was significant at the <0.001 level, leading to acceptance of Hypothesis 2.

Faculty members at the schools surveyed apparently do an adequate job of taking appropriate action in instances of cheating. From [Table 3](#) it can be seen that the mean of the responses to the statement “if a course instructor knew about plagiarizing an assignment, appropriate disciplinary action would be taken” was 1.89, which was significantly less than 3.0 (“neither agree nor disagree”).

Regarding the existence of a relationship between being upset with cheating and the belief that appropriate action would be taken when a case of cheating occurred, a significantly positive relationship was found. Thus, there is support for the proposition that those students most upset by other students’ cheating are those who believe most strongly that appropriate action would be taken.

No significant relationship was found between the propensity of a student to report a cheater and the belief that appropriate action would be taken. Thus

Table 3. Means, Standard Deviations and Pearson Correlations (with *p*-Values).

	Mean	S.D.	1	2	3	4	5	6	7	8
1. Would report cheater	3.58	1.140								
2. Upset with cheating	2.25	1.137	0.457 (0.000)							
3. Appropriate action would be taken	1.89	0.951	-0.100 (0.127)	0.142 (0.029)						
4. Penalty for cheating	3.27	0.983	-0.253 (0.000)	-0.351 (0.000)	-0.056 (0.392)					
5. Have personally cheated	2.63	0.687	-0.176 (0.007)	-0.364 (0.000)	-0.051 (0.437)	0.280 (0.000)				
6. GPA	3.28	0.382	-0.154 (0.031)	-0.177 (0.013)	-0.044 (0.539)	0.142 (0.047)	0.161 (0.024)			
7. Gender	0.55	0.498	0.164 (0.012)	0.181 (0.006)	-0.057 (0.687)	-0.026 (0.697)	-0.161 (0.014)	-0.154 (0.031)		
8. Year	3.42	1.268	-0.082 (0.218)	-0.052 (0.430)	-0.079 (0.234)	-0.062 (0.350)	0.168 (0.011)	0.304 (0.000)	0.070 (0.293)	
9. School	1.31	0.463	-0.088 (0.176)	-0.082 (0.210)	-0.019 (0.768)	-0.048 (0.465)	0.236 (0.000)	0.087 (0.224)	0.067 (0.311)	0.408 (0.000)

Hypothesis 3 is rejected. While this contradicts the empirical findings previously discussed, it may be that the failure to find a significant relationship is due to the high level of agreement (see [Table 3](#)) among all students that appropriate action would be taken.

The mean of the penalties deemed appropriate for plagiarizing a paper was 3.27, where 1 represents “do nothing” and 6 “expulsion.” Thus the appropriate action to be taken, on average, was viewed as being somewhere between receiving a failing grade on the paper (3) and failing the course (4), with receiving a failing grade on the paper being the modal response (51% of the students chose this response).

Students' view of the severity of the appropriate sanction was significantly negatively related to the “upset” and “whistle-blowing” variables, but not the “appropriate action” variable. This indicates that students who are more upset by academic dishonesty are more likely to believe that more severe sanctions are suitable. Furthermore, those students who favor more severe penalties are more likely to report cheaters. However, there was no significant relationship between students' beliefs regarding the severity of sanctions and the belief that appropriate action would be taken when a case of academic dishonesty occurs. Thus Hypothesis 4 is not supported.

In response to the question as to whether they had ever plagiarized a paper in college, 12.3% of the students indicated that they had plagiarized a paper, 12.7% had not plagiarized but would if they had the chance, and 75.0% would not because it was wrong. While it is discouraging to see that approximately one-quarter of the students would cheat in this manner, this number compares favorably to the figures cited in prior studies.

Student's cheating was significantly related to the “whistle-blowing” variable, with students who had engaged in cheating being less likely to engage in whistle-blowing behavior. Thus Hypothesis 1 is accepted. There was also a significant relationship between students' cheating and the “upset” and “penalty” variables. These relationships indicate that (a) students who are most upset with cheating are those who are least likely to have cheated in the past and that (b) those who have cheated in the past are less likely to report an incident of cheating and are more likely to favor more lenient sanctions for cheating.

One implication of this finding is that while it is generally appropriate for faculty to discuss with their students the sanctions for cheating in their classes, it is especially desirable to do so when the faculty members believe that a more severe sanction is called for than that viewed as being appropriate by the students. Not only would this alert the students as to the potential outcomes of academic dishonesty, but it may also help shape student beliefs as to what an appropriate sanction is when such behavior occurs.

Grade Level

For purposes of analyzing the effect of grade level on students' attitude towards academic dishonesty, students were grouped into three categories: lower division (freshmen and sophomores), upper division (juniors and seniors), and graduate students. The results of the survey indicate that students in higher grades (and especially graduate school) were less likely to have plagiarized a paper than those in lower grades. However, grade level was not significantly related to whistle-blowing behavior. Thus Hypothesis 5 is not supported.

Grade Point Average

Students' attitude toward engaging in whistle-blowing behavior is also significantly correlated with their reported grade point averages (GPA), with students possessing higher grades being more likely to engage in such behavior. Hypothesis 6 is thus supported.

Students' GPA was significantly related to students' attitude towards other students' cheating. The better students (i.e. the ones with higher GPAs) tended to be more upset with cheating by their peers than those who performed less well. It may be that in achieving their high grades, these students have worked harder, and they resent cheating by other students who attempt to obtain higher grades without the necessary work. The relationship between GPA and whistle-blowing may thus reflect the degree to which students are upset by cheating.

GPA was not significantly related to students' belief regarding the appropriateness of disciplinary action taken. With regard to actually having engaged in acts of academic dishonesty, GPA was significant. Students with higher GPAs were less likely to have engaged in academic dishonesty than those with lower GPAs. It thus appears that students with higher grades do not need to cheat to obtain those grades. Conversely, and perhaps ironically, even though students with low GPAs are more likely to cheat, their averages are lower.

Gender

Significant differences were found between the responses provided by the two genders. Female students were more likely to be upset with other students plagiarizing papers, and less likely to have plagiarized a paper. In addition, supporting Hypothesis 7, they were more likely to report a cheater. This result is consistent with prior empirical studies that indicate that females tend to hold more ethical beliefs than males and to behave in a more ethical manner.

School

The students at the private schools were significantly less likely to have personally cheated than those at the public university. However, there were no significant differences between the ethical beliefs of the two groups of students. There is thus no support for Hypothesis 8.

ADDITIONAL ANALYSIS

The correlation matrix in [Table 3](#) suggests a large amount of intercorrelation among the variables in this study. Factor analysis was used to further analyze the responses to the five “ethics” questions, plus the school and year variables, using varimax rotation. Three significant factors (see [Table 4](#)) were identified. The first factor, accounting for 18.4% of the variation in the data, was most heavily loaded on the whistle-blowing, “consequence,” and “have cheated” variables. It thus appears to represent the degree to which students believe that whistle-blowing is an appropriate response to situations where cheating has taken place and that a relatively severe penalty is appropriate. The second variable, accounting for an additional 14.0% of the variation in the data, is most heavily loaded on the school and year variables. It thus represents the variability in the response due to demographic factors. Finally, the third factor, accounting for an additional 12.3% in the variation in the data, is most heavily loaded on the “upset” and “organizational responsiveness” variables. It thus represents the degree to which students think

Table 4. Results of Factor Analysis.

	Factor 1	Factor 2	Factor 3
SS Loadings	1.2875	0.9792	0.8617
Proportion variance	0.1839	0.1399	0.1231
Cumulative variance	0.1839	0.3238	0.4469
Variable	Loadings		
	Factor 1	Factor 2	Factor 3
Would report cheater	0.704		0.144
Upset with cheating	0.440	-0.141	0.887
Appropriate action would be taken	0.158		-0.207
Penalty for cheating	-0.539	-0.119	
Have personally cheated	-0.529	0.275	0.101
School		0.745	
Year		0.551	

cheating is unfair and should be punished, although they, themselves, would not necessarily resort to whistle-blowing to ensure that such action would take place.

DISCUSSION

Both college students and practicing CPAs were found by [Tyson \(1992\)](#) to see themselves acting far more ethically than others. In a study of business students, [Magner \(1989, p. A32\)](#) reported that “students in the survey were often more confident in their own sense of ethics than in the morality of their peers. While 46% said their own ethics were about the same as those of other students at their school, 51% reported their own ethics were higher.” Similarly, [Newstrom and Ruch \(1976, p. 23\)](#) note, “respondents perceived their fellow students as more lax in their ethics.” However, there is, as they note, (p. 26) “a major paradox: All students cannot be correct when they claim that they are more ethical in thought and deed than their average classmate.” Similarly, [Peterson et al. \(1991, p. 737\)](#) speaks of “an apparent paradox regarding students’ increased concern with business ethics and their alleged decline in personal ethics Because of its implications – both for society and business – the apparent paradox warrants more detailed attention.”

A possible explanation for the “paradox,” consistent with the data, is suggested by the apparent inconsistency between students who engage in academic dishonesty and their beliefs regarding such behavior. Of the 53 students who admitted to having cheated on an exam in college, 66.0% would be upset (37.7%) or very upset (28.3%) by the same behavior in their peers! Similarly, of the 27 students who have not cheated on an examination but would if given the opportunity, 66.7% would be upset (33.3%) or very upset (33.3%) by similar behavior by other students in their classes. With regard to plagiarizing papers or assignments, approximately one-third of the students who have engaged in such behavior would be upset or very upset by their peers engaging in such behavior. A similar percentage of those students who have not plagiarized but would if given the opportunity would be upset by such behavior by other students in their class.

An explanation for these results is suggested by a study by [White & Dooley \(1993\)](#) that concluded that “the majority of students [in the study] were able to determine the correct ethicality of the cases presented to them” (p. 643). They further conclude that “students prefer to act ethically when other variables are held constant” and that “students prefer to act practically when other variables are held constant” (p. 649). They note that “ethicality and practicality are often at odds with each other” (p. 649) and that in this type of situation “students’ responses indicated they believed practicality was more important than ethicality” (p. 643).

These results suggest that the difference between students' ethical beliefs and their perceptions of others' actions may be due to a difference in how the situation is "framed" due to information asymmetry. When an individual is making a decision with an ethical component, all of the information relevant to that decision, both personal and with regard to other stakeholders, can be considered and given appropriate weight. An observer of this individual, when evaluating the ethicality of a decision, is frequently not aware of the personal dimensions of the context in which the decision was made (which primarily affects its "practicality") and may regard the decision as unethical. However, had the observer been knowledgeable about all of the information relevant to the situation, the observer might very well have made the same (practical) decision.

Take, for example, a student who believes that cheating on a test is wrong. However, the night before a test, the student's roommate is injured in a serious accident. The student, faced with the decision as to whether to help the roommate or study for the test, chooses the former course of action. Unprepared for the test the next day, the student is faced with a choice between a practical solution and an ethical one. The student chooses the practical alternative and copies someone else's answers, with the possible rationalization that this act enabled the student to get the grade he would have had anyway if the accident had not occurred and he had studied. An observer of this student's cheating, unaware of the accident, considers the act unethical. Had he been in the same situation, it is possible that he would have engaged in the same behavior.

There are several limitations associated with this study. The first of these is the use of standard survey techniques to collect data of a relatively sensitive nature (i.e. students' self-reporting of cheating behavior and their reporting of cheating). However, this should not affect the conclusions reached here, as prior research (Burton & Near, 1995) has shown that this type of data can be accurately collected using this approach.

In addition, the generalizability of the conclusions may be limited due to the sample selection. While students from three widely differing schools were selected as respondents, all of them were from schools located in one state. Furthermore, all of the students were taking accounting or business classes. The generalizability of the results to students outside these fields may be limited.

CONCLUSION

This study found that in general students were reluctant to engage in peer reporting of academic dishonesty. Those students most likely to engage in whistle-blowing believed more lenient penalties were appropriate for cheating than those who would

not report cheating. They were also less likely to have personally cheated in the past, to be more upset with their peer's cheating, and to more likely to believe that appropriate action will be taken by the course instructor. Consistent with prior studies which have shown female students and students with higher GPA to be more ethical, these students were also more likely to engage in whistle-blowing behavior.

This study also found that while students are generally upset with cheating, a significant proportion of them engage in such behavior. However, even among students who had engaged in cheating, most would be upset by their peers engaging in similar behavior. This result, along with prior observations that most students believe themselves to be more ethical than their peers, reinforces the importance of context in ethical decision-making. In situations where practicality and ethicality conflict, practicality often wins out. It is thus important when teaching students business ethics that they confront realistic business situations so that they can understand the potential impact of situational variables on ethical decision-making.

REFERENCES

- Allmon, D., Page, D., & Roberts, R. (2000). Determinants of perceptions of cheating: Ethical orientation, personality and demographics. *Journal of Business Ethics, 23*, 411–422.
- Arlow, P. (1991). Personal characteristics in college students' evaluation of business ethics and corporate social responsibility. *Journal of Business Ethics, 10*, 63–69.
- Barnett, T., & Vaicys, C. (2000). The moderating effect of individuals' perceptions of ethical work climate on ethical judgements and behavioral intentions. *Journal of Business Ethics, 27*, 351–362.
- Beltramini, R., Peterson, R., & Kormetsky, G. (1984). Concerns of college students regarding business ethics. *Journal of Business Ethics, 3*, 195–200.
- Brabeck, M. (1984). Ethical characteristics of whistle blowers. *Journal of Research in Personality, 18*, 41–53.
- Burton, B., & Near, J. (1995). Estimating the incidence of wrongdoing and whistle-blowing. *Journal of Business Ethics, 14*, 17–30.
- Collinson, M. N-K. (1990). Apparent rise in students' cheating has college officials worried. *The Chronicle of Higher Education*, January 17, A33, A35.
- Crown, D., & Spiller, M. (1998). Learning from the literature on collegiate cheating: A review of empirical research. *Journal of Business Ethics, 17*, 683–700.
- Davis, J., & Welton, R. (1991). Professional ethics: Business students' perceptions. *Journal of Business Ethics, 10*, 451–463.
- Davis, S., Grover, C., Becker, A., & McGregor, L. (1992). Academic dishonesty: Prevalence, determinants, techniques, and punishments. *Teaching of Psychology, 19*, 16–20.
- Ford, R., & Richardson, W. (1994). Ethical decision making: A review of the empirical literature. *Journal of Business Ethics, 13*(3), 205–221.
- Hooks, K., Kaplan, S., & Schultz, J. (1994). Enhancing communication to assist in fraud prevention and detection. *Auditing, 13*(2), 86–130.

- Jeffrey, C. (1993). Ethical development of accounting students, non-accounting business students, and liberal arts students. *Issues in Accounting Education*, 8(2), 86–96.
- Jones, T., & Gautschi, F. (1988). Will the ethics of business change? A survey of future executives. *Journal of Business Ethics*, 7, 231–248.
- Magner, D. (1989). Students urge graduate business schools to emphasize ethical behavior and require courses in standards. *The Chronicle of Higher Education*, 35(March 29), A31–A32.
- Miceli, M. P., & Near, J. P. (1984). The relationships among beliefs, organizational position, and whistleblowing status: A discriminant analysis. *Academy of Management Journal*, 27(4), 687–705.
- Miceli, M. P., & Near, J. P. (1992). *Blowing the whistle*. New York: Lexington Books.
- Miesing, P., & Preble, J. (1985). A comparison of five business philosophies. *Journal of Business Ethics*, 4, 465–476.
- Nazario, S. L. (1990). Schoolteachers say it's wrongheaded to try to teach students what's right. *The Wall Street Journal*, B1, B8.
- Newstrom, J., & Ruch, W. (1976). The ethics of business students: Preparation for a career. *AACSB Bulletin* (April), 21–29.
- O'Clock, P., & Okleshen, M. (1993). A comparison of ethical perceptions of business and engineering majors. *Journal of Business Ethics*, 12, 677–687.
- Peterson, R., Beltramini, R., & Kozmetsky, G. (1991). Concerns of college students regarding business ethics: A replication. *Journal of Business Ethics*, 10, 733–738.
- Sherrill, D., Salisbury, J., Horowitz, B., & Friedman, S. (1971). Classroom cheating: Consistent attitude, perceptions, and behavior. *American Educational Research Journal*, 8(3), 503–510.
- Stanga, K., & Turpen, R. (1991). Ethical judgement on selected accounting issues: An empirical study. *Journal of Business Ethics*, 10, 739–747.
- Stevens, R. (1993). A comparison of ethical evaluations of business school faculty and students: A pilot study. *Journal of Business Ethics*, 12, 611–619.
- Trevino, L. K., & Youngblood, S. A. (1990). Bad apples in bad barrels: A causal analysis of ethical decision-making behavior. *Journal of Applied Psychology*, 75(4), 378–385.
- Tyson, T. (1992). Does believing that everyone else is less ethical have an impact on work behavior? *Journal of Business Ethics*, 11, 707–717.
- White, C., & Dooley, R. (1993). Ethical or practical: An empirical study of students' choices in simulated business scenarios. *Journal of Business Ethics*, 12, 643–651.
- Zastrow, C. (1970). Cheating among college graduate students. *Journal of Educational Research*, 64(4), 157–160.

THE INFLUENCE OF POLITICAL IDEOLOGY ON DIT SCORES: FACT OR ARTIFACT?

Richard A. Bernardi*, David F. Bean
and Dawn W. Massey

ABSTRACT

Concern about the validity of the DIT and Fisher and Sweeney's measurement of conservative, moderate and liberal political orientation using a seven-point Likert scale motivates our study. We perform two experiments to investigate these interrelated issues. First, we assess the degree to which 569 undergraduate students' political orientation as measured by a seven-point Likert scale associates with their corresponding political orientation as measured by a nine-point Likert scale. We find differences in categorization of subjects depending upon scale used, suggesting problems with the sampling distribution arise when a seven-point Likert scale is used for categorizing subjects. Second, we measure 115 students' political orientation utilizing a nine-point Likert scale to assess Fisher and Sweeney's findings. Our results suggest that Fisher and Sweeney's findings may relate to their using a seven-point Likert scale in measuring political orientation rather than a flaw in the DIT's validity resulting from an embedded political ideology.

* While all three authors contributed equally to this research, the lead and second authors are involved in several research projects and alternate lead author responsibilities.

INTRODUCTION

In recent years, a plethora of ethics research in accounting has used Rest's (1979) Defining Issues Test (DIT) as a measurement instrument (e.g. Louwers et al., 1997). This increase is not only due to an increased emphasis on ethics as an important consideration in accounting research, but also is due to an increase in the number of Ph.D. graduates writing dissertations investigating various aspects of accounting ethics (e.g. Bernardi, 1991; Massey, 1997; Ponemon, 1988; Thorne, 1997). Although these accounting-ethics researchers studied various issues, a common thread in the research is their use of the DIT. For instance, Ponemon examined the average level of moral development (as measured by the DIT) by staff level in public accounting. Bernardi found that high-moral development (as assessed using the DIT) managers detected fraud at a significantly higher rate when they were provided with information concerning client integrity ratings. Massey and Thorne both developed tests of moral reasoning based on the Defining Issues Tests that used auditing-based ethical dilemmas.

Despite widespread use of the DIT, some researchers have questioned its validity. For instance, Gilligan (1982) voiced concern about the DIT, maintaining that it favored (opposed) the male (female) justice- (care-) oriented reasoning. Interestingly, Bernardi and Arnold (1997) find that, rather than scoring lower than men, women actually scored significantly higher than men on the DIT. Bernardi and Arnold note that Gilligan's results may have resulted from sampling bias since her sample only consisted of 32 subjects divided into eight groups of four (two men and two women).

Fisher and Sweeney (2002, p. 3) question the continued use of the DIT, because research to date provides only "*relatively modest relationships found between moral reasoning of accountants . . . and professional judgments and behavior.*" Perhaps a more cogent argument would be that the DIT uses generic ethical dilemmas and that the use of auditing-based ethical dilemmas (Massey, 1997; Thorne, 1997) might provide clearer results. Nonetheless, Fisher and Sweeney's (2002) argument continues that scores on the DIT "*favor those with political liberalism to political conservatism*" (p. 3).

We use two experiments to examine: (1) the appropriateness of using a seven-point Likert scale to assess the three categories of political orientation (i.e. conservative, moderate, liberal); and (2) whether Fisher and Sweeney's (1998) findings are robust if one uses a sample distribution derived from a nine-point Likert scale. Our analysis indicates that Fisher and Sweeney's findings are not supported by an evenly distributed nine-point scale. Our findings do not change when we segment our nine-point data using Fisher and Sweeney's argument that only those selecting the middle value (i.e. five on a nine-point scale) are moderates,

which calls into question findings using Fisher and Sweeney's application of their seven-point scale.

THEORETICAL BACKGROUND AND LITERATURE REVIEW

Moral Development

We can partially describe the cognitive-developmental theory of moral development (Kohlberg, 1973) using four characteristics: cognitive, structural, developmental and sequential. First, the cognitive-developmental theory of moral development maintains that cognition is an integral part of the ethical decision process. Second, cognitive structures provide a framework for moral reasoning – comprising six stages over three levels. Third, moral development is a cognitive process that develops over time. Fourth, the developmental process is sequential because moral reasoning progresses in one direction only (Ponemon & Gabhart, 1993; Rest & Narváez, 1994). That is, while individuals may progress to higher levels of moral reasoning structures over time, they cannot regress.

Rest and Narváez (1994) describe this process of moral development using a staircase as an example. Increases in moral reasoning are likened to an individual climbing a staircase; development (climbing the staircase) occurs in discrete steps. According to this developmental perspective, how morality is perceived is a function of an individual's level of moral reasoning (Kohlberg, 1958, 1973). The three levels of Kohlberg's moral reasoning are: pre-conventional, conventional, and post-conventional or principled.

Individuals at the two stages of the pre-conventional level assess the moral acceptability of alternative ways to resolve a moral dilemma by the rewards and punishments they attach to various outcome choices. Individuals at the two stages of the conventional level determine the moral acceptability of alternate ways to resolve a moral dilemma through their interpretation of group norms. Individuals at the two stages of the post-conventional or principled level utilize complex notions of universal fairness and an internal sense of responsibility and justice to define the moral acceptability of alternate ways to resolve a moral dilemma.

Measuring Moral Development Using the DIT

The DIT is a psychometric instrument used to assess moral reasoning. It appears often in psychology and social science studies (Rest, 1986; Rest et al., 1999).

Accounting ethics researchers also commonly use the DIT (Louwers et al., 1997). However, some criticize accounting ethics researchers' use of the DIT because of the DIT's inability to aid in assessing moral behavior (e.g. Thornton, 2000, pp. 241–244). Nonetheless, even Thornton (2000, p. 244) concedes, “Despite these criticisms, the DIT is an excellent measurement instrument that describes how the accounting profession makes cognitive moral judgments.” Indeed, prior researchers have found that the DIT generally displays adequate validity (construct validity, content validity, and empirical validity) and reliability (temporal stability, internal consistency, and immunity from artificial score inflation).

Because the DIT is based on Kohlberg's (1969, 1973) cognitive theory of moral development, it has construct validity (Frankfort-Nachmias & Nachmias, 1992). Additionally, the DIT exhibits both elements of content validity: face validity and sampling validity (Frankfort-Nachmias & Nachmias, 1992). With respect to face validity, Rest et al. (1974) report that 65.2% of doctoral students in moral philosophy and political science attained scores on the DIT in the post-conventional or principled range while only 50.4% of college students attained scores on the DIT in the post-conventional or principled range. Thus, it appears that the test is, indeed, capturing a cognitive skill more closely associated with moral philosophy and political science Ph.D. students than college students. Sampling validity (Frankfort-Nachmias & Nachmias, 1992) of the DIT is underscored by results in Alozie (1976). In Alozie's (1976) study, subjects' DIT scores correlated (at $r = 0.75$) to their scores on a similar test developed by Kohlberg (the Moral Judgment Interview). Finally, as a measure of a cognitive ability, the DIT also exhibits empirical validity (Frankfort-Nachmias & Nachmias, 1992) through its correlation with education (e.g. Dortzbach, 1975).

Davison and Robbins's (1978) review of several studies establishes for the DIT two measures of reliability: temporal stability and internal consistency (Frankfort-Nachmias & Nachmias, 1992). According to Davison and Robbins (1978), the test-retest reliability of scores on the DIT is generally in the high 0.70s or 0.80s. Similarly, Davison and Robbins (1978) find that internal consistency of the DIT (as measured by Cronbach's alpha) is in the upper 0.70s.

Finally, McGeorge (1975) establishes that the DIT is immune to artificial score inflation. In McGeorge's experiment, three groups of subjects completed the DIT twice. In a fully randomized design, each of the groups completed the DIT once with ordinary instructions. In the control group, the completion of the DIT was also according to the original instructions. In the experimental group, McGeorge asked subjects to “fake” (either good or bad) on their other completion of the DIT. Importantly, although McGeorge found subjects' DIT scores were significantly lower in the “fake bad” conditions (regardless of whether they were in the ordinary-bad or bad-ordinary group), he found no significant differences in

DIT scores for any other condition. Thus, DIT scores can be “faked downward” but not “faked upward.” Accordingly, McGeorge’s results confirm a primary assumption of moral development theory: an individual at a given stage of moral development is incapable of understanding higher order moral arguments. That is, an individual can lower his/her score on the DIT by identifying lower order responses but should not be able to identify higher order responses as the higher order responses are beyond the individual’s cognitive capacity.

Political Ideology and the DIT – The Current Debate

Despite studies suggesting the validity and reliability of the DIT (as described above), some researchers question the validity of the DIT and believe that the DIT produces a measure of moral reasoning that is biased by political orientation. Emler et al. (1983) assert that the DIT score is a measure of political attitude. Fisher and Sweeney (2002) suggest that the DIT has an underlying political content that over- (or under-) states an individual’s true capacity for moral reasoning. This may cause an individual to consciously or unconsciously reject more advanced responses even though the individual understands the underlying moral reasoning. Fisher and Sweeney (2002, p. 7) argue that:

[I]f a politically conservative person comprehends the cognitive complexity of principled DIT responses and chooses to avoid ranking those responses as important because he or she associates this viewpoint with liberalism, then the P score would not be measuring this person’s most advanced moral thinking . . . Similarly, a politically liberal test-taker may overstate his or her DIT P score by ranking higher-order response items as important because of their association with liberal ideology, without comprehending the underlying moral content.

Fisher and Sweeney’s Studies

To empirically assess whether the DIT has an underlying political content that masks moral reasoning, Fisher and Sweeney conduct three studies: Fisher and Sweeney (1998), Sweeney and Fisher (1999), and Fisher and Sweeney (2002). In the first study, Fisher and Sweeney (1998) used 112 undergraduate accounting majors as experimental subjects. Subjects first responded to the DIT, a National Election Survey (see National Election Studies, 2002, for the most recent version) and also indicated on a seven-point scale how liberal or conservative they were concerning important political and social issues. The authors then coded subjects’ responses to the seven-point scale as follows: subjects choosing 1–3 were coded as political liberals, subjects choosing 4 were coded as political moderates, and subjects choosing 5–7 were coded as political conservatives.

After a two-week period, Fisher and Sweeney randomly assigned subjects to groups who were asked to complete the DIT from either: the perspective of an “extremely conservative” person or the perspective of an “extremely liberal” person. Subjects in Fisher and Sweeney’s study decreased their P scores by responding to the DIT from an “extremely conservative” perspective and increased their P scores by responding to the DIT from an “extremely liberal” perspective. Accordingly, Fisher and Sweeney suggest that some items in the DIT may have a political content separate from their contribution to the assessment of moral reasoning.

In the second study, Sweeney and Fisher (1999) replicate the first study using a subject pool of 137 undergraduate accounting majors. Notably, they conducted the same within-subjects design experiment, using the same seven-point scale to classify subjects as politically liberal, politically moderate or politically conservative as in Fisher and Sweeney (1998). Not surprisingly, Sweeney and Fisher’s (1999) findings are strikingly similar to those in Fisher and Sweeney (1998).¹

In the third study, Fisher and Sweeney (2002) used 221 undergraduate accounting majors from two midwestern universities as experimental subjects. They utilized a between-subjects design and randomly assigned subjects to either the control or experimental condition. Both groups of subjects completed the DIT. The control group completed the DIT under standard test instructions (see [http://www.coled.umn.edu/CSED/](http://www.coled.umn.edu/CSSED/)). In the experimental group, Fisher and Sweeney (2002, p. 13) provided subjects with modified instructions informing them that:

The Defining Issues Test is a standardized measure of moral judgment. We are interested in whether you can identify the statements designed to represent the highest level of moral judgment.

Subjects in the 2002 study also indicated on a seven-point scale how liberal or conservative they were concerning important political and social issues. Subjects’ responses to the seven-point scale served as the basis for classifying subjects as liberal (those who chose 1–3 on the scale), moderate (those who chose 4 on the scale) or conservative (those who chose 5–7 on the scale).

The experimental results show that, for liberals, the mean DIT P score was significantly lower ($p < 0.10$) under the modified instructions than under the standard instructions. For moderates, there were no significant differences according to the instructions the subjects received. For conservatives, the mean DIT P score was significantly higher ($p < 0.05$) under the modified instructions than under the standard instructions. Based on their results, Fisher and Sweeney (2002) conclude that the DIT systematically overstates (understates) the moral reasoning abilities of political liberals (conservatives).

Further, when subjects received standard instructions, Fisher and Sweeney (2002) found a significantly higher ($p < 0.001$) mean P score for liberals than the mean P scores for moderates and conservatives. In contrast, when subjects received the modified instructions, their mean P scores did not differ by political ideology ($p = 0.920$). These results lead Fisher and Sweeney (2002) to suggest that instructions to the DIT may be causing subjects to pursue DIT statements consistent with their preferred political ideology, preventing the instrument from presenting a true measure of the person's moral competence.

If true, the results from much of the ethics based research utilizing the DIT are questionable and this body of research becomes extremely difficult to assess and interpret. However, we have great concern about the methodology employed in Fisher and Sweeney's studies. In particular, we take exception to Fisher and Sweeney's use of a seven-point Likert scale that is unevenly apportioned to classify subjects as liberal, moderate, or conservative (i.e. 1-to-3 are for conservative, 4 is moderate, and 5-to-7 are for liberal). While this methodology is convenient and provides an approximately equal distribution between liberals, moderates, and conservatives in Fisher and Sweeney's studies, we believe it is inappropriate to assign only one data point to the moderate classification and three each to the liberal and conservative classifications. Indeed, according to Siegel and Castellan (1988, p. 24):

In a nominal scale, the scaling operations partition a given class into a set of mutually exclusive subclasses. The only relation involved is that of *equivalence*; that is, the members of any one subclass must be equivalent in the property being scaled. (Emphasis in the original.)

In classifying subjects as political liberals, conservatives and moderates (i.e. nominal classifications), Fisher and Sweeney give three choices on their scale for political liberals as well as for political conservatives, but only one choice for political moderates. As a result, Fisher and Sweeney's classification scheme is inconsistent with Siegel and Castellan's basic requirement for subclass equivalence in nominal classification. Accordingly, to achieve subclass equivalence (Siegel & Castellan, 1988), a better measure for classifying subjects as political liberals, moderates and conservatives might derive from a nine-point scale that is evenly apportioned when assigning subjects to categories. Such an expanded scale provides an equal number of choices for each of the three nominal classifications.

Given Fisher and Sweeney's research and our concern about their basic methodology for determining political orientation, we propose to test first whether political orientation classification differences result from using a seven-point versus a nine-point scale. The hypothesis to test this assertion follows:

H1. Differences in classification of subjects as political conservatives, moderates and liberals will arise from basing the classification on a seven-point scale that is unevenly apportioned to classify subjects (as in Fisher & Sweeney, 1998, 2002) as opposed to basing the classification on a nine-point scale that is evenly apportioned to classify subjects.

In anticipation of differences in the classification of subjects as political conservatives, moderates and liberals emerging from use of the nine- versus seven-point scale (i.e. if we find support for H1), we also undertake a second experiment to replicate Fisher and Sweeney's studies – using political classifications based on responses to a nine-point scale that is evenly apportioned – to test the same three hypotheses that they used in their research (Fisher & Sweeney, 1998, 2002):

H2a. Accounting students with a liberal political identification will attain higher DIT P scores, on average, than accounting students who are not liberal.

H2b. Accounting students who are not politically conservative will decrease their DIT P scores when responding from a conservative perspective.

H2c. Accounting students who are not politically liberal will increase their DIT P scores when responding from a liberal perspective.

EXPERIMENT ONE: SUBJECTS, MEASURES AND RESULTS

Sample

Five hundred and sixty-nine students enrolled in accounting classes at three private institutions in the Northeast participated in the first experiment. All provided usable responses. On average, approximately 50% of the students are female, and their mean age is 19.6.

Political Attitudes Survey

Subjects completed a political attitudes survey (see [Appendix A](#)). The first three questions ([Appendix A](#), items a to c) on the political attitudes survey are drawn from the National Election Studies (NES) (NES, 2002) and ask subjects to indicate their opinions about three social and economic issues on a nine-point Likert scale ([Appendix A](#), items a to c). Additionally, we asked subjects to indicate their political orientation on two scales: (1) the same seven-point scale Fisher and

Sweeney (1998, 2002) used; and (2) a nine-point version of the scale Fisher and Sweeney (1998, 2002) used (see Appendix A, items d and e). Notably, one-half of the subjects in our study completed the seven-point political orientation scale first, followed by the nine-point version of the scale; the other half of the subjects in our study completed the nine-point scale first, followed by the seven-point scale.

To assess the validity and reliability of subjects' self-reported political orientation, we correlated participants' responses to the three social and economic issues drawn from the NES with both their political orientation indicated on the seven-point scale ($0.345, p < 0.001$) and their political orientation indicated on the nine-point scale ($0.366, p < 0.001$). Results of these correlations suggest the subjects' self-reported political orientations valid and reliable measurements for use in the study.

Accordingly, we then use subjects' responses to the seven-point (nine-point) political orientation scale to classify subjects as political liberals, moderates or conservatives according to the uneven (even) distributions in Fisher and Sweeney (the present study). Next, we compare subjects' assessed political orientation classifications, as derived from the seven- and nine-point scales so that we may test whether Hypothesis 1 holds.

Classification Differences (H1)

Table 1 maps and assesses subjects' categorization as liberals, moderates and conservatives according to Fisher and Sweeney's (1998, 2002) seven-point scale that is unevenly apportioned against subjects' categorization as liberals, moderates or conservatives political classifications based on responses to a nine-point scale that is evenly apportioned. Of the 209 students who indicated a liberal orientation on the seven-point scale, 94 (italicized values in Table 1) switched from a liberal to moderate orientation on the nine-point scale (i.e. 55% consistency). Of these 94, 74 (78%) switched from the 3 ranking on the seven-point scale to the 4 ranking on the nine-point scale. Only ten of the original 207 moderates on the seven-point scale switched their political orientation on the nine-point scale (i.e. 94% consistency). Finally, of the 153 students who indicated a conservative orientation on the seven-point scale, 75 (underlined values in Table 1) switched to a moderate orientation on the nine-point scale (i.e. 51% consistency). Of these 75, 59 (82%) switched from the 5 ranking on the seven-point scale to the 6 ranking on the nine-point scale.

When compared to a nine-point scale, the seven-point scale classifies more individuals as having liberal and conservative orientations and, at the same time, classifies fewer individuals as having a moderate orientation. That is, while the number of liberals (conservatives) decreased from 209 (153) to 122 (81),

Table 1. Seven- versus Nine-Point Scale Distributions.^{a,b}

	Liberal			Moderate	Conservative			Total
	One	Two	Three	Four	Five	Six	Seven	
One	6	1	1					8
Two	3	21	3					27
Three	2	35	43	7				87
Four		<u>3</u>	<u>74</u>	22	<u>1</u>			100
Five		<u>3</u>	<u>13</u>	155	<u>14</u>			185
Six			<u>1</u>	20	<u>59</u>	<u>1</u>		81
Seven				3	23	27		53
Eight					2	14	1	17
Nine							11	11
Total	11	63	135	207	99	42	12	569
	209			207	153			

Note: Single (double) underlined data are the individuals who switched from a Conservative (Liberal) political orientation on a seven-point scale to a Moderate orientation on the nine point scale.

^aThe data represent the number of individuals.

^bShaded areas indicate classification agreement between the two scales.

moderates increased by like amounts (i.e. 94 for liberals and 75 for conservatives). Additionally, use of the seven-point scale results in a different classification for a small number of subjects (ten) as moderates when they are classified using the nine-point scale as either liberals ($n = 7$) or conservatives ($n = 3$). Thus, we would classify 31% of the subjects ($[\underline{94} + \underline{75} + 10]/569$) differently using Fisher and Sweeney's (1998) unevenly apportioned scale as compared to classifications based on an evenly apportioned nine-point scale. As shown in Table 2, these differences are statistically significant ($\chi^2 = 29.5$; $p < 0.001$), suggesting that Hypothesis 1 holds.

Of the 207 participants who indicated a conservative political orientation on the seven-point scale 155 (74.9%) expressed a political orientation of five (i.e. dead center) on the nine-point scale. However, we did not anticipate a change in the political orientations of these individuals; rather, we expected a change for individuals who indicated either of the adjoining preferences (i.e. three or five) on the seven-point scale. Of the 135 individuals who indicated three on the seven-point scale, 74 (54.8%) switched to a four (moderate political orientation) on the nine-point scale. Similarly, of the 99 individuals who indicated five on the seven

Table 2. Contingency Tables for Seven- and Nine-Point Scales.^{a,b}

	Liberal	Moderate	Conservative	χ^2 (<i>p</i> -value)
<u>H1: Nine-Point Scale</u>				
Observed (Table 1, 9-pt)	21.4%	64.3%	14.2%	} 29.5 (0.001)
Expected (Table 1, 7-pt)	36.7%	36.4%	26.9%	
<u>Seven-Point Scales</u>				
Observed (Table 1, 7-pt)	36.7%	36.4%	26.9%	} 16.2 (0.001)
Expected (F&S, 7-pt)	25.9%	27.7%	46.4%	

^aAll observed frequencies were computed using the Table 1 data. For instance, the observed frequency of 21.4% (36.7%) for the nine-point scale (seven-point scale) includes the 122 (209) individuals who identified themselves as having a liberal orientation (points 1-to-3 on either scale) divided by the total sample of 569.

^bExpected frequencies for the nine-point scale were computed from our seven-point data appearing in Table 1. Expected frequencies for the seven-point scales are from Fisher and Sweeney's seven-point data (1998, p. 909). percentage calculations are the same as in Note a.

point scale, 59 (59.6%) switched to a six (moderate political orientation) on the nine-point scale.

Moreover, as shown in Table 2, the percentage of subjects in this study that were categorized as political liberals, moderates or conservatives based on their responses to Fisher and Sweeney's seven-point, unevenly apportioned scale also differ from the percentage of subjects that Fisher and Sweeney (1998) categorized as political liberals, moderates or conservatives ($\chi^2 = 16.2$; $p < 0.001$). This finding suggests that beyond differences in subjects' classification according to scale used (i.e. seven- versus nine-point), fundamental differences between our sample and Fisher and Sweeney's (1998) also exist. These results reinforce the need to replicate Fisher and Sweeney's (1998, 2002) studies and re-assess whether the hypotheses they propose are robust when classifying subjects as political liberals, moderates or conservatives according to a nine-point, evenly apportioned scale.

NES and HERI Databases

Part of the data in Table 3 is taken from the National Election Studies (NES) (2002), which represent the averages for a 28-year period (1972–2000). The NES data are

Table 3. Comparison of Study Data with National Data.

NES Categories	NES Data	NES M1	F&S Data	NES M2	Our Data	HERI Data	HERI Categories
Extremely Liberal	2.2	24.8	25.9	12.3	21.4	24.7	Far Left
Liberal	10.1							Liberal
Slightly Liberal	12.6						
Moderate	34.4	34.4	27.7	66.4	64.3	54.6	Moderate
Slightly Conservative	19.4	40.7	46.4	21.3	14.2	20.7	
Conservative	18.1						Conservative
Extremely Conservative	3.2							Far Right

Legend:

Method 1 (M1)
(7-point scale) All Liberal, only Moderate, all Conservative

Fisher & Sweeney
(7-point Scale) All Liberal, only Moderate, all Conservative (i.e. same as M1)

Method 2 (M2)
(7-point scale) Liberal Extremely Liberal + Liberal
Moderate Slightly Liberal, Moderate + Slightly Conservative
Conservative Extremely Conservative + Conservative

Our Data
(9-point scale) Liberal 1-to-3 on the 9-point scale
Moderate 4-to-6 on the 9-point scale
Conservative 7-to-9 on the 9-point scale

HERI Data
(5-point Scale) Liberal Far Left + Liberal
Moderate Moderate
Conservative Far Right + Conservative

from voter surveys taken before major elections (i.e. typically surveys of 45-year old American voters). The data represent a *nine-point* scale: (1) Extremely Liberal; (2) Liberal; (3) *Slightly* Liberal; (4) Moderate/*Middle of the Road*; (5) *Slightly* Conservative; (6) Conservative; and (7) Extremely Conservative (emphasis added). Of the remaining two points, “8” indicates “haven’t thought much about this” and “0” (i.e. the ninth response) indicates “Don’t know” (NES question G1a.T). These non-responses (i.e. selections of 8 and 0) represent approximately 29% of those surveyed during the 28-year period. The data represent averages, which we standardized to 100%.

Some of the data in [Table 3](#) also comes from the Higher Education Research Institute (HERI) (2002): these data also represent the averages for the same

28-year period (1972–2000). The HERI data are from students about to enter their freshman year of college and represent the responses of “over 404,000 students [who] completed the Freshman Survey at 717 participating institutions nationwide” (HERI, 2002). HERI gathered its data on a *five-point* scale: (1) Far Left; (2) Liberal; (3) *Middle-of-the-Road*; (4) Conservative; and (5) Far Right (emphasis added). Because the data represent completed responses, we did not need to standardize the data.²

Experiment One finds that either political opinions are scale dependent or there may be differences between the populations in Fisher and Sweeney’s (1998) sample and our sample. In Table 3, we group Fisher and Sweeney’s data as well as our own data into three categories: liberal, moderate and conservative. For comparative purposes, we also group NES data and HERI data into the same three categories. Because NES derives its data from a seven-point scale, we use two methods to group the data. In Method One, which is consistent with Fisher and Sweeney’s approach, we categorize only those from the middle designation on the seven-point NES scale, “moderate,” as moderates. Using Method One, we categorize as liberals those who are “extremely liberal,” “liberal,” or “slightly liberal”; we categorize as conservatives those who are “extremely conservative,” “conservative,” or “slightly conservative.”

In Method Two, which is consistent with our approach, we categorize those who are in the three middle designations on the NES, “slightly liberal,” “moderate,” and “slightly conservative,” as moderates. Using Method Two, we categorize as liberals those who are “extremely liberal” or “liberal”; we categorize as conservatives those who are “extremely conservative” or “conservative.”

The HERI data come from a five-point scale. We group the HERI data into the three categories (liberal, moderate, and conservative) by including as moderates those HERI designates as “moderate.” For categorizing the HERI data, we include as liberals those who are “far left” and “liberal”; conservatives are those who are “far right” and “conservative.” Interestingly, the NES data, as grouped using Method Two, closely approximate the grouped HERI data. Accordingly, these two groupings may provide comparative benchmarks that are superior to the NES data, as grouped using Method One.

As shown in Table 3, Fisher and Sweeney’s data, as grouped into liberal, moderate and conservative categories, closely approximate the data from the NES, as grouped into the same categories using Method One. In contrast, Fisher and Sweeney’s data, as grouped into the three categories, closely approximates neither the data from NES, as grouped using Method Two, nor the grouped data from HERI.

Data from our nine-point scale, as grouped into liberal, moderate and conservative categories, are similar to both the NES data, as grouped using Method Two as well as the grouped HERI data. In fact, groupings of our data are within ten percentage points of HERI data in all categories.

These findings lead to two questions about Fisher and Sweeney’s research. First, did Fisher and Sweeney use the most appropriate scale for comparison to their data? That is, are the political orientations of college seniors more closely aligned with those of the average 45-year-old American voter (i.e. NES data) or those of a college freshman (i.e. HERI data)? Second, why didn’t Fisher and Sweeney attempt a bootstrap procedure – moving the two “slightly” categories in the NES data to the middle-of-the-road category (i.e. grouping the NES data using Method Two) – to assess the robustness of their results?

EXPERIMENT TWO: SUBJECTS, MEASURES AND RESULTS

In Experiment Two, as in Fisher and Sweeney’s (1998, 2002) studies, subjects first responded to the DIT, a national election survey, and indicated their political orientation on a Likert scale. Different from Fisher and Sweeney’s studies, however, subjects in our study utilized a nine-point, evenly apportioned scale to indicate their political orientation. Similar to Fisher and Sweeney (1998, 2002), within a three-week interval subjects complete the DIT a second time – but this time from either the perspective of an “extremely liberal” or “extremely conservative” person. Our research methodology controls for political orientation by assigning students to the three treatment groups based on the political orientation they indicated and their DIT P score.

Sample

One hundred and thirty-two freshman and sophomore business students enrolled in accounting classes at three private institutions in the Northeast provided complete responses to both parts of the experiment. Of the 132 students, we eliminated 17 (12.9%) because they failed the meaningless or consistency checks on the DIT. This left 115 students in the final sample. These students took the DIT twice during a two-to-three-week period.

Political Attitudes Survey

As in Experiment One, the students completed a political attitudes survey (See Appendix B). The first five questions (Appendix B, items a to e) on the political attitudes survey are drawn from the National Election Studies (NES, 2002) and ask subjects to indicate their opinions about social and economic issues on a nine-point

Likert scale. Additionally, we asked subjects to indicate their political orientation on a nine-point, evenly apportioned version of the scale Fisher and Sweeney (1998, 2002) used. The participants' responses to the five social and economic issues drawn from the NES correlated ($0.464, p < 0.001$) with their political orientation indicated on the nine-point scale, suggesting that subjects' self-reported political orientations are valid and reliable measures for use in Experiment Two.³

We then use subjects' responses to the nine-point political orientation scale to classify them as political liberals, moderates or conservatives. We use subjects' political orientation classifications, as derived from the nine-point scale, to assess whether Hypotheses 2a, 2b and 2c hold.

Defining Issues Test

We use the three-story version of the DIT to measure the subjects' moral development (Rest, 1979).⁴ The DIT presents subjects with three ethical dilemmas. Twelve considerations that reflect moral reasoning at the upper five stage levels of moral development follow each dilemma (i.e. the DIT does not include Stage One considerations). For each dilemma, the test directs individuals to first rate all twelve considerations (as having Great, Much, Some, Little or No importance to their resolution to the ethical dilemma) and then rank the four most important of the considerations for resolving the dilemma. We use subjects' rankings to determine DIT P scores – the percent of post-conventional or principled (i.e. Stage Five and Six) considerations a subject uses in resolving the three moral dilemmas. DIT P scores range from zero to 90; a score of zero (90) indicates that all ranked considerations are in the lower four (upper two) stage levels.

Additionally, the DIT also assesses reliability of subject responses by providing "M" (for meaningless) scores and consistency checks. Because the "M" items are "written to sound lofty and pretentious but [are] not [intended] to mean anything" (Rest, 1979, p. 4), they screen for subjects who typically emphasize meaningless items in considering the ethical dilemmas and therefore lack the proper test-taking set. The DIT's consistency checks allow the researcher to screen for subjects who haphazardly respond to the instrument. Rest (1979, p. 7) reports that between 5 and 15% of the sample is generally lost because subjects fail to pass the DIT's reliability checks.

Political Identifications and DIT P Scores (H2a)

Table 4 presents the DIT scores by political orientation for the sample of 115 students. In addition to providing the P scores, we also provide equivalent scores

Table 4. DIT Scores^a by Self-Defined Political Orientations.

	Stage 3	Stage 4	Stage 5	Stage 6	P Score
Liberals (<i>n</i> = 22)					
Mean	22.71	35.82	18.59	5.99	24.58
Moderates (<i>n</i> = 58)					
Mean	21.81	32.03	25.10	3.13	28.23
Conservatives (<i>n</i> = 35)					
Mean	19.73	33.85	23.67	3.06	26.73
Overall (<i>n</i> = 115)					
Mean	21.45	32.76	23.73	3.64	27.37
Rest's College ^b (<i>n</i> = 270)					
Mean	14.33	28.35	35.03	8.16	43.19
Fisher & Sweeney ^c (<i>n</i> = 112)					
Mean	13.33	36.63	34.15	4.01	38.16

^a All data is standardized data (i.e. equivalent scoring to P scores).

^b Rest's data are from the Guide for the Defining Issues Test (1987, p. 3–13).

^c Fisher and Sweeney's data are from Fisher and Sweeney (1998).

for stages three, four, five and six. For comparison, we also provide the average scores for Fisher and Sweeney's sample (1998) and the data from Rest's (1987) standardization sample. Hypothesis 2a tests whether accounting students with a liberal political identification will, on average, have a higher average DIT P score than accounting students who are not liberal in their political identification. Because political liberals in our study have a slightly *lower* DIT P score than political conservatives, it is evident that Hypothesis 2a is not supported by the data in Table 4.

Effect of College Level and Version of DIT

The average DIT P score for the subjects in our study was significantly lower than both the average DIT P score Rest (1987) reports for a standardization sample of college graduates as well as the average DIT P score Fisher and Sweeney (1998) report for their sample of accounting students. Although interesting, these differences are not entirely unexpected given the subtle differences in the samples from which they are drawn (cf., Bernardi & Arnold, 1997). That is, Rest's sample includes 270 college graduates with B.A. degrees, while Fisher and Sweeney limit their sample of 112 to junior and senior accounting majors at two schools. Our research includes 115 freshman and sophomore business students – from all majors – at three schools.

Rest's (1987, p. 3–13) data indicates that a 13.82-point difference exists between the DIT P scores of college graduates (44.85) and senior high school students (31.03). If one assumes a uniform increase, an individual's DIT P score should increase throughout their college experience at a rate of approximately 3.45 points per year ($13.82/4$). For instance, we would reduce Fisher and Sweeney's (1998) and Sweeney and Fisher's (1998) reported average P scores of 38.2 by 6.9 (2×3.45) to 31.3 because college juniors and seniors make up their sample whereas college freshmen and sophomores make up our sample.

For those studies that used the six-story version of the DIT (i.e. Fisher & Sweeney, 1998; Sweeney & Fisher, 1998), a second adjustment must be made because the highest score on the six (three) story version is 95 (90). Thus, after adjusting for the six-story versions of the DIT, we would reduce Fisher and Sweeney's (1998) and Sweeney and Fisher's (1998) projected P scores of 31.3 for freshmen and sophomores to 29.7 ($31.3 \times [90/95]$). Consequently, the average P score of 27.4 reported in this research is not substantially different than that reported in Fisher and Sweeney's (1998) and Sweeney and Fisher's (1998) when adjusted for a freshman and sophomore sample and the version of the DIT we used in the present research. Other differences in the DIT scores could arise from differences in school type (i.e. public versus private).

Political Perspectives and Changes in DIT P Scores (H2b & H2c)

The data in Panel A of Table 5 provide the two sets of average scores for each manipulation of political perspective: (1) scores based on subjects responses to the DIT according to ordinary instructions (denoted "Self-Presentation"); and (2) scores based on subjects responses to the DIT according to instructions to respond from either an "Extremely Liberal Perspective" or an "Extremely Conservative Perspective." The proportions of subjects for each political orientation in our sample approximate those for college freshmen, which are drawn from HERI (2002) and reported in Table 3: liberals are 19.1% in this study versus 24.7% according to HERI data appearing in Table 3; moderates are 50.4% (this study) versus 54.6% (HERI data); conservatives are 30.5% (this study) versus 20.7% (HERI data).

Hypothesis 2b examines whether accounting students who are *not* politically conservative will decrease their DIT P scores when responding from a conservative perspective. The data in Table 5 indicate that, rather than decreasing, there was a slight increase in P scores for both of the groups who were not conservative and who were told to respond from a conservative perspective; however, these increases were not significant.

Table 5. Effects of Political Perspective on DIT Scores.

	Stage 3	Stage 4	Stage 5	Stage 6	P Score		Stage 3	Stage 4	Stage 5	Stage 6	P Score
Panel A: Even distribution to all political attitudes (3–3–3)											
Liberals											
Self-presentation (<i>n</i> = 11)						Self-presentation (<i>n</i> = 11)					
Mean	25.80	33.30	19.96	3.79	23.75	Mean	19.63	38.34	17.23	8.20	25.43
Extremely conservative perspective						Extremely liberal perspective					
Mean	25.04	34.89	19.95	4.21	24.16	Mean	22.10	32.14	20.85	9.58	30.43
Moderates											
Self-presentation (<i>n</i> = 26)						Self-presentation (<i>n</i> = 32)					
Mean	22.02	37.30	20.99	4.51	25.50	Mean	21.73	27.28	28.70	2.26	30.96
Extremely conservative perspective						Extremely liberal perspective					
Mean	20.48	33.67	22.90	4.02	26.92	Mean	15.20	38.12	23.68	5.01	28.69
Conservatives											
Self-presentation (<i>n</i> = 18)						Self-presentation (<i>n</i> = 17)					
Mean	18.72	33.30	24.43	3.15	27.58	Mean	22.10	33.01	22.83	3.14	25.97
Extremely conservative perspective						Extremely liberal perspective					
Mean	16.54	36.20	22.98	3.50	26.48	Mean	17.81	34.98	20.72	6.04	26.76
Panel B: F&S distribution of political attitudes (4–1–4)											
Liberals											
Self-presentation (<i>n</i> = 16)						Self-presentation (<i>n</i> = 19)					
Mean	23.89	32.45	25.25	3.63	28.88	Mean	20.64	30.21	24.24	4.73	28.97
Extremely conservative perspective						Extremely liberal perspective					
Mean	22.25	36.01	21.50	4.48	25.98	Mean	19.13	35.24	19.80	4.13	27.93
Moderates											
Self-presentation (<i>n</i> = 14)						Self-presentation (<i>n</i> = 16)					
Mean	23.64	38.15	17.85	4.27	22.13	Mean	22.98	26.43	29.78	1.19	30.97

Extremely conservative perspective						Extremely liberal perspective					
Mean	19.95	30.03	25.43	3.06	28.49	Mean	13.33	37.19	26.41	3.83	30.24
Conservatives											
Self-presentation (<i>n</i> = 25)						Self-presentation (<i>n</i> = 25)					
Mean	19.00	34.90	22.60	3.77	26.37	Mean	21.46	33.13	23.85	3.78	27.63
Extremely conservative perspective						Extremely liberal perspective					
Mean	18.31	36.59	21.46	3.90	25.36	Mean	17.30	36.36	21.51	5.94	27.45

Hypothesis 2c examines whether accounting students who are *not* politically liberal will increase their DIT P scores when responding from a liberal perspective. The data in [Table 5](#) indicate that the P scores for conservatives who were told to respond from a liberal perspective follow the anticipated direction for Hypothesis 2c in that they increased. However, the increase was slight and therefore not statistically significant. On the other hand, the average DIT P score for moderates who were told to respond from a liberal perspective actually decreased; but, again, the difference was not significant.⁵

Nine vs. Seven Point Results

The data in Panel A of [Table 5](#) use our nine-point scale to split our sample into three evenly apportioned groups (i.e. 1-to-3 for liberals, 4-to-6 for moderates, and 7-to-9 for conservatives). An accepted procedure to test the effect choice of cutoff point has on the outcome of tests (i.e. to assess the robustness of the findings) is to move those individuals who are adjacent to a cutoff point from one grouping to another. In this case, we assess the effect of our choosing cutoff points based on three evenly apportioned groups by also choosing cutoff points using the procedure that [Fisher and Sweeney advocate \(1998, 2002\)](#) (i.e. including only those selecting the middle value, 5, as moderates and including those selecting 1-to-4 as liberals and those selecting 6-to-9 as conservatives).

By redistributing subjects according to the cutoff points Fisher and Sweeney advocated in their studies, the proportion of subjects in our study included in each category of political orientation more closely approximate those in [Fisher and Sweeney \(1998\)](#). That is, in our study (Fisher & Sweeney's study), 30.4 (25.9)% of subjects are liberals, 26.1 (27.7)% are moderates and 43.5 (46.4)% are conservatives.

Using the method of groupings advocated by Fisher and Sweeney, Panel B of [Table 5](#) provides two sets of average scores for each manipulation of political perspective for our data. There are no significant differences between DIT scores based on self-presentation and DIT scores based on instructions to respond from either an "extremely liberal" or "extremely conservative" perspective. Accordingly, as indicated in Panel B of [Table 5](#), the results of our tests are very robust; none of our findings change from altering the cutoff points we used for our groupings to those Fisher and Sweeney advocated.

The findings of our research combined with the HERI and NES data suggest that a better approximation would be obtained from a seven-point scale by using a political split of 1 and 2 for liberals, 3 to 5 for moderates, and 6 and 7 for conservatives rather than Fisher and Sweeney's groupings of 1 to 3 for conservative, 4

for moderates, and 5 to 7 for conservatives. Our results also reinforce Siegel and Castellán's (1988, p. 24) basic requirement for subclass equivalence in nominal classifications.

CONCLUSIONS

Because we find differences in subjects' classification according to scale used (i.e. seven- vs. nine-point), our results call into question the appropriateness of using a seven-point, unevenly apportioned scale for classifying subjects as political liberals, moderates or conservatives. Further, because we find fundamental differences between political orientation classifications among subjects in our sample and Fisher and Sweeney's (1998), our results reinforce the need to replicate Fisher and Sweeney's (1998, 2002) studies and re-assess the robustness of the hypotheses they proposed.

Rather than affirming the validity of the DIT, our research questions the methodology Fisher and Sweeney used. Thus, while our results do not indicate that political orientation can affect DIT P scores, we believe that a single study cannot stand alone. We do not believe that Fisher and Sweeney employed a valid procedure for categorizing their sample as political liberals, moderates or conservatives (cf., Siegel & Castellán, 1988). Consequently, our study suggests that further empirical research is necessary.

With respect to the differences between our study and those of Sweeney and Fisher, other researchers should remember three points. First, all of Fisher and Sweeney's/Sweeney and Fisher's studies use samples from two Midwestern universities. Both of these schools are public universities affiliated with their respective states. In the current study, our sample comes from three private universities located in the Northeast. A limitation in most behavioral studies is that the samples represent only a small portion of the population and therefore, the results may not generalize (i.e. there is some degree of self-selection bias in university populations). Our results indicate that, even though Sweeney and Fisher/Fisher and Sweeney have several studies indicating the same results, their findings are not generalizable to a different sample.

Second, when one segments a sample into parts for analysis, the choice of segments may drive the results. To avoid this possibility, most research methodologies perform additional data analysis segmenting their samples differently to test how robust their findings are (i.e. our use of the groupings advocated by Fisher and Sweeney to reinforce our findings with respect to Hypotheses 2b and 2c, as shown in Panel B of Table 5). This is especially critical when there are differences in the data and national samples (e.g. NES & HERI). The only way for Fisher and

Sweeney to address this concern in their four studies is to expand their moderate range to include individuals whose political orientations are from three to five and limiting their liberal (conservative) range to those indicating political orientations of one and two (six and seven). Such a test would enhance the analysis of their data.

Finally, a simple regression analysis should indicate if scores on the DIT are dependent on political orientation. Thus, if a liberal political orientation accounts for a high DIT P score, in our (Sweeney & Fisher's, 1998) data, liberals indicating a political orientation of one should have the highest DIT P score, while conservatives indicating a political orientation of nine (seven) should have the lowest average score on the DIT. Indeed, although Rest et al. (1999, p. 83) indicate that political orientation explains a large percentage of variance in DIT scores (i.e. over 40% of the variance in *some* studies), data in this study as well as in Bailey et al. (2002) refute this premise. In this study, we can attribute less than one percent of the variation in DIT P scores to political orientation. In Bailey et al.'s (2002, p. 9) study, the authors attribute less than five percent of the variation in DIT P scores to political orientation.

Two limitations are present in this research. First, the research sample includes students from three private schools. While this sample includes one more school than Fisher and Sweeney's sample, the robustness of our findings may be restricted and may not be applicable to the entire population of accounting students. Second, the research assumes that Rest's Defining Issues Test is capable of measuring moral reasoning.

NOTES

1. Since Sweeney and Fisher (1999) replicates Fisher and Sweeney (1998) with nearly identical hypotheses and results, for ease of exposition, the remainder of our paper focuses on the 1998 study (i.e. Fisher & Sweeney, 1998).

2. The political orientation scale on the DIT2 approximates the HERI (2002) *five-point* scale: (1) Very liberal; (2) Somewhat liberal; (3) *Neither liberal nor conservative*; (4) Somewhat conservative; and (5) Very Conservative (emphasis added).

3. Item d of the NES survey has only four points compared to the nine for the other four questions. To provide equal weighting, we scored choice one as 1.0, choice two as 3.67, choice three as 6.33, and choice four as 9.0. Note also that while the correlation between participants' self-indicated political orientation and their responses to the *five* issues drawn from the NES in Experiment Two (0.464) is higher than the correlation between participants' self-indicated political orientation and their responses to the *three* issues drawn from the NES we previously reported for Experiment One (0.387), both correlations are highly significant (i.e. $p < 0.001$ in both cases). Further, the sum of the five items used in this experiment alone correlates (0.896, $p < 0.001$) with the sum of the first three items, which were used in both experiments.

4. The reason we use the 1979 version of the DIT is because all of the accounting research using the DIT prior to 2000 used this version. By calling into question the 1979 version of the DIT, Fisher and Sweeney also challenge the validity of the results of over ten years of accounting research.

5. We also note that the manipulation affected politically liberal individuals who received instructions to answer from an extremely liberal perspective. That is, average P Score in the self-presentation condition, 25.43, increased by five-points to 30.43 when liberals responded from an extremely liberal perspective; however, this difference was not significant.

REFERENCES

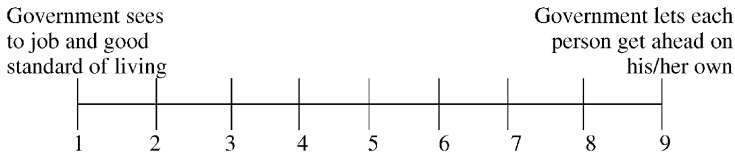
- Alozie, C. (1976). *An analysis of the interrelationship of two measures used in the measurement of moral judgment development: The Kohlberg moral judgment interview and the rest defining issues test*. Unpublished doctoral dissertation. University of Minnesota.
- Bailey, C. D., Phillips, T. J., Jr., & Scofield, S. B. (2002). The impact of education on the moral reasoning abilities of auditing students. Presented at the 7th Annual Symposium on Ethics in Accounting in San Antonio, TX.
- Bernardi, R. A. (1991). *Fraud detection: An experiment testing differences in perceived client integrity and competence, individual auditor cognitive style and experience, and accounting firms*. Unpublished doctoral dissertation. Schenectady, NY: Union College.
- Bernardi, R. A., & Arnold, D. F., Sr. (1997). An examination of moral development by gender, staff level, and firms within public accounting, *Contemporary Accounting Research* (Fall), 653–668.
- Davison, M., & Robbins, S. (1978). The reliability and validity of objective indices of moral development. *Applied Psychological Measurement*, 2(3), 391–403.
- Dortzbach, J. (1975). *Moral judgment and perceived locus of control: A cross-sectional developmental study of adults aged 25–74*. Unpublished doctoral dissertation. University of Oregon.
- Emler, N., Renwick, S., & Malone, B. (1983). The relationship between moral reasoning and political orientation. *Journal of Personality and Social Psychology*, 45(5), 1073–1080.
- Fisher, D., & Sweeney, J. (1998). The relationship between political attitudes and moral judgment: Examining the validity of the defining issues test. *Journal of Business Ethics*, 17(8), 905–916.
- Fisher, D. G., & Sweeney, J. T. (2002). Morality vs. ideology: Implications for accounting ethics research. *Advances in Accounting Behavioral Research*, 5, 141–160.
- Frankfort-Nachmias, C., & Nachmias, D. (1992). *Research methods in the social sciences* (4th ed.). New York: St. Martin's Press.
- Gilligan, C. (1982). *In a different voice*. Cambridge, MA: Harvard University Press.
- Higher Education Research Institute (HERI) (2002). *Freshmen survey results*. www.gseis.ucla.edu/~heri/cirp-freshmen-survey_results.htm.
- Kohlberg, L. (1958). *The development of models of moral thinking and choice in the years ten to sixteen*. Unpublished doctoral dissertation. University of Chicago.
- Kohlberg, L. (1969). Stages and sequences: The cognitive developmental approach to socialization. In: D. Goslin (Ed.), *Handbook of Socialization Theory and Research*. Chicago: Rand McNally.
- Kohlberg, L. (1973). The claim to moral adequacy of a highest stage of moral judgment. *Journal of Philosophy*, 70(Oct), 630–646.

- Louwers, T., Ponemon, L. A., & Radke, R. (1997). Examining accountants' ethical behavior: A review and implications for future research. In: V. Arnold & S. Sutton (Eds), *Behavioral Accounting Research: Foundations and Frontiers*. Sarasota, FL: American Accounting Association.
- Massey, D. W. (1997). *An investigation into the assessment of auditors professional moral abilities and their improvement through the use of task-properties feedback*. Unpublished doctoral dissertation. Storrs, CT: University of Connecticut.
- McGeorge, C. (1975). The susceptibility to faking of the defining issues test of moral development. *Developmental Psychology*, 11, 108.
- National Election Studies (NES) (2002). *The NES guide to public opinion and electoral behavior* (<http://www.umic.edu/~nesguide/nesguide.htm>). Ann Arbor, MI: University of Michigan, Center for Political Studies [producer and distributor].
- Ponemon, L. A. (1988). *A cognitive-developmental approach to the analysis of certified public accountants ethical judgments*. Unpublished doctoral dissertation. Schenectady, NY: Union College.
- Ponemon, L. A., & Gabhart, D. (1993). *Ethical reasoning in accounting and auditing*. Vancouver, Canadian Certified General Accountants' Research Foundation.
- Rest, J. R., Narváez, D., Bebeau, M. J., & Thoma, S. J. (1999). *Postconventional moral thinking: A neo-Kohlbergian approach*. Mahwah, NJ: Erlbaum.
- Rest, J. R. (1979). *Defining issues test*. Center for the Study of Ethical Development, Minneapolis, MN: University of Minnesota Press.
- Rest, J. R. (1986). *Moral development: Advances in research and theory*. New York: Praeger.
- Rest, J. R. (1987). *Guide for the defining issues test*. Minneapolis, MN: Center for the Study of Ethical Development.
- Rest, J. R., Cooper, D., Coder, R., Masanz, J., & Anderson, D. (1974). Judging important issues in moral dilemmas – An objective test of development. *Developmental Psychology*, 10(4), 491–501.
- Rest, J. R., & Narváez, D. (1994). *Moral development in the professions*. Hillsdale, NJ: Lawrence Erlbaum Associates.
- Siegel, S., & Castellan, N., Jr. (1988). *Nonparametric statistics for the behavioral sciences*. NY: McGraw-Hill.
- Sweeney, J., & Fisher, D. (1998). An examination of the validity of a new measure of moral judgment. *Behavioral Research on Accounting*, 10, 139–158.
- Sweeney, J., & Fisher, D. (1999). Politics, faking, and self-presentation: How valid is the P score of the defining issues test. *Research on Accounting Ethics*, 5, 51–75.
- Thorne, L. (1997). *The influence of social interaction on auditors' moral reasoning*. Unpublished doctoral dissertation. Montreal, Canada: McGill University.
- Thornton, J. (2000). Challenges to the defining issues test: A new perspective on accountants' moral development. *Research on Accounting Ethics*, 7, 225–252.

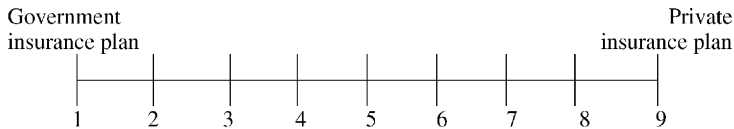
APPENDIX A

Political Attitudes Survey: Experiment One

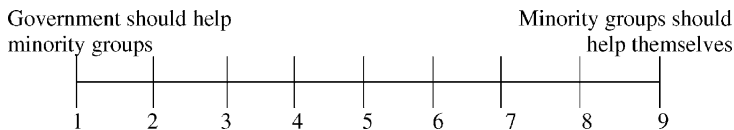
- (a) Some people feel that the federal government in Washington should see to it that every person has a job and good standard of living. Others think that the government should just let each person get ahead on his/her own. And of course, other people have opinions somewhere in between. Where would you place yourself on this scale?



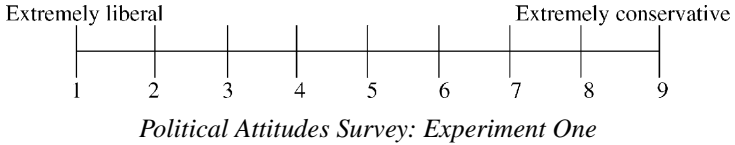
- (b) There is much concern about the rapid rise in medical and hospital costs. Some feel that there should be a government insurance plan that would cover all medical and hospital expenses. Others feel that medical expenses should be paid by individuals and through private insurance like Blue Cross. Where would you place yourself?



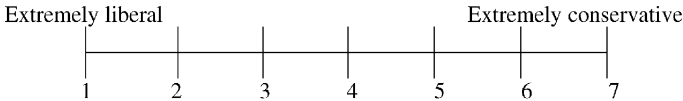
- (c) Some feel that the federal government in Washington should make every effort to improve the social and economic position of African-Americans and other minority groups. Others feel that the government should not make any special effort to help minorities because they should help themselves. Where would you place yourself on this scale?



- (d) Concerning important political and social issues, where would you place yourself on the following NINE-POINT scale?



(e) Same question as before concerning important political and social issues, however, this time where would you place yourself on the following SEVEN-POINT scale?



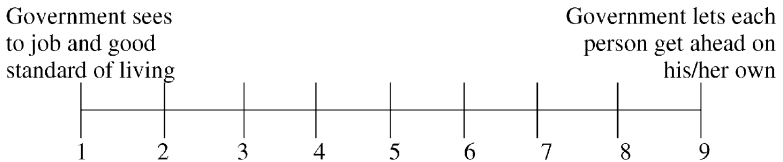
- f. Your first major
- Double-major (specify areas)
- g. When you anticipate graduating
- h. Your gender (check one box)
- i. Your date of birth

Month		Year	
Male	<input type="checkbox"/>	Female	<input type="checkbox"/>
Month	<input type="text"/>	Year	<input type="text"/>

APPENDIX B

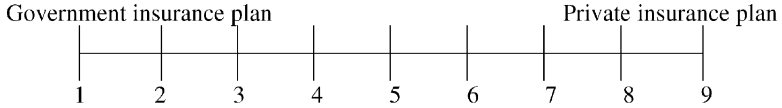
Political Attitudes Survey: Experiment Two

(a) Some people feel that the federal government in Washington should see to it that every person has a job and good standard of living. Others think that the government should just let each person get ahead on his/her own. And of course, other people have opinions somewhere in between. Where would you place yourself on this scale?

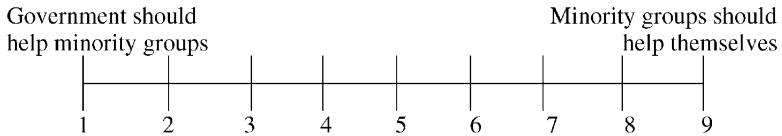


(b) There is much concern about the rapid rise in medical and hospital costs. Some feel that there should be a government insurance plan that would cover

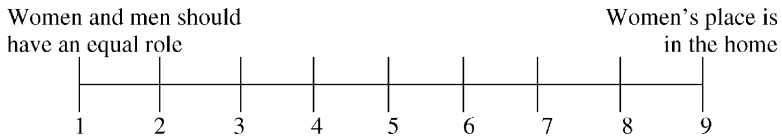
all medical and hospital expenses. Others feel that medical expenses should be paid by individuals and through private insurance like Blue Cross. Where would you place yourself?



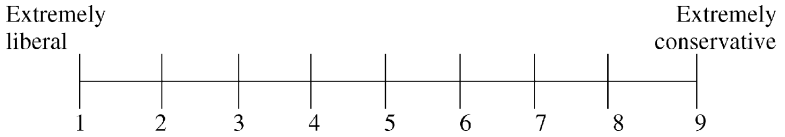
- (c) Some feel that the federal government in Washington should make every effort to improve the social and economic position of African-Americans and other minority groups. Others feel that the government should not make any special effort to help minorities because they should help themselves. Where would you place yourself on this scale?



- (d) There has been much discussion concerning abortion during recent years. Which of the following opinions best agrees with your view?
- (1) Abortion should never be permitted.
 - (2) Abortion should be permitted only if the life and health of the woman is in danger.
 - (3) Abortion should be permitted if, due to personal reasons, the woman would have difficulty in caring for the child.
 - (4) Abortion should never be forbidden, since one should not require a woman to have a child she doesn't want.
- (e) There has been a lot of talk about women's rights. Some people feel that women should have an equal role with men in running business, industry, and government. Others feel that the women's place is in the home. Where would you place yourself on this scale.



- (f) Concerning important political and social issues, where would you place yourself on this scale?



- f. Your first major
 Double-major (specify areas)
 g. When you anticipate graduating
 h. Your gender (check one box)
 i. Your date of birth

Month		Year	
Male		Female	
Month		Year	

ETHICS IN AUDITING: AN EXAMINATION OF AUDITOR INDEPENDENCE

Mark C. Mitschow and Nader Asgary

ABSTRACT

According to former SEC Chairman Harvey Pitt, there is a crisis of confidence in U.S. business and markets. This crisis has led to the bankruptcy of several major enterprises and the demise of Arthur Andersen. At the root of this crisis is auditor independence.

For a variety of reasons, the 1980s S&L crisis is an excellent vehicle for examining auditor independence. This paper examines the behavior of the independent auditors of Savings and Loan Holding Companies (SLHCs). A general pattern was observed when analyzing the data. First, a positive relationship existed between the issuance of non-unqualified (i.e. "unclean") audit opinions and termination of the audit engagement. Second, the most significant predictors of auditor opinion in time t were resolution and audit opinion in time $t - 1$. Third, after the issuance of an unclean opinion and the subsequent termination of the audit engagement, the new independent auditor generally issued similar unclean opinions.

These findings appear to have several generalizable consequences for public accounting. First, auditors issuing unclean opinions risk dismissal by their clients. Second, independent auditors may have been late to recognize

the S&Ls' financial deterioration. Finally, firms that changed auditors tended to receive the same audit opinion from their new auditor.

INTRODUCTION

There is currently a crisis of confidence in U.S. financial markets, much of it driven by scandals involving questionable accounting practices and apparent audit failures (Pitt, 2002). According to Alan Greenspan, the accounting scandals are a significant factor inhibiting economic recovery (Kirchhoff, 2002, C1) The collapse of public confidence in auditor independence has led to the demise of Arthur Andersen and spawned a number of proposals to increase regulation and outside oversight of the public accounting profession.

The question of auditor independence is the most important one facing the public accounting profession today, for it threatens both the profession's reputation and its autonomy. It is therefore crucial to understand both the nature and the extent of threats to auditor independence. As Greenspan's testimony before Congress (Kirchhoff, 2002, C1) illustrates, if the accounting profession does not address the crisis of confidence in auditor independence other bodies will do it for us, with incalculable effects on the future of the industry.

The size of the debacle and the volume of information on the public record make the Savings and Loan (S&L) crisis an excellent vehicle for examining auditor independence. The S&L crisis was the largest financial disaster in U.S. history (Mayer, 1990, p. 1). The cost of resolving insolvent S&Ls was over \$150 billion, not including interest on the federal debt issued to bail out depositors (estimated at an additional several hundred billion dollars). In addition, the damage done to the reputation of professions such as law and public accounting – as well as the substantial judgments rendered against specific practitioners – was immense (Mayer, 1990, p. 18).

Regulators require every federally insured depository institution to have its financial statements audited by an independent public accounting firm. Critics argue the wide scale failure of S&Ls in the late 1980s occurred without warning from the S&L's auditors.¹ Several possible explanations for these assertions have been considered. S&L independent auditors may have been reluctant to issue unclean audit opinions for fear that the client would terminate the audit engagement. Further, the rapid financial deterioration of certain S&Ls may have made it impossible for CPAs to promptly warn financial statement users. Finally, it is possible that the incentives faced by independent auditors may have made them reluctant to address client firm deterioration until some triggering event took place.

Data provided to the SEC represents an opportunity to address criticisms of the public accounting profession in a focused setting. The size of the failures and the amount of publicly available data provide researchers with a great deal of information. Furthermore, just as an impending trip to the gallows tends to clarify one's mind, the size of the judgments against public accounting firms² has forced the profession to focus on issues related to auditor independence.

Data on publicly traded S&Ls has been analyzed to infer S&L auditor behavior. Using data from the SEC, Savings and Loan Holding Companies (SLHCs) that issued publicly traded stock between 1983 and 1989³ have been examined to answer two primary questions:

- (1) Is there an association between the issuance of an unclean audit opinion and auditor turnover?
- (2) Are critics of the public accounting profession correct in asserting that auditors were slow to issue unclean audit opinions on troubled institutions?

The answers to these questions allow for some preliminary observations regarding the behavior of S&L CPAs. These observations can in turn shed light on the more general issue of auditor independence. They can also help assess the causes and cures for the current accounting crisis.

The remainder of this paper proceeds as follows. The next section establishes the motivation for the paper, while the next section consists of an explanation of the research questions. This is followed by the section that outlines the data used in this study. Then a section where the results are presented. The concluding section outlines some future research topics.

MOTIVATION

Auditor Independence

According to Henry Paulson of Goldman Sachs, "American business has never been under such scrutiny. To be blunt, much of it is deserved" (Murray, 2002, p. A4). A great deal of this scrutiny currently revolves around improper accounting at Enron, Adelphia Cable, and a host of other publicly traded companies. Earnings restatements and SEC enforcement actions have become a daily occurrence, with a predictable affect on the stock market. Arthur Andersen ceased operations in August 2002 due to a felony conviction involving the shredding of Enron documents. In short, auditor independence is again a crucial issue because public skepticism of financial information poses a serious threat both to the public accounting profession and the ability of firms to raise capital.

Previous independence questions have revolved around issues such as CPA advertising, consulting, auditor-client financial dealings and limited liability partnerships. Currently the Securities and Exchange Commission is proposing severe limitations on the ability of public accounting firms to provide other consulting services to audit client, and Congress is debating numerous measures that would place the public accounting profession under greater outside control. Most significantly, the Enron scandal has led to the destruction of Arthur Andersen. Thus, auditor independence is arguably the most significant question currently facing the public accounting profession.

Before we can address the propriety and effectiveness of proposals to improve auditor independence, it is important to assess the current state of independence. Specifically, has auditor independence been systematically compromised in the past, and if so, what was the cause? Without answers to these questions it will be difficult to ascertain either the necessity or the probable effectiveness of current proposals to improve auditor independence.

While it took place in the 1980s, the Savings & Loan crisis still represents an excellent vehicle for examining auditor independence for several reasons. First, many of the independence questions raised by the S&L crisis are similar to those underlying the current accounting crisis. Were auditors late in issuing unclean audit opinions? Did audit clients successfully engage in opinion shopping? Should the public accounting profession re-examine the way it inculcates and enforces ethical standards among accounting professionals? Second, the size of the S&L crisis and the large volume of publicly available material (e.g. lawsuits, Congressional investigations, newspaper reports, government filings, etc.) create an excellent opportunity to examine auditor independence. Third, the S&L crisis was one of the largest financial disasters in U.S. history. If evidence of auditor independence problems cannot be found there, then it is hard to imagine where such evidence can be found.

Literature Review

Auditor independence has been an important topic in the accounting literature for several decades. Mutchler (1985) examined publicly available financial disclosures and determined that the going concern opinion “has marginal information content for financial statement users” (Mutchler, 1985, p. 669), thereby suggesting that independent audit opinions are valuable to financial statement users. McKeown et al. (1991) examined cases where companies went bankrupt without ever receiving a qualified opinion. They determined that hidden fraud was a significant factor in bankruptcies of non-financially stressed companies and

that there was an inverse relationship between client firm size and the issuance of a going concern opinion. These findings are especially relevant given the robust economic climate of the late 1990s – a climate that did not lend itself to the creation of financially stressed firms – and the size of recent high-profile bankruptcies and accounting scandals (e.g. Enron, WorldCom, Adelphia).

Johnson and Lys (1990) examined the factors associated with auditor switches. They determined that a change in client firm activities was responsible for many audit terminations (Johnson & Lys, 1990, p. 288). The authors initially speculated that the client firm's desire to receive more favorable treatment from the new (and usually smaller) audit firm played a role in auditor changes. However, they were unable to discover any significant evidence of opinion shopping (Johnson & Lys, 1990, p. 298). Finally, Johnson and Lys (1990, p. 306) found that auditor-client firm disputes were not a significant factor in auditor changes.

Statement on Auditing Standards (SAS) No. 59 was issued to address the apparent reluctance of auditors to issue going concern opinions. Raghunandan and Rama (1991) examined firms that went bankrupt before and after SAS 59 and determined that implementation of the standard had made auditors more likely to issue going concern opinions to both financially stressed and bankrupt firms. However, Carcello et al. (1995) examined over 600 bankruptcies between 1972 and 1992 and concluded that the issuance of SAS 59 did not lead to an increase in going concern opinions. In addition, recent high profile bankruptcies and accounting failures suggest that public accountants may still be reluctant to issue qualified audit opinions to large, financially stressed client firms.

What happens to firms that receive going concern opinions? Nogler (1995) examined 377 firms that received such opinions between 1983 and 1991 and concluded that only about one-third of firms that receive going concern opinions successfully restructure their debts without entering bankruptcy protection or liquidation (Nogler, 1995, p. 62). Furthermore, the author found that the pattern of successful resolutions⁴ was not significantly altered by the adoption of SAS 59. Taken together, these results suggest that auditors may be relying on non-financial events (such as default and debt restructuring) when issuing going concern opinions.

Carcello et al. (1998) examined the factors that caused clients to switch auditors. Surveying the controllers of Fortune 1,000 corporations, the authors found that client controller satisfaction and work experience were significant predictors of auditor-client relationships. Furthermore, the risk of audit switching was greater if the client controller was a former employee of another Big-six audit firm.

Raghunandan and Rama (1999) examined the market for audit services after the previous auditor has resigned. They found that even after controlling for litigation risk, Big-six firms were less likely to be the successor auditor after

an auditor resignation. Further, the authors suggest that auditor resignations are fundamentally different from terminations (Raghunandan & Rama, 1999, p. 124).

The willingness of auditors to issue qualified opinions to large audit clients is a significant indicator of auditor independence. McKeown et al. (1991) suggested that auditors were reluctant to issue going concern opinions to large audit clients. Other research (e.g. Raghunandan & Rama, 1995) suggested that improved accounting standards may have mitigated the independence problem and led to the issuance of more qualified opinions. Whatever the case may be, recent accounting scandals have created a crisis of confidence in financial reporting that has induced Congress to pass legislation threatening public accounting's professional autonomy. It is therefore crucial that the issue of auditor independence is effectively addressed before irreparable harm is done to the profession.

Some have suggested moving away from the current model of enforcing ethical standards. Cushing (1999) argues that the accounting profession should move away from the current method of enforcing ethical standards using strict rules and monitoring in favor of a more "laissez-faire" approach to professional ethics. Such an approach "utilizes moral training leadership to motivate professional accountants to act in the public interest, for the sake of the profession as a whole" (Cushing, 1999, p. 339). Using the classic prisoner's dilemma game, Cushing finds that the effectiveness of the laissez-faire approach depends on a variety of factors, including the ethical climate at the firm, the frequency of auditor rotation, the explicitness of the particular GAAP, disclosure requirements related to auditor-client disputes, and the ability to speak with other auditors about ethical choices.

Cushing's approach was examined by Coate (1999), who concluded "that a movement toward a *laissez-faire* approach to ethics is a strategy the profession should not ignore" (Coate, 1999, p. 365). Before one can concur with Coate's conclusion, however, it is important to determine whether the current rule-based model is failing to uphold professional standards. Examining historical data such as the S&L crisis will help the profession determine whether there is a need to move to a different method of instilling ethical standards in the profession.

Summary

Auditor independence is arguably the most important issue facing the public accounting profession today. Questions surrounding the reliability of financial disclosures have cost investors and companies billions in lost market capitalization and led to the demise of at least one of the former Big Five accounting firms. Perhaps more significantly, the perceived lack of independence has encouraged a host of proposals to limit the autonomy of the public accounting profession

(i.e. Sarbanes-Oxley) or alter the way we enforce professional standards (Cushing, 1999). Thus, it is crucial that the profession regain public confidence in auditor independence.

In order to restore such trust, we must understand what poses a threat to auditor independence. The S&L crisis provides an excellent vehicle to examine this question because of the size of the debacle and the large volume of publicly available information. Examining data from the S&L crisis can help policy makers understand the factors that inhibit auditors from issuing unclean audit opinions, which will in turn help in crafting policies that enhance auditor independence.

RESEARCH QUESTIONS

Several important figures from the S&L crisis were interviewed as part of the lead author's doctoral dissertation.⁵ They asserted that S&L auditors were late to issue unclean audit opinions. Perhaps due to a desire to retain the client, S&L auditors tended to continue issuing unqualified audit opinions long after the institutions' capital began to fall. CPAs only issued unclean opinions after regulators had taken action against an S&L (Black, 1993b). The criticisms are important because they are similar to many of those currently being leveled at the public accounting profession.

There are several reasons to examine the reliability of the critics' allegations. It may assist in developing and assessing standards to prevent such an event from recurring. More effective auditing standards could also help insulate the accounting profession from future litigation and threats to its autonomy. Finally, a detailed examination of S&L audits could improve our understanding of the threats to auditor independence.

Assessing the criticisms outlined above requires addressing at least two questions. First, is there an association between the issuance of an unclean audit opinion by the auditor and auditor turnover? Second, were CPAs slow to issue unclean audit opinions on troubled institutions? These questions in turn lead to the two research questions outlined below.

Research Question 1

The relationship between audit opinion and turnover goes to the heart of external auditor independence. A potential threat to independence may exist if the issuance of an unclean audit opinion is associated with a change in auditors (Mitschow, 1994, p. 300).

Several predictions can be made if the criticisms are valid. First, audit opinion should be associated with auditor turnover in the following period. CPAs who give clean (unclean) audit opinions⁶ in time $t - 1$ should be retained (terminated) by the SLHC in time t . This leads to the following hypothesis:

H₁. There is no association between the issuance of an unclean audit opinion and the termination of the audit engagement.

Research Question 2

The Federal regulators interviewed⁷ all indicated a desire to use auditor opinion as a signal of firm distress. However, all the regulators stated that this was impossible because the independent auditors only issued unclean opinions after regulatory action had been taken against S&Ls. Once resolution occurred, however, the auditors issued unclean audit opinions and continued to do so regardless of auditor switches (Black, 1993b). Thus, while independent auditors may have been slow to issue unclean opinions, opinion shopping was either infrequent or unsuccessful.

Several relationships should be observed if the regulators are correct. First, the issuance of an unclean audit opinion in time $t - 1$ should lead to termination of the audit engagement in time t . Such a relationship would indicate that auditors risked termination if they did not issue a clean audit opinion. Second, regulatory action against should be a strong predictor of an unclean opinion. The regulators' criticism (that auditors were slow to issue unclean audit opinions) is strengthened if regulatory action consistently precedes unclean audit opinions. If these relationships do not exist, then it is difficult to confirm the validity of the regulators' assertions.

The circumstances described above lead to the following hypothesis:

H₂. There is no association between regulatory action and audit opinion.

If the regulators' story is credible, then a relationship should exist between resolution in time t and audit opinion in time t .

DATA

To test the research questions, data was collected on all Savings and Loan Holding Companies (SLHCs) that issued publicly traded stock between 1983 and 1989. The study has been limited to S&L holding companies that issued publicly traded stock for several reasons. Unlike bank data, the approximately 2,500 S&Ls that operated between 1983 and 1989 were generally not listed on the COMPUSTAT

Table 1. SLHCs Used in the Study.

SLHCs in SEC directory (1983–1989)	223
SLHCs that never filed with the SEC	(16)
Mutually owned S&Ls listed as SLHCs	(6)
Bank holding companies listed as SLHCs	(2)
Emerging from bankruptcy	(1)
Wholly owned subsidiary of Ford Motor Company	(1)
Not involved in financial services industry	(2)
Total SLHCs in this study	195

tapes.⁸ Difficulties in hand-collecting the data made it important to limit the volume of data. Since an examination of the SEC and Federal Home Loan Bank Board (FHLBB) records indicated the FLHBB data was incomplete and unreliable (i.e. missing and misfiled data, illegible hardcopies and no computerized data), it appeared wise to limit the study to data filed with the SEC.

The sample of SLHCs was obtained from the *Directory of Firms Required to File Annual Reports with the Securities and Exchange Commission (SEC, 1981–1990)* for each year in the study period. The 10-K reports and annual reports were obtained from the microfiche holdings at the University of Maryland at College Park. The 8-K reports were obtained directly from the SEC main office in Washington, DC. A total of 195 SLHCs out of 223 were used, as summarized in Table 1. The 195 companies yielded a total of 462 observations over the study period.⁹

Review of the Variables

A description of the variables used in the study as well as the data sources appear in Table 2. Additional information regarding each variable in the study is included thereafter.

Auditor turnover is defined as any change in the independent auditor of a SLHC. All such changes are recorded on 8-K forms filed with the SEC.¹⁰ Auditor turnover is a dichotomous variable with zero signifying no turnover and one signifying a change in auditors.

S&L examiners attempted to use the audit opinion in planning examinations (U.S. General Accounting Office, 1986, p. 32), with more resources devoted to those financial institutions that received an unclean opinion. Furthermore, L. William Seidman (the former head of the FDIC) stated that owners of financially distressed institutions attempted to use unqualified audit opinions to convince regulators that the S&L was healthy (Seidman, 1993a). Any type of unclean audit opinion removed that leverage and was therefore detrimental to the S&L owner.

Table 2. Data Sources and Explanation of Variables.

	Data Source
Variables	Sources
Independent auditor changes	8-Ks
Auditor opinion	10-Ks and Annual Reports (Ars)
Resolution, assistance, seizure of S&L	10-Ks, ARs, and oversight agencies
Ownership change	10-Ks, ARs, and oversight agencies
GAAP capital	10-Ks and Ars
Tangible capital	10-Ks and Ars
Late filing with the SEC	
Brokered Deposits	10-Ks and Ars
ADC Loans	10-Ks and Ars
Home Mortgage Loans (HML)	10-Ks and Ars
Explanation of Variables	
T = Independent auditor turnover (O = no turnover, 1 = turnover)	
O = Independent auditor opinion (O = unqualified opinion; 1 = any other opinion)	
R = Resolution (O = S&L not in resolution; 1 = S&L in resolution)	
OC = Change in S&L ownership (O = no change in ownership; 1 = change in ownership)	
GC = GAAP Capital/Total liabilities	
TC = (GAAP Capital – Goodwill)/Total liabilities	
NT = Late filing of 10-K with the SEC (O = on time filing; 1 = “Not Timely” filing)	
Yi = Dummy variable to control for year of observation (O = observation not in year <i>i</i> , 1 = observation in year <i>i</i>)	
BD = Brokered Deposits (Brokered Deposits/Total Deposits)	
ADC Loans = ADC Loans/Total Loans	
HML Loans = HML/Total Loans	

Note: 8-K = A required filing made with the SEC when a firm changes auditors, 10-K = An annual filing of financial information required of all SEC regulated, AR = A company’s annual report companies.

Auditor opinion is a dichotomous variable; zero signifies an unqualified opinion and one represents all other types of opinion.¹¹ Auditor opinions are available in the 10-Ks and Annual Reports (ARs) filed with the SEC.

We used the term “resolution” to describe some form of federal assistance to, or increased supervision of, a troubled savings and loan. Resolution was a sign of financial distress since S&L regulators generally took supervisory action only after an S&L had been in financial distress for more than one year (Barth, 1991, p. 32). Since most S&Ls remained in resolution for some time before being shut down, this state of affairs was usually costly to the insurance fund (Kane, 1987, p. 77). Resolution was a dichotomous variable, with a value of one assigned for each period that an S&L was in resolution and zero assigned for each period an S&L was not in resolution.

Anderson et al. (1993, p. 65) note that auditor turnover was more common after a corporate takeover. Furthermore, Johnson and Lys (1990, p. 281) found that changes in client firm activities were associated with auditor turnover. In addition, one of the major purposes of the Garn-St. Germain Act was to encourage entrepreneurs to become owners of federally insured S&Ls (Barth, 1991, p. 54). It was hoped that these new owners would bring the S&L industry back to profitability by aggressively taking advantage of the expanded powers granted under Garn-St. Germain. These observations suggested that ownership change might contribute to auditor turnover.

There were generally two problems with these new owners. First, most of these investors did not appear to understand the S&Ls were fundamentally lending businesses, not investing enterprises (Seidman, 1993a). Second, relative to their predecessors, the new owners engaged in riskier lending activities (U.S. General Accounting Office, 1989a, p. 106) that resulted in greater losses for the insurance fund. These two problems resulted in the most spectacular S&L failures involving S&Ls headed by the new owners (U.S. General Accounting Office, 1989b, pp. 51–52). Since the information was available in the 10-Ks and Annual Reports, ownership change was included in the study.

Ownership change is defined as either an explicit change in ownership or a change in organizational form by the S&L (i.e. the formation of a SLHC). The reason for this second criterion is that an S&L that is forming a holding company for itself might be planning changes in its operating strategy, which could in turn cause it to seek new auditors.

GAAP capital is defined as assets minus liabilities as computed using Generally Accepted Accounting Principles, while Tangible capital is simply GAAP capital minus goodwill. These variables are both presented as a percentage of total liabilities in order to control for institutional size and to conform to regulatory practices during the 1980s.

Goodwill was often a significant factor for many SLHCs, since the regulators generally included it in the calculation of regulatory capital. In addition, federal regulators often induced healthy institutions to merge with financially distressed counterparts by allowing the merged institution to include “supervisory goodwill” in their calculation of regulatory capital. This indulgence was withdrawn with the passage of FIRREA in 1989, throwing several institutions into bankruptcy.

During the 1980s S&L portfolios shifted from low-risk home mortgage loans to high-risk acquisition, development and construction (ADC) loans, often financed by high-interest brokered deposits. The decrease (increase) in HML (ADC and BD) represent an increase in S&L financial risk.

The final variable is “late filings” of the 10-K with the SEC. Late filings are a sign of financial distress because they violate federal regulations, something that a healthy firm presumably would be reluctant to do (U.S. General Accounting

Table 3. Descriptive Statistics.

Variable		<i>N</i> (Yes/No) ^a	Mean	Std. Dev.
Turnover (<i>t</i>)	T	462 (28/434)	0.060	0.238
Turnover (<i>t</i> - 1)	T _{<i>t</i>}	462 (24/438)	0.051	0.222
Audit Opinion (<i>t</i>)	O	462 (40/422)	0.087	0.282
Audit Opinion (<i>t</i> - 1)	O _{<i>t</i>}	461 (19/442)	0.041	0.199
Resolution	R	462 (19/442)	0.087	0.282
Ownership Change	OC	462 (40/442)	0.167	0.373
Not Timely Filing	NT	460 (77/385)	0.024	0.152
GAAP Capital	GC	457 ^(b)	0.058	0.101
Tangible Capital	TC	457 ^(b)	0.049	0.104
Brokered Deposits	BD	457 ^(b)	0.123	0.117
ADC Loans	ADC	457 ^(b)	0.183	0.123
Home Mortgage Loans	HML	457 ^(b)	0.441	0.176

^aAll of the variables with numbers in parentheses are dichotomous. Yes represents 1 and no represents 0.

^bNot dummy variable.

Office, 1989b, pp. 46–47). Empirically, late filings of financial reporting data by municipalities are associated with financial distress (Dwyer & Wilson, 1989, p. 52). Further, the authors' description of the municipal reporting environment as partially regulated and partially unregulated (Dwyer & Wilson, 1989, p. 29) appears similar to the financial environment of the SLHCs. Thus, Not Timely filing is included in this study as a dichotomous variable, with zero signifying an on-time filing and one representing those cases where the filing was late.

Descriptive statistics for the variables described above are provided in Table 3:

RESULTS

Hypothesis 1 Test Results

Hypothesis 1 examines the relationship between issuance of an unclear opinion and termination of the audit engagement. Such a relationship could pose a threat to auditor independence, since auditors have short-term incentives not to issue unclear opinions (e.g. loss of audit fees, diminished audit firm revenue, and possible loss of employment for the partner). As the theory predicts and based on prior expectations, our research questions tests are one-tailed. A two-tailed test would suggest that the issuance of a clean audit opinion would lead to auditor turnover, an assumption that does not make sense. Therefore, the findings reported in the Tables are one-tailed.

To test this hypothesis, a logistic regression model was developed to examine the association between the audit opinion in one period and auditor turnover in the following period. It was hypothesized that auditor opinion in time $t - 1$ was directly associated with independent auditor turnover in time t . Furthermore, both the ownership change and the not timely filing variables were also hypothesized to be positively associated with auditor turnover. This led to the following logistic regression model:

$$T_t = b_0 + b_1O_{t-1} + b_2OC_t + b_3NT_t + b_4Y5 + b_5Y6 \\ + b_6Y7 + b_7Y8 + b_8Y9 + e_t$$

where, T_t = Auditor turnover in time t , O_{t-1} = Independent auditor opinion in time $t - 1$, O_{c_t} = Ownership change in time t , NT_t = Not timely filings in time t , Y_i = Dummy variable (year, 1981, where $i = 5-9$).

The model yields the results in Table 4.

The model is significant ($p < 0.001$). In the model auditor opinion in time $t - 1$ is directly associated with CPA turnover in time t ($p < 0.0001$). Ownership change is significant ($p < 0.01$), thus supporting the findings of Anderson et al. (1993).¹²

Table 4. Research Question 1 Test Results.

Criterion	χ^2 for Covariates	p Value (8 DF)		
-2 log likelihood	25.984	0.001		
Source	Parameter Estimate	Standard Error	Wald χ^2	Prob. > χ^2 ^a
Intercept	-2.967	0.602	24.278	0.000
Auditor opinion in time $t - 1$	2.305	0.573	16.172	0.000
Ownership change	1.363	0.454	8.993	0.002
Not timely filing	1.279	0.883	2.097	0.074
1985	0.191	0.796	0.057	0.406
1986	-0.548	0.842	0.423	0.258
1987	-0.221	0.740	0.089	0.383
1988	-0.251	0.684	0.135	0.357
1989	-1.238	0.758	2.668	0.051

Note: Procedure: Logistic regression.

Dependent Variable: Independent auditor turnover in time t .

Criteria for assessing model fit.

Association of predicted probabilities and observed responses: Concordant = 70.6%; Discordant = 20.2%; Tied (12,208 pairs) = 9.3%.

^aOne-tailed test.

Not timely filing is marginally significant ($p < 0.10$).¹³ There are several possible explanations for the association between not timely filings and independent auditor turnover. Perhaps a dispute arose between the CPA and the SLHC client that both delayed the 10-K filing and resulted in the termination of the audit engagement. Alternatively the original auditor may have been dismissed so late in the accounting period that it was impossible for a successor to issue an audit opinion in a timely fashion.

The dummy variables for 1985–1988 are all insignificant. However, there appears to be an association between 1989 and auditor turnover. It is plausible that this association is related to the passage of FIRREA in 1989. However, the stricter requirements of FIRREA would presumably cause CPAs to leave their SLHC clients, thereby creating a direct association between 1989 and auditor turnover. The answer to this anomaly requires further research.

The results indicate that audit opinion in the prior period is a strong predictor of auditor turnover in the following period. The opinion variable was significant ($p < 0.001$). Thus, the null hypothesis of no association is rejected, indicating that auditors may be right to fear termination when they issue an unclean audit opinion.

Johnson and Lys (1990) determined that a change in client firm activities was responsible for many audit terminations (Johnson & Lys, 1990, p. 288). The authors initially speculated that the client firm's desire to receive more favorable treatment from the new (and usually smaller) audit firm played a role in auditor changes. However, they were unable to discover any significant evidence of opinion shopping (Johnson & Lys, 1990, p. 298). Finally, Johnson and Lys (1990, p. 306) found that auditor-client firm disputes were not a significant factor in auditor changes.

Our results appear consistent with most of the Johnson and Lys (1990) findings, while contradicting at least one of them. A change in client firm management was significantly associated ($p < 0.01$) with auditor turnover, suggesting that changes in client firm activities may be responsible for many audit terminations. Furthermore, it appears that successor auditors issued the same types of audit opinions as their predecessors, thereby confirming Johnson and Lys' observation that opinion shopping was not a significant problem.¹⁴ However, the relationship between unclean audit opinions and auditor turnover appears to contradict Johnson and Lys regarding auditor-client firm disputes. Perhaps this difference is due to the greater importance of unqualified audit opinions to federally regulated financial institutions.

The results presented herein do not appear to support Carcello et al. (1998). Perhaps due to the unique nature of the S&L industry, S&L auditor switches appeared to be driven by ownership changes and the issuance of qualified opinions rather than client firm controller characteristics. Since S&L controllers were not surveyed, however, confirmation of this observation remains a future research topic.

Virtually all S&L auditors (i.e. predecessor and successor firms) were Big-six firms. This would appear to contradict Raghunandan and Rama (1999), who suggested that Big-six auditors were less likely to serve as the successor auditor after a resignation. However, the inability to determine who initiated the S&L auditor switch prevents us from confirming this observation. It therefore remains a topic for future research.

Hypothesis 2 Test Results

Hypothesis 2 examines the relationship between regulatory action and audit opinion. To test the regulators' suggestion that SLHCs received unclean opinions only after regulatory action took place, the sample was divided into two groups (pre-regulatory action and post-regulatory action) and compared it against the type of audit opinion that was received by the SLHC in time $t - 1$. The results of the chi-squared test are presented below (Table 5).

The chi-squared value of 171.952 is significant ($p < 0.0001$), suggesting that the pre-regulatory action and post-regulatory action groups come from different populations.¹⁵ SLHCs appear to receive clean audit opinions until regulatory action takes place and unclean audit opinions thereafter. This result appears to support suggestions that regulators could not use the audit opinion as a warning sign of SLHC distress.

To further test hypothesis two, a logistic regression model was developed to examine the association between the audit opinion in time $t - 1$ with auditor turnover and the audit opinion in the following period. The purpose of this model is to examine some of the factors that influenced the audit opinion. The following model was used:

$$O_t = b_0 + b_1O_{t-1} + b_2T_t + b_3OC_5 + b_4R_t + b_5Y_5 + b_6Y_6 \\ + b_7Y_7 + b_8Y_8 + b_9Y_9 + e_t$$

Table 5. Audit Opinions Before and After Regulatory was Taken Against the SLHC.

	Unclean Audit (Opinion in Time $t - 1$)	Clean Audit (Opinion in Time $t - 1$)	Total
Pre-regulatory action	16 (3.9%)	396 (96.1%)	412 (100%)
Post-regulatory action	29 (65.9%)	15 (34.1%)	44 (100%)
Total	45	411	456 ¹

Note: χ^2 : 171.952, Significance level: 0.0001 (one tailed test).

where, O_t = Auditor opinion in time t , O_{t-1} = Auditor opinion in time $t - 1$, T_t = Auditor turnover in time t , OC_t = Ownership change in time t , R_t = Resolution in time t , Y_i = Dummy variable (year 1981, where $i = 5-9$).

If the critics' story is credible, then there should be a positive relationship between the resolution and audit opinion in time t . Furthermore, a positive association should exist between audit opinion in time $t - 1$ and audit opinion in time t in years where no regulatory action took place. If these relationships do not exist, then one must question the claims of federal regulators.

The results are presented in Table 6.

The model itself is significant ($p < 0.0001$). All the dummy variables are insignificant. Ownership change was not significant ($p > 0.20$), while auditor turnover was marginally significant ($p < 0.10$). The latter result suggests that opinion shopping was not successful.

These results appear to support the regulators' complaints that S&Ls rarely received an unclean audit opinion prior to regulatory action taking place. Resolution is associated with audit opinion ($p < 0.0001$), suggesting that the S&L independent auditors tended to issue clean audit opinions until regulatory action was taken and unclean audit opinions thereafter.

Table 6. Research Question 2 Test Results.

Source	χ^2 for Covariates	p Value (9 DF)		
-2 log likelihood	130.054	0.0001		
Source	Parameter Estimate	Standard Error	Wald χ^2	Prob. > χ^2 ^a
Intercept	-4.592	0.932	24.272	0.000
Auditor opinion in time $t - 1$	3.931	0.744	27.892	0.000
Auditor turnover in time t	1.056	0.721	2.419	0.072
Ownership change	0.464	0.574	0.654	0.210
Resolution	3.555	0.490	52.608	0.000
1985	0.478	1.185	0.163	0.344
1986	1.215	1.067	1.296	0.128
1987	0.924	1.000	0.853	0.178
1988	1.146	0.993	1.332	0.124
1989	0.743	0.941	0.624	0.215

Note: Procedure: Logistic regression.

Dependent variable: Independent auditor opinion in time t .

Criteria for assessing model fit.

Association of predicted probabilities and observed responses: Concordant = 88.4%; Discordant = 8.5%; Tied (18,480 pairs) = 3.1%.

^aOne-tailed test.

The conclusion is reinforced by the direct association between audit opinion in time t and $t - 1$. This association suggests that CPAs continued to issue unqualified opinions even as the SLHCs' financial position deteriorated. Once the regulators took action against the S&L, however, the independent auditors gave unclean audit opinions in that and future years.

There were only six cases where an unclean audit opinion in time $t - 1$ led to termination of the audit engagement in time t . In five of the six cases the S&L received an unclean audit opinion in time t . Furthermore, in the sixth case the unclean audit opinion in time $t - 1$ was a "subject to" opinion that was resolved by the new owners in the following period (i.e. this particular S&L appeared to be in financial difficulty). Thus, it appeared that switching auditors did not lead to clean opinions for financially distressed SLHCs.

The failure of auditor switching to lead to an "improved" audit opinion confirms the results of several prior studies (Chow & Rice, 1982; Krishnan, 1994; Smith, 1986), while rejecting the findings of Lennox (2000). Lennox asserted that companies do successfully engage in opinion shopping because they "would have received unfavorable reports more often under different switching decisions" (Lennox, 2000, p. 321). This conclusion does not appear to be supported in the case of S&L audits.

Krishnan (1994) also found that "when qualified opinions are based on conservative standards, the switching rate is higher than when average rates are applied" (Krishnan, 1994, p. 200). Given the low number of S&L auditor switches, Krishnan's findings suggest that the auditors were not using conservative standards. This would appear to support the critics' argument that regulators could not use unclean audit opinions as a sign of firm distress because the opinions only came after regulatory action had taken place.

One important question this analysis does not address is who terminated the audit engagement. Did the auditors quit or were they fired? Unfortunately, the 8-K filings do not clearly state who terminated the audit engagement.¹⁶ In order to provide some insight the relationship between auditor opinion and firm deterioration was examined. If CPAs were slow to issue unclean audit opinions, then there should be no relationship between client firm financial deterioration and auditor opinion.

The issue was examined using the following model:

$$O_t = b_0 + b_1GC_t + b_2BD_t + b_3ADC_t + b_4HML_t + b_5Y5 + b_6Y6 + b_7Y7 + b_8Y8 + b_9Y9 + e_t$$

where, O_t = Auditor opinion in time t , GC_t = GAAP capital in time t , BD_t = Brokered deposits in time t , ADC_t = Acquisition, development, and

Table 7. Determinants of Audit Opinion.

Source	χ^2 for Covariates	p Value (9 DF)		
-2 log likelihood	128.823	0.0001		
Source	Parameter Estimate	Standard Error	Wald χ^2	Prob. > χ^2
Intercept	-1.441	1.396	1.066	0.302
GAAP Capital in time t	-65.361	9.980	42.909	0.0001
Brokered deposits	-2.005	2.08	0.926	0.336
ADC loans	2.181	1.790	1.484	0.223
HML	-0.885	1.476	0.360	0.548
1985	0.412	1.251	0.108	0.742
1986	1.359	1.169	1.352	0.245
1987	1.449	1.157	1.568	0.210
1988	0.433	1.207	0.128	0.720
1989	2.019	1.116	3.273	0.070

Note: Procedure: Logistic regression.

Dependent variable: Independent auditor opinion in time t .

Criteria for assessing model fit.

Association of predicted probabilities and observed responses: Concordant = 91%; Discordant = 8.1%; Tied (16,880 pairs) = 0.9%.

construction loans in time t , HML_t = Home mortgage loans in time t , Y_i = Dummy variable (year 1981, where $i = 5-9$).

The results are present in Table 7.

The model appears to fit the data ($p < 0.0001$). The dummy variable for 1989 was positively associated with independent auditor opinion ($p < 0.10$), while GAAP capital was negatively associated with independent auditor opinion ($p < 0.01$). All other variables were insignificant ($p > 0.10$).

The results presented in this paper appear to extend and clarify the findings of other researchers. McKeown, Mutchler and Hopwood (1991) found that client firm size was inversely correlated with the issuance of going concern opinions. Mutchler, Hopwood and McKeown (1997, pp. 306-307) speculate that auditors may assume that larger firms have the resources to weather their current problems, or that the issuance of a going concern opinion may itself increase the likelihood that the troubled firm will eventually go bankrupt.

The results of this paper would appear to confirm the conclusions of McKeown et al. (1991), since our sample of SLHCs generally contains large institutions. The results also appear to confirm the Nogler (1995) conclusion that auditors rely on non-financial indicators (i.e. regulatory action) in issuing going concern opinions. Furthermore, Mutchler et al. (1997, pp. 306-307) may help explain

why S&L auditors appeared to delay the issuance of unclean opinions (especially since troubled S&L rarely experienced the cash flow problems of other near-bankrupt firms).

Mutchler et al. (1997) also found a significant relationship between highly negative news items before the audit and the issuance of going concern audit opinions (Mutchler et al., 1997, p. 306). However, they were unable to determine whether the relationship was due to the bad news itself or to the public disclosure of the problem (Mutchler et al., 1997, p. 308). This study of SLHCs also found a strong relationship between extreme bad news (i.e. regulatory action) and the issuance of unclean audit opinions. Furthermore, it would appear that the bad news itself was responsible for the strong relationship with unclean opinions since the regulatory action was not always well-publicized (at least initially).

SUMMARY AND CONCLUSION

While auditor independence has been a significant topic in the accounting literature, the current crisis of confidence has made the topic more important than ever before. Questions currently surround both the frequency of successful opinion shopping (Krishnan, 1994; Lennox, 2000) and the need to move to a “laissez-faire” model of enforcing ethical behavior by independent auditors. The public accounting profession must address these questions or risk losing both public trust and professional autonomy.

The S&L crisis of the 1980s is an excellent vehicle for examining independence questions. The crisis directly raised auditor independence questions, while the size of the debacle, the judgments against public accounting firms, and the volume of information on the public record provide a vehicle whereby those questions can be answered. Furthermore, S&L data allows us to gain insight on the volume of successful opinion shopping and the efficacy of our current model of inculcating professional accounting standards.

This research examined SLHCs that were required to file with the SEC between 1983 and 1989. Two research questions were tested. The first test indicated a strong relationship between audit opinion and auditor turnover, suggesting that auditors who issued unclean audit opinions risked losing the audit engagement. The second test appeared to verify the regulators’ story by establishing a strong relationship between regulatory action against the institution and auditor opinion.

Taken together, the results present an interesting scenario. CPAs issued clean audit opinions even as the tangible capital declined. Once government regulators took action, however, an unclean audit opinion was issued. The audit engagement was often terminated shortly thereafter, but the succeeding auditor would generally

continue to issue unclean opinions – suggesting that opinion shopping either was not attempted or was unsuccessful.

From the perspective of S&L regulators, CPAs may have been slow to issue unclean opinions. However, the strong relationship between GAAP capital deterioration and the issuance of unclean audit opinions (coupled with the relationship between tangible capital deterioration and resolution) suggests that auditors may have been responding to different signals. Thus, “late opinions” may be due to an expectations gap rather than a loss of independence.

The actions of federal regulators may also have played a role in the issuance of “late opinions.” Throughout the 1980s S&L regulators allowed SLHCs to capitalize “supervisory goodwill” that arose from their purchase of troubled S&Ls. SLHCs were also permitted (under Memorandum R-49) to sell or trade loans at a loss and then amortize that loss over the remaining life of the loan. These practices may have convinced S&L auditors that regulators were not likely to take action against troubled S&Ls, thereby mitigating the need for an unclean audit opinion. This intriguing possibility could be a topic for future research.

Another explanation for “late opinions” is the issue of timing. S&L regulators could take action at any time, but auditors generally issue audit opinions only after the close of the fiscal year. Given the speed with which many S&Ls deteriorated, it is not surprising that resolution would often precede an unclean audit opinion.

The results presented in this paper appear to confirm and extend several recent findings, particularly those in [Johnson and Lys \(1990\)](#), [McKeown et al. \(1991\)](#) and [Mutchler et al. \(1997\)](#). However, this study also appeared to contradict certain earlier findings, specifically the [Johnson and Lys \(1990\)](#) conclusion that auditor-client disputes did not appear to be a significant factor in audit turnover. In addition, the results appear to contradict those of [Carcello et al. \(1998\)](#) and [Raghunandan and Rama \(1999\)](#). Perhaps the contradictory results presented herein were due to the greater significance of unqualified audit opinions for financial institutions.

An examination of post-turnover S&L audit opinions does not support [Lennox \(2000\)](#) conclusion regarding successful opinion shopping. However, if a low number of auditor switches is a sign that auditors are not using conservative auditing standards ([Krishnan, 1994](#)), then this examination would appear to confirm the regulators complaints regarding S&L audits. It may also help explain why unclean audit opinions tended to follow regulatory action.

This research study does not specifically address the efficacy of moving to a “laissez-faire” enforcement model ([Cushing, 1999](#)). However, to the extent that unclean audit opinions were slow in coming the study appears to support [Coate \(1999\)](#) that there may be grounds for examining a new model for enforcing professional auditing standards. At the very least it does nothing to refute the assertions of [Cushing \(1999\)](#) and [Coate \(1999\)](#).

A number of questions remain unresolved. Were auditors and regulators responding to the same evidence? If so, then one would expect unclean opinions to follow regulatory action, since audit opinions are issued after the end of the fiscal year while resolution takes place during the period. Also, what was the impact of “pre-emptive firing,” where firms terminate their audit engagement in anticipation of receiving an unclean audit opinion? Finally, what impact does auditor-client consulting have on independence? These and other questions await further research.

NOTES

1. This paper is an examination of the behavior of S&L independent auditors. However, for purposes of readability, the terms “independent auditor,” “auditor,” and “CPA” will be used interchangeably.

2. Many cases are still going through the courts, while others were quietly settled out of court. However, by the early 1990s the awards had already run into the hundreds of millions of dollars. See Mayer (1990, 1997) for more details.

3. This time period was selected because 1983 was the first full year after the sweeping Garn-St. Germain reforms were enacted, while 1989 saw the passage of FIRREA, which began the cleanup of the S&L industry.

4. We used the term “resolution” to describe some form of federal assistance to, or increased supervision of, a troubled savings and loan. This term is described in greater detail (along with other variables) later in the manuscript.

5. Several important figures from the S&L crisis were interviewed as part of the lead author’s dissertation research (Mitschow, 1994). William Black was counsel to the FSLIC and the Bank Board’s litigation director during the S&L crisis. Other figures from that era who were interviewed include Edwin Gray (Chairman of the Federal Home Loan Bank Board), L. William Seidman (Chairman of the Federal Deposit Insurance Corporation), Michael Patriarca (director of supervision at the FHLB – San Francisco, later Deputy Comptroller of the Currency) and John LaFalce (Chairman of the House Banking Committee).

6. In this study “clean” and “unclean” will be used as synonyms for “unqualified” and “not unqualified” audit opinions, respectively. According to all of the federal regulators interviewed for this paper, any audit opinion that was not unqualified tended to attract regulatory attention (Black, 1993a; Bloom, 1993; Gray, 1993; Patriarca, 1993; Seidman, 1993b).

7. See Note 5.

8. Information on S&Ls generally was unavailable on COMPUSTAT for the time period in question.

9. All of the SLHCs that were required to file with SEC were included in this manuscript. While we did lose about five observations for other reasons (e.g. the institution in question was not a SLHC) most SLHCs were closed by the regulators or merged with other institutions in fairly short order. This is the reason for the number of observations.

10. In one case an SLHC changed auditors without filing an 8-K. This was included as an auditor change. When the SEC discovers that a company has not filed an 8-K, they usually

request that the party file immediately. If the party refuses to do so, then the matter would be sent to the enforcement division for further action (which could conceivably result in the firm being de-listed). Note, however, that the officials we spoke with at the SEC press office could remember no such case that needed to be forwarded to the enforcement division.

11. Public accountants issued four basic opinions during the 1980s. Unqualified opinions were issued when the audit was conducted with professional care by qualified individuals, sufficient evidence was obtained to conclude that the financial statements are presented in accordance with GAAP, and no significant matters exist that would require additional explanation. Disclaimers of opinion are issued when the external auditor could not gather sufficient evidence to render an opinion, while an adverse opinion stated that the financial statements are not in accordance with GAAP. Finally, a qualified opinion indicated that with the exception of a specific issue the financial statements were presented in accordance with GAAP. See Defliese et al. (1990, pp. 23–24).

12. There is a low correlation (<0.0634) among independent variables.

13. Note that it was not significant at the 0.05 level (one-tailed test), however.

14. It seemed unnecessary to run another model since *in every case* the successor auditor issued to same (unclean) opinion as the predecessor auditor.

15. There is a low correlation ($<0.0148, 0.104, 0.32, 0.034$) among independent variables.

16. In but one case the 8-Ks were written in generic language that appeared designed to obscure the issue of who terminated the engagement. The one exception was ACC Corporation's 8-K filing regarding Arthur Young. Here ACC clearly stated that they terminated the engagement because they were displeased with the audit opinion rendered by Arthur Young.

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REFERENCES

- Anderson, D., Stokes, D., & Zimmer, I. (1993). Corporate takeovers and auditor switching. *Auditing: A Journal of Practice & Theory*, 12(Spring), 65–73.
- Barth, J. (1991). *The great savings and loan debacle*. Washington, DC: AEI Press.
- Black, W. (1993a). Telephone interview with the author, November 22.
- Black, W. (1993b). Telephone interview with the author, November 23.
- Bloom, T. (1993). Interview with the author, November 16. Washington, DC.
- Carcello, J. V., Hermanson, D. R., & Hermanson, R. H. (1998). Factors associated with audit client relationships "at risk." *Journal of Professional Services Marketing*, 29–42.
- Carcello, J. V., Hermanson, D. R., & Huss, H. F. (1995). Temporal changes in bankruptcy-related reporting. *Auditing*, 14(Fall), 133–140.

- Chow, C. W., & Rice, S. J. (1982). Qualified audit opinions and auditor switching. *The Accounting Review*, 57(April), 326–335.
- Coate, C. J. (1999). Discussion of “economic analysis of accountants’ ethical standards: The case of audit opinion shopping. *Journal of Accounting and Public Policy*, 18(Winter), 365–373.
- Cushing, B. E. (1999). Economic analysis of accountants’ ethical standards: The case of audit opinion shopping. *Journal of Accounting and Public Policy*, 18(Winter), 339–363.
- Defiesse, P. L., Jaenicke, H. R., O’Reilly, V. M., & Hirsch, H. B. (1990). *Montgomery’s Auditing*. New York: Wiley.
- Dwyer, P. D., & Wilson, E. R. (1989). An empirical investigation of factors affecting the timeliness of reporting by municipalities. *Journal of Accounting and Public Policy*, 8, 29–55.
- Gray, E. (1993). Telephone interview with the author, November 11.
- Johnson, W. B., & Lys, T. (1990). The market for audit services: Evidence from voluntary auditor changes. *Journal of Accounting and Economics*, 12, 281–308.
- Kane, E. (1987). Dangers of capital forbearance: The case of the FSLIC and zombie S&Ls. *Contemporary Policy Issues*, 5(January), 77–99.
- Kirchhoff, S. (2002). Greenspan optimistic on economy: Says fundamentals sound, tough penalties for abuses needed. *The Boston Globe* (July 17), C1.
- Krishnan, J. (1994). Auditor switching and conservatism. *The Accounting Review*, 69(January), 200–215.
- Lennox, C. (2000). Do companies successfully engage in opinion-shopping? Evidence from the UK. *Journal of Accounting and Economics*, 29(June), 321–337.
- Mayer, M. (1990). *The greatest-ever bank robbery: The collapse of the savings and loan industry*. New York: Charles Scribners’ Sons.
- Mayer, M. (1997). *The bankers: The next generation*. New York: Truman Talley Books/Dutton.
- McKeown, J. C., Mutchler, J. F., & Hopwood, W. S. (1991). Towards an explanation of auditor failure to qualify the opinions of bankrupt companies. *Auditing: A Journal of Practice and Theory* (Supplement), 1–13.
- Mitschow, M. (1994). *Auditor independence and the savings and loan crisis: Two research essays*. Ann Arbor, MI: UMI.
- Murray, A. (2002). Accounting scandal brings out worst in Gramm, Chertoff. *The Wall Street Journal* (June 11), A4.
- Mutchler, J. F. (1985). A multivariate analysis of the auditor’s going-concern opinion decision. *Journal of Accounting Research*, 23(Autumn), 668–682.
- Mutchler, J. F., Hopwood, W., & McKeown, J. M. (1997). The influence of contrary information and mitigating factors on audit opinion decisions on bankrupt companies. *Journal of Accounting Research*, 35, 295–310.
- Nogler, G. E. (1995). The resolution of auditor going concern opinions. *Auditing*, 14(Fall), 54–65.
- Patriarca, M. (1993). Telephone interview with the author, November 30.
- Pitt, H. (2002, July 1). Interview with the chairman of the SEC. *All Things Considered*. National Public Radio.
- Raghunandan, K., & Rama, D. V. (1995). Audit reports for companies in financial distress: Before and after SAS No. 59. *Auditing*, 14(Spring), 50–60.
- Raghunandan, K., & Rama, D. V. (1999). Auditor resignations and the market for audit services. *Auditing*, 18(Spring), 124–134.
- Securities and Exchange Commission (1981–1990). *Directory of companies required to file annual reports with the securities and exchange commission*. Washington: GPO.
- Seidman, L. W. (1993a, October 28). Interview with the author. Washington, DC.

- Seidman, L. W. (1993b). *Full faith and credit: The great S&L debacle and other Washington sagas*. New York: Times Books.
- Smith, D. B. (1986). Auditor “subject to” opinions, disclaimers, and auditor changes. *Auditing: A Journal of Practice and Theory*, 6(Fall), 95–108.
- U.S. General Accounting Office (1986, April). Bank regulation: Information on independent public accountant audits of financial institutions. *GAO/GGD-86-44FS*. Washington: GPO.
- U.S. General Accounting Office (1989a, February). Troubled financial institutions: Solutions to the thrift industry problem. *GAO/GGD-89-47*. Washington: GPO.
- U.S. General Accounting Office (1989b, June). Thrift failures: Costly failures resulted from regulatory violations and unsafe practices. *GAO/AFMD-89-62*. Washington: GPO.

CORPORATE SOCIAL PERFORMANCE: EMPIRICAL EVIDENCE ON CANADIAN FIRMS

Lois S. Mahoney and Robin W. Roberts

ABSTRACT

The purpose of this study is to introduce the Canadian Social Investment Database (CSID), developed by Michael Jantzi Research Associates, Inc., as an independent measure of Corporate Social Performance (CSP) and to provide initial evidence of CSP in Canada and its relationship to the financial performance of publicly traded Canadian firms. We review prior research on CSP in Canada and examine the CSID measurement of CSP for the Toronto Stock Exchange 300 for the years 1995 through 1999.

We found that, generally, the CSP of Canadian firms was evaluated more favorably in recent years, indicating an increase in corporate social responsiveness. However, diversity, environmental, and corporate governance concerns continue to be present and are in need of further research. Additionally, we did not find a significant relationship between CSP and traditional accounting measures of financial performance and conclude that more research is needed at the industry and/or firm level of analysis.

INTRODUCTION

The impact of modern economic activities on the quality of human and social life has led to a growing concern in society about Corporate Social Performance (CSP). This concern is reflected in wider press coverage, academic and practitioner research, business textbooks and in curricula of business schools. Recently, the topic of CSP has surfaced in a number of important business and political arenas (Canadian Institute of Chartered Accountants, 2001; Delfgaauw, 2000; Deloitte & Touche Tohmatsu, 2002; United Nations in Canada, 2002). This demand for CSP is increasing in significance and appears to be reaching a degree of permanency in our society.

CSP is a multidimensional construct consisting of economic responsibility to investors and consumers, ethical responsibilities to society, legal responsibility to the government or the law, and discretionary responsibility to the community (Carroll, 1979). According to Wartick and Cochran (1985) this multidimensional construct incorporates the interaction between the principles of social responsibility, the process of social responsiveness, and the policies and programs designed by corporations to address social issues. These behaviors also occur across a wide range of industries with significantly different characteristics, histories, and performance in different CSP domains (Waddock & Graves, 1997a). Even though a precise definition has not been agreed upon in the literature, CSP is generally portrayed as a broad construct comprised of social issue and stakeholder management (Clarkson, 1995; Hillman & Keim, 2001; Swanson, 1995; Wood, 1991).

While many parties may agree that a greater emphasis on CSP and reporting is a positive development, prior research can be used to quickly point out that this newly found corporate interest in the reporting of social performance does not resolve many, if any, of the substantive practical or research problems surrounding this issue. There is no history of systematic reporting (Gray et al., 1995) and there are no generally accepted social reporting standards (Wallage, 2000). Traditional, positive research on CSP has been difficult due to the lack of generally accepted standards of measurement, reporting, or assurance and the lack of systematic reporting by firms (Gray et al., 1995). As a result, empirical accounting research utilizing available CSP data has produced mixed results regarding the characteristics of reporting firms, the quality of their reporting, and the relationship between social performance and economic performance (Gray et al., 1995; Roberts, 1992).

In 1994, several U.S. researchers were able to address several major problems in CSP measurement by using the Kinder, Lydenberg, Domini (KLD) database as a measurement of CSP for companies listed on the stock exchanges in the U.S. Because the KLD database was developed and maintained by an independent

rating service that assessed CSP across a range of dimensions related to stakeholder concerns, researchers argued that the KLD database brought a new, quantifiable, and improved measurement of CSP for United States companies. U.S. research flourished with this new measurement assessment (Bendheim et al., 1998; Berman et al., 1999; Graves & Waddock, 1994; Greening & Turban, 2000; Griffin & Mahon, 1997; Johnson & Greening, 1999; Waddock & Graves, 1997a, b) and this database has been recognized as the best information available for researchers studying CSP (Hillman & Keim, 2001).

Similar to the KLD database, a database in Canada, the Canadian Social Investment Database (CSID) was developed in 1992 by Michael Jantzi Research Associates, Inc. (MJRA). This database is comparable to the KLD database and is developed and maintained in a similar manner (MJRA, 2002) but has yet to be used in Canadian academic research. The authors hope that the introduction of the CSID database will provide researchers with a new and improved means to quantify CSP in Canada and lead to increased research efforts. In addition, it is hoped that the use of this database with its consistent measurement of CSP will allow researchers to examine large sample sizes, allow for comparable findings and lead to consensus of the impact of CSP on Canadian corporations and their stakeholders.

The purpose of this study is threefold. First, we introduce MJRA and its database, CSID, as a way to measure CSP for Canadian firms. Prior Canadian researchers have attempted to measure CSP in a variety of ways, including surveys, content and case study analysis. Each of these techniques has limitations and often results in inconsistent measures of CSP (Graves & Waddock, 1994). To overcome these problems, we introduce the CSID database as a new measure of Canadian CSP that is uniformly measured across a wide range of companies and for a consistent range of important social issues. Second, using this measurement, we provide an overview of CSP for a large cross-section of Canadian firms listed on the Toronto Stock Exchange (TSE) 300 for the years 1995 through 1999. Finally, using these same firms, we examine the relationships between CSP and firm size and profitability. Specifically, we address four different questions: (1) what is the CSID database and how does it compare to the KLD database?; (2) How does CSID characterize the level of CSP of the TSE 300 firms?; (3) What changes, if any, have occurred from 1995 through 1999 concerning CSP of the TSE 300 as measured by the CSID database?; and (4) How are firm size and profitability related to CSP in Canada?

CSP IN CANADA

Canada has long noted the need for CSP. As reported by Brooks (1997) there are upwards of 15 ethics consultants and/or academic consulting practitioners in

Canada. Some of the more prominent consultants are EthicsScan Canada, ethic-scentre.ca (formerly Canadian Centre for Ethics and Corporate Policy (CCECP)), Clarkson Center for Business Ethics (formerly The Center for Corporate Social Performance and Ethics (CCSPE)), The Centre for Applied Ethics (CAE), Ethics Practitioners Association of Canada and Michel Jantzi Research Associates. In 1975 the Task Force on the Churches and Corporate Responsibility (TCCR) was established to enable the churches to exercise corporate responsibility both as shareholders and as an advocacy organization. The TCCR has proven to be an effective vehicle through which churches can address issues of concern with corporate management and other shareholders. In 1995, it issued the Principles of Global Corporate Responsibility: Bench Marks to Measure Business Performance. During the 1980s and early 1990s, William Allen was considered the most outspoken investment adviser on ethical/governance issues (Brooks, 1997). Today, the organization he founded, now called Fairview, provides a clearing house for information on shareholder issues, provides proxy analysis service and publishes newsletters.

Canadian Research

Though numerous research articles have addressed the area of CSP in general, few of these studies explicitly examined Canadian corporations (see Johnson & Greening, 1999; Roman et al., 1999). Brooks (1997) noted that Canadian business ethics applications, research, and learning experiences are distinctive from the U.S. and thus the impact of CSP on Canadian corporations may differ from that of the U.S. He argued that pressures from society in general, pressures from responsible investors, directors, executives and employees, consultants and researchers have all contributed to the direction that CSP has taken in Canada. McDonald (1997) commented that the 1989 applied ethics research theme of the Social Sciences and Humanities Research Council of Canada has fostered interdisciplinary and integrated approaches to Canadian CSP research. He went on to say that while other areas of ethical research have achieved a mature status, business and professional ethics research is still in a growth and developmental stage.

Prior studies have documented continual pressure on Canadian firms to be more socially responsible. Several studies, using small sample sizes, have noted that this pressure led to increased corporate concern for social responsibility (Brooks, 1997, 1989; Preston et al., 1978). In 1978, Preston et al. reported that 84% of all Canadian companies recognized at least some need for a corporate response to social performance concerns and that this degree of concern was strongly related to the size of the company. This study was followed up by Brooks

(1986) who found that at least 85% of Canada's largest corporations were making ethical performance disclosures, either through their annual reports or separate reports specifically designed for that purpose. This increased trend was also found in sustainable development reporting (a combination of economic prosperity, environmental quality and social justice) as the quantity of this reporting increased by 45% from 1992 to 1998 (Nitkin & Brooks, 1998).

Several factors appear to affect the type and amount of Canadian CSP reporting and disclosures. Ownership size and status influence the amount of social and environmental disclosures for utility companies (Cormier & Gordon, 2001) while firm size, regulatory regime governing corporate disclosure and industry contribute to explaining environmental disclosures (Cormier & Magnan, 1999). The amount of environmental disclosures for firms with environmental spills appears to be directly related to the increase in pollution propensity and an increase in outsiders' knowledge (Li et al., 1997). Proactive environmentally sensitive firms have a higher perception of the relative importance of different stakeholders, which in turn affects their CSP activities (Henriques & Sadorsky, 1999). In addition, Lefebvre and Singh (1992) noted that when Canadian codes of ethics addressed issues of social responsibility, they were principally concerned with conduct against the firm.

While the U.S. literature has found no clear relationship between firm financial performance and firm CSP (Griffin & Mahon, 1997; Waddock & Graves, 1997a), several Canadian studies have found a correlation using a variety of measurements. In a small sample study, Clarkson (1988) found that superior profits and social responsiveness tend to be associated. Stoffman (1991) supported Clarkson's notion of the relationship between profits and social responsiveness by providing several examples of social responsible Canadian corporations whose financial performance exceeded their competitors. Two large scale studies examined types of CSP disclosures and important economic measures. Cormier and Magnan (1997) reported a positive relationship between the amount of a firm's pollution and the amount of their environmental liabilities while, Richardson and Welker (2001) found a positive relationship between social disclosures and the cost of equity capital.

Several studies compared the types and amounts of CSP-related information produced in Canada and the U.S. When comparing the contents of codes of ethics in the U.S. and Canada, Wood (2000) found that the Canadian codes focused more on relationships with consumers and less on relationships with customers, suppliers and competitors. Burke (1980) found that 63.2% of the Canadian firms compared to 53.0% of the U.S. firms reported at least one social measurement disclosure (social concern not traditionally reported) while 39.5% of the Canadian firms and only 27.2% of the U.S. firms reported at least one meaningful social information

disclosure. In 1986, Brooks found similar results for firms with less than 25,000 employees as 40% of the Canadian firms but only 19.7% of the U.S. firms reported at least one meaningful social information disclosure though U.S. firms had a wider variety of disclosures. The difference in the type and quantity of disclosures between Canada and the U.S. could be contributed to the fact that up until 1996, Canada was not subject to the powerful national institutional frameworks that the U.S. was, such as the U.S. SEC and the Foreign Corrupt Practices Act. As a result, business ethics in Canada seem to have developed primarily in response to broader socio-political and socio-economic factors that demanded more CSP disclosure (Brooks, 1997).

Based on our review of this small set of CSP academic literature in Canada, we draw three primary conclusions. First, the business/society relationship in Canada reflects the broader societal arrangements that have come to exist in Canada. The relationship between business and society in Canada has resulted, at least in part, from country-specific cultural values. This means that business/society relationships in Canada may not mirror those found in the U.S., Europe, Australia, or other parts of the world. Second, there are no generally accepted standards of CSP measurement, reporting, or assurance and there is a lack of systematic academic research concerning CSP in Canada. As a result, sample sizes are generally small and interpreting and comparing various research outcomes may be subject to question. Third, CSP appears to be relatively important both to Canadian investor and non-investor groups. In the remaining sections we discuss a proprietary, independent CSP rating that has been used in the U.S. academic research, introduce a similar measure that is available for Canadian firms, and explain its characterization of CSP in Canada.

MEASURING CSP

When examining CSP of U.S. companies, many studies (Berman et al., 1999; Graves & Waddock, 1994; Griffin & Mahon, 1997; Johnson & Greening, 1999; Waddock & Graves, 1997a) measured CSP using the KLD index. KLD rates over 650 corporations traded on U.S. stock exchanges on various dimensions considered important to social performance. The KLD ratings provide a unique access to a wide range of consistently applied ratings of firms across a number of important social performance attributes that were determined by a knowledgeable group of individuals not connected with the firms (Waddock & Graves, 1997a).

Similar to the KLD, the CSID was developed in 1992 by MJRA, a financial advisory firm specializing in the assessment of CSP for Canadian corporations. CSID contains social and environmental profiles of over 400 publicly traded

Canadian companies, including the companies in the TSE 300 Index. MJRA also has a longstanding research partnership with KLD. They exchange research and have collaborated on numerous research projects (MJRA, 2002). MJRA is also a member of the Sustainable Investment Research International (SIRI) Group, a coalition of ten research organizations devoted to the global advancement of social investment (MJRA, 2002).

Similar to KLD, MJRA provides a comprehensive set of rating criteria of social and environmental issues in evaluating CSP¹. These seven dimensions of social and environmental issues assessed for each company include *community; diversity; employee relations, environment; international; product and business practices* and *other*. Each of these dimensions is assessed on a scale of zero to two for both strengths and weaknesses. In each of these areas, MJRA investigates a range of sources to determine whether the company has a major strength (e.g. positive union relations) and/or major weakness (e.g. safety problems). Table 1 provides details on the factors used in determining ratings for each of the seven areas.

In designing the rating criteria MJRA relies on the experiences of its staff and the advice and recommendations of a wide range of stakeholders. MJRA's investment analysts review corporate documents, including each company's annual report, annual information form and proxy information circular. They also analyze the firm's environmental policy, health and safety policy, and code of business conduct in order to better evaluate the company's performance. In addition, MJRA's analysts track hundreds of publications and major newspapers across Canada and internally through on-line, CD Rom and subscription services. They also access a broad range of material from government, labor, industry, and not-for-profit organizations, among a host of others. In addition, they interview important stakeholders, including company and industry executives, community groups, environmental organizations, government and regulatory representatives, and union representatives (MJRA, 2000).

The CSID ratings appear to be subject to similar benefits and limitations previously discussed regarding the KLD ratings (Griffin & Mahon, 1997; Waddock & Graves, 1997a, b; Wood & Jones, 1995). The CSID index offers an improvement over other Canadian social responsibility ratings because they are determined by using objective screening criteria that are applied consistently across a wide range of companies. In addition, the CSID ratings, similar to KLD, are developed independently by a third party. Similar to the KLD (Graves & Waddock, 1994), a limitation of the CSID rating index is the lack of a weighting scheme for the different dimensions of CSP in that all dimensions are treated as equally important. A second limitation of CSID is the potential for a dimension of a company's CSP to be rated as both a major strength and a major weakness.

Table 1. Social and Environmental Rating Criteria for MJRA Company Profiles.

Dimension	Strength	Concern
Community Issues	<ul style="list-style-type: none"> ●Generous Giving ●Innovating Giving ●Community Consultation/Engagement ●Strong aboriginal Relationships 	<ul style="list-style-type: none"> ●Lack of Consultation/Engagement ●Breach of covenant ●Weak aboriginal relations
Diversity in workplace	<ul style="list-style-type: none"> ●Strong employment equity program ●Women on board of directors ●Women in senior management ●Work/family benefits ●Minority/women contracting 	<ul style="list-style-type: none"> ●Lack of employment equity initiatives ●Employment equity controversies
Employee Relations	<ul style="list-style-type: none"> ●Positive union relations ●Exceptional benefits ●Workforce management policies ●Cash profit sharing ●Employee ownership/involvement 	<ul style="list-style-type: none"> ●Poor union relations ●Safety problems ●Workforce reduction ●Inadequate benefits
Environmental Performance	<ul style="list-style-type: none"> ●Environmental management strength ●Exceptional environment planning and impact assessment ●Environmentally sound resource use ●Environmental impact reduction ●Beneficial products and services 	<ul style="list-style-type: none"> ●Environmental management concern ●Inadequate environmental planning or impact assessment ●Unsound resource use ●Poor compliance record ●Substantial emissions/discharges ●Negative impact of operations ●Negative impact of products
International	<ul style="list-style-type: none"> ●Community relations ●Employee relations ●Environment ●Sourcing practice 	<ul style="list-style-type: none"> ●Poor community relations ●Poor employee relations ●Poor environmental management/performance ●Human rights ●Burma ●Sourcing practices
Product and Business Practices	<ul style="list-style-type: none"> ●Beneficial products and services ●Ethical Business Practices 	<ul style="list-style-type: none"> ●Product safety ●Pornography ●Marketing practices ●Illegal business practices
Other	<ul style="list-style-type: none"> ●Limited compensation ●Confidential proxy voting ●Ownership in companies having high CSID Ratings 	<ul style="list-style-type: none"> ●Excessive compensation ●Dual-class share structure ●Ownership in other companies

This dual rating effectively nullifies any adverse effects or potential benefits of a dimension rating of a company. Further, collapsing the CSID's multiple dimensions into a one-dimensional index may mask the individual dimensions that are especially important and relevant for a specific company or industry.

METHOD

Data

The data used in this study were drawn from the CSID database, which was developed by MJRA. CSP ratings for all TSE 300 companies were purchased for the years 1995 through 1999. For each year, CSID provided data for 300 companies, except for 1997 when data for only 298 companies was provided. Due to mergers, growth rates and other factors, only 156 companies remained on the Exchange during the entire five-year period. For additional analysis to be performed on each year independently, corresponding financial data (sales, assets and profits) were obtained from Standard & Poor's Research Insight (Standard & Poor's Research Insight, 2000). Due to unavailability of financial data from Standard & Poor's Research Insight, the sample size for some analysis was reduced to 171 companies for 1995, 173 companies for 1996, 207 companies for 1997, 227 companies for 1998 and 229 companies for 1999².

Measures

As noted earlier, there are seven dimensions in the CSID database. These dimensions are *community*; *diversity*; *employee relations*; *environment*; *international*; *product and business practices*; and *other*. Each of these dimensions is given two ratings, one for strength and one for weakness, on a scale of zero to two. For some of our analysis, these two different ratings were collapsed into one rating for each dimension, treating the strengths ratings as a positive number and the weakness ratings as a negative number. For each dimension the ranges of scores could be from two to negative two. Further analysis added all seven dimensions strengths scores and subtracted the weakness score to arrive at a single CSP score for each company with a possible range of scores of -14 to 14 . The scoring procedure follows that generally used in U.S. studies that employ the KLD ratings.

ANALYSIS

Characterization of Level of CSP

This section first examines the strength and concern criteria used to arrive at ratings for each dimension. Secondly, Table 2 shows how MJRI characterized the level of CSP of the TSE 300 firms for the years 1995 through 1999. The strength and

Table 2. Frequencies of MJRA Ratings for TSE 300 Firms.

Dimension	Strengths			Concerns			Total (Strengths – Concerns)					
	0	1	2	0	1	2	-2	-1	0	1	2	
1995 (<i>n</i> = 300)												
Community	211	69	20	300	0	0	0	0	211	69	20	
Diversity	214	72	14	181	118	1	1	100	129	58	12	
Employee	122	145	33	274	23	3	1	7	129	135	28	
Environment	227	54	19	235	50	15	6	25	226	37	6	
International	297	3	0	292	8	0	0	7	291	2	0	
Product	238	55	7	285	12	3	2	9	232	50	7	
Other	240	53	7	132	134	34	16	118	152	13	1	
1996 (<i>n</i> = 300)												
Community	211	70	19	299	1	0	0	0	212	69	19	
Diversity	197	85	18	180	119	1	1	100	114	68	17	
Employee	106	153	41	273	24	3	1	8	113	141	37	
Environment	224	55	21	236	49	15	8	20	225	40	7	
International	295	5	0	288	12	0	0	11	285	4	0	
Product	231	63	6	282	14	4	3	10	223	59	5	
Other	239	54	7	130	137	33	13	128	141	17	1	
1997 (<i>n</i> = 298)												
Community	217	69	12	292	6	0	0	4	214	69	11	
Diversity	210	70	18	184	113	1	1	99	123	57	18	
Employee	114	135	49	269	28	1	0	6	124	126	42	
Environment	231	54	13	234	50	14	6	27	227	35	3	
International	290	8	0	282	16	0	0	13	280	5	0	
Product	232	62	4	283	15	0	0	11	224	60	3	
Other	245	47	6	126	143	29	15	133	130	19	1	
1998 (<i>n</i> = 300)												
Community	222	63	15	295	5	0	0	3	221	61	15	
Diversity	208	70	22	211	89	0	0	74	149	55	22	
Employee	116	114	70	278	22	0	0	6	117	116	61	
Environment	242	48	10	235	53	12	6	33	227	32	2	
International	294	6	0	286	13	1	1	11	284	4	0	
Product	235	60	5	283	16	1	0	14	224	58	4	
Other	249	46	5	122	154	24	14	143	121	20	2	
1999 (<i>n</i> = 300)												
Community	226	67	7	297	3	0	0	1	226	67	6	
Diversity	223	59	18	207	93	0	0	74	167	42	17	
Employee	185	93	22	281	19	0	0	9	180	93	18	
Environment	258	33	9	238	51	11	4	38	237	18	3	
International	296	4	0	288	11	1	1	9	288	2	0	
Product	250	46	4	285	14	1	0	12	242	42	4	
Other	255	38	7	161	115	24	16	104	157	22	1	

concern rating of each dimension of CSP is analyzed for the number of firms receiving a rating of zero, one, or two. In addition, a total CSP rating was calculated by adding the strength rating and subtracting the concern rating to arrive at a total dimension rating. Again, we analyzed the number of firms receiving a rating between negative two and two.

Community Dimension

The CSID bases its *community* dimension rating upon evidence of the firm's generous and innovative giving, and community and aboriginal relations. Companies that have consistently donated 1% or more of pre-tax profits to charity or demonstrate ongoing support through substantial donations to innovative programs are given high strength ratings for this dimension. Companies that make outstanding efforts to consult/engage with local communities affected by its operations or adjust its operations in accordance with the concerns of the community also receive high strength ratings. Companies that fail to work with affected communities about their concerns, breach agreements with the community, or affect community relations by closing plants are given a higher concern rating. Companies that equitably share the benefits of their developments with the aboriginal communities where they are located and take into account their concerns and interests are given high strength ratings while companies that fail to do so are given high concern ratings.

Table 3 shows that the *community* dimension of CSP for the TSE 300 firms consistently received the second highest mean dimension ratings for all years, though the average rating declined from 0.36 in 1995 to 0.26 in 1999. On balance MJRI rated TSE 300 firms as having more strengths than concerns when evaluating the firms' relationships with communities as more companies received a positive rating than a negative one. According to Table 2, no companies received a total negative two rating for the five-year period and four or less companies received a negative one rating for years 1997 through 1999. Over the five year period, there appeared to be a slight steady decline in companies receiving a rating of one or two, as 30% of the companies received these ratings in 1995 compared to 24% in 1999. This slight decline in one and two ratings is offset by a slight increase in zero ratings. Overall, it appears that community dimension rating for firms is declining over time.

Diversity Dimension

Employment equity programs, women serving on board of directors and in senior management, minority/women contracting and family benefits are all factors that influence the *diversity* dimension rating of a Canadian company. Companies with exceptional programs to encourage hiring and promoting women, minorities or disadvantaged groups receive high strength ratings while companies that do not

Table 3. Mean and Standard Deviation of Dimension by Year.

Year	Community	Diversity	Employee	Environment	International	Product	Other	Total
1995	0.36 (0.60)	-0.07 (0.84)	0.61 (0.70)	0.04 (0.61)	-0.02 (0.17)	0.17 (0.54)	-0.45 (0.68)	0.65 (1.97)
1996	0.36 (0.60)	0.00 (0.90)	0.68 (0.73)	0.06 (0.63)	-0.02 (0.22)	0.18 (0.55)	-0.45 (0.68)	0.80 (2.05)
1997	0.29 (0.56)	-0.02 (0.91)	0.71 (0.79)	0.01 (0.57)	-0.03 (0.24)	0.18 (0.50)	-0.48 (0.72)	0.67 (2.12)
1998	0.29 (0.57)	0.09 (0.87)	0.80 (0.85)	-0.03 (0.57)	-0.03 (0.25)	0.17 (0.51)	-0.49 (0.72)	0.81 (2.21)
1999	0.26 (0.49)	0.02 (0.83)	0.40 (0.65)	-0.07 (0.52)	-0.03 (0.22)	0.13 (0.47)	-0.37 (0.71)	0.33 (1.89)

have these policies receive high concern ratings. Companies that have 15% or more of the seats on the company's board of directors held by women have more than 25% of women as senior officers or demonstrate a commitment to purchase or contract with businesses owned by women, minorities or disadvantaged groups are also given higher strength ratings. Also affecting the strength rating are benefit programs that help employees balance their work and family responsibilities. Higher concern ratings are given for company involvement in employment equity legislation, major controversy relating to the hiring, promotion, and dismissal, or the failure to prevent discrimination and harassment in the workplace.

According to [Table 3](#), the mean *diversity* dimension rating scores for the TSE 300 firms is improving over time, as they moved from the sixth mean lowest dimension rating in 1995 to fourth in 1999. As seen in [Table 2](#), more companies received negative ratings than positive ratings. Despite the overall negative ratings, this dimension shows a wide range of rankings, as it has the third highest number of companies receiving a total positive one or two ranking. In more recent years, fewer extreme ratings, either positive or negative, were given, resulting in an increase in the number of firms rated zero (neither a strength nor a concern).

Employee Dimension

The CSID *employee* dimension rating is based upon factors concerning union relationships, safety, management policies, benefits, and employee ownership or profit sharing plans. While positive relations with its unionized employees are considered strengths, poor relationships, as evidenced by recent history of strike activity, use of non-unionized employees or unfair labor practices are considered weaknesses (MJRA, 2000). Exceptional employee benefits, employee stock ownership plans, and cash profit sharing programs are also considered strengths while inadequate benefits packages and poor health and safety records compared with industry counterparts are considered weaknesses. Companies that have maintained a consistent no layoff policy are given a higher strength rating while companies that reduce the size of their workforce relative to their competitors or that transfer/expand operations in other jurisdictions in order to take advantage of lower labor costs or less stringent labor laws are given a higher concern rating.

The *employee* dimension consistently received the highest mean dimension ratings (see [Table 3](#)), with an average of over 53% of the companies receiving a total rating of positive one or two for the five-year time period (see [Table 2](#)). This dimension had the lowest number of companies receiving a total rating of zero, with an average of 44% of the companies receiving this rating over the five-year time period. The TSE 300 companies received increasingly higher ratings in this dimension for the years 1995 through 1998, but this rating took a severe

downturn in 1999 going from an average of 0.80 in 1998 to an average rating of 0.40 in 1999. The decline in this dimension rating is caused by a majority of the companies going from a positive rating to a revised rating of zero.

Environment Dimension

The *environment* dimension rating of Canadian firms is based upon environmental management, planning and impact assessment, use of resources, compliance record, emission/discharges and impact of products. While a major strength is having an outstanding environmental management and reporting system, a major concern is the lack thereof or an unwillingness to improve environmental management and reporting. A company that engages in exceptional environmental planning, development of comprehensive management plans, and meaningful public consultation is given a high strength rating while companies that lack this are given a high concern rating. Higher strength ratings are given to companies that are leaders with respect to efficient and environmentally sound use of natural resources and to those who have implemented measures or altered their production process to reduce the environmental impact of their operations. Higher concern ratings are given to companies that: (1) have poor compliance records with environmental laws, regulations and operating permits; (2) are substantial emitters of hazardous or toxic substances; (3) lag behind their industry counterparts in implementing measures to prevent or reduce negative environmental impact; or (4) derive a substantial portion of revenues from products that have a negative impact on the environment.

Table 3 shows that the *environment* dimension had the fourth lowest mean dimension rating in the years 1995 through 1997, the fifth lowest rating in 1998 and the sixth lowest rating in 1999. As can be seen in Table 2, a majority of these companies, approximately 76%, received a total zero rating. During the five year period, there appears to be a negative trend in the rating as it went from 0.04 in 1995 to -0.07 in 1999. This trend can be contributed to two factors: (1) the companies receiving a negative rating increased from a total of 31 in 1995 to 42 in 1999; and (2) the number of companies receiving a positive rating went from a total of 43 in 1995 to 21 in 1999.

International Dimension

Community and employee relations, human rights, environment and sourcing practices for company operations outside Canada and the United States are all factors that affect the CSID *international* dimension rating. Companies with positive employee relations, progressive community relations and progressive environmental practices receive higher strength ratings while companies with poor employee relations, poor community relations and poor environmental practices

receive higher concern ratings. Companies that ensure that their suppliers and subcontractors are not contributing to the perpetuation of human rights abuse, unfair or abusive labor practice, or environmental degradation receive higher strength ratings while companies who do not follow this practice receive higher concern ratings. Finally, companies that have been implicated in the violation of human rights in their international operations or have operations in or a commercial relationship with certain countries receive higher concern ratings.

According to [Table 2](#), the *international* dimension had the most companies receiving a zero rating, with over 95% of all companies receiving it. By examining [Table 2](#), no companies received a total two rating over this time period and one company received a negative two rating in the years 1998 and 1999. [Table 3](#) shows that the average rating for this dimension stayed consistent over the five-year period. Based upon this analysis, it appears that either few Canadian companies have international operations or their international operations have minimal impact on the CSP ratings.

Product Dimension

The CSID rating of a firm's *product* dimension as it relates to CSP is significantly affected by the type and safety of product, the marketing practices and ethical behavior of the company. Higher strength ratings are given to companies where a significant proportion of their revenues come from socially beneficial products or services and take significant initiatives to ensure ethical business practices (including the creation of a code of business conduct) throughout their operations. Higher concern ratings are given to companies involved in the development/production of products that cause permanent impairment, non-life-threatening or life-threatening injury/illness. Also, companies involved in the production of pornography or derive 10% or more of its revenues from the provision of services related to pornography receive higher concern ratings. Finally, companies convicted or who paid recent fines as a result of advertising, marketing, production practices, price fixing, antitrust violations, consumer fraud or other illegal business activities receive higher concern ratings.

[Table 3](#) shows that the *product* dimension consistently received the third highest dimension rating from 1995 through 1999. Though the average total rating stayed consistently in the 0.17/0.18 area for the years 1995 through 1998, it declined in 1999 to 0.13. [Table 2](#) shows that more companies received positive than negative ratings. In 1999 there was a reduction in the number of companies receiving a one or two total rating, as 21% of the companies received this rating in the years 1996 through 1998 but only 15% of the companies received this rating in 1999. This downgrading in ratings appeared to result from firms moving from a positive rating to a zero rating.

Other Dimension

The CSID rating of the *other* dimension depends upon a variety of issues, including compensation, voting rights, and ownership. Companies that limit compensation of board members or senior managers receive high strength ratings, while companies that pay excessive compensation receive high concern ratings. Companies that adopt confidential proxy voting procedures receive high strength ratings while companies that have non-voting or multiple-voting common shares receive high concern ratings. Finally, companies that own (or owned by) 50% of another company cited by CSID as having one or more areas of social strength receive high strength ratings, while owning 50% (or owned by) companies that have one or more areas of social concern receive high concern ratings.

Table 3 shows that the *other* dimension showed a slight decline in ratings from 1995 to 1998 with an increase in 1999. This dimension consistently received the lowest mean dimension rating over the five-year period, with over 46% of the companies receiving a negative one or negative two total rating for each year. According to Table 2, these negative ratings reached a peak of 52% in 1998; there was a decline in these negative ratings to 40% in 1999, occurring mostly from a rating change of negative one to zero. About half the companies received an *other* dimension total rating of zero, with less than 7% of companies receiving a positive rating during the five-year period. This dimension had the highest number of companies receiving a negative two rating, with approximately 5% of the companies receiving it.

Summary of CSP Analysis

For every year, more firms received a strength rating of a two in the *employee* dimension than was received for any of the other dimensions (see Table 2). Though the number of firms receiving a two strength *diversity* rating was the fourth highest in years 1995 and 1996, the category moved up to second place in the remaining years, for that particular measure. The *employee* dimension also had the highest number of firms receiving a rating of a one, followed by the *diversity* dimension for years 1995 through 1998 and the *community* dimension for 1999. The *employee* dimension also had the highest number of firms receiving a positive two rating in the total category followed by the *community* dimension for years 1995 and 1996 and the *diversity* dimension for years 1997 through 1999. The *employee* dimension and *community* dimension had the highest and second highest number of firms receiving a total rating of a one for each of the five years.

For every year, the *other* dimension had the highest number of firms with a two rating in the concern category followed by the *environment* rating having the second highest. No other specific dimension had a significant number of firms receiving a two rating. The *other* dimension had the highest number of

firms had the same rating in 1999 that they had in 1995, but the ratings changed during the intervening years.

Fifty-six firms show a rating increase from 1995 through 1999. Though over half (33 firms) of the ratings only increase by one, fifteen firms increased by two points, six firms increased by three points and two firms increased by four points. Sixty-five firms showed a rating decrease from the years 1995 through 1999. Again, over half (33 firms) decreased by one point, 11 firms decreased by two points, 17 firms had a decrease of three points, and four firms had a decrease of four points.

Relationship of Size and Profitability to CSP

Evidence concerning the relationship between firm size, profits and CSP in Canada can be found in Table 5 through 9. We examined, by year, the means, standard deviations and correlations of the total CSP and CSP dimensions with various size and profitability variables. TSE 300 firms where CSP rating information was available in the CSID database and financial information was available in Standard & Poor's Research Insight were included in this analysis (Tables 6–9).

For all years, 1995 through 1999, income, sales, assets, and debt (shown in millions) were significantly correlated with the CSP dimensions of *diversity*, *product*, *other* and with the total cumulative CSP score. For the dimension of *community*, income was significantly correlated with it in 1995 and 1997. In 1997, 1998 and 1999 sales, assets and debt were also significantly correlated with *community*. For the dimension of *employee*, assets were significantly correlated with it for the years 1997 and 1998. Also, in 1997 the *employee* CSP rating was correlated with income as well as sales for the year 1998. For the dimension of *international*, the asset measure was correlated in 1997 and 1998; the income measure was correlated in 1997 through 1999; and the sales measure was correlated in 1998. Surprisingly enough, no correlation was noted for any year for the dimension of *environment*.

When examining the correlation between the CSP dimensions and total CSP with ROA, ROI and ROS, few significant correlations were noted. In 1995, only ROE was significantly and positively correlated with the dimension of *diversity*. In 1996, ROS was significantly negatively correlated with the dimension of *international* and positively correlated with the *other* dimension. In 1998, only ROE was significantly positively correlated with the dimension of *environment*. In 1999, ROA and ROE were significantly and positively correlated with the dimension of *international*. No significant correlations were noted for the year 1997.

Table 5. Means, Standard Deviations, and Correlations of CSP, Profitability and Firm Size 1995.

Variable	Mean	S.D.	1	2	3	4	5	6	7	8	9	10	11	12	13	14
1. Communities	0.43	0.65														
2. Diversity	-0.07	0.82	0.20													
3. Employee	0.60	0.66	0.07	0.07												
4. Environment	0.05	0.53	-0.01	-0.15	0.04											
5. International	-0.02	0.20	-0.08	-0.04	-0.01	0.01										
6. Product	0.17	0.59	-0.04	0.31	0.21	-0.10	-0.02									
7. Other	-0.48	0.71	0.07	0.17	0.10	0.08	0.11	0.35								
8. Total CSP	0.69	2.00	0.43	0.60	0.49	0.21	0.09	0.57	0.61							
9. ROA	3.83	8.29	0.04	0.02	-0.06	0.00	0.02	0.00	0.02	0.01						
10. ROE	8.82	17.85	0.04	0.21	-0.05	0.05	0.02	0.07	0.03	0.13	0.80					
11. ROS	-9.43	188.00	0.06	0.00	-0.05	0.01	-0.01	0.03	-0.03	0.00	0.69	0.51				
12. Income	120.60	230.00	0.19	0.38	0.03	-0.05	0.01	0.46	0.41	0.49	0.13	0.23	0.06			
13. Sales	2414.62	3682.00	0.10	0.38	-0.04	-0.05	0.03	0.43	0.32	0.40	-0.05	0.09	0.05	0.74		
14. Assets	7971.82	26835.00	0.10	0.36	0.10	-0.03	0.02	0.42	0.40	0.47	-0.09	0.06	0.03	0.73	0.62	
15. Debt	753.56	1347.00	0.09	0.32	-0.01	0.01	0.01	0.31	0.23	0.33	-0.11	0.04	0.04	0.51	0.77	0.44

Note: $N = 171$. Correlations greater than or equal to 0.15 significant at 0.05 and those greater than or equal to 0.20 significant at 0.01.

Table 6. Means, Standard Deviations, and Correlations of CSP, Profitability and Firm Size 1996.

Variable	Mean	S.D.	1	2	3	4	5	6	7	8	9	10	11	12	13	14
1. Communities	0.41	0.64														
2. Diversity	0.03	0.88	0.24													
3. Employee	0.70	0.72	0.16	0.10												
4. Environment	0.05	0.60	-0.00	-0.07	0.13											
5. International	-0.01	0.23	-0.06	0.00	-0.01	-0.04										
6. Product	0.20	0.59	0.01	0.30	0.16	-0.04	0.01									
7. Other	-0.47	0.73	0.04	0.19	0.09	0.02	0.05	0.21								
8. Total CSP	0.91	2.12	0.46	0.65	0.53	0.29	0.10	0.52	0.53							
9. ROA	3.74	6.22	-0.01	-0.12	-0.02	0.11	-0.07	-0.08	0.07	-0.03						
10. ROE	9.26	13.11	-0.01	0.01	-0.15	0.14	-0.04	-0.06	0.08	-0.01	0.78					
11. ROS	6.02	14.49	0.06	-0.14	0.01	0.11	-0.15	-0.01	0.15	0.03	0.72	0.56				
12. Income	131.12	256.46	0.14	0.37	0.09	0.00	-0.00	0.42	0.48	0.50	0.10	0.23	0.16			
13. Sales	2447.56	3902.00	0.11	0.38	0.02	0.00	0.03	0.42	0.35	0.44	-0.07	0.11	-0.03	0.84		
14. Assets	8599.33	29883.00	0.11	0.36	0.09	-0.02	0.01	0.32	0.40	0.43	-0.11	0.10	0.03	0.81	0.61	
15. Debt	793.33	1411.00	0.10	0.29	-0.03	-0.01	-0.01	0.32	0.22	0.30	-0.13	0.07	-0.03	0.62	0.76	0.42

Note: $N = 173$ Correlations greater than or equal to 0.15 significant at 0.05 and those greater than or equal to 0.20 significant at 0.01.

Table 7. Means, Standard Deviations, and Correlations of CSP, Profitability and Firm Size 1997.

Variable	Mean	S.D.	1	2	3	4	5	6	7	8	9	10	11	12	13	14
1. Communities	0.29	0.56														
2. Diversity	0.04	0.95	0.23													
3. Employee	0.68	0.79	0.21	0.17												
4. Environment	0.02	0.58	-0.04	0.02	0.11											
5. International	-0.01	0.21	-0.09	0.08	0.09	-0.08										
6. Product	0.18	0.50	0.02	0.25	0.13	-0.02	0.07									
7. Other	-0.52	0.74	0.18	0.08	0.08	-0.08	0.11	0.11								
8. Total CSP	0.68	2.13	0.49	0.67	0.59	0.27	0.17	0.44	0.47							
9. ROA	2.60	16.24	-0.01	-0.04	0.01	0.10	0.01	0.05	0.04	0.04						
10. ROE	5.39	41.77	0.04	-0.02	0.03	0.10	0.01	0.07	0.01	0.06	0.87					
11. ROS	0.30	48.77	0.05	-0.10	-0.06	0.07	-0.01	0.05	0.09	0.01	0.57	0.50				
12. Income	128.73	298.00	0.27	0.29	0.20	-0.07	0.16	0.32	0.38	0.47	0.24	0.26	0.25			
13. Sales	2397.97	4060.00	0.25	0.32	0.13	-0.05	0.12	0.35	0.32	0.45	0.02	0.08	0.06	0.77		
14. Assets	8927.96	33220.00	0.34	0.33	0.25	-0.02	0.15	0.22	0.38	0.52	-0.02	0.05	0.04	0.77	0.60	
15. Debt	856.12	1430.00	0.23	0.28	0.01	-0.05	0.06	0.31	0.21	0.33	-0.03	0.04	0.05	0.57	0.75	0.43

Note: $N = 207$ Correlations greater than or equal to 0.15 significant at 0.05 and those greater than or equal to 0.18 significant at 0.01.

Table 8. Means, Standard Deviations, and Correlations of CSP, Profitability and Firm Size 1998.

Variable	Mean	S.D.	1	2	3	4	5	6	7	8	9	10	11	12	13	14
1. Communities	0.29	0.56														
2. Diversity	0.11	0.88	0.19													
3. Employee	0.78	0.82	0.21	0.19												
4. Environment	-0.02	0.56	-0.05	-0.02	0.09											
5. International	-0.03	0.24	-0.07	0.02	0.10	-0.01										
6. Product	0.18	0.52	0.02	0.31	0.12	0.00	0.04									
7. Other	-0.50	0.76	0.06	0.13	0.15	-0.07	0.09	0.15								
8. Total CSP	0.80	2.14	0.43	0.65	0.63	0.25	0.18	0.48	0.51							
9. ROA	1.68	9.29	0.01	0.04	0.02	0.11	0.05	-0.02	0.05	0.07						
10. ROE	3.58	35.84	0.01	0.04	0.10	0.13	0.03	0.03	-0.00	0.1	0.31					
11. ROS	-18.99	186.00	0.06	-0.07	-0.06	0.10	-0.01	0.04	0.05	0.02	0.30	0.07				
12. Income	117.51	418.00	0.12	0.24	0.12	0.00	0.13	0.34	0.33	0.39	0.28	0.16	0.07			
13. Sales	2471.56	4159.00	0.22	0.32	0.13	-0.05	0.15	0.32	0.34	0.44	0.07	0.08	0.08	0.77		
14. Assets	9465.13	36046.00	0.27	0.32	0.17	-0.01	0.15	0.19	0.34	0.45	-0.01	0.06	0.04	0.53	0.67	
15. Debt	978.89	1615.00	0.17	0.24	0.08	-0.09	0.07	0.30	0.21	0.31	0.01	0.03	0.07	0.55	0.64	0.38

Note: $N = 227$. Correlations greater than or equal to 0.13 significant at 0.05 and those greater than or equal to 0.19 significant at 0.01.

Table 9. Means, Standard Deviations, and Correlations of CSP, Profitability and Firm Size 1999.

Variable	Mean	S.D.	1	2	3	4	5	6	7	8	9	10	11	12	13	14
1. Communities	0.25	0.47														
2. Diversity	-0.05	0.82	0.20													
3. Employee	0.41	0.65	0.11	0.08												
4. Environment	-0.07	0.54	0.06	0.05	0.15											
5. International	-0.03	0.23	-0.08	-0.04	0.01	-0.02										
6. Product	0.14	0.48	0.06	0.37	0.03	0.13	-0.08									
7. Other	-0.35	0.74	0.08	0.14	0.09	0.05	0.06	0.14								
8. Total CSP	0.39	1.95	0.42	0.65	0.48	0.41	0.08	0.51	0.55							
9. ROA	1.38	14.50	-0.00	0.05	-0.04	0.03	0.23	0.05	-0.04	0.04						
10. ROE	2.00	48.25	-0.00	0.02	-0.05	0.01	0.14	0.08	0.12	0.07	0.36					
11. ROS	-6.75	82.50	-0.03	0.08	0.05	-0.12	0.01	-0.02	-0.06	-0.02	0.12	0.08				
12. Income	135.81	491.00	0.08	0.30	-0.06	0.02	0.14	0.35	0.21	0.31	0.22	0.14	-0.00			
13. Sales	2657.95	4610.00	0.18	0.34	0.11	0.11	-0.03	0.27	0.24	0.41	0.06	0.08	-0.03	0.52		
14. Assets	9775.26	35698.00	0.26	0.39	0.02	0.03	0.13	0.17	0.31	0.42	-0.00	0.05	-0.02	0.55	0.64	
15. Debt	1988.96	6046.00	0.25	0.37	0.02	0.01	0.13	0.19	0.29	0.40	-0.00	0.03	-0.02	0.56	0.62	0.95

Note: $N = 229$. Correlations greater than or equal to 0.14 significant at 0.05 and those greater than or equal to 0.18 significant at 0.01.

IMPLICATIONS AND CONCLUSIONS

This study was undertaken to introduce the CSID CSP ratings as an independent measure of the CSP of Canadian firms and to use it to report on the level of CSP activities in Canada. We find evidence that while CSP is an important aspect of the business/society relationship in Canada, Canadian CSP studies use specific, noncomparable measures and utilize small sample sizes. As U.S. CSP research flourished after the introduction of the KLD database, which is regarded as the best database available on U.S. companies (Hillman & Keim, 2001), it is hoped that the use of the CSID database for Canadian firms will lead to the same increase in CSP research for firms listed on the TSE 300. This new independent measurement will allow researchers to examine large sample sizes using a consistent measurement of CSP and will dramatically improve the comparability of results among Canadian CSP studies.

In addition to introducing a new CSP measure, we have been able to provide an initial large scale overview of CSP in Canada through a multiple-year analysis of the CSP of 300 of Canada's largest companies. According to the CSID reported ratings we conclude that firms typically receive a zero rating from CSID. This finding indicates that TSE 300 firms are most likely to be rated as having no noticeable strengths or concerns with respect to their CSP. There are two empirical regularities that deserve further attention. First, three specific CSP measures show a relatively large percentage of companies receiving concern ratings – *diversity* (30%), *environment* (12%), and *other* (47%). For the *diversity* dimension, it appears that almost one-third of the TSE 300 firms lacked appropriate employment equity initiatives and/or were involved in employment equity controversies. The *other* concern ratings reveal that over one-third of these companies have corporate governance concerns. Finally, the *environment*-related concerns, while affecting only about 10% of the TSE 300, is concentrated in industries subject to environmental regulations. The *environment* ratings are particularly noteworthy given that Canada's economy is driven partially by natural resource-based industries.

Second, we found no persistent empirical relationship between measures of CSP and traditional accounting measures of profitability. From this aggregate analysis, we conclude that a firm's CSP activities do not improve financial performance. Conversely, CSP does not seem to have to occur at the expense of firm profitability. Research is needed to investigate the meaning and importance, if any, of these CSP ratings when they are incorporated into more specific industry or firm-level analyses. Also, it is important to recognize that although an independent firm performs the CSID ratings, they are the result of MJRA's definitions and evaluations of CSP. Studies can aid in the development of this research stream

by investigating the construct validity of CSID ratings and providing critiques of MJRA's perspective on CSP.

NOTES

1. Both CSID and KLD use a comprehensive set of ratings for seven dimensions. Though KLD uses different names for some of their dimensions, they cover the same basic social and environmental issues and use the same rating scale as MJRA. Both companies determine their ratings through extensive research, including public and private documents, interviews, surveys, analysis of litigations and legislative actions. The major difference in the two companies is that KLD provides ratings for companies traded on U.S. stock exchanges while CSID provides ratings for companies traded on the Canadian stock exchange.

2. Standard & Poor's Research Insight does not maintain historical data for Canadian companies that have merged or have gone out of business.

REFERENCES

- Bendheim, C. L., Waddock, S. A., & Graves, S. B. (1998). Determining best practice in corporate-stakeholder relations using data envelopment analysis. *Business and Society*, 37(3), 305–338.
- Berman, S. L., Wicks, A. C., Kotha, S., & Jones, T. M. (1999). Does stakeholder orientation matter? The relationship between stakeholder management models and firm financial performance. *Academy of Management Journal*, 42(5), 488–506.
- Brooks, L. J. (1986). *Canadian corporate social performance*. Society of Management Accountants of Canada, Hamilton, Canada.
- Brooks, L. J. (1989). Corporate ethical performance: Trends, forecasts and outlooks. *Journal of Business Ethics*, 8, 31–38.
- Brooks, L. J. (1997). Business ethics in Canada: Distinctiveness and directions. *Journal of Business Ethics*, 16, 591–604.
- Burke, R. C. (1980). The disclosure of social accounting information. *Cost and Management* (May–June), 21–24.
- Canadian Institute of Chartered Accountants (2001). *Measuring the business value of stakeholder relationships – Part I*. CICA: Toronto.
- Carroll, A. (1979). A three-dimensional conceptual model of corporate social performance. *Academy of Management Review*, 4, 497–505.
- Clarkson, M. B. E. (1988). Corporate social performance in Canada, 1976–86. *Research in Corporate Social Performance and Policy*, 10, 241–365.
- Clarkson, M. B. E. (1995). A stakeholder framework for analyzing and evaluating corporate social performance. *Academy of Management Review*, 20, 92–117.
- Cormier, D., & Gordon, I. M. (2001). An examination of social and environmental reporting strategies. *Accounting, Auditing & Accountability Journal*, 14(5), 587–616.
- Cormier, D., & Magnan, M. (1997). Investors' assessment of implicit environmental liabilities: An empirical investigation. *Journal of Accounting and Public Policy*, 16, 141–215.
- Cormier, D., & Magnan, M. (1999). Corporate environmental disclosure strategies: Determinants, cost and benefits. *Journal of Accounting, Auditing & Finance*, 14(4), 429–451.

- Delfgaauw, T. (2000). Reporting on sustainable development: A preparer's view. *Auditing: A Journal of Practice and Theory*, 19(Suppl.), 67–74.
- Deloitte Touche Tohmatsu (2002). *Deloitte environmental reporting*. <http://www.deloitte-sustainable.com>.
- Graves, S. B., & Waddock, S. A. (1994). Institutional owners and corporate social performance. *Academy of Management Journal*, 37(4), 1034–1046.
- Gray, R., Kouhy, R., & Lavers, S. (1995). Corporate social and environmental reporting: A review of the literature and a longitudinal study of U.K. disclosure. *Accounting, Auditing and Accountability Journal*, 8(2), 47–77.
- Greening, D. W., & Turban, D. B. (2000). Corporate social performance as a competitive advantage in attracting a quality workforce. *Business and Society*, 39(3), 254–280.
- Griffin, J. J., & Mahon, J. F. (1997). The corporate social performance and corporate financial performance debate. *Business and Society*, 36(1), 5–31.
- Henriques, I., & Sadosky, P. (1999). The relationship between environmental commitment and managerial perceptions of stakeholder importance. *Academy of Management Journal*, 42(1), 87–99.
- Hillman, A. J., & Keim, G. D. (2001). Shareholder value, stakeholder management, and social issues: What's the bottom line. *Strategic Management Journal*, 22, 125–139.
- Johnson, R. A., & Greening, D. W. (1999). The effects of corporate governance and institutional ownership types on corporate social performance. *Academy of Management Journal*, 42(5), 564–576.
- Lefebvre, M., & Singh, J. B. (1992). The content and focus of Canadian corporate code of ethics. *Journal of Business Ethics*, 11, 799–808.
- Li, Y., Richardson, G. D., & Thornton, D. B. (1997). Corporate disclosure of environmental liability information: Theory and evidence. *Contemporary Accounting Research*, 14(3), 435–474.
- McDonald, M. (1997). Business ethics in Canada: Integration and interdisciplinary. *Journal of Business Ethics*, 16, 635–643.
- Michael Jantzi Research Associates Inc. (2000). *Social and environmental rating criteria for MJRA company profiles*. Toronto, Ontario.
- Michael Jantzi Research Associates Inc. (2002). Retrieved December 12 from http://www.mjra-jsi.com/about.asp?section=1&level_2=0&level_3=0.
- Nitkin, D., & Brooks, L. J. (1998). Sustainability auditing and reporting: The Canadian experience. *Journal of Business Ethics*, 17, 1499–1507.
- Preston, L. E., Rey, F., & Dierkes, M. (1978). Comparing corporate social performance. *California Management Review*, XX(4), 40–49.
- Richardson, A. J., & Welker, M. (2001). Social disclosure, financial disclosure and the cost of equity capital, Accounting. *Organizations and Society*, 26, 597–616.
- Roberts, R. W. (1992). Determinants of corporate social responsibility disclosure: An application of stakeholder theory. *Accounting, Organizations and Society*, 17(6), 595–612.
- Roman, R., Hayibor, M. S., & Agle, B. R. (1999). The relationship between social and financial performance. *Business & Society*, 38(1), 109–125.
- Standard & Poor's Research Insight (2000). The McGraw-Hill Companies, New York, NY.
- Stoffman, D. (1991). Good behavior and the bottom line. *Canadian Business* (May), 28–32.
- Swanson, D. (1995). Addressing a theoretical problem by reorienting the CSP model. *Academy of Management Review*, 20, 43–64.
- United Nations in Canada (2002). Stewardship and conservation discussion paper. http://www.canada2002earthsummit.gc.ca/en/stewardship_conservation_e.cfm.

- Waddock, S. A., & Graves, S. M. (1997a). The corporate social performance-financial performance link. *Strategic Management Journal*, 18(4), 303–319.
- Waddock, S. A., & Graves, S. M. (1997b). Social issues in management: Theory and research in corporate social performance. *Journal of Management*, 17(2), 383–406.
- Wallage, P. (2000). Assurance on sustainability reporting: An auditor's view. *Auditing: A Journal of Practice and Theory*, 19(Suppl.), 53–65.
- Wartick, S., & Cochran, P. E. (1985). The evolution of the corporate social performance model. *Academy of Management Review*, 10, 758–769.
- Wood, D. (1991). Corporate social performance revisited. *Academy of Management Review*, 16, 691–718.
- Wood, D. J., & Jones, R. E. (1995). Stakeholder mismatching: A theoretical problem in empirical research on corporate social performance. *International Journal of Organizational Analysis*, 3(3), 250–279.
- Wood, G. (2000). A cross cultural comparison of the contents of codes of ethics: USA, Canada and Australia. *Journal of Business Ethics*, 25, 287–298.

THE MORAL AND CULTURAL REASONING OF IPO ACCOUNTANTS: A SMALL SAMPLE STUDY

John T. Sennetti, Tara J. Shawver and
Patricia C. Bancroft

ABSTRACT

This study investigates the effects of moral and cultural reasoning on the ethical evaluation and intentions of thirty-nine internal accounting staff actively engaged in preparing financial information for an initial public offering (IPO) by four technology-related service companies. These accountants have incentives to manage earnings for their IPOs, as each will benefit from stock price increases. Each accountant is subjected to the IPO culture with its unique ethical orientation created after the Private Securities Litigation Reform Act of 1995 and prior to the Enron scandal.

We find that IPO accountants ethically recognize, but are not sensitive to choosing procedures to manage earnings. Generally the IPO accountant's ethical judgments are not predicted by their level of moral reasoning as measured by the Defining Issues Test (DIT-2), but are predicted by the philosophical constructs of the Multidimensional Ethics Scale (MES). We find the DIT, but not the MES, subject to response bias. These results invite greater investigation of ethical orientation in addition to cognitive development in predicting behavior in ethically challenged environments.

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INTRODUCTION

“Going public” is an ultimate American small business ideal. It serves as one goal that projects universally accepted images of success, such as early retirement and vast personal wealth. Its expectations inspire workers to accept cult-like working conditions, and to eagerly work many hours without overtime pay. Workers compete to achieve such immediate goals as the most “hours-on-task” and the highest frequency of task “completions” with the expectation of proportionally owning the benefits of the firm’s success. These expectations also motivate the key participants, such as the internal accountants and staff, to identify short cuts to success, since it is they who provide the supporting evidence for the initial public offerings (IPOs) of the firm’s new securities.

This study examines IPO accountants’ self-reported ethical sensitivity and intentions toward questionable acts subsequent to the Private Securities Litigation Reform Act of 1995 and prior to the Enron scandal (Morgenson, 2002). Such responses are believed predictable by levels of moral reasoning (Duncan & Knoblett, 2000, p. 28), typically measured by the Defining Issues Test (DIT, Rest, 1986).

Moral reasoning was re-examined by Rest, Narvaez, Bebeau and Thoma (1999) who subsequently created a refined moral reasoning test (DIT-2). The DIT-2 score is obtained from asking twelve questions on each of five ethically challenged dilemmas, such as whether it is fair to steal from the wealthy to feed a starving family. Higher DIT scores imply higher moral reasoning.

This test assumes an individual’s cognitive growth is developed through states where a specific culture serves as a basis for cognitive choice, since “[e]ach person does not construct him or herself anew” (Rest et al., 1999b, p. 178). Rest et al. (1999b, p. 178) point to Jared Diamond’s (1997) Pulitzer prize winning text, *Guns, Germs and Steel* to show how cultures rationalize cognitively abhorrent choices (even as discussed in *Guns* (p. 54), murder). Yet, Rest et al. (1999b, pp. 104 and 185) admit other “moderator” variables may be needed to predict behavior, since the connection between cognition and culture is not clear. Ponemon (1993b, DIT) and a replication by Bay and Greenberg (2001, DIT-2) find contrary evidence to the linking of moral reasoning measure to behavior. To this Rest et al. (1999b, p. 101) respond that behavior is a product of four moral components (sensitivity, judgment, motivation and character) and the DIT may measure at most two of them, “explaining less than 20% of the variance of the behavior measure.” To further understand this phenomenon we ask respondents questions that indirectly infer behavior, and then seek their justification for this behavior.

Respondents reveal their ethical orientation to eight different questionable actions [some with implications for managing earnings] taken from Cohen

et al. (1998, p. 253)]. An individual's ethical orientation is then found by the Multidimensional Ethics Scale (MES, Reidenbach & Robin, 1990). The MES creates philosophical constructs (from justice, relativism, utilitarianism, egoism and deontology) and then reports these as the respondents' justifications for their self-reported actions. For example, a relativistic justification is given by the response to whether the action is "culturally acceptable" to me and "my family." Whereas the DIT is mostly limited to questions of justice and utility, rights-based morality, the MES expands these to cover what Rest et al. (1999b, p. 164) refer to as the next two, the social and personal domains.

This study is the first to examine sensitivity, judgment, intention, moral reasoning and rationale of internal accountants actively engaged in IPOs, i.e. to undertake a study using both instruments, the DIT-2 and the MES. Results show IPO accountants ethically recognize, but are not sensitive to avoiding procedures to manage earnings by operation or by accounting choice. We find that IPO accountant's ethical awareness and intentions are found not related to his/her level of moral reasoning, but explained by his/her philosophical and cultural orientation.

The remainder of this study is organized as follows. The next section develops the IPO earnings management culture. For members of this culture it anticipates the IPO accountant's ethical sensitivity and choices. It then seeks to find explanations for this sensitivity in the IPO accountant's ethical orientation and moral reasoning processes. The third section reviews the methodology used to obtain the findings this study. This is followed by the study and its results. The paper concludes with a discussion of the results, their limitations, and their implications.

HYPOTHESIS DEVELOPMENT

The Earnings Management Culture

Duncan and Knobbett (2000, p. 29) in their study of 145 corporate accountants review the earnings management culture. They point to the agency theory literature on earnings management from Antle (1989) to Merchant and Rockness (1994). An agent (manager or employee) provides evidence of labor (earnings) to the owners (stockholders and the principals, such as bankers) of the firm. The manager has incentives to use private information on these earnings (e.g. which accruals will be paid), in order to maximize compensation, which may be based entirely on the firm's stock price, e.g. stock options.

Earnings may be managed by operations or by accounting choice. The ordering of goods and services may be delayed, for example, or employees may be

retired or even let go, thus operationally improving income. Accounting choices encompass the: (1) manipulation of accruals and accounting estimates; (2) timing of revenue recognition; (3) classification of expenditures as capital or expense; and (4) income statement classification above or below operating income. All of these “have cash flow effects and involve accelerating or decelerating decisions and actions that affect reported profit” (Duncan & Knoblett, 2000, p. 30).

The ethical challenge of the workers is to report earnings that are consistent with good faith estimates of revenues and expenses likely to predict future cash flows and are consistent with the best long-term interests of the stockholder rather than the short-term interests of the manager. The extreme consequences of inappropriate earnings management to the investors are likely to be the long-term penalties of lasting stock price declines and of higher financing rates, potentially reaching those of bankruptcies, as reviewed by DeChow et al. (1996). As seen in the case of Enron (Associated Press, 2001) along with investor losses, employees’ may incur job and pension losses.

In the agency framework, the shareholders can mitigate these management risks with controls over the incentives (stock price options) offered to the manager and other employees. But at least in the short-term, this control is problematic to the extent the stock prices can be manipulated. The independent auditor provides another control over the manager’s distortion of information, but this control depends on acceptable, and often varying levels of materiality, and is subject to such variation that even firms with Big 5 auditors, as seen in the Enron case, fail. In fact, Big 5 auditing firms receive consulting revenues that exceed audit fees, making them, at least in appearance, not effective monitors (see Gordon, 2002; Investor Relations Business, 2001).

Therefore, inappropriate earnings management appears to have been increasing, and it may have been acknowledged or even permitted culture prior to the 2001 Enron scandal. Merchant and Rockness (1994) in surveying general managers staff managers, find “effective” managers “will have smoother earnings patterns, and will have achieved their budget targets more often” Merchant and Rockness (1994, p. 92).

In the case of new companies that offer IPOs, what must be managed are the past trends and the future projections of revenue and earnings growth. Since the resources of beginning companies are limited, additional compensation to the clerks, staff, and management is limited to stock options that provide payoffs only when the share price rises. This makes IPOs so risky that the SEC Act of 1933 imposed the burden of proof on the IPO auditors for subsequent lawsuits, reduced somewhat by the Private Securities Litigation Reform Act of 1995. IPOs are so suspect of misstatement that they often are required to provide comfort letters (in addition to the auditor’s report) on the limited and asymmetric information

outside the financial statements. These provide additional assurance that the IPO registration complies with that required by security regulations (Fargher et al., 2001, p. 24). Given this requirement, the IPO firms are likely to hire a Big 5 (“quality”) auditor to provide investors with brand name assurance (Datar et al., 1991; Turner & Sennetti, 2001).

Prior to the Private Securities Litigation Reform Act of 1995 even the Big 5 auditors avoided high risk audits such as IPOs (Beatty et al., 2002, p. 1). The 1995 Act was intended to reduce the auditor’s litigation risk, but requires a higher degree of responsibility from the auditor to detect and report fraud and inappropriately managed earnings. Beatty et al. (2002) find in a study of 872 post-1995 IPOs the rate of litigation reduced. The latter could be due to the law’s intended higher evidential demands, to recent robust markets, or just to better audits. Duncan and Knoblett (2000, p. 28) do not find evidence for better audits, “[C]ontrary to many opinions, the presence of strong corporate controls and the use of audits do not appear to prevent or to deter earnings management in the presence of earnings pressure.”

Moral Reasoning and Behavior

We expect IPO accountants with higher moral reasoning to be more ethically sensitive. Rest (1979) in measuring moral reasoning follows Kohlberg (1969). As a child’s physical development progresses to an adult so cognitive development progresses through six stages, from responding to pleasure and pain rewards, to responding to rewards for the greater good for society and finally arriving at individually-held principles of conscience. Many studies, e.g. Ponemon and Gabhart (1993), have studied the relationship of moral reasoning to situations in the business environments noting individuals with higher levels of moral reasoning are more likely to respond in a more ethical manner. Duncan and Knoblett (2000, p. 28) find “a corporate accountant’s ethical development (a higher DIT score) also plays a role in the accountant’s decision to engage in managing earnings.” Hence it would appear that

H1(a). IPO accountants with higher moral reasoning are more likely to evaluate questionable actions as unethical.

H1(b). IPO accountants with higher moral reasoning are more likely to evaluate questionable earnings management actions as unethical.

H1(c). IPO Accountants with higher moral reasoning are less likely to indicate an intention to engage in questionable actions.

Not all studies support a relationship between moral reasoning and responses in ethical business decision-making. Logsdon, Thompson and Reid (1994, p. 849) found no correlation between moral reasoning and attitudes toward the common practice of unauthorized copying of microcomputer software, known as software piracy (a study we continue). Ponemon (1993a) and a replication by Bay and Greenberg (2001) find contrary evidence to actual behavior. Participants with low and high (DIT-2) moral reasoning scores behaved unethically.

Moral reasoning by itself may be insufficient for predicting behavior. Rest et al. (1999b, p. 104) point to an additional moderator variable, a utilizer score from Thoma, Rest and Davison (1991), to control for “differences among people, not only their concepts of justice as utilized by the DIT, but also in the degree to which those concepts are utilized in moral decision making and behavior,” or their ethical orientation.

Justification

Because “. . . [T]he level of moral reasoning is not a measure of . . . ethical goodness” (Shaub, 1994, p. 2), predictions based upon moral reasoning first must define good and moral. This is the problem of relativism, according to Rest et al. (1999b, p. 176). It is resolved by an individual’s moral reasoning to what is good defined by, but not limited to, culture. For example, “. . . Kohlberg would argue that for cannibalistic societies it is still not right to eat people . . .” (p. 176). Contrarily, Rest et al. (1999b, p. 178) in referring to the influence of culture still inexplicably defer to *Guns, Steel and Germs* by Diamond. But Diamond (1997, p. 53) describes the killing of the Polynesian Moriori by the related Maori tribesmen, “We took possession . . . in accordance with our customs and caught all the people. No one escaped. Some ran away from us, these we killed, and others we killed – but what of that? It was in accordance with our custom.” (Presumably, according to Rest et al. (1999b, p. 104), these tribesmen would have low DIT-2 scores, if they are measurable at all, and then these would be adjusted by a Thoma et al. (1991) utilizer score.)

To better understand the moral reasoning process and how it relates to justification, Cohen et al. (1998) use the five philosophical explanations of the Multidimensional Ethics Scale (MES), in a study of 645 undergraduate student’s ethical evaluations of eight questionable actions. Cruz et al. (2000, p. 226) also use the MES on three questionable tax dilemmas to explain “not only what the respondent (the CPA tax practitioner) believes (regarding the conflict of serving the client versus serving the IRS) but why he or she believes it.”

Reidenbach and Robin (1988) initially developed the MES based on content analysis of five contemporary moral philosophies, justice, deontology, relativism,

egoism, and utilitarianism. To the moral reasoning (justice, utility domain the MES adds to the cultural) deontological, cultural) and personal (egoist) domains. The following paragraphs will describe these philosophies, their constructs, and their application to IPO accountants.

Actions taken for *justice (moral equity)* are those to create equitable treatment or to make all scales seem fair. The smoothing of uneven earnings creates in one sense, a measure of the “true earnings growth.” In this sense, a smoother earnings number is more representative, as is the mean or some other measure of central tendency. Higher sensitivity to justice also implies a higher moral development, and a higher DIT-2 score, but this may depend upon context or culture. A “fair” accounting earnings procedure is perceived quite differently than an affirmative action law that creates “fair” hiring system for minority employees.

Actions taken for relativistic reasons are those where certain rules may not seem universal, i.e. accounting rules that may be acceptable in one culture may not be so in another. In the IPO environment, the generally accepted (and legal) business practice of stating, “We have the best merchandise in town,” can be taken to another level of stating only the firm’s most appealing attributes, e.g. “We have exceptional revenue growth.” This may be done by ignoring or just consciously not considering possible negative events. Such were the claims made by the IPO “dot.com” companies in the year 2000 that did not survive. These firms initially claimed they were part of a non-traditional, newer, better, and “different economy,” wherein revenue growth are more important than earnings. Egoistic actions are presumed ethical if they promote an individual’s long-term interests. “Literal application of an egoistic philosophy appears to be rather extreme, since it leads to the conclusion that any action is ethical as long as it promotes the self-interest of the actor. Nevertheless, it is reasonable to assume that self-interest does exert some influence over [the actor]” (Cruz et al., 2000, p. 227). IPO companies “not yet profitable” must have investors just to survive, and investors need reasons to invest. Therefore, it is in the IPO employee’s self-interest to argue the reasons of revenue growth rather than investor-interest, earnings growth.

Utilitarian actions are those done for the greatest good, in contrast to those of egoism. Yet, these two philosophies are alike in that their determinations depend on the outcomes of events, unlike the other three philosophies. Utilitarian actions for earnings management (seemingly done out of egoism) may be instead justified to save the company, to save the most number of jobs, to reduce the need for overall corporate downsizing, to lower prices for all customers or to just make the company’s product available for all.

Actions taken under a deontological philosophy focus on the principles of right and wrong but only to the duties defined by the actor, which may include unwritten contracts or social obligations. Peer (social) pressure creates obligations. Lord

and DeZoort (2001) find that either obedience to superiors or conformity pressure may override the professional (AICPA ethical) commitment for independence required of auditors. Testing 171 staff auditors from one international auditing firm they find such pressure may increase the willingness to sign off on a materially misstated account balance. Both obedience and peer pressure may persist in IPO companies, because the public offering affects everyone in the firm.

Since Cohen et al. (1993, 1996, 1998) and Cruz et al. (2000) do find that participants are able to explain their questionable actions by at least one of the philosophical constructs of the MES, i.e. their ethical orientation, we extend their hypotheses to the IPO accountant's sensitivity and intentions.

H2(a). An IPO accountant's ethical orientation explains his/her evaluation of questionable actions.

H2(b). An IPO accountant's ethical orientation explains his/her evaluation of questionable earnings management actions.

H2(c). An IPO accountant's ethical orientation explains his/her probability of avoiding questionable actions.

Moral Reasoning and Justification

Cohen et al. (1998, p. 266) because of findings contrary to Ponemon and Gabhart (1993), speculate that moral reasoning (from fairness (equity), from the greater good (utility)) may not be related to the other (relativistic, contractual, and egoistic) philosophical justifications. Lord and DeZoort (2001) find that auditors with higher moral reasoning do not have stronger contractual obligations to the profession, the accounting client or firm. On the other hand, Cruz et al. (2000, p. 239) suggests cognitive moral development may influence the "deontological and teleological evaluations of ethical dilemmas."

If the Moriuri tribesmen choose questionable actions, we (or they) may blame their culture and/or their low levels moral reasoning. Alternatively, higher moral reasoners (with higher DIT-2 scores) should have more philosophical objections (from at least fairness (equity) and utilitarianism, and perhaps relativism, contractualism, and egoism):

H3. IPO accountants with higher moral reasoning present more philosophical objections in their evaluations of questionable actions.

To summarize these hypotheses, IPO accountants may be less sensitive toward and thereby may be more likely to undertake questionable actions, particularly those of

earnings management. Because culture influences cognition, this sensitivity may be moderated by the accountant's ethical orientation, as measured by one or all of five philosophical constructs, in order to improve what Rest et al. (1999b, p. 104) call the "predictability of moral judgment to behavior."

THE METHODOLOGY OF THIS STUDY

This study asked thirty-nine respondents from four IPO companies to answer three questionnaires. The first was as shown in [Appendices A and B](#), is the Multidimensional Ethics Scale (MES). It has eight Vignettes, twelve measures per Vignette (questions 1–12) and three additional questions (questions 13–15) for ethical evaluation. The next was the Defining Issues Test (DIT-2) containing five dilemmas each with twelve issues. The third questionnaire was the Balanced Inventory of Desirable Responding (BIDR) containing twelve questions measuring impression management.

The MES on Eight Questionable Actions

The Questionable Actions or Vignettes

[Appendices A and B](#) present the eight Vignettes and MES as found in [Cohen et al. \(1998, p. 267\)](#). For a given questionable action (vignette) the questions (numbers 13–15) in [Appendix B](#), allow the respondent to state three choices, whether the action is ethical, would be chosen by the respondent or peers, and then to give his/her reasons for these three choices (numbers 1–12).

The Vignettes 3 and 7 are general accounting related, and 5, 6, and 8 present earnings management actions directly. The other actions are created each to be different than "an 'off the shelf' solution . . ." [[Cohen et al. \(1998, p. 253\)](#)]. Vignette 3 is a direct violation of the 1977 Foreign Corrupt Practices Act, a well-known accounting rule that also requires firms to establish accounting controls over their financial statements. Vignette 7, expensing personal gifts, is one familiar to professional (tax) accountants. Vignette 5 suggests an early shipment of goods, a standard fraudulent practice used to overstate income. A bank that extends an unfair loan, Vignette 6, fraudulently increases income. To unfairly reduce the bad debt, Vignette 8, is to similarly reduce expenses, increase income.

Those that are not directly accounting issues, Vignettes 1, 2, and 4, indirectly identify with the respondent's short-term self-interest. Vignette 1 addresses the unfair layoff of a younger worker. Vignette 2 challenges product safety (but to the employee's advantage), and Vignette 4 considers a common problem of

software copyright violation, mentioned earlier. Vignette 7, expensing a personal gift, although an accounting issue is less an earnings management issue and more related by direct self-interest to Vignette 1, Vignette 2, and Vignette 4.

Sensitivity and Intention

Questions 13–15 in [Appendix B](#) question the respondent's (ethical, 15) sensitivity and intention. From the respondent's intention (undertake action, 13) and that of others (peers do it, 14), conclusions can be drawn on the respondent's behavior ([Ajzen, 1988](#)). Individuals who correctly identify unethical situations (15) are assumed more likely to behave in an ethical manner. An IPO accountant's intention is not inferred necessarily for the direct question (13), but rather from question 14 (peers do it). [Israeli \(1998, p. 263\)](#) points out "that the best predictor of a respondent's behavior is their beliefs and perceptions concerning their peers' behavior."

The Questions Eliciting Each of the Five Philosophies

Also, for the Vignettes of [Appendices A and B](#) provides questions 1 through 12 that allow the respondent to present his/her "... the underlying rationale, or mode of ethical reasoning behind the overall ..." for choices made in questions 13–15 ([Cohen et al., 1998, p. 255](#)). These outcomes of the questions 1 through 12 in [Appendix B](#) once completed by the respondent can be re-recorded to be those of [Appendix C](#), so that only the "positive" forms of each question are presented for our discussion. In this format, the higher scores, i.e. closer to "7" on questions 13 through 15 which suggest do not take the questionable action, can be associated with because the act is unjust, unfair and not morally right, the lower scores near "1" on questions 1 through 12. [Re-recording also provides a cross-check for consistency in response. Cross-checks provided accuracy in this study]. So for the three earnings management Vignettes (5, 6, and 8), ethical IPO accountants should rank the awareness of and probability to do these unethical actions ([Appendix C](#), questions 13–15) at scores close to "7" as unethical and with low probability of taking this action, and the rank for questions 1–12 should be near "1."

[Cohen et al. \(1998, p. 255\)](#) established for this particular set of twelve questions a factor analysis that shows "either three or four factors had eigenvalues over 1 and the five factors explained between 81 and 86% of the variance of the individual responses."

The DIT

The typical measure of moral awareness and reasoning is the Defining Issues Test (DIT, [Rest, 1979; Rest et al., 1999b](#), pp. 644–659). It is a set of moral dilemmas

to which an individual responds, and the total of these responses yields an DIT-P (percentage of agreement with ethical levels) score.

Rest, Narvaez, Bebeau and Thoma (1999) redefined this understanding and thereby created the DIT-2 to include the (Neo-Kohlbergian) influences of culture on moral development. The culture is presumed to be the “skeleton upon which reason rests.” Moral development does not progress serially from the bottom to the top stage, but through various orientations (schemas) of culture. The DIT-2 is shorter, uses current issues and terminology in the dilemmas and provides clearer instructions removing fewer subjects in the scoring process (Rest et al., 1999, p. 644). The DIT and DIT-2 ethical dilemmas have a high degree of internal consistency (Cronbach’s alpha = 0.90) (Rest et al., 1999, p. 657).

The Balanced Inventory of Desirable Responding (BIDR)

Since all of the dilemmas in the DIT and questionable actions of the MES can be given as those responses seen as socially acceptable, this study uses as a cohort for the purpose of mitigating this bias, the Balanced Inventory of Desirable Responding (BIDR, the short version 6; Paulhus, 1991, pp. 17–51). This is a set of twelve questions used to measure formidable impression bias; the BIDR measures self-deceptive positivity and impression management. Self-deceptive positivity occurs when a respondent tends to give answers that are honest but positively biased. Impression management occurs when a respondent answers questions in a manner that deliberately underreports socially undesirable acts and overreports desirable acts or behaviors. The twelve questions include statements such as “I never cover up my mistakes” or “There have been occasions when I have taken advantage of someone.” Each statement is rated on a 7-point Likert scale ranging from “not true” to “very true.” Paulhus (1991) found scores for 338 males to average 2.93 and similarly for 338 females to average 3.21, each with a standard deviation of 2.8.

The Participants

Four Northeast USA high technology companies that design, develop market, support and offer consulting for network communications, companies that have survived the technology market crash in April 2000, employed the participants in this study. During this study, each was undergoing the preparation for an IPO. Each company hired a larger (quality) auditor to signal lesser risk to investors. As of this writing two companies have had successful IPOs, one is still working toward that goal, and a corporation purchased the fourth.

Respondents had motivations to manage earnings for their IPO projects. Each employee received stock options as compensation for their employment. Each would benefit in the rise of their company share prices. To enhance participation in this study, the authors agreed to provide the results of the study to the respondents, and as an additional incentive for completion of the study, each respondent received a token gift, a comedy ticket (estimated worth, \$10).

Of ninety-six study packages distributed to the internal accounting staff actively engaged on one of four IPO projects in May 2001, thirty-nine (43%) after a fixed time period were completed and returned (with an additional eight not completed) to a mailbox location, thus eliminating personal identification. During the fixed time period, follow-up reminders were sent to all ninety-six candidates assuring each of their confidentiality and of their importance to the study and to an author, who has maintained a working relationship with the respondents as group since the study's completion.

THE RESULTS

Demographics

Table 1 presents the descriptive characteristics of the respondents in this study obtained from questions on the DIT. The employees' firm (of the four) was not identified to insure privacy. The average age of the sample is 38 years old, 56% are female, 44% are male and have on average 13 years of work experience. The group is mostly well educated with 77% (30 of the 39) having completed at least a bachelor's degree program and one ethics class during their college years. On the DIT respondents were asked to identify their political views as either very liberal, somewhat liberal, neither liberal nor conservative, somewhat conservative, or very conservative. The mean average of the sample (3.1) indicated neither liberal nor conservative political views. All received stock options for the IPO.

Finally, for this study of 39 responses, the mean BIDR (of desirable responses) was 4.73 for the males with a standard deviation of 1.33 and 4.65 for females with a standard deviation of 1.02. Although these scores are slightly higher, they do not differ statistically from Paulhus (1991), suggesting no evidence of response bias.

Table 2 presents the means and standard deviations for the responses to the MES (Appendix C, questions numbers 13, 14, and 15). An average score of 3.5 would be complete indifference to the unethical action. Table 2 column one (Awareness, question 15, ethical?) shows most of the means closer to 5.0, which is closer to 7 than to 1, and hence closer to recognizing the action as unethical.

Table 1. Demographic Profile of Respondents.

	<i>n</i>	%
Gender		
Male	17	43.59
Female	22	56.41
Rank		
Clerical	6	15.38
Staff	27	69.23
Manager	6	15.38
Highest degree		
High school	2	5.13
Associate	5	12.82
Bachelor	14	35.9
Graduate	16	41.03
Other	2	5.13
	Mean	S.D.
Age	37.8	7.95
Accounting experience	13.3	8.58
Number of ethics courses	1.1	0.97
Political view	3.1	0.95

But **Table 2** shows that all means in all three columns for awareness and intention are statistically different from 7, i.e. are all below the cutoff, 7-*lsd*, where *lsd* is the least significant difference amount necessary to demonstrate a statistical difference.¹ The IPO accountants do not recognize as unethical (they do not choose “7”) nor do they intend to avoid these questionable actions. That they also do not choose the ranking “1” (i.e. the average scores are above the statistical cutoff “1 + *lsd*,” and hence they do not identify the action as ethical) shows the actions are recognizable as questionable in their minds, but their thoughts and actions are not, as they should be, 7, to avoid these actions.

H1 (a) (b) (c) are not really supported-high moral reasoners do not appear sensitive to the questionable actions, including those of earnings management. **Table 3** shows that [H1 (b)] is not supported; given higher DIT-2 scores, higher awareness of the questionable earnings management actions (Vignettes 5, 6, and 8) does not exist. Awareness may exist [H1(a)] for only two other Vignettes,² actual violations of law (3, foreign bribe and 4, copyright violation).³ Their *R*-squared values for awareness show that only 16 and 9% of the variation is explained by cognition (the DIT score). Only one vignette (3), the foreign bribe, seems recognized and avoided by IPO accountants with higher DIT scores [H1(c)]. The

Table 2. Vignette Mean Scores (Standard Deviations) and Ranked Vignette (Mean Scores) for Awareness and Intentions.

	Awareness	Intention	
	Is Ethical?	Do it?	Peers Do it?
Vignette			
V1 Unfair layoff	3.49 (1.89)	4.18 (2.09)	4.44 (1.52)
V2 Ignore product safety	5.54 (1.29)	5.82 (1.55)	4.49* (1.60)
V3 Foreign bribe	4.05* (2.03)	4.08 (2.07)	3.23 (1.66)
V4 Violate software copyright	5.15 (1.63)	4.13 (2.02)	3.54 (1.74)
V5 Early shipment	5.03 (1.80)	5.15 (1.80)	3.28 (1.54)
V6 Unfairly extend loan	4.59* (1.87)	4.49* (1.54)	3.56* (1.64)
V7 Expense personal gifts	5.69 (1.66)	5.82 (1.60)	4.33 (1.71)
V8 Reduce bad debt	4.74 (1.68)	4.97* (1.88)	3.59* (1.65)
Vignette ranks			
1	V1 (3.49) ^a	V3 (4.08) ^b	V3 (3.23) ^c
2	V3	V4	V5
3	V6	V1	V4
4	V8	V6	V6
5	V5	V8	V8
6	V4	V5	V7
7	V2	V7	V1
8	V7 (5.69) ^d	V2 (5.82) ^e	V2 (4.49) ^f

Note: The LSD (least significant difference) is computed as the product of the (Student *t* coefficient, one-tailed, 0.05) times the pooled standard deviation (of the eight individual standard deviations) times the square root of (1/*n*), where *n* is 39. The LSD test comparisons are then made not amongst the eight means but from a known fixed point, i.e. 1 or 7.

^aStatistically different from “1,” by the Least Significant Difference Test (LSD = 2.08).

^bStatistically different from “1,” by the Least Significant Difference Test (LSD = 2.19).

^cStatistically different from “1,” by the Least Significant Difference Test (LSD = 1.95).

^dStatistically different from “7,” by the Least Significant Difference Test (LSD = 2.08).

^eStatistically different from “7,” by the Least Significant Difference Test (LSD = 2.19).

^fStatistically different from “7,” by the Least Significant Difference Test (LSD = 1.95).

*Statistically different (0.05) by gender.

DIT explains only 7% of the variation in the answers to the intention question (14, Appendix C) for the foreign bribe. There is very little evidence to support H1.

H2 (a) (b) (c) are supported—ethical orientation can explain an IPO accountant’s sensitivity and intentions. The significant R^2 and *p*-values of Table 4 show that for each question (13–15, Appendix C) at least one of the five philosophical constructs explains the choices made. In each vignette the model R^2 values for awareness (question 15) are much larger (0.55–0.85) than those of intended behavior (question 14, 0.261–0.632). More is explained by Tables 5A and B.

Table 3. Correlations of the DIT-2 with Awareness and Intention.

Vignette	Awareness		Intention			
	Is Ethical?		Do it?		Peers Do it?	
	<i>R</i> ²	<i>p</i> -Value	<i>R</i> ²	<i>p</i> -Value	<i>R</i> ²	<i>p</i> -Value
V1 Unfair layoff	0.08	(0.31)	0.03	(0.42)	0.09	(0.28)
V2 Ignore product safety	0.03	(0.42)	0.03	(0.42)	0.00	(0.46)
V3 Foreign bribe	0.42	(0.00)	0.41	(0.00)	0.27	(0.05)
V4 Violate software copyright	0.30	(0.03)	0.03	(0.42)	0.11	(0.26)
V5 Early shipment	0.03	(0.42)	0.08	(0.31)	0.06	(0.36)
V6 Unfairly extend loan	0.13	(0.23)	0.11	(0.25)	0.13	(0.22)
V7 Expense personal gifts	0.00	(0.48)	0.05	(0.38)	0.07	(0.33)
V8 Reduce bad debt	0.11	(0.25)	0.06	(0.35)	0.00	(0.49)

Note: All *p*-values are calculated from one-tailed *F* distribution.

Table 5A shows that at least one dimension of the MES is statistically significant (with a *p*-value of 0.10 or less, support for H2 (a)) in explaining awareness in every vignette, including [H2 (b)] those of earnings management (Vignettes 5, 6, and 8). Justice explains the choices made in seven of the vignettes, deontology explains four, and relativism and utilitarianism explain two. Egoism is found to be statistically significant (*p*-value, 0.079) in only one vignette (Vignette 2, product safety). Similar evidence could be shown for the intention question (14). The addition of Table 5B to this explanation is discussed later. H2 is supported.

H3 is not supported-higher moral reasoners do not present more philosophical objections in their evaluation and avoidance of questionable actions. A total

Table 4. Eight Vignette Multiple Regression Model *R* Values for Awareness and Intention.

Vignette	Awareness		Intention			
	Is Ethical?		Do it?		Peers Do it?	
	<i>R</i> ²	<i>p</i> -Value	<i>R</i> ²	<i>p</i> -Value	<i>R</i> ²	<i>p</i> -Value
V1 Unfair layoff	0.550	(0.000)	0.680	(0.000)	0.261	(0.640)
V2 Ignore product safety	0.550	(0.000)	0.760	0.000	0.345	(0.015)
V3 Foreign bribe	0.850	(0.000)	0.072	(0.000)	0.632	(0.000)
V4 Violate software copyright	0.760	(0.000)	0.511	(0.000)	0.470	(0.001)
V5 Early shipment	0.830	(0.000)	0.729	(0.000)	0.276	(0.049)
V6 Unfairly extend loan	0.800	(0.000)	0.824	(0.000)	0.495	(0.000)
V7 Expense personal gifts	0.790	(0.000)	0.658	(0.000)	0.261	(0.064)
V8 Reduce bad debt	0.820	(0.000)	0.550	(0.000)	0.281	(0.045)

Note: All *p*-values are calculated from one-tailed *F* distribution.

Table 5. Moral Awareness as Measured by the Components of the (A) MES and (B) MES and BIDR^a.

Vignettes	R^2	Components of the MES (Statistical p -Values) ^b					
		Justice	Relativism	Egoism	Utilitarianism	Deontology	BIDR
(A) MES							
V1 Unfair layoff	0.55	-1.27 (0.214)	-0.64 (0.527)	0.69 (0.494)	-2.76 (0.009)	-1.49 (0.146)	
V2 Violate product safety	0.55	-2.57 (0.015)	-0.76 (0.454)	1.82 (0.079)	-1.12 (0.273)	-0.04 (0.723)	
V3 Foreign	0.85	-7.97 (0.000)	-1.23 (0.229)	-0.24 (0.816)	-0.15 (0.882)	-0.67 (0.508)	
V4 Violate copy-right	0.76	-4.38 (0.000)	0.31 (0.761)	-0.74 (0.465)	-0.31 (0.757)	-4.62 (0.000)	
V5 Early shipment	0.83	-3.59 (0.001)	0.38 (0.703)	-1.10 (0.280)	-1.52 (0.138)	-3.60 (0.001)	
V6 Make unfair loan	0.80	-4.90 (0.000)	1.87 (0.071)	0.43 (0.667)	-0.06 (0.949)	0.66 (0.512)	
V7 Expense gift	0.72	-4.61 (0.000)	-1.11 (0.276)	0.86 (0.399)	0.65 (0.520)	-2.44 (0.020)	
V8 Reduce bad debt	0.82	-3.60 (0.001)	-2.01 (0.053)	0.27 (0.792)	-3.67 (0.001)	-2.12 (0.041)	
(B) MES and BIDR							
V1 Unfair layoff	0.55	-1.22 (0.231)	-0.63 (0.534)	0.67 (0.507)	-2.35 (0.025)	-1.46 (0.154)	-0.03 (0.975)
V2 Violate product safety	0.55	-2.46 (0.020)	-0.62 (0.543)	1.84 (0.076)	-1.15 (0.257)	-0.42 (0.679)	-0.44 (0.663)
V3 Foreign	0.86	-8.14 (0.000)	-1.33 (0.192)	-0.22 (0.829)	-0.75 (0.941)	-0.49 (0.626)	-1.27 (0.214)
V4 Violate copy-right	0.76	-4.365 (0.000)	0.26 (0.793)	-0.53 (0.600)	-0.36 (0.425)	-4.65 (0.000)	-0.83 (0.415)
V5 Early shipment	0.83	-3.38 (0.002)	0.4 (0.695)	-1.09 (0.285)	-1.46 (0.153)	-3.48 (0.001)	0.17 (0.869)
V6 Make unfair loan	0.80	-4.82 (0.000)	-1.74 (0.091)	0.42 (0.677)	0.03 (0.980)	0.6 (0.550)	-0.41 (0.683)
V7 Expense gift	0.79	-4.54 (0.000)	-1.09 (0.285)	0.86 (0.395)	0.66 (0.512)	-2.41 (0.022)	-0.18 (0.855)
V8 Reduce bad debt	0.83	-3.74 (0.001)	-1.47 (0.152)	-0.35 (0.732)	-3.15 (0.004)	-2.33 (0.027)	1.16 (0.256)

^aMES is Multidimensional Ethics Scale.^bAll (p -values) are computed from two tailed t tests.

MES score is created to test H3. The sum of all questions 1–12 in [Appendix C](#), computed for each one of the eight questionable actions, provides a construct for one aggregated measure of the disaggregated MES. A lower MES total (negative correlation) would be anticipated for respondents with higher moral reasoning

Table 6. Correlation Matrix *p*-Values for Each Vignette: DIT, BIDR, MES Total.

	DIT	BIDR	MES
V1: Unfair layoff			
DIT	–	0.032	0.458
BIDR		–	0.345
MES			–
V2: Ignore product			
DIT	–	0.032	0.483
BIDR		–	0.298
MES			–
V3: Foreign bribe			
DIT	–	0.032	0.002
BIDR		–	0.308
MES			–
V4: Violate software			
DIT	–	0.032	0.133
BIDR		–	0.465
MES			–
V5: Early shipment			
DIT	–	0.032	0.236
BIDR		–	0.448
MES			–
V6: Unfairly extend loan			
DIT	–	0.032	0.272
BIDR		–	0.019
MES			–
V7: Expense personal gifts			
DIT	–	0.032	0.482
BIDR		–	0.22
MES			–
V8: Reduce bad debt			
DIT	–	0.032	0.497
BIDR		–	0.437
MES			–

(higher DIT scores), since in using [Appendix C](#) they could be expected to choose the MES lower scores near “1” for questionable actions, suggesting the action is by (1) unjust, by (2) unfair, by (3) not morally right, by (4) not acceptable to my family, by (5) culturally unacceptable, etc.

[Table 6](#) presents the significance levels of correlations run between an individual’s DIT score and his/her MES total score, and other variables. For every questionable action (except as before, 3, the foreign bribe), including those of earnings management, the significance levels are not less than 0.05. With only one exception, H3 is not supported.

Evidence for Non-response Bias for the MES and Response Bias for the DIT

[Table 5B](#) extends [Table 5A](#) by adding the BIDR variable. [Table 5B](#) indicates no response bias found in using the MES, but [Table 6](#) shows evidence of this bias for the DIT. It explains the finding by [Cruz et al. \(2000\)](#) on egoism and its connection to social bias. The coefficient for egoism in vignette 2, product safety (the only vignette where it is significant), does not noticeably change (from 1.82 to 1.84) and is still statistically significant. Social bias is not related to egoism. Only the coefficient for relativism in vignette 8 (reduce the bad debt) statistically changes its p -value from significance (0.053) to non-significance (0.152) in the presence of BIDR, suggesting that the BIDR duplicates relativism, and only for vignette 8. In [Table 5B](#) in every vignette for the MES the BIDR is not significant, whereas in [Table 6](#), the score of each individual respondent’s DIT is significant with his/her BIDR measure, with p -value at 0.032.

SUMMARY, LIMITATIONS, DISCUSSION OF THE RESULTS AND IMPLICATIONS

Limitations and Summary

This is the first of its kind to study accountants actively engaged in creating IPOs. However, the study’s sample size (39) limits its external validity. Therefore, its extensions to IPO accountants are preliminary and limited. Since these are companies located only in the Northeastern United States, there are cultural biases of geographical and cultural influences beyond that of the IPO firm culture. Potential biases arise in self-assessments and in answering the three questionnaires of the study packets. There is no way to reliably test whether the MES was answered before the DIT, although the results seem to confirm this. The MES results are dependent upon the questionable actions chosen, different actions may yield different scores. The average DIT-2 p -score was about 32, the

average of high school graduate scores, even though some high scores up to 68 did exist. Seven of the 39 respondents did not have a bachelor’s degree. However, even with such a small sample, some statistical differences were observed, and therefore with larger sample sizes more statistical differences may be found. Another limitation of this study is the inability to test for non-response bias.

We found IPO accountants ethically recognize but do not avoid choosing questionable actions, including those of earnings management. The DIT does not predict awareness or intentions (H1) as well as ethical orientation as well as the MES (H2), and the DIT does not correlate as well as would be expected with ethical orientation (H3).

Discussion

The DIT-2 as a Measure of Moral Reasoning and the Need for Ethical Orientation

Our results differ from those of 145 corporate accountants studied by Duncan and Knoblett (2000, p. 44) who do find such an association. The problem may lie in the weakness of the DIT-2 score or in the low (average 32 of the) DIT scores. The evidence seems to favor the weakness of the DIT measure. A plot of these scores in vignette 4 for the awareness question is given in Fig. 1.

Figure 1 also shows for vignette 4, the variance of the DIT score increases as the awareness score increases from ethical to unethical. This suggests (see Neter

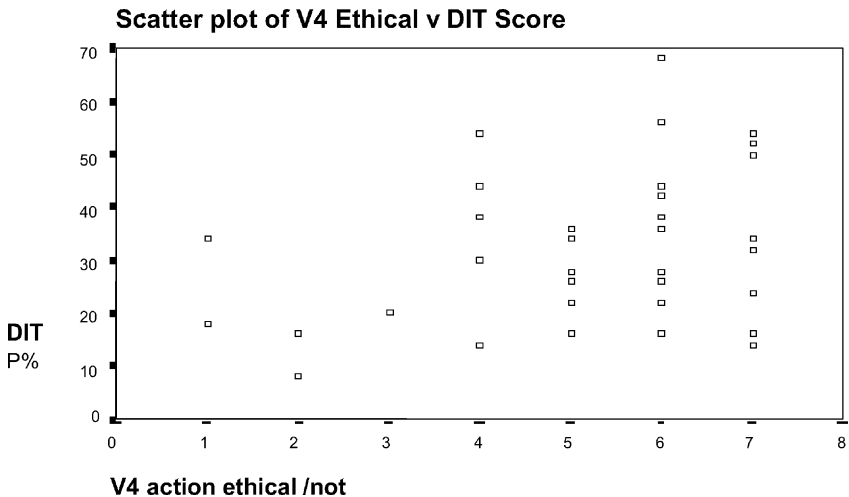


Fig. 1. Scatter Plot of V4 Ethical v. DIT Score.

et al., 1990, p. 146, Fig. 4, p. 15 (6)) either there is a missing variable in the relationship or there is a non-linear relationship (consistent with the non-linear findings of Bay & Greenberg, 2001). The missing variable according to Rest et al. (1999b, p. 104) is the utilizer score, the degree in which the respondent utilizes his/her moral reasoning, and the subject of their future research (p. 185). Alternatively, this is the ethical orientation of the respondent. The MES captures the moral reasoning domain of the DIT (in part with the construct of justice), and the social and personal domains (with four other constructs).

The MES Results

The philosophical associations are also consistent with Cruz et al. (2001) and Cohen et al. (1998). As indicated by Cruz et al. (2001, p. 232), “previous studies find support for equity (justice), contractualism (deontological) and relativism dimensions.” In those studies moral equity (justice) had the greatest influence on “self-reported intentions in all the cases” [Cruz et al. (2001, p. 237)], and this is followed by contractualism. These also agree with Cohen et al. (1996, p. 112) where the cost-benefit analysis (the utilitarian interest) was significant in two (1, 8) of these same vignettes. At higher p -values Cohen et al. (1998, p. 263) finds egoism in two other vignettes than vignette 2, product safety. In Cruz et al. (2000), the lack of support for the egoism dimension has been attributed to “the social desirability bias” (which we do not find) and other obvious self-interest abhorrence in ethically intended responses. The results on intentions in Table 4 are consistent with Cohen et al. (1998, p. 260) who find differences in awareness and intention for all but vignette 1, the unfair layoff. In response to a request made by Cohen et al. (1998, p. 266) and by Cruz et al. (2000, p. 239), we find no correlation between cognitive development (DIT-2) and ethical orientation (MES).

Recommendations

Age

In addition to ethical orientation, gender, age and experience have been considered relevant to cognitive moral development, ethical evaluation and intention. Yet, our result [for accountants whose average age is about 38 and whose work experience exceeds 13 years] are surprisingly similar to the awareness, intentions, and ethical orientations computed from 645 university students in Cohen et al. (1998). Not shown here are the results on age, which are nearly statistically significant with the total MES score. Further investigations therefore may find statistical significance given that age is presented as a (non-linear) categorical variable (young, old) in conjunction with a total MES score.

Gender

As [Table 2](#) indicates on at least two of the eight vignettes, gender was significant. Many other accounting studies (e.g. [Shaub, 1994](#); [Sweeney & Roberts, 1997](#)) continue to find gender at least an important moderator variable. In this case, the connection to cognition (the DIT) and ethical orientation (the MES) is worth further investigation, particularly since [Rest et al. \(1999b, p. 116\)](#) claim “Since 1986, we know of no evidence to challenge the conclusion that gender is a trivial variable in accounting for DIT variance.”

Culture

These results contribute to the debate ([Rest et al., 1999b, p. 177](#)) of the contributions of cognition (autonomy) and culture (heteronomy) to ethical choice. [Lawrence \(1985\)](#) would explain Moslem suicide bombers as those fundamentalists, who otherwise knowing the rights-based justice of their innocent victims, put moral reasoning aside for duty-based based religious reasons. Ethical orientation on certain questionable actions matters.

These results do not distinguish IPO accountants as a culture, since they are not compared to any other cultures, but do suggest a greater investigation into ethical orientation as a valid tool for predicting behavior in ethically-challenged environments as seen in Enron ([Morgenson, 2001](#); [Schroeder, 2001](#)). The MES can also be used in screening applicants and in training new accounting recruits, as reported by [Ahadiat and Smith \(1994\)](#).

NOTES

1. A multiple comparisons among means (e.g. Scheffe’s test), is not used here in [Table 2](#). Instead the lsd (least significant difference) is computed as the product of the (Student *t* coefficient, one-tailed, 0.05) times the pooled standard deviation (of the eight individual standard deviations) times the square root of $(1/n)$, where n is 39. The comparisons are then made not amongst the eight means but from a known fixed point, i.e. 1 or 7.

2. [Reidenbach and Robin \(1990, p. 649\)](#) suggest that moral reasoning is related to justice and dependent on the laws of society which may explain the reason for the relationship in the case of a foreign bribe (Vignette 3). Many of these accountants indicate that ethical situations are culturally determined. They maintain that the bribe is neither illegal, nor unusual in some cultures and, therefore, ethical. Answers to this question for Vignette 4 (software violations) indicate that the respondents would be more likely to lend software to a friend in need. These results appear to be similar to [Logsdon et al. \(1994\)](#) who found that many business and engineering students do not view unauthorized use of software as unethical behavior.

3. See [Cohen et al. \(1998, p. 265\)](#) who also find these two questionable actions more likely intended. The magnitude of the consequences of a foreign bribe and violating a copyright

are perceived so small as to create negligible effects on others and hence, respondents are less adverse to their intention.

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REFERENCES

- Ahadiat, N., & Smith, K. J. (1994). A factor-analytic investigation of employee selection factors of significance to recruiters of entry-level accountants. *Issues in Accounting Education* (Spring), 59–79.
- Ajzen, I. (1988). *Attitudes, personality, and behavior*. Chicago, IL: Dorsey Press.
- Antle, R. (1989). Intellectual boundaries in accounting research. *Accounting Horizons*, 3(2), 103–109.
- Associated Press (2001). Energy firm Enron files (Chap. 11). *The Miami Herald* (December 3), 3A.
- Bay, D., & Greenberg, R. R. (2001). The relationship of the DIT and behavior: A replication. *Issues in Accounting Education*, 16, 367–380.
- Beatty, R. P., Drake, P. P., & Hogan, C. E. (2002). *The impact of the 1995 private securities litigation reform act on litigation risk and auditor compensation in the IPO market*. Presented at the Midyear Meetings of the Audit Section of the American Accounting Association (http://accounting.rutgers.edu/raw/aaa/audit/midyear/02midyear/papers/Beatty_Drake_Hogan.pdf), January 18, 2002, Orlando, Florida.
- Cohen, J. R., Pant, L. W., & Sharp, D. J. (1993). Culture-based ethical conflicts confronting multinational accounting firms. *Accounting Horizon*, 7(3), 1–13.
- Cohen, J. R., Pant, L. W., & Sharp, D. J. (1996). Measuring the ethical awareness and ethical orientation of Canadian auditors. *Behavioral Research in Accounting*, 8(Suppl.), 98–119.
- Cohen, J. R., Pant, L. W., & Sharp, D. J. (1998). The effect of gender and academic discipline diversity on the ethical evaluations, ethical intentions, and ethical orientation of potential public accounting recruits. *Accounting Horizons*, 12(3), 250–270.
- Cruz, C. A., Shafer, W. E., & Strawser, J. R. (2000). A multidimensional analysis of tax practitioner's ethical judgments. *Journal of Business Ethics*, 24(3), 223–245.
- Datar, S. M., Feltham, G. A., & Hughes, J. S. (1991). The role of audits and audit quality in valuing new issues. *Journal of Accounting and Economics*, 14(1), 3–49.
- Diamond, J. (1997). *Guns, germs and steel: The fates of human societies*. New York: W. W. Norton & Company.
- DeChow, P., Sloan, R., & Sweeney, A. (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.
- Duncan, J. R., & Knoblett, J. A. (2000). Investigating behavioral antecedents of earnings management: Moral reasoning, earnings pressure, and likelihood of detection. *Research on Accounting Ethics*, 6, 27–66.

- Fargher, N. L., Fields, L. P., & Wilkins, M. S. (2001). The impact on IPO assurance fees of commercial bank entry into the equity underwriting market. *Auditing, A Journal of Practice & Theory*, 19(Suppl.), 23–35.
- Gordon, M. (2002). *SEC: Ernst & Young violated rules*. Associated Press (May 21).
- Investor Relations Business (2001). *Auditor independence rules don't go far enough* (January 22), 16–17.
- Kohlberg, L. (1969). Stage and sequence: The cognitive-development approach to socialization. In: D. Goslin (Ed.), *Handbook of Socialization Theory and Research*. Chicago: Rand McNally College Publishing Company.
- Logsdon, J., Thompson, J., & Reid, R. (1994). Software piracy: Is it related to level of moral judgment? *Journal of Business Ethics*, 13, 849–857.
- Lord, A. T., & DeZoort, F. T. (2001). The impact of commitment and moral reasoning on auditor's responses to social influence pressure. *Accounting, Organizations and Society*, 26(3), 215–235.
- Merchant, K., & Rockness, J. (1994). The ethics of managing earnings: An empirical investigation. *Journal of Accounting and Public Policy*, 13, 79–94.
- Morgenson, G. (2002). How 287 turned into 7: Lessons in fuzzy math. *New York Times, Money & Business* (January 20), 1
- Paulhus, D. L. (1991). Measurement and control of response bias. In: J. P. Robinson, P. R. Shaver & L. S. Wrightsman (Eds), *Measures of Personality and Social Psychological Attitudes* (pp. 17–59).
- Ponemon, L. (1993a). Can ethics be taught in accounting? *Journal of Accounting Education*, 11, 185–209.
- Ponemon, L. (1993b). The influence of ethical reasoning on auditors' perceptions of management's competence and integrity. *Advances in Accounting*, 11, 1–29.
- Ponemon, L., & Gabhart, D. (1993). Ethical reasoning in accounting and auditing. *Research Monograph* (No. 21). Vancouver, BC: CGA-Canada Research Foundation.
- Reidenbach, R. E., & Robin, D. P. (1990). Toward the development of a multidimensional scale for improving evaluations of business ethics. *Journal of Business Ethics*, 9, 639–653.
- Rest, J. R. (1979). *Development in judging moral issues*. Minneapolis, MN: University of Minneapolis Press.
- Rest, J. R. (1986). *Moral development: Advances in research and theory*. New York, NY: Praeger.
- Rest, J. R., Narvaez, D., Bebeau, M., & Thoma, S. (1999). *Post conventional moral thinking*. Minneapolis, MN: Center for the Study of Ethical Development, University of Minnesota.
- Rest, J. R., Narvaez, D., Thoma, S., & Bebeau, M. (1999). DIT2: Devising and testing a revised instrument of moral judgment. *Journal of Educational Psychology*, 91(4), 644–659.
- Schroeder, M. (2001). Enron debacle spurs calls for controls. *Wall Street Journal* (December 14), New York, NY.
- Shaub, M. (1994). An analysis of the association of traditional demographic variables with the moral reasoning of auditing students and auditors. *Journal of Accounting Education*, 12(1), 1–25.
- Sweeney, J., & Roberts, R. (1997). Cognitive moral development and auditor independence. *Accounting, Organizations and Society*, 22, 337–352.
- Thoma, S. J., Rest, J., & Danson, M. L. (1991). Describing and testing a moderator of the moral judgment and action relationship. *Journal of Personality and Social Psychology*, 61, 659–669.
- Turner, J., & Sennetti, J. T. (2001). Post-audit restatement risk and firm size. *Journal of Forensic Accounting*, 2(June), 67–93.

APPENDIX A

The Eight Multidimensional Ethics Scale Vignettes

(#1) A firm has been hard hit by recessionary times and the partners realize that they must scale back. An analysis of productivity suggests that the person most likely to be terminated is a long time employee with a history of absenteeism due to illness in the family.

Action: Instead, the partner in charge lays off a younger, but very competent, recent hire.

(#2) A company has just introduced a highly successful new kitchen appliance. The sales manager, who is paid partly on a commission basis, discovers that there has been insufficient product testing to meet government guidelines. The tests so far indicate no likelihood of any safety problem.

Action: The sales manager continues to promote the product.

(#3) A manager of a company is eager to do more business abroad has been requested to make an undisclosed cash payment to a local distributor in a foreign country. The payment is requested as a “goodwill gesture” that will allow the company to introduce its products in that foreign country. This practice is considered normal business procedure in that country, and no laws prohibit such a payment there.

Action: The manager verbally authorizes the payment.

(#4) The owner of a local small business, which is currently in financial difficulty, approaches a longtime friend to borrow and copy a proprietary database software package which will be of great help in generating future business. The software package retails for \$500.

Action: The friend loans the software package.

(#5) A manager realizes that the projected quarterly sales figures will not be met, and thus the manager will not receive a bonus. However, there is a customer order which if shipped before the customer needs it will ensure the quarterly bonus but will have no effect on the annual sales figures.

Action: The manager ships the order to ensure earning the quarterly sales bonus.

(#6) A promising start-up company applies for a loan at a bank. The credit manager at the bank is a friend of and frequently goes golfing with the Company’s owner. Because of this company’s short credit history, it does not meet the bank’s normal lending criteria.

Action: The credit manager recommends extending the loan.

(#7) A salesman, the father of two small children, has been promoted to a job in what he has to travel away from home for the firm on regular basis. Because the trips are frequent and inconvenience his family life, he's contemplating charging some small personal expenses while traveling for the company. He has heard that this is common practice in the company.

Action: The salesman charges the company \$50 family gifts.

(#8) The CEO of a company requests to the controller reduce the estimate for bad debts in order to increase reported income, arguing that this is common practice in the industry when times are hard. Historically, the company made very conservative allowances for doubtful accounts, even in bad years. The CEO's request would make it one of the least conservative in the industry.

Action: The controller makes the adjustment.

APPENDIX B

A Sample Multidimensional Ethics Scale Vignette

(#1) A firm has been hard hit by recessionary times and the partners realize that they must scale back. An analysis of productivity suggests that the person most likely to be terminated is a long time employee with a history of absenteeism due to illness in the family.

Action: Instead, the partner in charge lays off a younger, but very competent, recent hire.

Please rate this action by circling one number for each of the items below:

- | | | |
|-------------------------------------|---------------|------------------------------|
| 1. Just | 1 2 3 4 5 6 7 | Unjust |
| 2. Unfair | 1 2 3 4 5 6 7 | Fair |
| 3. Morally right | 1 2 3 4 5 6 7 | Not morally right |
| 4. Not acceptable to my family | 1 2 3 4 5 6 7 | Acceptable to my family |
| 5. Culturally acceptable | 1 2 3 4 5 6 7 | Culturally unacceptable |
| 6. Traditionally unacceptable | 1 2 3 4 5 6 7 | Traditionally acceptable |
| 7. Not self-promoting for the actor | 1 2 3 4 5 6 7 | Self-promoting for the actor |
| 8. Personally satisfying for actor | 1 2 3 4 5 6 7 | Not satisfying for actor |

9. Produces the greatest utility	1	2	3	4	5	6	7	Produces the least utility
10. Minimizes benefits while maximizes harm	1	2	3	4	5	6	7	Maximizes benefits while minimizes harm
11. Violates an unwritten contract	1	2	3	4	5	6	7	Does not violate an unwritten contract
12. Violates an unspoken promise	1	2	3	4	5	6	7	Does not violate an unspoken promise
13. The probability that I would undertake the same action is:								High 1 2 3 4 5 6 7 Low
14. The probability that my peers would undertake the same action is:								High 1 2 3 4 5 6 7 Low
15. The action described above is:								Ethical 1 2 3 4 5 6 7 Unethical

APPENDIX C

Figure 2.1 Recoded to Create "Positive" Responses

1. Unjust	1	2	3	4	5	6	7	Just
2. Unfair	1	2	3	4	5	6	7	Fair
3. Not morally right	1	2	3	4	5	6	7	Morally right
4. Not acceptable to my family	1	2	3	4	5	6	7	Acceptable to my family
5. Culturally unacceptable	1	2	3	4	5	6	7	Culturally acceptable
6. Traditionally unacceptable	1	2	3	4	5	6	7	Traditionally acceptable
7. Not self-promoting for the actor	1	2	3	4	5	6	7	Self-promoting for the actor
8. Not personally satisfying for the actor	1	2	3	4	5	6	7	Satisfying for actor
9. Produces the least utility	1	2	3	4	5	6	7	Produces the maximum utility
10. Minimizes benefits while maximizes harm	1	2	3	4	5	6	7	Maximizes benefits while minimizes harm

- | | | | | | | | | | |
|---|---------|---|---|---|---|---|---|--|-----------|
| 11. Violate an
unwritten contract | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Does not violate
unwritten contract | |
| 12. Violate an unspoken
promise | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Does not violate
unspoken promise | |
| 13. The probability that I would
undertake the same action is: | High | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Low |
| 14. The probability that my peers
would undertake the same action
is: | High | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Low |
| 15. The action described above is: | Ethical | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Unethical |

ACCOUNTING ETHICS: A STUDY OF PROFESSIONAL INDEPENDENCE STATUS OF ACCOUNTING FIRMS IN BOTSWANA

N. S. Bonu and E. G. Kitindi

ABSTRACT

The purpose of this study was to determine if auditing firms in Botswana have begun to provide services beyond traditional auditing. It also sought to establish whether income from such services was significant compared to income from auditing, and whether audit firms in Botswana have in place mechanisms to assure quality audit work. In view of these, an attempt was made to establish the professional independence status of Botswana public auditors.

Data for the study was collected from thirteen audit firms on the basis of the register of auditors maintained by the Botswana Institute of Accountants. The results showed that audit firms in Botswana provided other services beyond the traditional audit work. The collective income obtained from these other services exceeded that generated by professional audit work. We also found that audit firms had some mechanisms in place to ensure quality audit work. However, most of the audited companies did not use audit committees and the audit firms did not recommend their use. The evidence was not sufficient to explicitly judge independence, but the results suggested that perceived auditor independence could be affected.

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INTRODUCTION

Ethics in public accounting has increasingly become an issue in the accounting profession. Accounting scholars and practitioners alike have expressed concern over the current status of the profession, including events that cause professional ethics to be questioned, and especially issues of auditor independence (Davidson & Emby, 1996; Lowe & Pany, 1995). Traditionally, ethical requirements in different professions, accounting included, were seen as imposing a number of restrictions on the professions. For example, professional firms were not allowed to include among their membership non-professionals, and they were not allowed to advertise in any way (Maurice, 1996). Subsequently, most of the restrictions were lifted as a result of changes in the socio-economic and legal environment. For example, proliferation of professionally qualified accountants made it possible and necessary to loosen restrictions on advertising and promotional activities in many countries. However, the relaxation of restrictions has led to concerns as to whether such relaxation has affected professional, and especially public accountants' ethical behavior. Most of this concern is over the ability of public accountants, or auditors, to maintain objectivity and independence in the conduct of audit work.

According to the Auditors' Code developed by the Auditing Practices Board (APB) in the U.K., there are nine fundamental principles of independent auditing, of which three relate to the concept of credibility. The three credibility concepts are competence, independence, and integrity (Gray & Manson, 2000). Doubts about the auditors' ability to maintain professional independence therefore implies, albeit indirectly, doubts over the credibility of the auditors and their work. These in turn may lead to the declining value of the auditor's opinion. Recently, the International Federation of Accountants (IFAC), reacting to the developments alluded to above, came out with an "Exposure Draft on Independence: Proposed Changes to the Code of Ethics for Professional Accountants." This draft dealt with the question of professional independence, and IFAC noted that the expectations now placed on public accounting firms could threaten these firms' independence and that more detailed guidance on independence issues is required (IFAC, 2000). The present study was partly inspired by that Exposure Draft.

THE BOTSWANA ACCOUNTING ENVIRONMENT

The Accountants Act of 1988 governs the accounting regulatory environment in Botswana. Section 3 of this Act provides for the establishment of the Botswana Institute of Accountants (BIA) as a body corporate under the Ministry of Finance and Planning. According to the former Assistant Minister of Finance and

Development Planning, this was necessary as accounting work in the country was conducted by professional accountants, 95% of whom were expatriates (Hansard, 1988). Establishing the BIA directly under the Ministry was considered a means of facilitating the faster localization of the accounting profession in Botswana.

This action differentiates the institute from professional organizations in other parts of the world where professional fraternity motivates the formation of institutes. As explained above, the majority of professional accountants in Botswana were expatriates. This means they had “foreign” qualifications and were affiliated with accounting associations or institutions outside Botswana. Even now, there is still no “local” equivalent to the qualifications offered by the Chartered Association of Management Accountants (CIMA) and Association of Chartered Certified Accountants (ACCA) of U.K., for example. With the diverse “expatriate” accountants affiliating themselves with equally diverse accounting institutions, it is unlikely that a “local” accounting institution can come into being soon to offer such qualifications.

Considering the diversity, the BIA has responsibilities and functions similar to those of other professional organizations. It is responsible for advancing the art of accountancy, financial management, taxation and allied subjects, maintaining the integrity and status of the profession, and providing for the education, training and examination of persons practicing or intending to practice the profession of accountancy.

This means that any person or group of persons practicing as professional accountants in Botswana must first register with the BIA in one of the four categories of Fellow, Associate, Registered and Licentiate (BIA, 1998). Under this section, only those registered as Fellow and Associate members are eligible to practice as accountants. Under Section 15 of the same Act of 1998, further separate registration as a practicing member is required for those intending to practice of audit in Botswana.

As a member of the IFAC, BIA is professionally bound to adhere to all International Accounting Standards (IAS) and International Standards on Auditing (ISA) and any other proclamations by the international body. These include the rules on independence. At the moment there are no specific rules relating to professional independence issued by the BIA. Nevertheless, in relation to professional independence, the Companies Act Cap 42.01(1984) provides auditors the right to make a qualified report if there is any problem, and the right to access books and accounts of the company being audited, as well as the right to attend the general meeting of the company’s members (Sec. 124 & 125).

The Institute therefore has assumed most of the functions performed by professional institutions in other parts of the world, for example, in the U.K. However, it has yet to establish its own professional qualification system whereby prospective

local accountants would be able to acquire a local professional qualification. It currently facilitates and actively encourages aspirants to professional accounting to acquire the U.K. qualifications of ACCA and CIMA, and requires an examination in local Companies Act and Taxation. This is ironic in that the government rather than the professional fraternity formed BIA. The impact of this approach to forming BIA on the profession in Botswana is a subject for future research.

STUDY OBJECTIVES

The easing of restrictions on professional practice has led to increasing involvement between audit firms and their audit including providing services in addition to the audit. As suggested above, this has led to a growing concern over the objectivity of the auditors. Traditionally, auditors were expected not to have any kind of relationship with their clients other than the provision, through auditing, of attestation services. Auditors were not expected to become too familiar with their clients. Familiarity with the client was considered to be potentially detrimental to the neutral attitude auditors were expected to have. However, this has changed drastically. Presently, auditors are allowed to, among other things, advertise their services that extend beyond the traditional audit engagement.

Botswana's economy is relatively small compared to other countries both within and outside the African continent. With an estimated total population of 1,693,970 in 2001 (Central Statistics Office, 2001) in a land covering more than 580,000 square kilometers, Botswana has only 29 Public Limited Companies, 7,545 Proprietary Limited Companies and 28 parastatals (Bonu & Matome, 2001, p. 36). A few other business units exist in the form of partnerships and sole traders. The Companies Act of Botswana Cap 42.01 requires that a Public Limited Company must appoint a qualified Auditor (Sec. 117 (1)) for the purpose of having its accounts audited (Sec. 121 (1) & (2)). A Proprietary Limited Company is, however, exempted from this requirement (Sec. 121 (8)), although it may acquire such services for bank loan purposes or government subsidy. Parastatals are public sector undertakings to be audited by the Auditor General of Botswana. They are not required to appoint a professional auditor from private audit firms. Partnerships and other sole traders mostly acquire professional assistance in the preparation of accounts.

It is thus apparent that the market for auditing services is somewhat restricted. There are 439 operating professional accounting firms¹, of which less than twenty are registered as authorized audit firms, servicing the Botswana market. This number as a point of interest includes all the "big five"² professional accounting firms, and nearly all of them are headquartered in Gaborone, the capital city. In such a

situation, there is bound to be intense competition among the accounting firms for accounting and auditing business in the country. Although cases suggesting a problem with independence in Botswana are few, with only one involving an auditor in the past three years that did not reach the court stage but was settled at the BIA committee stage, this is a problem that raises concern on the ethical conduct of these accounting firms in their efforts to survive. In particular, the problem raises concern as to whether public auditing firms in Botswana are able to maintain an independent approach to audit engagements.

To address this research problem, the following research objectives were set for this study. The primary objective was to find out whether public auditors in Botswana appear to take up audit assignments with an impartial, unprejudiced mind. Specifically, the study sought to establish:

- (i) whether public auditing firms in Botswana routinely provide significant non-auditing services to their clients;
- (ii) whether services other than auditing services, if provided, constitute a major source of income to public auditing firms in Botswana;
- (iii) whether members of public auditing firms in Botswana routinely make management decisions for and on behalf of their clients; and
- (iv) whether public auditing firms in Botswana institute quality control measures.

CONCEPTUAL FRAMEWORK

Financial statements are considered to have greater significance if they are accompanied by an independent opinion that is credible. Credibility has to do with acceptability and trustworthiness and is attained through integrity, competence, and independence. Public accountants³ are expected to behave with integrity (Maurice, 1996), which has to do with honesty and truthfulness. Competence deals with the ability of the auditor to perform the audit assignment to an expected standard, an important element in instilling public confidence in the auditor's work. These two concepts, though also important, were not the major focus of this study. The third credibility concept, independence, is the major focus of this study. The independence of the auditor is an important component of the assurance an audit report provides its beneficiaries. An opinion without influences that impair professional judgment (IFAC, 2000) can be considered to be the backbone of external attestation: the fact that a person *external* to an entity is called in to examine the financial records with a view to rendering a *professional* opinion is an indication of the importance attached to independence. This is also evidenced in the definition of auditing: "... the *independent* examination of, and expression of an opinion on,

the financial statements of an enterprise by an appointed auditor in pursuance of that appointment and in compliance with any relevant statutory obligation” (APC, 1980)⁴.

All the same, a concise definition of independence is lacking and researchers have been free to define independence in various ways. Some of these definitions include “an auditor’s making reporting decisions consistent with his or her beliefs as to whether the reporting decision may be regarded as an audit failure” (Magee & Tseng, 1990, p. 322), “power to withstand management pressures in a conflict situation” (Emby & Davidson, 1998, p. 9), and “the absence of collusion between the auditor and the manager of the client firm” (Lee & Gu, 1998, p. 3). In the U.S., the definitions include “the ability to act with integrity and objectivity” (Frost & Ramin, 1996, p. 8). An auditor is judged to be independent by actually acting independently (independent in fact) and by appearing to be independent. In the U.K., independence is defined as “freedom from influences that could affect a member’s objectivity” (Frost & Ramin, 1996, p. 8). Beattie and Brandt’s definition of independence is “acting with integrity and objectivity and being able to withstand pressure from management to infringe professional standards” (Beattie & Brandt, 1999, p. 8). This last definition is more or less a combination of the U.S. definition and the one given by Emby and Davidson (1998).

The IFAC Exposure Draft (IFAC, 2000, p. 5) defines independence as:

- (a) The state of mind that permits the provision of an opinion without being affected by influences that impair professional judgment (sometimes referred to as independence of mind), and
- (b) the ability to demonstrate that risks to independence of mind have been eliminated or limited to such clearly insignificant matters that an informed third party would not reasonably question the reporting accountant’s objectivity (sometimes referred to as independence of appearance).

The definition is dichotomous so as to give prominence to the two important elements of independence: the attitude of mind and the manner in which the auditor, as a professional, is expected to behave in front of the public and especially consumers of his or her services. This is in line with the U.K. and U.S., and most other basic textbooks’ definitions on auditing.

REVIEW OF RELATED LITERATURE

Numerous literature exist expressing apprehension on the independence of the modern auditor, and noting that professional independence was being eroded as a result of various environmental pressures. Attempts have been made to identify the various sources of these pressures.

Ethical behavior by public accountants has been quite extensively studied, and the foci of the studies have been equally diverse. Most studies on ethics in accounting have, however, focused on the independence of public accountants, and how that independence is being affected by professional and environmental developments (Beattie & Brandt, 1999; Chapman, 1995; Emby & Davidson, 1998; Lee & Gu, 1998).

Independence or objectivity can be endangered by self-interest threat, self-review threat, advocacy threat, familiarity or trust threat, and intimidation threat (Maurice, 1996). The first was the focus of the study by Goldman and Barlev (1974).⁵ The second has to do with the auditor reviewing his or her own work. The advocacy threat arises in cases where an auditor knowingly supports the client's view even where such a view is not professionally acceptable. Familiarity or trust threat occurs where the auditor is closely associated with the directors of the client to the extent of unknowingly agreeing to most of their views. This threat differs from the advocacy threat in the sense that the auditor in this case finds himself or herself being drawn to concur with views expressed by the client, whereas in the case of advocacy, the auditor actively promotes views favoring the client. In both cases the auditor may form an opinion on the financial statements that is biased in favor of the client. Finally, an auditor can be intimidated by a domineering personality on the client's board who may project a feeling that the auditor should purposely behave unprofessionally.

Shockley (1982)⁶ addressed the self-review threat. Arguing that being seen to be independent (independence in appearance) is as important as actually being independent (independence in fact), Shockley (1982) identified several factors that affected the auditor's appearance of being independent. Among these were the provision of management advisory services (MAS) and competition within the auditing profession.

The notion that provision of MAS by auditors to their audit clients affects their perceived independence is rather controversial. Arguments to the effect that the provision by the public accountant of both auditing and consultancy services affected audit independence have existed for decades (e.g. Briloff, 1966; Schulte, 1965). The American Institute of Certified Public Accountants (AICPA) Rule of Conduct No. 101 permits an audit firm in the USA to do both bookkeeping and auditing for the same client (AICPA, 1976; Arens & Loebbecke, 1997). Big Five firms have supported this, claiming that it has not been shown that the provision of MAS may affect the auditor's ability to withstand pressure. However, it was found in Nigeria that auditors who offered MAS to their audit clients had a higher risk of losing their independence than those who did not (Addo-Nkrumah, 1998).⁷ Furthermore, literature still abound citing the provision of MAS to audit clients as

being detrimental to auditors' perceived independence (Beattie & Brandt, 1999; Engle, 1996; Teoh & Lim, 1996).

Competition within the auditing profession, as suggested by Shockley (1982), has not been deeply investigated. However, it was found that when competition is done through the pricing of services, the auditor's "value of incumbency" does not threaten independence (Magee & Tseng, 1990). It was also demonstrated that low-balling can jeopardize auditor independence if the owner of the firm did not have the right to hire and fire (Lee & Gu, 1998). Finally, charging large audit fees threatened perceived auditor independence (Beattie & Brandt, 1999; Teoh & Lim, 1996).

The literature seems to suggest that the presence of a large number of audit firms competing in a small market for audit services actually favors perceived independence as opposed to a few firms operating in a monopoly market. However, it appears difficult to validate this position in the Botswana context. In Botswana, it is either a big firm or a small firm, where a big firm would most likely be a Big Five firm. With less than twenty firms registered to render audit services and less than thirty companies legally compelled to have their accounts audited, it surely is not a "one or two clients each" situation. It is very likely that for most of the firms, non-audit work would be the source of livelihood. Whether this makes them appear to be less independent is debatable.

The reviewed literature clearly suggests that concerns about auditor independence are valid. It is also quite apparent that evidence to support a particular position regarding auditor independence is still weak. The contradictory findings of the various studies are testimony to that. However, what clearly emerges from the literature is the fact that there is concern over the ethical conduct of auditors.

Unfortunately, with the exception of the Nigerian study, no other studies exist on the professional independence of auditors, perceived or otherwise, in an African context. The majority of the studies above were undertaken in the context of developed countries. The present study therefore intends to fill that gap by looking at how public accountants in the Botswana setting behave ethically.

RESEARCH METHOD

The Sample

We studied thirteen of fifteen audit firms registered with the Botswana Institute of Accountants (BIA) as Authorized Auditors. These were identified from a list obtained from BIA. The list of registered audit firms had fifteen firms on it. However, only thirteen could be traced. The questionnaire was therefore submitted to

thirteen audit firms registered with BIA. To minimize non-response, follow-up guidelines were devised and adhered to.

All thirteen questionnaires, duly completed, were returned, giving a 100% response rate. With the exception of the two firms that could not be traced, the responses represent views from all audit firms practicing in Botswana. This provides greater meaning to the interpretation of the results, and is a unique advantage of this study. Audit firms in Botswana have not usually been receptive to academic researches, and this was one reason why a personal interview was not included as part of the research design. The researchers did not seek to relate responses with the respondents, and with no identity assigned to the questionnaires at the analysis stage, it was possible to ensure anonymity to a large extent, although it is unlikely that identification would have affected the interpretation of the results.

Data Collection

Data were collected using a detailed, structured questionnaire that was hand-delivered to twelve of the thirteen study subjects within Gaborone. Only one firm is located outside Gaborone. To this firm, the questionnaire was sent by e-mail, and the response was received through the same medium. Specific requests on the time frame for completing the questionnaire were provided.

Data Analysis

The size of the sample was small and this imposed some restrictions on the extent and type of analysis to be performed. Microsoft Excel spreadsheet was used to analyze quantitative data. As for qualitative data, an attempt was made to associate the study findings with the study objectives in order to reach conclusions. With regard to objectives one to three, results that were affirmative were considered to be detrimental to perceived independence. For the fourth objective, results indicating the presence of quality control measures are a plus to perceived independence.

RESULTS

Demographics

The respondents' characteristics are summarized in [Table 1](#). Nine out of the thirteen respondents were partners. Of these, four were Managing Partners and two were

Table 1. Respondent Demographics.

Title of Respondents	Number	Percentage
Partners	9	100
Managing	4	44.5
Senior	2	22.2
Partner	3	33.3
Managing director/audit manager	1	7.7
Director	1	7.7
Not indicated	2	15.4
Total	13	100.0
Size of respondent's firm number of professionals		
1	1	7.7
2–5	2	15.4
6–10	4	30.8
11–20	0	0.0
21–30	2	15.4
Over 30	4	30.8
Total	13	100.1 ^a
Number of years firm has existed		
Less than 5 years	2	15.4
5–10 years	1	7.7
11–15 years	4	30.8
16–20 years	2	15.4
21–25 years	1	7.7
26–30 years	1	7.7
Over 30 years	2	15.4
Total	13	100.1 ^a

^aRounding up error.

Senior Partners. One respondent was an Audit Manager with the role of Managing Director, and another was a Director. Two respondents did not indicate their titles. The average years of experience for nine of the respondents who answered this question was 22.4 years. The minimum experience was 15 years and the maximum was 45. This gives a range of 30 years. It is evident that very senior people in the audit firms answered the survey, which gives the responses received more weight.

Table 1 further indicates the size of the audit firm from which the respondents came from as follows:

Of the thirteen respondents, one (7.7%) was a sole practitioner, two (15.4%) came from an office with up to five professionals, and four were in a firm with six to

ten professionals. The firm for two respondents (15.4%) had 21 to 30 professionals, and that of four respondents (30.8%) had more than 30 professionals.

Table 1 also summarizes the number of years the respondents' firm has been in existence. The question was not specific as to whether the existence was with respect to Botswana or elsewhere. Due to a significant amount of collaboration among audit firms globally and significant events that have affected the audit firms, one can assume that the response is with respect to the existence of the firm globally, though not necessarily in Botswana.

The firm for two respondents has been in existence for less than five years. One firm has existed for five to ten years, four have been around for 11–15 years, and two respondents came from firms that have existed for 16–20 years. One respondent came from a firm that has been in existence for 21–25 years and another one from a firm that has been around for 26–30 years. Only two respondents came from a firm in existence for over 30 years.

For the thirteen firms examined in this study, there are forty-one partners. The firm with the most number of partners has seven, while the one with the least has one partner. The number of partners admitted into partnership in the three years prior to this study was ten. Eight firms (61.5%) admitted at least one partner in those three years.

Three firms (23.1%) indicated that they had partners who were not members of an accountancy professional institute. These were admitted as directors with responsibilities in non-audit business. It is emphasized that the non-professional accountants have responsibilities not related to auditing. It was mentioned in the literature review that the provision of non-audit services might affect independence. Judging independence solely on the basis of the professional inclination of the partners however is not easy. In this particular study, on the basis of this qualitative information, only less than a quarter of the firms dedicate non-audit work to non-accountants, thereby dispelling the notion that their independence is impaired. By implication, the majority of the firms might be exposing themselves to perceptions of lack of independence.

Services Provided

Table 2 summarizes the type of services usually provided by the firms.

Twelve firms (about 92%) indicated that they perform professional audit work. It is surprising that only part of the group responded affirmatively: all thirteen firms have been registered to provide audit services. Ten firms (77%) provided bookkeeping and other accountancy work. Internal auditing and budgeting and other management accounting work are each provided by nine firms (69.2%). Only

Table 2. Services Usually Provided by Audit Firms.

Service	Firms Providing	Percent Total
Professional audit work	12	92.3
Bookkeeping and other accountancy work	10	76.9
Budgeting and other management accountancy work	9	69.2
Internal auditing	9	69.2
Recruitment and placement	4	30.8

four firms (31%) provided recruitment and placement services. Table 3 provides a summary of other services offered.

Management consulting appears to be a popular service offered by seven firms (over 53%). Provision of tax services is the second most preferred service, offered by six firms (over 46%). In the Botswana context, more firms provide management consultancy and tax services than recruitment and placement services, which ties with corporate services, offered by four firms (31%). Company secretarial services are offered by three firms (23%) only, as are liquidation services.

Table 4 indicates the approximate average percentage income from each type of service offered by the audit firms.

This question had a low response rate. However, the table provides an indication as to the percentage income generated by each of the five major services listed. Among these services, professional audit work generates the highest percentage

Table 3. Other Services Provided by Audit Firms.

Service	Firms Providing	Percent of Total
Management consulting	7	53.8
Tax services	6	46.2
Corporate services	4	30.8
Company secretarial services	3	23.1
Liquidation	3	23.1
Judicial	2	15.4
Business plan	1	7.7
Computerization of accounts	1	7.7
Feasibility studies	1	7.7
Insolvency	1	7.7
Marketing research	1	7.7
Permits, visas and licenses	1	7.7
Treasury and financial services	1	7.7

Table 4. Average Percentage Income per Service Category.

Service	Percentage Income
Recruitment and placement	0.23
Bookkeeping and other accountancy work	22.85
Professional audit work	30.62
Internal auditing	1.38
Budgeting and other management accounting work	9.00
Other services	35.92

income to the firms. This was expected because professional audit work is the main business line of these firms, which were selected for study on the basis of their being registered as audit firms in the country. Bookkeeping and other accountancy work is the next highest income generator for the firms, consistent with what most professional accountancy firms are doing. Budgeting/management accounting, internal auditing and recruitment and placement services do not generate as much income for the firms. These three services together generate 10.61% to the firms' total income.

The results indicate that in addition to audit services, at least 76% provided bookkeeping and other accountancy work, while close to 70% provided internal auditing and management accounting services, including budgeting. Hence a majority of the audit firms do provide other services in addition to auditing. Audit services account for about 31% of the firms' total income. This implies that the majority of income comes from non-audit services. This appears to be the trend elsewhere. In the USA for example, consulting and management advisory services now represent 50% of the revenues of the five largest firms (Levitt, 2000).

The fact that audit firms also provide non-audit services necessitates a consideration of whether there is a need for separating the two functions. It is generally assumed that to enhance auditor independence, audit firms must be organized in a manner that clearly separated auditing from non-auditing work. In other words, a person doing auditing should not do consultancy work. Apparently, only about 20% of the firms are so organized. It is not clear how the remaining 80% are organized. This is vital even if it only serves to enhance perceived independence, and the fact that they are getting substantial amounts from non-audit services makes it affordable to the firms. Separating audit from non-audit work may indeed portray a firm as being concerned with an independent approach to audit work. However, whether the firms are actually perceived as being independent would involve surveying users of financial statements. This is an issue for future research.

Attitude Toward Making Management Decisions for Clients

The results of the study suggest that, on average, audit firms have occasionally had to make some management decisions for their clients. Eight respondents (about 62%) indicated that they made such decisions occasionally. Of these, three respondents (23.1% of the total respondents) indicated that they did make such decisions on a frequent basis.

Respondents were of the opinion that making managerial decisions for their clients was acceptable. Eight firms (61.5%) believed that professional accountancy firms are expected to help their clients attain their objectives, and hence participating in managerial decision-making was very much acceptable. For five of the respondents (36.5%), this was regardless of whether or not the client was one for audit services.

In the case where management decision-making was not supported, the overriding reason given was that it would affect the independence of the auditor. This was the view given by six of the eight firms not participating in managerial decision making for their audit clients. Three respondents (23.1%) thought it was not acceptable to participate in managerial decision making for their client, with one of them suggesting that professional accountancy firms should desist from such practice.

The results are somewhat confusing. The majority of the respondents saw no problem in being involved in managerial decision making for the client, but they also accepted that the practice could affect auditor independence in fact. Perhaps respondents were looking at the other services provided by their firms. It has been established that audit firms provided several other services over and above auditing. Probably the responses were affected by considering the fact that the firm may have clients for services other than auditing, and in that case there was no problem if they made some management decisions to assist the clients to achieve their objectives. In any case, given the small market and the likely competition among the firms, auditors may not have a choice.

Audit Quality Control

Five mechanisms popular with audit firms to ensure quality audit work are summarized in [Table 5](#).

The most widely used quality control mechanism is internal peer reviews: reviews by either other partners or senior partners within the audit firm locally, or by others in sister organizations and even a professional organization. Seven respondents indicated the use of internal peer reviews, two indicated reviews

Table 5. Mechanisms for Ensuring Quality Audit Work.

Mechanism	Firms in Place	% (All Firms)
Partner (peer) review/re-reviews	7	53.8
Adherence to IAS/independence guidelines	4	30.8
Audit Planning (elaborate)/audit programs	4	30.8
Audit staff training/update seminars for audit seniors	4	30.8
Engagement letter	3	23.1

by sister organizations, and one indicated that a professional organization was used. Elaborate audit planning, adherence to internal audit standards and constant staff training and update seminars were seen as other important quality control mechanisms and were the other mostly preferred quality control mechanisms. Four respondents indicated relying on these mechanisms to ensure quality control.

Seven respondents, representing 53.8% of the total respondents, had a lawyer who provided legal advice to the firm, and who handled any other legal matters including potential lawsuits. Two of these seven had a lawyer serving as a full-time staff member. Six firms (46.2%) did not have a lawyer. The absence or infrequency of lawsuits and cost considerations were the major reasons provided for not having a lawyer. It was deemed that such services could, and would, be obtained when the need arose.

It is clear that audit firms have a number of measures to ensure they provide quality audit services to their clients. However, none of the respondents indicated that they insisted on the client establishing an audit committee. According to literature the presence of an audit committee within the client structure is one of the principal factors enhancing audit independence, especially if the committee involved directors external to the client management (Teoh & Lim, 1996). The absence of an indication of the fact that auditors insist that an audit committee be established in the client organization from the list of measures mentioned is thus conspicuous. In the United States, for example, the Cohen Commission has recommended establishing audit committees for all public listed companies (AICPA, 1978). A sensible combination of the measures suggested by the respondents and the requirement that clients establish audit committees in Botswana can provide reasonable assurance of independence.

CONCLUSIONS

This study undertook to establish whether public auditing firms in Botswana routinely provide significant non-audit services to their clients and whether such

services constitute a major source of income to the auditing firms. It also sought to find out whether members of audit firms in Botswana made decisions in concert with management. Finally, the study sought to determine whether audit firms in Botswana have quality control mechanisms in place.

The results suggest that non-audit services are provided on a routine basis and include bookkeeping and other accountancy work, internal auditing and management accountancy work. Others are management consulting and taxation work. We found that income from these services is substantial, with only about 31% generated by audit services.

Auditors occasionally made management decisions for their clients although it was considered acceptable to make such decisions to non-audit clients. However, making such decisions for audit clients was explicitly considered as potentially harmful to auditor independence. It is also evident that audit firms have put in place mechanisms of quality control, although audit committees do not feature among the mechanisms. Apparently, auditors are aware of their professional obligations with regard to professional independence, and they are aware of some of the dangers that can affect their independence.

On the basis of these results, an overall conclusion as to whether the firms are independent cannot be made easily. For one, it is important to distinguish independence in appearance and independence in deed. The former has to do with independence perceptions, which does not necessarily correctly reflect what is actually the case. This might appear to be harmed by the fact that auditors involve themselves with their clients in other ways besides strictly providing them with audit services. But it is also important to bear in mind that audit services are provided by professional accountants. As professionals, auditors are aware of the perils of usurping their clients' responsibilities, especially in relation to decision-making. The fact that the audit firms provide other services to clients emphasizes the professional inclination of the firms' proprietors and of the market place: to provide professional service, and the fact that the Botswana market is small and audit firms are probably left with no alternative than to broaden the scope of services rendered, even to their existing clients for audit services.

What is perhaps important is how the business of a firm is organized such that there does not seem to be a conflict of interest. About 20% of audit firms in Botswana are organized in such a manner that the two services are not seen to be offered by the same people. This enhances the appearance of independence. The fact that the firms have mechanisms to assure quality control is somehow evidence of their concern over perceived independence.

A major weakness of this study is the absence of data from a survey of users of audit reports. This would have given conclusive evidence as to how auditor independence is perceived in Botswana. On the basis of the positions of [Engle \(1996\)](#),

Teoh and Lim (1996), and Beattie and Brandt (1999), it can only be inferred that auditors in Botswana put themselves in a situation in which their appearance of independence can be impaired. However, whether they are independent in fact is difficult to judge and the authors therefore refrain from making a concise conclusion on that.

NOTES

1. Data provided by the Government Statistician, Central Statistics Office, Gaborone, through their letter with reference CSO 8/7 dated 22nd May 2002.
2. At the time of conducting this study the biggest audit firms were five. The number has since gone down to four.
3. “Public accountant”, “public accounting firm”, “auditor” and “audit firm” are used synonymously in this work. Reference to “public accountant” would mean “auditor” and vice versa. The same applies to “public accounting firm” and “audit firm”. “Professional accountants”, on the other hand, is used mostly to refer to non-auditing accounting firms and accountants not so engaged, i.e. those employed by non-audit firms.
4. APC (1980). *Auditing Standards and Guidelines: Explanatory Foreword*, paragraph 2. Auditing Practices Committee. As cited in Dunn (1996, p. 6).
5. As cited in Gray and Manson (2000, p. 52).
6. As cited in Gray and Manson (2000, p. 52).
7. Auditors have since been barred from providing MAS to audit clients in Nigeria (Addo-Nkrumah, 1998).

REFERENCES

- Addo-Nkrumah, S. K. (1998). Management advisory services (MAS) and the perceived independence of auditors: Empirical evidence from Nigeria. Paper presented at the First International Conference of the Association of African Academic Accountants, 24–26 June. Gaborone, Botswana.
- AICPA (1976). *Commission on auditors' responsibilities, reports, conclusions, and recommendations (Cohen Commission)*. New York: AICPA.
- Arens, A. A., & Loebbecke, J. K. (1997). *Auditing: An integrated approach*. Upper Saddle River, NJ: Prentice-Hall.
- Beattie, V., & Brandt, R. (1999). Perceptions of auditor independence: U.K. evidence. *Journal of International Accounting Auditing & Taxation*, 8(1), 67–107, taken from <http://www.medupe/>.
- BIA (1998). *Botswana institute of accountants act, rules and regulations as amended up to 1998 AGM*.
- Bonu, N. S., & Matome, T. T. K. (2001). Development of the capital market in Botswana. *The African Finance Journal*, 3(1), 26–58.
- Briloff, A. J. (1966). Old myths and new realities in accountancy. *The Accounting Review*, XLI(3), 484–495.
- Central Statistics Office. Government of Botswana (2001). 26(1).
- Chapman, C. (1995). The independence question. *Internal Auditor*, 52(5), 10.

- Companies Act (1984). Chapter 42:01. Government of Botswana.
- Davidson, R., & Emby, C. (1996). Should auditors provide nonaudit services to their audit clients? *Research on Accounting Ethics*, 2, 1–10.
- Dunn, J. (1996). *Accounting: Theory and practice*. Harlow, England: Financial Times Prentice-Hall.
- Emby, C., & Davidson, R. A. (1998). The effects of engagement factors on auditor independence: Canadian evidence. *Journal of International Accounting Auditing & Taxation*, 7(2), 163–177, taken from <http://www.medupe/>.
- Engle, T. (1996). Revisiting independence. *Internal Auditor*, 53(6), 66–70.
- Frost, C. A., & Ramin, K. P. (1996). International audit differences. *Journal of Accountancy*, 8(4), 62–68, April, taken from <http://www.medupe/>.
- Gray, I., & Manson, S. (2000). *The audit process: Principles, practice and cases*. Australia: Business Press Thomson Learning.
- Hansard (1988). *National assembly, official report* (Vol. 94). Third Meeting of the 4th Session of the Fifth Parliament.
- International Federation of Accountants (2000). *Exposure draft on independence: Proposed changes to the code of ethics for professional accountants*.
- Lee, C. W., & Gu, Z. (1998). Low balling, legal liability and auditor independence. *Accounting Review*, 73(4), 533–555, October, taken from <http://www.medupe/>.
- Levitt, A. (2000). Clarification of independent auditor status. *FDCH Congressional Testimony to the U.S. Senate Subcommittee on Banking, Housing and Urban Affairs*. U.S. Senate, September 28.
- Lowe, D. J., & Pany, K. (1995). CPA performance of consulting engagements with audit clients: Effects on financial statement users' perceptions and decisions. *Auditing: A Journal of Practice and Theory*, 14(2), 35–53.
- Magee, R. P., & Tseng, M. C. (1990, April). Audit pricing and independence. *Accounting Review*, 65(2), 315–336.
- Maurice, J. (1996). *Accounting ethics*. London: Pitman Publishing.
- Schulte, A. A. (1965). Compatibility of management consulting and auditing. *The Accounting Review*, XL(3), 587–593.
- Teoh, H. Y., & Lim, C. C. (1996). An empirical study of the effects of audit committees, disclosure of nonaudit fees, and other issues on audit independence: Malaysian evidence. *Journal of International Accounting Auditing and Taxation*, 5(2), 231–248.

ETHICS OF VIRTUE AND ETHICS OF DUTY: DEFINING THE NORMS OF THE PROFESSION[☆]

Mary S. Doucet and Thomas A. Doucet

ABSTRACT

This paper examines the necessity and the compatibility of the philosophical paradigms of an ethics of virtue and an ethics of duty for defining the norms of the practice of public accounting. This current work recognizes that both paradigms are already well entrenched in the profession and argues here that both paradigms are quite necessary and quite compatible in delineating the profession's norms. One need look no further than the design of the profession's various codes of conduct to see that these codes generally contain talk of both virtues and duties and hence, could be said to take a combined ethics of virtue/ethics of duty approach. We conclude that the two philosophical paradigms are compatible and can provide guidance to individual accountants and accounting educators in fulfilling their respective roles in society and, while the implications are not as straightforward, can provide guidance to public accounting firms.

[☆]While this discussion is applicable to international settings, for ease of exposition references to regulatory bodies, principles, standards, and organizational culture will be made primarily within the context of the U.S. institutional framework, with some references to Canadian institutional framework.

INTRODUCTION

In recent years the applicability of an ethics of virtue to accounting practice has been the focus of several articles in the accounting literature (Dobson & Armstrong, 1994; Doucet & Ruland, 1994; Francis, 1990; Mintz, 1995, 1992; Thorne, 1998). Doucet and Ruland is the only one of these that begins to explore the necessity and compatibility of a combined ethics of virtue/ethics of duty approach for defining the norms of the profession of public accounting.

It is useful to note that Doucet and Ruland frame their discussion in terms of a tension between the two philosophical paradigms, while this current work sees the issue more as one of the recognition that both paradigms are already well-entrenched in the profession and argues here that both paradigms are quite necessary and quite compatible in delineating the profession's norms. One need look no further than the design of the profession's codes of conduct¹ to see that these codes generally contain talk of both virtues and duties, and hence, could be said to take a combined ethics of virtue/ethics of duty approach. This is not to say that those who developed these codes explicitly set out to include both virtue and duty ethics in these codes. However, it is believed that the framers of these codes were aware of the necessity of reference to qualities of character (virtues) as well as to the characteristics of the role of the professional accountant, and hence, the duties incumbent upon those who practice the profession of public accounting.

The purpose of this paper, therefore, is to provide an argument for the necessity and the philosophical compatibility of drawing on these two apparently competing ethical paradigms as a means to provide members of the profession and the public with an understanding of the profession's ethical norms. The AICPA *Code of Professional Conduct*, hereafter called AICPA Code (AICPA, 1997) will be used to demonstrate that these two ethical paradigms are already embodied in the profession's view of its ethical norms, with some brief comparisons the Institute of Chartered Accountants of Ontario *Rules of Professional Conduct*, hereafter called ICAO Code² (ICAO, 1995) and to the CGA – Canada *Code of Ethics and Rules of Professional Conduct*, hereafter called CGA Code (CGA-Canada, 1994). The profession's various codes are used because, as with any profession's code, it is "perhaps its most visible and explicit enunciation of its professional norms. [It] embodies the collective conscience of a profession and is testimony to the group's recognition of its moral dimension" (Frankel, 1989, p. 110). The next section provides a discussion of the meaning of the terms practice, virtue and duty as used in this paper and, using the AICPA Code, along with the ICAO Code and the CGA Code, illustrates how the profession's codes can and do contain both virtue and duty language. Following this, the next section is devoted to illustrating the compatibility of the ethics of virtue/ethics of duty paradigms. A conceptualization of these paradigms

within an accounting context and the specific implications for individuals, firms, and accounting education are then discussed, followed by concluding comments.

VIRTUE AND DUTY LANGUAGE IN THE CODES

The Meaning of Virtues

Before illustrating the presence of both virtue language and duty language in the AICPA *Code*, it is useful to define what is meant by the term “practice” as used in the definition of what is a virtue, as well as define what is meant by virtues and duties in this paper. MacIntyre (1984, pp. 187–191) defines and provides examples of what he means by the term “practice.” His definition includes the following, “. . . any coherent and complex form of socially established cooperative human activity through which goods internal to that form of activity are realized in the course of trying to achieve those standards of excellence which are appropriate to . . . that form of activity” (1984, p. 187). Internal goods can be distinguished from external goods in that the achievement of internal goods is a good for all who participate in the practice, while the achievement of external goods necessitates some will gain, some will lose (1984, p. 190). For the practice of public accounting in the form of auditing, the internal good of a particular audit would be to excel at performing the audit and thus, protect the public interest by informing the public about the fair presentation of financial statements. The external goods would consist of the audit fee, prestige, and possibly status, to name a few.

One definition of a virtue, according to MacIntyre (1984, p. 191), is that it is “an acquired human quality the possession and exercise of which tends to enable us to achieve those goods which are internal to practices and the lack of which effectively prevents us from achieving any such goods.” To further distinguish moral virtues from other acquired human qualities, we call on St. Thomas Aquinas,³ (Trans. McDermott, 1989, p. 232) who would say that virtue always “disposes us to live rightly.” According to Aquinas (1989, p. 232), moral virtues are dispositions to act well and thus, their “. . . purpose is always good action” and “. . . they cannot be misused.”

The Aristotelian concept of virtues requires one to not only act in particular ways, but to feel in particular ways also; hence, the possession of the virtues requires one to act according to right reason (MacIntyre, 1984, p. 152). This concept illustrates what is meant by independence in fact and in appearance for auditors. Independence in fact requires that auditors feel in particular ways, while independence in appearance requires that auditors act in particular ways (see Olazabal & Almers [2001, p. 69–70] for a discussion of why independence in appearance is important).

To act according to right reason, auditors must necessarily be concerned with both independence in fact and independence in appearance. In the *Nicomachean Ethics*, Aristotle (Trans. Irwin, 1985, p. 33) describes two categories of virtues: intellectual virtues and character virtues. The Aristotelian concept of virtues requires the intellectual virtue of judgment without which the character virtues cannot be exercised (MacIntyre, 1984, p. 154). Thus, judgment is a critical component to being a virtuous person. Stephen Carter (1996, p. 19), in his book *Integrity*, considers being able to discern (judge) what is right and what is wrong to be an integral part of the virtue integrity and indeed, defines integrity as the overriding virtue. Thus, in addition to possessing the character virtues, it is necessary to possess intellectual virtues, the ability to discern right from wrong. It is interesting to note that according to Aristotle, intellectual virtues are acquired through teaching while virtues of character are acquired through habitual exercise. As we will see in the following discussion of the AICPA *Code*, both technical and ethical judgment are critical to fulfilling the role of the professional accountant, whether in performing audits or other services.

The Meaning of Duties

In this paper, the concept of duties in general will be derived from Ross (1965). In discussing what makes right acts right, Ross (1965, p. 19) describes relations to others (promisee/promisor, debtor/creditor, friend to friend, spouse to spouse, parent to child, child to parent, etc.) as being the foundation of what he calls *prima facie* duties (a better term might be conditional duties⁴) which are incumbent upon an individual given the circumstances of the case. As Ross describes them, some of these *prima facie* duties are promise-keeping, justice, beneficence, and non-maleficence (1965, p. 21). He states further that when one is in a situation when more than one of these *prima facie* duties is incumbent on him/her, one must study the situation to come to a considered opinion as to which is more incumbent than the others (1965, pp. 19–20). This is where Aristotle's concept of judgment, or Carter's concept of discernment, is necessary to resolve the conflicting duties. Thus, the concept of duties used here is not of the implacable Kantian categorical imperative, but of the *prima facie* duty that would be the obvious duty in the absence of an overriding duty in the situation. Hence, one has a *prima facie* duty to keep a promise; however, if the situation were present that one could save a life by breaking that promise, the duty to save a life would override the duty to keep a promise.

The concept of professional duties used in this paper derives from the public accountant's role in society (i.e. the public accountant's relations vis-à-vis third

parties based on the profession's contract with society) (Gaa, 1994, p. 35). "The social contract approach says that auditors are obligated to act in accordance with the dictates of [the public accountant's role in society]" (1994, p. 34). In fulfilling this social role, which is their *prima facie* duty to protect the public interest by informing the public about the fair presentation of financial statements, auditors face a myriad of duties, including *prima facie* duties to their clients (e.g. maintaining client confidentiality). When the auditor's *prima facie* duties to the client and to the public potentially conflict, judgment must be used to determine which duty is more incumbent. To successfully determine which duty is more incumbent, the auditor must possess the intellectual virtue of judgment to discern right from wrong. While the duty to inform the public may be the overriding duty, it would be difficult for the profession's standards to clearly delineate at which point client confidentiality should be breached.

While the auditor will always consider legal liability when making such a decision, the overriding concern should be the prevention of harm to the public and prevention of a loss of confidence in the profession's ability to perform audits. One can envision a scenario where the auditor decides that it is appropriate to breach client confidentiality and inform the public, only to find that public confidence in the profession is diminished because auditors' ability to gain the clients' trust has evaporated. Equally, one can envision a scenario where the auditor decides that it is not appropriate to breach client confidentiality to inform the public, only to find that public confidence in the profession is diminished because the auditor knew and did not inform. Thus, the auditor must use judgment when faced with these conflicting duties. Given the nature of the exceptions to maintaining client confidentiality provided in the *Code* and the reporting requirements for audits, we would hope that the instances when the auditor would believe it necessary to decide whether to breach client confidentiality are rare, albeit not non-existent.

ILLUSTRATION OF VIRTUE/DUTY LANGUAGE IN THE PROFESSION'S CODES

To illustrate the use of virtue and duty language in the profession's codes of ethics, the Principles Section of the AICPA *Code* is used, along with some comparisons to the ICAO *Code* and the CGA *Code*. Frankel (1989, pp. 110–111) identifies three types of codes of ethics: (1) aspirational codes which state ideals to which practitioners should strive; (2) educational codes which "[seek] to buttress understanding of [their] provisions with extensive commentary and interpretation"; and (3) regulatory codes which include "a set of detailed rules to govern professional conduct and to serve as a basis of adjudicating grievances." While they differ

somewhat in approach, the *AICPA Code*, the *ICAO Code*, and the *CGA Code* contain elements of all three of these types of codes. Each code contains elements of an educational nature with extensive commentary and, at least for the *AICPA Code*, numerous interpretations meant to educate accounting professionals. Each code also contains very similar detailed rules that form the basis for disciplinary proceedings against members who fail to comply with the rules and/or against whom allegations of professional misconduct have been raised. The primary interest here, however, is in the aspirational aspects of these codes and the use of virtue and duty language in those aspirational statements contained in each code. All three codes contain numerous statements of an aspirational nature.

The aspirational language of codes helps to define the social role of a profession. Our ethical obligations as professionals derive from our roles as professionals (Lebacqz, 1985, p. 58). These roles are "... linked with images of whom to be, as well as what to do" (1985, p. 59). Hence, codes often, and maybe necessarily, contain language of both virtues (whom to be) and duties (what to do). The ethical obligations (duties) of the profession lie behind most professional codes of ethics that contain rules linked to the duties (1985, p. 70), and the *AICPA Code* is no exception. According to Lebacqz (1985, p. 18) the rules we find in codes protect us, as professionals, from possible errors in exercising our own judgment. However, she asserts that professionals should not look to professional codes for guidelines to action, but rather should view these codes as a statement about the image of the profession (its social role) and the character (virtues) of professionals (1985, p. 68).

While some aspirational language may be found in the rules and interpretations of the *AICPA Code*, the most concentrated use of aspirational language is found in the Principles Section. We will thus focus on this section in our discussion of the virtue and duty language of the *AICPA Code*, with selected references to the *ICAO Code* and the *CGA Code*.

The first sentence in the Preamble to the *AICPA Code* indicates that membership in the AICPA is voluntary (Section 51). While this statement may not seem significant in and of itself, its significance derives from the fact that following the principles and rules of a voluntary organization requires the member to possess character virtues. The second sentence states that by accepting membership a CPA "assumes an obligation of self-discipline above and beyond the requirements of laws and regulations." This indicates that the member CPA has a duty to discern when an action may be inappropriate even though it does not violate a law or regulation. In a sense this duty implies that the member CPA must possess the character virtue of integrity, which includes the ability to discern right from wrong. These first two sentences of the Principles set the stage for delineating the duties and character required of all member CPAs.

The second section of the Preamble (51.02) indicates that the profession recognizes that it has duties to the public, clients, and to colleagues, whose interests may, at times, conflict. This section of the Preamble also indicates the primacy of the public accountant possessing the character virtue of courage. The last sentence of the Preamble states “The principles call for an unswerving commitment to honorable behavior, even at the sacrifice of personal advantage” (51.02). The Foreword of the ICAO *Code* contains similar language by enumerating several distinguishing elements of what a profession is, including the statement that “...there is acceptance by the practitioners of a responsibility to subordinate personal interests to those of the public good” (Foreword). The implications of this character virtue for individual accountants are discussed later.

Article I of the AICPA *Code* explicitly recognizes the need to “...exercise sensitive professional and moral judgments” (Section 52). The placement of this statement in the first article of the Principles section of the *Code* sends a signal as to the importance of the ability to exercise judgment (discernment) of what is right and what is wrong. This phrase in Article I not only requires sensitive moral judgments, but also requires sensitive professional judgments regarding technical matters. Consistent with the Aristotelian belief that right actions must issue from right reasons, the *Code* also explicitly recognizes this need.

The responsibilities (duties) of all member CPAs to those who use their professional services are also emphasized in Article I. In addition, their duties “to improve the art of accounting, maintain the public’s confidence, and carry out the profession’s special responsibilities for self-governance” are highlighted here. To fulfill their responsibilities to all those who use their professional services, member CPAs must maintain independence in fact in the performance of attestation services; while to maintain the public’s confidence, they also must maintain independence in appearance.

The social role of the profession is recognized more fully and explicitly in Article II of the Principles section. This article states “Members should accept the obligation to act in a way that will serve the public interest, honor the public trust, and demonstrate commitment to professionalism” (Section 53). The CGA *Code* describes this public interest obligation in the Preamble to its *Code* and the ICAO *Code* describes the same obligation to the public in the Foreword to its *Code*.

While this public interest obligation may seem straightforward and easy to discern, one must recognize that the public represents a broad category of users of member CPAs’ professional services that include many with conflicting interests who “rely on the objectivity and integrity of certified public accountants to maintain the orderly functioning of commerce” (53.01). One might note that in late 2001 and early 2002, the orderly functioning of commerce and faith in the accounting profession was sadly shaken by the Enron/Arthur Andersen debacle.

The guidance provided by Article II (53.02) indicates that to resolve these conflicting pressures members should act with integrity, which requires the ability to discern what is the right thing to do (Carter, 1996). In addition to integrity, Article II mentions the character virtue of objectivity and the duty to discharge responsibilities with due professional care. The framers of the current AICPA Code believed that integrity, objectivity/independence, and due professional care were so critical to the ethical well-being of the profession, that each of these concepts is presented and described in Articles III (Integrity, Section 54), IV (Objectivity & Independence, Section 55), and V (Due Professional Care, Section 56).

While Articles III and IV deal with character virtues, the possession of these virtues is presented as a duty for member CPAs. Thus, Article III says that a member has a duty to “perform all professional responsibilities with the highest sense of integrity.” Section 54.02 perhaps provides some of the strongest duty language in describing the character virtue of integrity as requiring not subordinating service and the public trust to personal gain and advantage. Integrity also requires (54.03) that the member CPA possess the ability to discern and act in accordance with the spirit, as well as the form of technical and ethical standards. And finally, integrity requires that member CPAs be objective, independent if in public practice, and to fulfill these professional responsibilities with due care.

Article IV elaborates on the need for member CPAs to maintain objectivity and the need for member CPAs in public practice to be independent both in fact and in appearance. The character virtue of objectivity results in the duty for member CPAs to be “impartial, intellectually honest, and free of conflicts of interest” (55.01). For member CPAs in public practice this need to be independent both in fact and in appearance results in the duty of “continuing assessment of client relationships and public responsibility” (54.03).

Article V specifies member CPAs’ duty to discharge all professional responsibilities with due care. Due care necessitates that member CPAs perform their professional responsibilities competently and diligently (56.01). What competence entails is further described in Sections 56.02 and 56.03 and what diligence entails is further described in Sections 56.04 and 56.05.

Article VI is the only principle of the Code that applies only to members in public practice. Given the public interest aspect of public practice, this section of the principles restates and elaborates on the importance of integrity, objectivity, independence, and due care for member CPAs in public practice (57.01, 57.02). It provides guidance as to how member CPAs can better assure that they reach the right judgments regarding the services to be provided in specific circumstances (57.03).

All three codes contain language of character virtues and duties of professional accountants. Within the context of describing these character virtues, the AICPA

Code refers to duties to maintain independence, to discharge professional responsibilities with competence (the public accountant's primary non-moral virtue), and other duties of rendering professional services. The principles of the ICAO *Code* contain "... fundamental statements of accepted conduct" which include statements such as "... a member or student shall perform his or her professional services with integrity and care and accept an obligation to sustain his or her professional competence" (Foreword). The principles of the ICAO *Code* also refer to the duty to maintain independence and objectivity. The Preamble of the CGA *Code* also contains discussion of the character virtues of integrity and honesty (Preamble).

In the AICPA *Code* and the ICAO *Code*, the rules that derive from these duties are not explicitly linked to these duties. The CGA *Code*, on the other hand, is much more explicit in the use of duty language. The sections of the CGA *Code* clearly delineate the duties to the public, duties to the profession, duties to the association, duties of members, and duties of members in public practice. The rules derived from these duties are clearly linked with each category of duties.

The language of these *Codes*, as illustrated here demonstrates a concern for character and a concern for enumerating the special duties of professional accountants.

THE COMPATIBILITY OF VIRTUES AND DUTIES

The virtue ethics paradigm posits that personal characteristics (attributes of character) are basic in morality and the rightness of actions is always derived from the virtuousness of traits. Accordingly, a naive interpretation of this paradigm might assume that to be ethical individuals need possess ability and intent and need not be guided by duties or roles. Thus, one might believe that there could be a person who has the ability and desire to do the right thing but who does not know what is the right thing. This belief is not consistent with the Aristotelian concept of virtue ethics that requires the intellectual virtue of judgment in order for the character virtues to be obtained. Nonetheless, the pertinent question of virtue ethics is "How should I be?"

Contrast this with the traditional ethics of duty approach, which focuses on rules, duties, and obligations and which, in a strict interpretation, posits that only judgments about right actions are basic in morality and that we derive the virtuousness of traits from right actions. When accountants follow the rules that derive from duties defining their roles, apparent compliance with the ethics of duty results. But, following the rules without possessing the ability and intent to fulfill the underlying duties could lead to a variety of situations where accountants could

choose to comply with the rules and yet not fulfill their duty. One example of this apparent inconsistency is the example provided earlier where the auditor maintains client confidentiality and following the rule might not be consistent with the overriding duty to protect the public. Other examples abound where the auditor might allow doubtful accounting treatment for certain transactions because their form is consistent with the rule, even though their substance is not. This belief is not consistent with our definition of *prima facie* duties, which also requires the exercise of judgment when rules conflict. The pertinent question here, however, is “How should I act?”

These appear to be two extreme positions. How is it possible to argue for their compatibility? “How should I be?” and “How should I act?” are not really the mutually exclusive questions they appear to be here. Narveson and Hahn (1995), for example, state that morality is necessarily an issue of character, however they say that “All action, we may agree, proceeds from motivation by individual people, and so from ‘the soul.’ But the rest of us can’t see into your soul, and what we *can* see – namely, what you *do* – is crucially important” (1995, p. 8). This statement perfectly illustrates the concepts of independence in fact (“your soul”) and independence in appearance (“what you do”), which are so crucial to the credibility of the public accounting profession. They also say that “Ethics is always about how one acts, and how one acts is always a matter of decisions, intentions, motives, and ultimately character – the locus of moral virtues and vices. Due respect for the right rules of conduct is part of good character” (1995, p. 9). If we assume that right rules of conduct issue from duties and if we hold the above statements to be true, we can see that it is difficult to comprehend a virtuous person (of good character) who would not be aware of his/her duty.

Duties often conflict and following an ethics of duty approach does not provide guidance when such duties conflict. Trianosky (1990, p. 342) provides a critique of ethics of duty theories by contending that they cannot provide a complete action guide because “rules... of right action must be applied, and conflicts between them adjudicated. But the rules themselves do not tell us how to apply them in specific situations, let alone how to apply them well, or indeed when to excuse people for failing to comply with them.” As Carter (1996, p. 13) contends what is needed is some sense of when rules should be followed as well as when rules should be broken. This sense of when rules should be followed or broken depends on the virtue integrity. As Carter says (1996, p. 12) “Integrity does not always require following the rules. Sometimes – as in the civil rights movement – integrity requires *breaking* the rules. But it also requires that one be open and public about both the fact of one’s dissent and the reasons for it.” Thus, integrity is required to answer the question “How should I act?” Without this, an ethics of duties approach seems to provide an incomplete guide to ethical behavior.

On the other hand, Wallace (1978) provides a critique of contemporary ethics of virtue theory. Wallace (1978, p. 127) believes that the virtues of conscientiousness (truth-telling, fairness, keeping one's word, honesty) are necessary virtues in the truly good person. He posits, however, that possessing the virtues of conscientiousness does not relieve one from making difficult decisions where there are conflicting interests (1978, p. 119). Wallace's critique of virtue ethics does not consider that within the virtue ethics approach of Aristotle, judgment is a necessary intellectual virtue without which the character virtues, such as Wallace's virtues of conscientiousness, cannot be exercised. Thus, the intellectual virtue of judgment is a necessary prerequisite to the character virtues.

Wallace maintains that the possession of the character virtues of conscientiousness is a commitment to forms of behavior that communities reasonably require of their citizens (1978, p. 127). These virtues, then, are inextricably tied to right actions and consideration of moral rules and requirements of the community. He also contends that human life is a social life lived in communities and structured by complex social institutions and conventions. An individual in such a community plays many different roles within these institutions. These various roles are constructed by the conventions that are derived from the complex social institutions. From this conception of human life, we can easily see that a rights and duties approach may be applicable. But, due to the complexity of moral decisions, it is hard to believe that somehow right conduct can be completely codified in rules and principles (McDowell, 1979; Trianosky, 1990).

Even if right conduct could be codified, who would do the codifying? We must assume it would be someone with virtuous character, good judgment, and infinite knowledge of all possible moral situations. However, even with this codification, as has been illustrated earlier, acting on duty-based rules without possession of virtues, one would lack the ability and intent to fulfill one's myriad roles in society and would not be able to adjudicate when rules, roles, and/or duties conflict. Neither an ethics of virtue nor an ethics of duty approach can provide one with a complete guide to living the moral life.

In the preface of his book, Wallace (1978) provides an illustration of the compatibility of the two paradigms. He describes the relationship between the virtues of conscientiousness (truth-telling, fairness, keeping one's word, honesty) and moral requirements or rules. He states that the virtues of conscientiousness are in fact "attitudes toward moral requirements or rules" (1978, p. 9). Thus, at least some virtues cannot be separated from moral requirements and rules (which in this discussion are assumed to be duties). These virtues happen to be those that Wallace concludes are necessary for human life in communities (1978, p. 127). He concludes that although there are differences among communities one commonality is a sense of conscientiousness or commitment to the way of

life defined by complex social institutions and conventions. A community will be a more moral society if its members possess virtues and are informed by their respective roles in society. Thus, there must be a blend of both the ethics of virtue and ethics of duty to enable a society to function morally.

CONCEPTUALIZATION WITHIN AN ACCOUNTING CONTEXT

Within the complex social structure of our business community (which is a vital part of any advanced community), the accounting profession performs the distinct role of informing the public about the fair presentation of financial information. It is incumbent upon the profession and individual professionals who perform this service to maintain a commitment to fulfilling that role. In order to do so, individual professionals must recognize their primary duty to the public and possess the virtues to fulfill this duty. This duty, of course, calls for those with this professional role to possess virtues akin to conscientiousness (we assume that the principle of integrity encompasses the virtues of conscientiousness). These virtues, along with the intellectual virtue of judgment, are necessary to maintain the profession's focus on its role and duties. In keeping with Carter's (1996) discussion of integrity, we will refer to this intellectual virtue as discernment. Within the accounting profession, other virtues are of course also necessary.

Although it may not seem to be true given the metaphors used to describe business today, trust forms the foundation of business activity (Solomon, 1993). This trust is based on some very basic assumptions that persons we do business with (particularly professionals) have integrity and are informed by the duties incumbent in their professional roles. Thus, in business and the professions in particular, all activity would degenerate if we did not have a certain degree of trust that results from business professionals possessing virtues and knowing the duties from which principles and rules are formed. Thus, the accounting professionals must not only possess certain key virtues, but must be aware of their duties which include the duty to inform the public, the duty to maintain client confidentiality when it does not conflict with the duty to inform the public, and the duty to maintain independence from attest clients.

Currently, the profession of public accounting in the U.S. is guided by the AICPA *Code*, which encompasses both principles and rules. The principles (articles) provide the framework for the profession by enumerating both some of the duties and some of the necessary virtues incumbent in the role of public accountant. The rules provide the minimum level of acceptable behavior. Thus, to fulfill the role of public accountant each individual professional must not only consider the

rules set forth in the *Code*, but must also consider the duties from which the rules are developed and must possess certain virtues, including the virtues of integrity, competence (expertise), and courage which are enumerated in the principles of the *Code*. Depending on the province, the profession of public accounting in Canada is guided by the CGA *Code* or a Canadian Institute of Chartered Accountants' code such as the ICAO *Code*, both of which have a similar structure to that of the AICPA *Code*.

It is apparent from the design of these codes that the profession's view of its normative role encompasses both virtues and duties. However, in recent years, at least in the U.S., the emphasis seems to have been placed on following the rules without regard to whether this is appropriate for the particular situation. There seems to be an attitude within the profession (as well as within the business community as a whole) that following the rules is enough. Preston et al. (1995, p. 512) suggest two potential reasons for this "following the rules is enough" mentality: (1) in recent years the language of the profession has increasingly used more legalistic and technical rhetoric; and (2) there has been a growing concern with public relations. This more legalistic and technical rhetoric is most prevalent in pronouncements of the Financial Accounting Standards Board (which are perhaps necessarily legalistic in nature); however, the rules of the Code still necessarily contain legalistic language. This legalistic and technical rhetoric, coupled with auditors trying to maintain good public relations with clients, has led to a rule-burdened, sometimes game-playing profession. This was not the case in the early 20th century, where the language of the profession focused more on "...forming oneself as an ethical subject, and insisting on good character as the basis for legitimating the activities of accountants" (1995, p. 512). While the AICPA *Code* still contains language of both a virtue and duty nature, the more legalistic and technical language that abounds in much of the professional literature today threatens the very essence of the profession of public accounting.⁵

Specific Implications for Individual Accountants

The primary implication of a dual ethics of virtue/ethics of duty focus for individual accountants is that, in addition to being guided by the principles and rules of one's professional role, individual accountants must possess certain virtues which will provide them with the ability and the intent to carry out their role. The discussion here will be limited to a discussion of what should be three necessary virtues which public accountants must possess and which are described to some extent in the profession's code: expertise, courage, and integrity.⁶

As mentioned in the previous section, the role of the public accountant suggests certain duties of which the duty to inform the public is primary. Other duties mentioned in the previous section include maintaining client confidentiality when it does not conflict with the duty to inform the public and maintaining independence from the client in all attest services. Following is a discussion of three necessary virtues and their relationship to the professional accountant's roles.

Expertise

Expertise is defined here as having two components: (1) technical expertise; and (2) ethical expertise (Doucet & Ruland, 1994, p. 7). Clearly technical expertise would be considered a non-moral virtue, but a very necessary virtue for any person who has gained professional status in a society. Although technical expertise is a non-moral virtue, it must be emphasized that it is related to morality. Some skills are necessary to act morally and technical expertise is necessary for public accountants to act morally within their roles in society. As a matter of fact, the AICPA *Code* draws attention to the primacy of technical expertise in Article V, which requires that members discharge duties with competence and diligence (Section 56). The ICAO *Code*, recall, specifies that members or students sustain their professional competence and even provides further discussion of this concept in the Foreword. Much of the domain of technical expertise is codified in the U.S. in principles, rules, and standards known as Generally Accepted Accounting Principles (GAAP) and Generally Accepted Auditing Standards (GAAS). Public accountants who lack technical expertise cannot fulfill their role in society no matter how much courage, integrity,⁷ or knowledge (other than expertise in the field of public accounting) they have. Thus, technical expertise is considered a necessary virtue for anyone claiming to perform the duties of a professional public accountant. Technical expertise, of course, is not the only expertise necessary of the public accountant.

Ethical expertise is also a necessary virtue for the public accountant (Gaa, 1994, pp. 78, 131). Ethical expertise requires that the public accountant knows the ethical principles and rules, knows the duties which inform those principles and rules, and knows when following the strict letter of the principles and rules would not be fulfilling the specific duty under consideration. Possessing ethical expertise also requires that public accountants know how to fulfill their duties when there are conflicting roles, conflicting interests, or conflicting rules and requires public accountants to recognize that the role that gives them professional status has as its primary duty the obligation to inform the public. Ethical expertise includes the virtue of justice, which is one of MacIntyre's necessary virtues for a practice.

Ethical expertise also requires that public accountants learn what is due to whom, learn to take whatever self-endangering risks as are present in the practice, and recognize the relationships within the practice which call for the exercise of

judgment regarding justice (MacIntyre, 1984, p. 191). The above characteristics of ethical expertise are necessary in order for the internal goods of the practice of public accounting to be achieved. The goods of any practice can only be achieved when each practitioner recognizes the special relationships resulting from the practice (1984, p. 191).

Courage

Courage, in this context, does not mean heroic actions in the sense of Greek myths or Celtic heroic societies (Solomon, 1993, pp. 195–196). Our societies today are much more complex and are ideally without class structures that strictly define roles and responsibilities.⁸ Thus, a person's birthright does not necessarily inform the role one will assume in adulthood.

The courage that public accountants must possess is a much more subtle concept than that of the courage described in heroic societies. It is the courage of the Preamble to the AICPA *Code*, that of "... unswerving commitment to honorable behavior, even at the sacrifice of personal advantage" (Section 51). Public accountants must possess the courage to withstand client and competitive pressures. Public accountants must also possess the courage to withstand pressures to conform to formal and informal firm policies when these conflict with the accountant's primary duty to inform the public. Without this virtue the public accountant could be led to use rules to support positions that are inconsistent with the duty to inform the public. This may result in allowing client management to manipulate the financial statements or even more subtly to non-disclose or under-disclose information that is critical to understanding the financial statements.

Integrity

While possessing the virtues of expertise and courage provide public accountants with the ability to fulfill their role, the virtue of integrity provides public accountants with the intent to do what is right. Of the necessary virtues described here integrity is most closely tied with the ethics of duty paradigm and is the one virtue that requires the public accountant to act in accordance with what is right and just. Integrity consists of those virtues which dispose one to right action consistent with one's role(s) in society and includes the virtues of conscientiousness described in Wallace (1978, pp. 90–127).

In simple terms, the integral public accountant will have the intent to do the "right and just action without regard to personal gain and advantage" (Doucet & Ruland, 1994, p. 7). The integral person is a discerning and steadfast individual who openly acts on his/her understanding of right and wrong (Carter, pp. 7, 9, 20, & 27). The AICPA *Code* implies that integrity is a character trait that would lead the accountant to observe the spirit of ethical and technical pronouncements

rather than to blindly follow the form of such pronouncements (Section 54). Thus, integrity is necessary for fulfilling the role of the public accountant. Although integrity, as Solomon states, cannot guarantee success, there clearly can be no success without it (1993, p. 174).

These three virtues are necessary for professional accountants to fulfill their role in society, with perhaps integrity being an overriding virtue. Without the ability to discern what is right and what is wrong and to follow through with actions consistent with what is right, public accountants cannot fulfill their societal role. Public accountants must not only know their role and the resulting duties, but must be individuals who have the virtues to fulfill that role.

Specific Implications for Accounting Firms

The implications of this analysis for accounting firms are problematic. While accounting firms are made up of individuals, there is much controversy about applying concepts of morality to organizations. The relation between the morality of the firm and the virtues of individual firm members begs exploration. The AICPA *Code*, as well as other codes of the profession, pays very little attention to the role that individual professionals play in an organization (although the ICAO *Code* explicitly recognizes that professional corporations must also comply with the bylaws, rules, and regulations of professional conduct (Section 100)). In fact, one might argue that virtuous individuals, who act in certain ways because of their moral character and who recognize their role in an organization in the broader context of the practice in which they are engaged, might be opposed to the group-think and conformity that many believe to be the essence of the majority of corporations and public accounting firms.

Certainly, as Solomon (1993, p. 146) discusses in *Ethics and Excellence*, corporations are indeed communities within the broader community and as such are guided by moral principles and rules. Thus, corporations for our purposes can be viewed as moral or immoral entities.⁹ However, virtues are personal characteristics and cannot be directly applied to organizations as a whole.

Obviously, individuals within the firm must at least possess the specific virtues delineated in the previous section in order for the public accounting firm to maintain its focus as a moral professional organization. Public accounting firms cannot possess the virtues as such. In addition, public accounting firms are institutions that are "characteristically and necessarily concerned with external goods" (MacIntyre, 1984, p. 194). MacIntyre asserts in order for practices to survive, they must be sustained by institutions (1984, p. 194). And yet, it is necessary for those who participate in a practice to possess certain virtues in order to resist

the corrupting power of these institutions that are concerned with external goods. Ironically, the virtues also sustain these institutions. Thus, in order to survive these institutions, in our case public accounting firms, necessarily must encourage virtuous practice, and hence a concern for internal goods, not just the appearance of virtues.

In addition to other responsibilities within society, the accounting firm must ensure its professionals perform their duties as public accountants. The accounting firm cannot escape responsibility when its employees fail to fulfill their societal role that enables public accounting firms to operate as professional organizations. Thus, accounting firms have to be ever vigilant to maintain the highest professional and ethical standards.

Aristotle posits that virtues of character arise from habituation and that intellectual virtues (such as wisdom and judgment) arise mostly from teaching (1985 translation, p. 33). Public accounting firms, therefore, must provide an environment that encourages their employees to gain both intellectual and character virtues. The reward structure of the firm must be designed in such a way that acting in accordance with the virtues of the practice of public accounting are rewarded, while at the same time educating employees about the underlying virtues and the right reason for action. Recognize that at first employees may be motivated by the rewards (external goods), but eventually, the environment in the firm should lead to motivation based on the internal goods of the practice of public accounting.

Ethics training in the form of workshops, seminars, and the like certainly will lay the foundation for organizational ethical growth. However, public accounting firms must provide the environment to ensure that employees “walk the talk.” The development of moral character involves much more than training individuals to comprehend and follow the rules in an organizational code of conduct or even a professional code of conduct. An organization must be willing to provide an environment where employees are encouraged to critically evaluate day-to-day practice norms, especially if these norms are not consistent with the organization’s corporate values. It must be an environment where management listens to and respects employee challenges to these practice norms and changes them if they are not consistent with the organization’s ethical corporate values. Successful translation of ethical training into practice requires the right environment, an environment where ethical behavior is encouraged and rewarded. This is an environment where everyone walks the talk.

A source of guidance for creating such an environment can be found in the Society of Management Accountants of Canada’s (CMA, 1998) Management Accounting Guideline 46. This guideline enumerates the following specific actions that organizations can take to create a values-based organization (paraphrased, p. 25):

- define the organization's values;
- communicate the organization's values;
- create systems that support corporate values;
- establish an ethics or corporate values function;
- ensure supervision of corporate values;
- assign responsibility for interpreting values;
- recruit and promote people of strong moral character;
- train people in ethical decision making and application of the values;
- encourage employees to report behavior inconsistent with the values;
- reward managerial and employee behavior consistent with the values;
- renew the values; and
- conduct policy and practices reviews.

Further, the guideline states that “. . . establishment of a values-based organization starts at the top” (1998, p. 26). Thus, the leadership of public accounting firms have the responsibility of providing the appropriate environment for the development and growth of both intellectual and character virtues and the CMA provides some guidance to enable the development of values-based public accounting firms.

This means that public accounting firms must continuously reemphasize the protection of the public interest, which is their primary duty given their role in society. This requires public accounting firms to ensure that their professionals not only possess certain key virtues, but are also informed by their role in society.

Specific Implications for Accounting Education

The implications of this analysis for accounting students are essentially the same as those for accounting professionals. Accounting students must begin to recognize the relationship between the rules and duties of their professional role and the characteristics (virtues) that will enable them to carry out their role in an ethical manner. However, the implications for accounting education require that we, as accounting educators, study the various Codes of Conduct (not limited to those for the practice of public accounting), as well as the rich language of our profession found elsewhere to enable us to help students assess the value of possessing certain virtues to perform their roles as accountants. As [Pincoffs \(1986, p. 30\)](#) discusses in *Quandaries and Ethics*, the focus of moral education should be on the instilling of good moral character (virtues).

Those of us who are accounting educators need to help ensure that our profession remains well respected by instilling in our students the need for an ethical orientation and hence, the need for the development of good moral character. The

virtues described as necessary for individual accountants would be a good starting place. The possession of these virtues should help us, as educators, and our students to become rule-conscious, but not rule-bound. One way to do this with the AICPA Code is to move away from a focus primarily on the rules of the *Code* toward a more integrated approach. This integrated approach should include an extensive analysis of the Articles of the *Code* and how they are related to the rules. This way our students will have a better understanding of the social role of the profession and the necessary character virtues of its professionals. In addition, when we teach our students about GAAP rules in our financial accounting classes, we should help them recognize that judgment is necessary to determine appropriate GAAP treatment, particularly on issues of revenue and expense recognition. As individuals, practicing our respective professions, we will exhibit the rule-responsibility described by Pincoffs (1986, p. 29), which will enable us to make ethical decisions even when rules conflict or there is no rule to govern a particular situation.

By evaluating the nature of the various codes of our profession, we can use these codes for a critical analysis of the ethics of our profession. We can ask of our students and ourselves to integrate both an ethics of virtue and an ethics of duty orientation into how we conduct ourselves both professionally and personally. Unlike what appears to be the case in politics, an ethics of virtues orientation requires that our personal and professional ethical orientations be consistent.

CONCLUSIONS

The AICPA *Code*, with brief references to the CGA *Code* and the ICAO *Code*, is used to illustrate that professional codes often contain language of duties and virtues and that these two paradigms are necessary and compatible in defining the profession's norms. These two philosophical paradigms can provide guidance to individual accountants and accounting educators, but the implications for accounting firms are more problematic. Nonetheless, public accounting firms can and must provide an environment that supports the development and growth of both intellectual and character virtues. Accounting practice is influenced by the language and view of its function within our society. If our view is broad enough to include a combined philosophical framework, then real guidance can be provided to practicing accountants and public accounting firms. One such implication is that practicing public accountants and public accounting firms should be informed by the aspirational aspects of their respective codes in making decisions about right actions. This might help public accountants to not fall prey to following the rules of their respective codes without thinking about the implications of such an action. Whenever there is a conflict between the rules and

the principles, public accountants should strongly consider the implications of acting on the rules without consideration of whether following the rules, in the specific instance, will enable them to fulfill their societal role.

This does not mean that we can provide a simple formula for determining what action will best fulfill the public accountant's duty (see [Armstrong, 1990](#) for criticisms of the eight-step method). Thus, the virtues/duties framework does not provide an algorithm that will lead the accountant to the right action every time. Rather, public accounting professionals and educators should view the framework as providing an heuristic from which they can obtain guidance in order to make their decisions consistent with their roles in society.

NOTES

1. Most of the examples and analyses in this paper refer to the AICPA *Code of Professional Conduct* (AICPA Code), with some references to the Institute of Chartered Accountants of Ontario *Rules of Professional Conduct* (ICAO Code) and the CGA-Canada *Code of Ethics and Rules of Professional Conduct* (CGA Code).

2. For ease of exposition, the term ICAO Code rather than ICAO Rules will be used to refer to the ICAO *Rules of Professional Conduct*.

3. St. Thomas Aquinas was a follower of Aristotle's, albeit one who wrote abundantly regarding his interpretations of Aristotle.

4. Hence, these duties are obvious, self-evident duties which are sufficient to raise a presumption of fact unless rebutted by other overriding duties.

5. While we believe that more focus should be placed on the principles of the Code of Conduct, we applaud the AICPA for its August 2001 changes to the Independence Rules. These changes were long overdue. However, it is important to recognize that the language in the rules is legalistic (because the rules must provide the minimum level of performance). The extensive changes to the Definitions provided in the Code are written in very specific language, which may be necessary to provide that minimum level of performance. The virtuous professional will recognize these rules as the floor and will strive to meet the higher ideals of the principles.

6. We assumed here that the virtue of integrity encompasses all of the virtues of conscientiousness and thus, possessing integrity means that the accountant has the intent to do what is right. Additionally, MacIntyre enumerates three virtues as necessary for a practice: justice, courage, and truthfulness. Courage is discussed here, truthfulness is subsumed in the character virtue integrity, and it is assumed that justice is best described within the context of ethical expertise.

7. Carter would argue that since integrity requires discerning what is right, that the person who would attempt to perform their duties without the necessary technical skills is a person who lacks integrity.

8. In the U.S., we live in a society where class does seem to have a great impact. However, that is not the ideal of our society.

9. We recognize that this concept is controversial, to say the least, but do not believe that the controversy affects our analysis.

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REFERENCES

- AICPA (1997). *Code of professional conduct*.
- Aquinas, St. Thomas (1989 Trans. T. McDermott). *Summa theologiae: A concise translation*. Christian Classics.
- Aristotle (1985 Trans. T. Irwin). *Nicomachean ethics*. Hackett Publishing Company.
- Armstrong, M. B. (1990). Professional ethics and accounting education: A critique of the 8-step method. *Business and Professional Ethics Journal* (Spring/Summer), 181–191.
- Carter, S. L. (1996). *Integrity*. HarperPerennial.
- CGA-Canada (1994). *Code of ethics and rules of professional conduct*.
- CMA (1998). Management accounting guideline 46. *Implementing Ethics Strategies within Organizations*. The Society of Management Accountants of Canada.
- Dobson, J., & Armstrong, M. B. (1994). *Application of virtue ethics theory: A lesson from architecture*. Presented at the Ernst & Young Research on Accounting Ethics Symposium.
- Doucet, M. S., & Ruland, R. G. (1994). An exploration of the professional role: Necessary virtues for the public accountant. *A Special Issue: Ethics in Accounting, PIS Newsletter, 19* (April), 7, 10.
- Francis, J. (1990). After virtue? Accounting as a moral and discursive practice. *Accounting, Auditing and Accountability Journal, 3*(3), 5–17.
- Frankel, M. S. (1989). Professional codes: Why, how and with what impact? *Journal of Business Ethics, 8*, 109–115.
- Gaa, J. C. (1994). *The ethical foundations of public accounting*. Research Monograph No. 22, CGA-Canada Research Foundation.
- ICAO (1995). *Rules of professional conduct*.
- Lebacqz, K. (1985). *Professional ethics: Power and paradox*. Nashville: Abingdon Press.
- MacIntyre, A. (1984). *After Virtue*. Notre Dame, Indiana: University of Notre Dame Press.
- McDowell, J. (1979). Virtue and reason. *Monist, 62*, 331–350.
- Mintz, S. (1992). *Cases in accounting ethics and professionalism* (2nd ed.). New York, NY: McGraw-Hill.
- Mintz, S. (1995). Virtues and ethics in accounting education. *Issues in Accounting Education, 10*(2), 247–267.
- Narveson, J., & Hahn, C. (1995). *Foundations of business ethics*. Monograph of the Centre for Accounting Ethics.
- Olazabal, A., & Almers, E. (2001). Independence and public perception: Why we need to care. *Journal of Accountancy* (April).
- Pincoffs, E. L. (1986). *Quandaries and virtues: Against reductivism in ethics*. University Press of Kansas.
- Preston, A. M., Cooper, D. J., Scarbrough, D. P., & Chilton, R. C. (1995). Changes in the code of ethics of the U.S. accounting profession, 1917 and 1988: The continual quest for legitimation. *Accounting Organizations and Society, 20*(6), 507–546.
- Ross, W. D. (1965). *The right and the good*. London: Oxford University Press.

- Solomon, R. C. (1993). *Ethics and excellence: Cooperation and integrity in business*. Oxford: The Ruffia Series in Business Ethics.
- Thorne, L. (1998). The role of virtue in auditors' ethical decision making: An integration of cognitive-developmental and virtue-ethics perspectives. *Research on Accounting Ethics*, 4.
- Trianosky, G. (1990, October). What is virtue ethics all about? *American Philosophical Quarterly*, 27(4), 335–344.
- Wallace, J. D. (1978). *Virtues and vices*. Ithaca and London: Cornell University Press.

TRUST AS A THREAT TO INDEPENDENCE: EMOTIONAL TRUST, AUDITOR-CLIENT INTERDEPENDENCE, AND THEIR IMPACT ON PROFESSIONAL SKEPTICISM

Michael K. Shaub

ABSTRACT

Since auditors do not test every transaction, they must choose when to trust their clients. The Independence Standards Board, however, has identified inappropriate trust as one of the five biggest threats to auditor independence (Independence Standards Board, 2000a). This raises the question as to what type of trust relationships auditors should maintain with their clients so as not to jeopardize their independence or their ability to protect the public interest. Two parallel threats to auditor independence, emotional trust and deep auditor-client interdependence, are identified and explained. A model to explain how auditors may find themselves in these troublesome trust relationships is proposed. The paper offers suggestions for slowing the auditor's movement from rational trust to emotional trust and avoiding deep auditor-client interdependence, and discusses a preliminary

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measure of auditor independence. The paper concludes by integrating the theories into a conceptual model of auditors' trust, independence and professional skepticism.

INTRODUCTION

Trust is of increasing importance as a construct in the marketplace because of the breadth of parties who are directly vulnerable to material misrepresentation by corporations in their financial statements. With the increasing popularity of on-line brokerages and mutual funds has come a significant influx of people whose wealth is tied to corporations' success. Where there is greater vulnerability, there is greater need to either trust or audit.

The ability of shareholders and investors to gather information about companies' economic transactions is limited by the information asymmetry between management and shareholders. Management may have motives for hiding information about the company's financial condition from its owners and from other potential investors in the market (Jensen & Meckling, 1976). To reduce this information asymmetry and to monitor management's performance, owners hire auditors to provide an assessment of the fairness of the financial statement presentation.

Trust has also received increasing attention in the accounting profession, particularly from the Independence Standards Board, that sees inappropriate or excessive trust as one of the primary risks to an auditor's independence (Independence Standards Board, 2000a). Employing auditors to conduct an audit reduces the need for shareholders to trust management, at least theoretically. However, the auditors are forced to trust the management at some level, since they cannot audit all transactions. Auditors exhibiting greater trust will generally test less and confront the client less frequently (Shaub, 1996; Shaub & Lawrence, 1996).

While trust is necessary in the audit, the type of trust demonstrated may be very important. Organizational science researchers have identified both cognition-based and affect-based trust as being important in differing contexts (Mayer et al., 1995; McAllister, 1995). In this paper, these will be referred to as "rational trust" and "emotional trust," respectively. This trust may directly affect the level of independence maintained by the auditor.

This paper describes theories that outline two parallel and interrelated threats to auditor independence: the potential for the auditor to move from shallow dependence to deep interdependence with the client, and the simultaneous movement from rational trust to emotional trust in the auditor-client relationship. These theories explain the fundamental characteristics of auditor-client dependence and interdependence, describing the concepts of rational trust and emotional trust, and

exploring how auditors at either end of the rational-emotional trust continuum might respond to clients and to fulfilling their public interest responsibility. The paper also examines the factors that might move an auditor along the continuum from rational trust to emotional trust and includes a discussion of actions the auditor can take to maintain the appropriate levels of trust and of auditor-client interdependence. After proposing a potential measure of auditor independence, a conceptual model of auditors' trust, independence and professional skepticism is offered as a basis for future research.

TRUST AND INDEPENDENCE

In recent years, trust and professional skepticism have been the focus of attention within the accounting profession during the debate over structuring standards for auditor independence. The Independence Standards Board (ISB) focused on trust as one of the five major threats to auditor independence, along with self-interest, reviewing one's own work, advocacy for clients, and intimidation by clients and others (ISB, 2000a). The ISB defines threats to auditor independence as

...sources of potential bias that may compromise, or may reasonably be expected to compromise, an auditor's ability to make unbiased audit decisions (ISB, 2000a, para. 11).

The ISB recognizes that auditors cannot be free from all independence-related pressures, but calls on auditors to identify the threats to auditor independence and to determine their effects on the audit.

Familiarity threats or trust threats are defined by the ISB as

... threats that arise from auditors being influenced by a close relationship with an auditee. Such a threat is present if auditors are not sufficiently skeptical of an auditee's assertions and, as a result, too readily accept an auditee's viewpoint because of their familiarity with or trust in the auditee. For example, a familiarity [or trust] threat may arise when an auditor has a particularly close or long-standing personal or professional relationship with an auditee (ISB, 2000a, para. 12d, bracket added).

These trust threats are not always evident to the auditor or to outsiders. Yet evidence exists that these relationships may influence auditors' professional skepticism (Shaub & Lawrence, 1996).

Trust and professional skepticism are also the focus of the ISB's recent statement governing the employment of auditors with audit clients after leaving the accounting firm. Two of the four identified threats to the independence of the audit firm are explicitly related to professional skepticism. First, the auditors may not be skeptical enough of a departing partner, and may be reluctant to challenge the former partner about accruals or accounting methods because of their respect

or friendship. In addition, the ISB expresses concern that the departing partner or staff member may not exercise adequate professional skepticism while conducting audit testing before departure (ISB, 2000b, para. 7).

Trust and Interdependence

Sheppard and Sherman (1998) identified four “distinct and ordered” forms of trust: shallow dependence, shallow interdependence, deep dependence, and deep interdependence based on Fiske’s (1990) work in sociology. Shallow dependence implies that one party’s outcomes are contingent on another’s acts. In the case of shallow interdependence, which increases with the intimacy of the relationship, coordination of behavior is required for goal achievement. Deep dependence by one party in the relationship comes when monitoring is difficult – the typical relationship between shareholders and management. It may also exist when one party controls another’s fate, including boss-subordinate relationships or supply chain relationships where one party is dominant. Deep interdependence is evidenced by parties turning over entire processes to one another with the anticipation that they will be completed. The central risk in deep interdependence is that one party will misanticipate the other’s needs.

Because shareholders are deeply dependent on management, they are subject to the risk that management will provide them with misleading information. Shareholders and other financial statement users must be able to depend on auditors to have a different sort of trust relationship with management. This relationship will need to be either a shallow dependence or a shallow interdependence auditor-client relationship to insure that auditors maintain the necessary objectivity and protect the interests of financial statement users.

Fiske (1990, p. 184) calls this shallow dependence a “market pricing” relationship based on an exchange of services for compensation. This relationship is best characterized by the individual, anonymous transactions that take place every day in the marketplace.

However, auditor-client relationships seem to be better characterized as shallow interdependencies, what Fiske (1990) would call “equality matching” relationships. Fiske (1990, p. 184) describes shallow interdependencies as being “. . . based on a concrete implementation of egalitarian distributive justice: to each the same.” Turn-taking, equal status relations, and reciprocity in dealings characterize equality matching.

Auditors who are involved in shallow dependence relationships with their clients are still subject to client indiscretions and unreliability. Those involved in shallow interdependence are subject to these risks, as well as to the problems

arising from poor coordination between the auditor and the client (Sheppard & Sherman, 1998).

If auditors allow themselves to become deeply dependent on clients, however, they are subject to the types of abuse of trust found in one-sided relationships. This type of relationship is likely to develop when the individual auditor or the accounting firm believes that the client will determine whether the CPA succeeds or not.

Deep interdependence happens in at least two ways. One way happens when the auditors turn over major parts of the audit to client personnel. This situation is most likely to happen either when the auditor lacks adequate technical training and proficiency or when client personnel are perceived to be extremely competent and efficient. This is a danger addressed by auditing standards regarding reliance on internal auditors' work in connection with the external audit.

The second way an auditor can become involved in deep interdependence with a client is through directly connecting the firm's financial success to the client's. For example, the accounting firm may serve as a major distributor or marketer of the client's software in exchange for commissions received. The accounting firm's economic success is directly linked to the quality and marketability of the software. This economic relation can lead to reduced objectivity on the auditor's part, which is why the AICPA Code of Professional Conduct (AICPA, 2000) requires that auditors disclose these relationships when recommending software to clients.

Both interdependence and dependence arguably are opposite of independence. Trust is explicitly linked to interdependence. If auditors want to maintain the level of independence and objectivity necessary to provide assurance to financial statement users, they must understand the appropriate type of trust relationship they ought to have with their clients.

RATIONAL VS. EMOTIONAL TRUST

The model of the auditor-client trust relationship over time put forth in this paper is one of movement along a continuum from rational trust to emotional trust (see Fig. 1). McAllister (1995) believes that cognition-based (rational) trust is an antecedent of affect-based (emotional) trust. Trust is more than attraction or acceptance; it requires the willingness of the trustor to risk harm by the trustee.

The AICPA's Auditing Standards Board, through its Statements on Quality Control Standards, reinforces the idea that the initial trust relationship is a rational one by requiring that firms demonstrate adequate quality controls in their client acceptance procedures. This requirement does not mean that rational auditors

Rational Trust-----Emotional Trust

Initial acceptance of client	Retention of client
Reliance on client reputation	Reliance on personal experience
No economic connections	Economic connections
No personal relationships	Extensive personal relationships
No history of client trustworthiness	History of client trustworthiness
Shallow dependence/interdependence	Deep dependence/interdependence

Fig. 1. Characteristics of Rational and Emotional Trust.

will not take on a high-risk audit client. However, any firm taking on a high-risk client is expected to enter into a careful risk-return evaluation during the client acceptance process, and is required to conclude that audit risk is acceptably low.

Client retention decisions may not be as careful as client acceptance decisions. This difference may be consistent with movement from rational trust in the initial decision to a more emotional level of trust in the subsequent decisions, after relationships have been established.

Rational trust allows for shallow dependence or shallow interdependence between the auditor and the client. A commitment to a greater level of emotional trust may tend to drive the auditor toward deeper dependence on or deeper interdependence with the client.

CHARACTERISTICS OF RATIONAL TRUST

Rotter (1980) characterizes trust as the generalized expectancy that another's statement can be relied upon. Trust is inherent to the operation of markets. Bigley and Pearce indicate that many organizational scientists "view trust as a mechanism that mitigates against the risk of opportunistic behavior among those engaged in various types of economic transactions" (1998, p. 407). Trust involves some level of vulnerability to another that is necessary for a transaction to take place, and thus it involves a level of risk of harm to the trusting party.

Rational trust is a function of an individual's expectancy model that calculates the likelihood of the other acting in a trustworthy manner. It is based primarily on an evaluation of the other's reliability (McAllister, 1995).

CHARACTERISTICS OF EMOTIONAL TRUST

Emotional trust arises from a continuing relationship over time that may have been initiated as a result of a rational trust calculation. Emotional trust must be nourished

and developed through repeated interactions that reinforce the trust. It is “grounded in reciprocated interpersonal care and concern” (McAllister, 1995, p. 25). In close relationships, Holmes (1991, p. 82) suggests that trust short-circuits the “active appraisal process” and inhibits likelihood calculations about another’s behavior.

The importance of time and repeated interaction in the development of emotional trust parallels the development of deep interdependence. Auditors are susceptible to deep interdependence in long-standing client relationships. According to Sheppard and Sherman (1998, p. 430):

Time, proximity, shared strategizing, shared identity, common incentives, and the negotiation of common values all can lead to the eventual evolution of highly similar internalized views, beliefs, and values. The essential construct in this argument is time. Sufficient trust for deep interdependence can only be built over time (Rempel et al., 1985; Sheppard & Tuchinsky, 1996a, b).

In addition to time, the repeated interaction characteristic of the auditor-client relationship facilitates the development of emotional trust. Auditors at higher levels usually interact with the client throughout the year, and even auditors at lower levels will typically spend time on-site at the client’s offices at least two or three times a year. Many auditors work on the same clients year after year *because* they have established relationships with client personnel. They also understand the business and are likely to be more efficient than auditors unfamiliar with the client. McAllister (1995) finds that frequency of interaction is positively associated with the development of emotional trust.

HOW RATIONAL TRUST BECOMES EMOTIONAL TRUST

Emotional trust is not of itself irrational. Often emotional trust develops out of rational trust because the individual has a series of rational trust expectations met. When another person or organization continually meets one’s trust expectations, it is only natural to develop an affinity for the other as a truth-teller. People will recommend an auto mechanic who repeatedly performs services in a timely manner at a fair price. At first the recommendation is a professional one such as, “I have had good luck leaving my car at that shop.” As time goes by, the recommendation becomes something like, “Joe is a great guy; he always treats me fairly.” People have a natural emotional attachment that goes along with repeated trustworthy behavior.

Rational trust may become emotional trust through increasing economic and emotional connections between the auditor and the client. A long-standing

relationship between a client and a CPA firm usually leads to a series of connections, including client employment of former CPA firm auditors, the CPA firm providing tax and consulting services to the client, personal interactions in social activities outside the business setting, common involvement in charitable causes, and employees of both firms serving together on boards and committees in the community. Increasing familiarity with the client may cause the auditors to form personal bonds with the client and to adopt some of the client’s goals.

IS EMOTIONAL TRUST APPROPRIATE FOR THE AUDITOR?

Emotional trust may follow naturally from rational trust in personal and professional relationships. However, the public interest role entrusted to the auditor argues for restraint on the auditor’s part from adopting a high level of emotional trust with clients.

Shaub and Lawrence’s (2002) taxonomy of professional skepticism classifies auditors according to their tendencies to think and act skeptically (see Fig. 2). Those auditors who think and act skeptically in most audit situations are classified

Tendency to Think Skeptically

		<i>LOW</i>	<i>HIGH</i>
		<i>Tendency to Act Skeptically</i>	<i>H I G H</i>
<i>Tendency to Act Skeptically</i>	<i>L O W</i>	Reluctant Skeptic	Conflicted Skeptic

Fig. 2. A Taxonomy of Auditors’ Professional Skepticism. *Source:* Adapted from Shaub and Lawrence (2002).

as aggressive skeptics. Those auditors who tend not to think or act skeptically regardless of the audit situation are referred to as reluctant skeptics. Those who think skeptically, but fail to act on their skepticism, are classified as conflicted skeptics. Finally, those auditors who think skeptically in appropriate situations and act on that skepticism are considered measured skeptics.

Emotional trust may deaden the auditor's sensitivities to risk in the audit. It may move them from the upper half (measured or aggressive skeptic) to the lower half (reluctant or conflicted skeptic) of the professional skepticism taxonomy. While education and professional training may influence auditors generally to take a similar approach to professional skepticism, situational factors (including emotional trust) might reasonably influence the auditor's willingness to think and act skeptically on a particular client. For example, [Shaub and Lawrence \(1996\)](#) provide evidence that managers and partners are less skeptical of important clients.

Many accounting firms implicitly recognize the dangers of emotional trust in their long-held prohibitions against dating client personnel. Personal relationships with people under audit not only provide the opportunity for information to be passed to another inappropriately, but they may influence the auditor's ability to assess objectively the work of the other person.

RESTRAINING EMOTIONAL TRUST

It may be that management can most easily mislead auditors by encouraging them to make an emotional investment in the success of the company or in the lives of individual members of management. Barry Minkow of ZZZZ Best fame was notorious for involving the spouses of auditors. It was his deliberate intent to get the spouses to see him as "that nice young boy" in an attempt to influence the rationality of the auditor's reasoning ([Association of Certified Fraud Examiners, 1991](#)). If the goal is to undermine auditors' objectivity, then the focus must be on activating affective responses in the auditor. The auditor who is emotionally involved is more easily misled.

[Rotter \(1967\)](#), widely recognized as an expert in the study of trust, believes that trust is a dispositional characteristic that is shaped in the early portions of a person's life. However, as characterized by [Bigley and Pearce \(1998, p. 411\)](#), Rotter also believes that

... as people become more acquainted with specific others, their personal knowledge of those others becomes the primary driver of their thoughts and actions.

If this facet of trust is true, then as auditors become better acquainted with their clients, they become potentially more vulnerable to being deceived.

So where should the auditor be on the continuum between rational trust and emotional trust? One thing seems clear: the closer the auditor moves toward the emotional trust end of the continuum, the more danger exists for the users of the financial statements. The fewer alternative sources of information for the user, the greater the danger is to the user. Unfortunately, users cannot observe the emotional distance between the auditor and the client.

What can be done to create the emotional distance necessary to keep the auditor from wandering too far toward emotional trust and becoming involved in a deep dependence or interdependence relationship with the client? The auditor must first determine the level of dependence or interdependence that is appropriate with the client. Figure 3 presents a classification of auditor-client dependence/interdependence. In this classification, commonality of goals and symmetry of information between parties determine the level of dependence or interdependence.

<p style="text-align: center;">Shallow Dependence</p> <p>Different goals Information asymmetry</p> <p><i>This relationship is typical of the early stages of the auditor-client relationship.</i></p>	<p style="text-align: center;">Deep Dependence</p> <p>Common goals Information asymmetry</p> <p><i>This relationship is dangerous for auditors because they may adopt the client's viewpoint while having information withheld from them by the client.</i></p>
<p style="text-align: center;">Shallow Interdependence</p> <p>Different goals Information symmetry</p> <p><i>This relationship should characterize the mature auditor-client relationship, where the auditor has extensive client knowledge but minimal economic and emotional entanglements.</i></p>	<p style="text-align: center;">Deep Interdependence</p> <p>Common goals Information symmetry</p> <p><i>This relationship is potentially dangerous for the auditor who has become very familiar with the client, but has entered into economic and emotional relationships that can impact the auditor's independence.</i></p>

Fig. 3. Classification of Auditor-Client Dependence/Interdependence.

It was mentioned earlier that the shareholder-management relationship is a deep dependence relationship, characterized by common goals (the corporation's success) and information asymmetry. While moral hazard issues are undeniably present because management may want to enrich itself at the expense of shareholders, in the long run management benefits from the success and wealth creation of the company, as do the shareholders. Shareholders (through the board of directors) hire management with a particular goal in mind, usually profitability. Consistent with agency theory (Jensen & Meckling, 1976), they then induce management's adoption of similar goals through the use of incentives such as stock options, monitoring through auditors, and the punishment of behavior that is inconsistent with shareholder goals.

An auditor auditing a client for the first time is in a shallow dependence relationship. The auditor's primary goal is fair presentation, while the management's primary goal is either profitability or its own enrichment. There is significant initial information asymmetry as the auditor becomes familiar with the client.

Auditors can expect to move from shallow dependence (the upper left quadrant) to shallow interdependence (the lower left quadrant) as they become experienced with the client and reduce information asymmetry. To minimize the risk of issuing the wrong opinion on financial statements, auditors gather extensive evidence to support their conclusions. The auditor must depend on the client to provide much of the evidence, and the client depends on the auditor to provide a timely audit opinion.

Auditors who develop goals in common with management, however, are likely to find themselves moving into a trust relationship that can be characterized as deep interdependence. The willingness of auditors to move from the lower left quadrant to the lower right quadrant is directly related to their emotional and economic commitment to the client. The danger of moving into this quadrant is reflected in the ISB's concern with client employment of auditors (ISB, 2000b) and in the Securities and Exchange Commission's concern with auditors providing consulting services (SEC, 2000), many of which were banned for auditors of public companies by the Sarbanes-Oxley Act of 2002.

The auditors' worst-case scenario is to end up in the upper right quadrant, in a deep dependence relationship where they have adopted management's goals and yet had significant information withheld from them. This is the quadrant which Barry Minkow sought to entice his auditors to occupy. The auditor can slip into this quadrant early in the relationship by simply being co-opted without doing sufficient auditing. But the auditor can also be led into this deep dependence from a deep interdependence by the introduction of information asymmetries later in the relationship.

METHODS OF RESTRAINING AUDITOR-CLIENT DEPENDENCE/INTERDEPENDENCE

While it is important for the auditor to minimize information asymmetry with the client, avoiding deep interdependence or dependence requires a willingness not simply to adopt management's viewpoints and goals. This care can be accomplished in a number of ways, but it requires an intellectual honesty about the potential the auditor has to attach emotionally or economically to the client. Options available to the auditor include auditor rotation, a willingness to confront clients, assignment of auditors with greater skepticism to clients where deep interdependence is a potential problem, becoming less dependent on the client in conducting the audit, adopting a broader definition of second partner review, and adopting a stricter review of auditor-client dependence/interdependence during planning.

Auditor rotation is one potential solution. Familiarity may breed certain efficiencies in conducting the audit and may increase the quality of recommendations made to management. But changing auditors – either from firm to firm or within the firm at the manager and partner level – is potentially helpful in restraining emotional commitment to similar goals.

Becoming comfortable with some level of conflict between management and the auditor may help forestall movement to the emotional trust end of the continuum as well. If auditors are willing to stand up to the client in a contentious situation, to confront clients over issues on occasion, then auditors might experience less emotional commitment to the client.

Measured skeptics and aggressive skeptics (Shaub & Lawrence, 2002) are more likely to be willing to confront the client over disagreements than reluctant skeptics or conflicted skeptics. Auditors' unwillingness to confront clients may reflect a high level of emotional trust, perhaps because of significant familiarity with the client. Auditors may not really trust their clients but instead act like either reluctant or conflicted skeptics. Audit firms can take a strategic move to deliberately assign measured or aggressive skeptics to clients where the likelihood of emotional trust is high. This strategy may require an explicit evaluation of the firm's exposure to excessive emotional trust as part of the planning process. It will also require the firm to evaluate the professional skepticism of individual auditors.

Another step to avoid adopting client goals is to become less dependent on the client. This step can also potentially help reduce information asymmetry. For example, the ability of the auditor to tap into client information to perform analytical procedures at any time during the year without the client's prior approval provides auditors with a practical independence. This "surprise auditing" requires cooperation by the client initially, of course. While it reduces dependence

on the client, it can also provide the client a more efficient and cost-effective audit and reduce audit risk for the auditor.

The second partner review (often called “concurring partner review”) can be valuable in identifying interdependence issues. The second partner is generally able to maintain a greater level of objectivity than the supervising partner on the engagement because there are fewer emotional attachments with client personnel and because the second partner’s success is not directly tied to the success of the client. However, most of the second partner review is done at the completion of the audit. The second partner could be employed as a front-end independence evaluator for the firm because this partner has the rare combination of familiarity and objectivity within the CPA firm. This partner can be used to identify potential problems with acceptance or continuation of a client, to identify independence risks, and could perhaps even be involved in suggesting staff assignments to strengthen independence.

To take this concept a step further, the CPA firm could employ a “skeptical partner review” or “watchdog partner review.” This partner might be particularly adept at maintaining the big picture and keeping in mind what is best for the firm as a whole. This watchdog partner would spend a significant portion of his or her time performing this service on audit engagements, much as a technical partner is used to support other partners’ understanding of accounting and auditing issues.

Finally, the auditing firm can build a formal evaluation of its client dependence/interdependence into the client acceptance and retention process. Profession-wide, this evaluation could be subject to the peer review process so that objective eyes outside the organization can periodically evaluate these types of decisions. This peer review can also facilitate the discussion of auditor-client independence issues with the audit committee as required by the Independence Standards Board (ISB, 1999).

Perhaps the most objective way of accomplishing a formal evaluation of client dependence/interdependence is to develop an independence score for the firm in relation to each of its clients, a score that is evaluated annually based on changes in the relationship over time. Of course, firms might be concerned that this information could be used against them in litigation or in SEC investigations. Nevertheless, an explicit score, even if characterized only categorically within the firm, would allow the accounting firm to be proactive in anticipating vulnerabilities before they become litigation. This score would potentially include evaluations of the five threats to auditor independence identified by the ISB: self-interest, self-review, advocacy for clients, intimidation by clients, and trust or familiarity. [Figure 4](#) provides examples of some of the potential measures that could be included under each of these categories. This list is in no sense exhaustive, but is

Self-interest

- Significance of client
 - Absolute amount of fee
 - Fee as a percentage of office audit fees
- Marketing relationships

Self-review

- % of internal audit work outsourced to accounting firm
- Fees received for accounting services
- Consulting fees
- Number of systems designed for the client by CPA firm consultants
- Actuarial and other valuation services provided to the client

Advocacy for Clients

- Fees for tax services
- Representation before the IRS

Intimidation by Clients

- Client ranking in office and firm-wide
- Former CPA firm partner as CEO, CFO, or in other influential position

Trust or Familiarity

- Number of former CPA firm auditors employed by client
- Length of service
- Close friendship between partner and important client personnel
- Close friendship between manager and important client personnel

Fig. 4. Potential Components of an Auditor Independence Measure Based on Five Threats to Independence Identified by the ISB.

meant to demonstrate the types of questions that the auditors should be asking as they evaluate their own independence.

This tool is linked to the theories discussed in this paper that underlie auditor independence. First, it is explicitly tied to the five threats to independence identified by the ISB. The instrument's objectivity also helps to slow auditors' movement from rational trust to emotional trust, because it forces auditors to step back from personal relationships for a critical annual evaluation. The auditors must confront those areas in which they have become susceptible to adopting management's goals, making them subject to deep dependence on or interdependence with the client (see Fig. 3). The instrument is especially useful if an effective second partner review or a firm-assigned "critical partner review" holds the manager and partner servicing the client accountable. The instrument also mirrors the important constructs included in the conceptual model in the next section of this paper.

This score, along with explicit actions the firm has taken to strengthen its independence, could be discussed with the audit committee as part of the planning

meeting. Buttressing this approach, a committee of audit firm partners and managers could be assigned to assist in client retention decisions by explicitly evaluating trends in the independence scores. This committee could make suggestions that would permit client retention while maintaining independence, such as partner rotation, foregoing certain adjunct services, or assigning a new manager to the job when the audit partner has accepted an important leadership position with the client.

A CONCEPTUAL MODEL OF AUDITORS' TRUST, INDEPENDENCE AND PROFESSIONAL SKEPTICISM

A conceptual model of auditors' trust, independence and professional skepticism that incorporates Sheppard and Sherman's (1998) theory, McAllister's (1995) theory, and the ISB's five threats to auditor independence is offered as a basis for developing testable hypotheses (see Fig. 5). Though other individual dispositional factors may affect professional skepticism (Kee & Knox, 1970; Shaub & Lawrence, 1996), this model focuses on the factors that influence professional skepticism through their effect on auditor independence.

The right side of the model represents the auditor's independence as a positive influence on professional skepticism. Lacking sufficient independence from the client, auditors will find it difficult to have the questioning mind and intellectual honesty characteristic of professional skepticism. Independence, along with other qualities such as curiosity, allows the auditor to exercise sufficient skepticism.

The top five of the six boxes in the middle of the model are the five threats to auditor independence identified by the ISB, all of which are expected to have a negative effect on independence. The relationship between information asymmetry and independence is potentially complex. As depicted in Fig. 3, symmetric information is a characteristic of interdependence. But Fig. 3 also indicates that deep dependence can exist in the presence of information asymmetry. The most straightforward representation is that management's possession of information that is unavailable to the auditor makes the auditor more dependent on the client. Therefore, information asymmetry negatively affects independence, as indicated in Fig. 5.

The three independent variables on the left side of the model might best be viewed as characteristics of the client and of the auditor-client relationship that create the threats to independence. Commonality of goals was pictured in Fig. 3 as leading to deep dependence or deep interdependence, both of which would potentially compromise the auditor's independence. Thus, a direct path

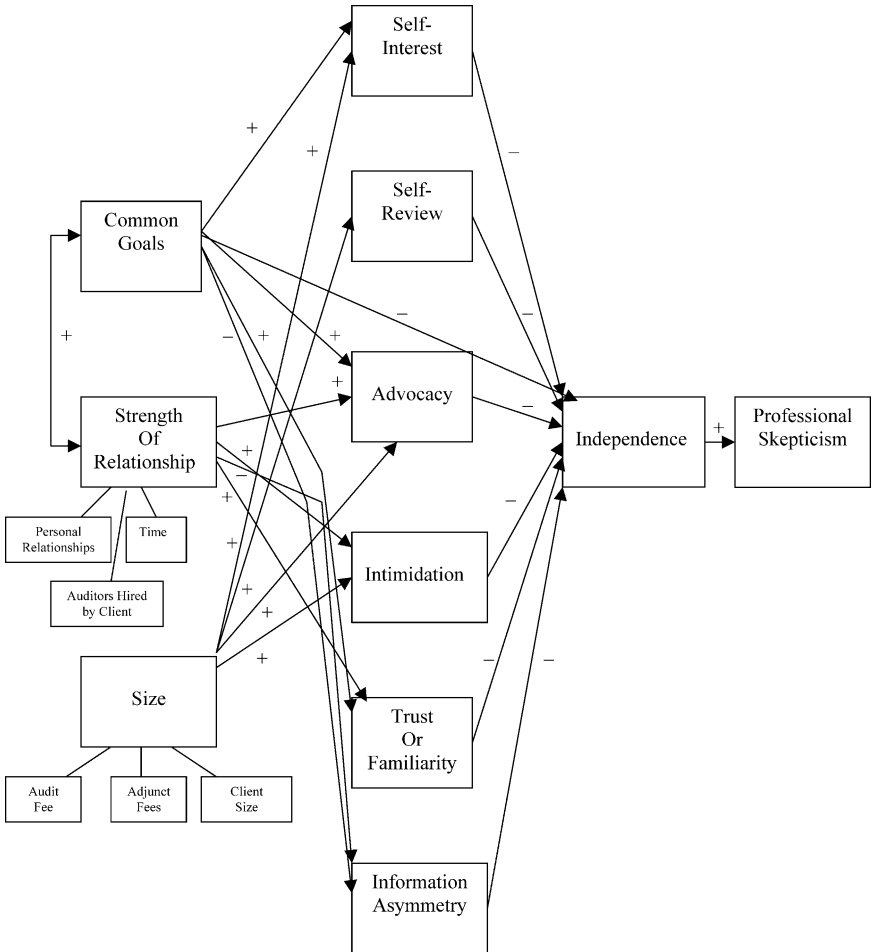


Fig. 5. A Model of Auditors' Trust, Independence and Professional Skepticism.

is included in the model between common goals and independence, just as there is a direct path between information asymmetry and independence. However, the presence of common goals is also expected to be positively associated with the auditor's self-interest, e.g. when the auditor is involved in marketing a client's products. Common goals are also linked to advocacy; when a CPA firm represents its client before the IRS, it holds many goals in common with the client. Hence, the development of common goals will affect the trust relationship

with the client, as those with similar viewpoints tend to trust one another. Finally, common goals are negatively associated with information asymmetry; people with common goals share information to accomplish those goals. In Fig. 3, this sharing is a natural movement over time from shallow dependence to deep interdependence.

The stronger the auditor's relationship with the client, the more likely the auditor is to advocate client positions. Strength of relationship may be correlated with commonality of explicit goals, but it is more a function of the interpersonal relationships developed over time than of formal, contractual relationships. This strength of relationship may be characterized by close ties between the partner and manager and client personnel, or it may result from the client hiring a number of auditors away from the CPA firm. The longer the auditor-client relationship, the stronger it is expected to become. Strength of relationship is linked to intimidation because a former CPA partner employed by the client as a CFO or CEO can potentially intimidate auditors who formerly worked under the partner (ISB, 2000b). Strength of relationship should also be positively associated with trust, and negatively associated with information asymmetry.

Finally, client size, as measured by the audit fee, adjunct fees, and firm size itself, is expected to create several potential threats to independence. The larger and more significant the client, the more the auditors can be expected to protect their self-interest and be reluctant to oppose the client. Auditors usually find themselves involved in self-review when they provide other services for clients such as internal audit outsourcing, systems design, actuarial and valuation services, and other consulting services. These aspects of self-review are more likely to be in place with large clients. The same is true with advocacy; audit firms provide more tax services and are expected to be more likely to advocate client positions for larger clients. Also, larger clients are also expected to be more likely to be able to intimidate the auditor.

LIMITATIONS

This paper is subject to the same limitations of any theoretical paper, in that much of its usefulness lies in its ability to predict behavior in the real world. These explorations lie ahead. Also, the enforceability of standards related to professional skepticism and independence is the function of a political process within the profession and the interaction of the profession with regulators and investors. The accounting profession's formalized definitions of these terms are affected as much by self-interest as by theoretical precision. In addition, the model proposed in this paper only addresses factors influencing professional skepticism

through independence. A number of other factors may potentially influence professional skepticism.

CONCLUSION

Unless auditors are willing to take steps like the ones recommended here to critically evaluate their relationships with clients, they are subject to the possibility that they will enter into relationships with clients characterized by significant reliance on emotional trust, by deep interdependence, and potentially even by deep dependence. These relationships can be potentially harmful to financial statement users, particularly to shareholders and potential investors, and they expose the accounting firm to significant dangers as well.

More extensive disclosure of potentially entangling relationships also serves to hold the auditor more accountable. Besides the ISB's requirement to discuss independence issues with the audit committee, the SEC took this approach to the problem of auditors providing permitted management consulting services to their clients (SEC, 2000). Even so, the disclosures do little to reduce emotional commitment or the adoption of management's goals, and Congress felt obligated to ban many of the services outright in the Sarbanes-Oxley Act of 2002.

This emotional commitment can eventually degrade the auditor's rationality. As McAllister (1995, p. 30) warns:

... as affect-based [emotional] trust matures, the potential for the decoupling of trust forms and for reverse causation (affect-based trust influencing cognition-based trust) increases. Zajonc observed that "once formed, an evaluation is not easily revoked... *Affect often persists after a complete invalidation of its original cognitive basis*" (1980, p. 157). Holmes and Rempel (1989) observed that as affect-based trust develops, key attributions, such as "This colleague genuinely cares about me," become incorporated into a stable and global picture of a partner's motives. In time, *ascribed motives are taken as permanent and left unquestioned, even in the face of disconfirming evidence*. Transgressions are discounted in advance or explained away. Thus, once a high level of affect-based trust has developed, a foundation of cognition-based trust may no longer be needed (bracket and emphases added).

The potential for auditors to abandon rationality in evaluating client trustworthiness increases with the strength of emotional trust and the depth of auditor-client interdependence. As the ISB suggested, auditors must adequately monitor threats to independence. The analysis here suggests that the trust-related threats may be among the most important. Nevertheless, the critical role that independence plays in the capital markets warrants more explicit evaluation of all the factors that influence auditors' independence and of their impact on professional skepticism. The model proposed in this paper provides a vehicle for continuing that exploration.

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REFERENCES

- American Institute of Certified Public Accountants (2000). *Code of professional conduct*. New York: AICPA.
- Association of Certified Fraud Examiners (1991). *Cooking the books: What every accountant should know about fraud*. Videotape.
- Bigley, G. A., & Pearce, J. L. (1998). Straining for shared meaning in organization science: Problems of trust and distrust. *Academy of Management Review*, 23, 405–421.
- Fiske, A. P. (1990). Relativity within Moose (“Mossi”) culture: Four incommensurable models for social relationships. *Ethos*, 18, 180–204.
- Holmes, J. G. (1991). Trust and the appraisal process in close relationships. In: W. H. Jones & D. Perlman (Eds), *Advances in Personal Relationships* (Vol. 2, pp. 57–104). London: Jessica Kingsley.
- Holmes, J. G., & Rempel, J. K. (1989). Trust in close relationships. In: C. Hedrick (Ed.), *Close Relationships* (pp. 187–220). Newbury Park: Sage.
- Independence Standards Board (1999). *Independence standard No. 1: Independence discussions with audit committees*.
- Independence Standards Board (2000a). *Statement of independence concepts exposure draft: A conceptual framework for auditor independence* (November).
- Independence Standards Board (2000b). *Independence standard No. 3: Employment with audit clients*.
- Jensen, M. C., & Meckling, W. M. (1976). Theory of the firm: Managerial behavior, agency costs, and ownership structure. *Journal of Financial Economics*, 3, 305–360.
- Mayer, R. C., Davis, J. H., & Schoorman, F. D. (1995). An integrative model of organizational trust. *Academy of Management Review*, 20, 709–734.
- McAllister, D. J. (1995). Affect- and cognition-based trust as foundations for interpersonal cooperation in organizations. *Academy of Management Journal*, 38, 24–59.
- Rempel, J. K., Holmes, J. G., & Zanna, M. P. (1985). Trust in close relationships. *Journal of Personality and Social Psychology*, 49, 95–112.
- Rotter, J. B. (1967). A new scale for the measurement of interpersonal trust. *Journal of Personality*, 35, 651–665.
- Rotter, J. B. (1980). Interpersonal trust, trustworthiness, and gullibility. *American Psychologist*, 35, 1–7.

- Securities and Exchange Commission (2000). *Final rule: Revision of the commission's auditor independence requirements*. At <http://www.sec.gov/rules/final/33-7919.htm>.
- Shaub, M. K. (1996). Trust and suspicion: The effects of situational and dispositional factors on auditors' trust of clients. *Behavioral Research in Accounting*, 8, 154-174.
- Shaub, M. K., & Lawrence, J. E. (1996). Ethics, experience, and professional skepticism: A situational analysis. *Behavioral Research in Accounting*, 8(Suppl.), 124-157.
- Shaub, M. K., & Lawrence, J. E. (2002). A taxonomy of auditors' professional skepticism. *Research on Accounting Ethics*, 8, 167-194.
- Sheppard, B. H., & Sherman, D. M. (1998). The grammars of trust: A model and general implications. *Academy of Management Review*, 23, 422-437.
- Sheppard, B. H., & Tuchinsky, M. (1996a). Micro OB and the network organization. In: R. M. Kramer & T. R. Tyler (Eds), *Trust in Organizations: Frontiers of Theory and Research* (pp. 140-165). Newbury Park, CA: Sage.
- Sheppard, B. H., & Tuchinsky, M. (1996b). Interfirm relationships: A grammar of pairs. In: B. M. Staw & L. L. Cummings (Eds), *Research in Organizational Behavior* (Vol. 18, pp. 331-373). Greenwich, CT: JAI Press.
- Zajonc, R. B. (1980). Feelings and thinking: Preferences need no inferences. *American Psychologist*, 35, 151-175.

GENDER DIFFERENCES AND EFFECTS OF PRESSURE FROM SUPERIORS IN TAX COMPLIANCE DECISIONS IN CLASSROOM ETHICS INTERVENTIONS

Hema Rao and Alireza Daneshfar

ABSTRACT

This paper addresses ethics education and evaluates whether classroom use of ethics vignettes affects the viewers' choices of ethical actions, and if such choices are influenced by gender and superior's pressure (SP) factors. It adds to the ethics literature by examining changes in responses following organizational pressure.

Senior accounting students enrolled in financial accounting theory courses viewed the vignettes and discussed the issues as per the procedures suggested in the vignettes. Thereafter, they responded to a questionnaire dealing with deductions of Travel and Entertainment (T&E) expenses from taxable income. A control group that did not see the vignette also responded to the same questionnaire.

MANCOVA analysis indicates that: (a) vignette viewing statistically affects responses; (b) male and female viewers respond to vignette viewing differently; and (c) pressure of a superior adversely affects ethical choices, but the vignette viewing effect remains significant even in the presence of superior's pressure (SP). The findings of this study may be of interest to

educators who incorporate ethical interventions in their courses as well as employers who want to consider it in their recruitment and training measures.

INTRODUCTION

Many accounting practitioners (see [Burton & Sack, 1989](#); [Fess, 1987](#)) and educators have called for more classroom coverage of ethical issues in accounting and other business course curricula ([Armstrong, 1993](#); [Hiltebeitel & Jones, 1992](#)). A variety of ethical reasoning models measure moral development in students ([Wright et al., 1998](#)). Educators have reported on ethical interventions carried out in their classes and their usefulness as a measure of student moral development ([Douglas & Schwartz, 1998](#)), but there is mixed evidence as to the effectiveness of such classroom measures in contributing to ethical development.

[Poneman \(1993\)](#) advocates a better understanding of the psychology of ethical reasoning as a basis for the more effective teaching of ethics in accounting. Many empirical studies report an association between professional school education and moral development.

[Langenderfer and Rockness \(1989\)](#) believe that day-to-day discussions of real-life ethical situations and cases in accounting classes provide students with a framework to resolve ethical dilemmas that they will face as professionals. Chairpersons of accounting departments, who see accounting faculty as effective in setting the stage for the discussion of ethics issues ([Cohen & Pant, 1989](#)), support this opinion.

[Ahadiat and Mackie \(1993\)](#) report that a survey of accounting practitioners reveals concerns about ethical behavior; they suggest a greater emphasis on teaching ethics to college students. [Kulberg \(1988\)](#) of Arthur Andersen suggests that students understand ethics issues more effectively when they are included as a component of core courses. [Zych \(1999\)](#) uses cases for decision-making in a marketing course, and finds that students are able to resolve complex real-life ethical issues in classroom settings.

Our study follows the recommendation of integrating ethical issues into regular class curricula. [Huss and Patterson \(1993\)](#) recommend designing a curriculum to change behavior by presenting ethical issues to students, providing them with appropriate opportunities to analyze ethical dilemmas critically, and helping them to pick appropriate courses of action. [Reiter and Flynn \(1997\)](#) suggest ethical sensitivity, ethical reasoning, ethical conduct, and ethical leadership as valid objectives of business education. [Smith \(1993\)](#) finds textbooks, case problems, videos, novels, and articles all teaching tools to integrate ethics into accounting education.

The contributions of this study to the literature are as follows. We use the ethics vignettes in an accounting theory class in which students are close to graduation and will be entering the workforce soon. Other researchers tend to use auditing classes (e.g. [Cohen & Pant, 1989](#)). Typically, auditing curricula expose students to different discussions of fraud detection and ethical issues. Such a discussion may interfere with the outcome of the research instrument used in the study.

Second, we consider gender differences in responses to ethics questions that are not considered in a majority of accounting studies. Finally and more importantly, we evaluate changes in responses following pressure from superiors. Reaction of students who may find themselves in similar circumstances has not been studied by any of the earlier researchers.

The results of our experiment indicate that viewing a vignette has a significant and positive impact on ethical actions. Female students react more positively to vignette viewing while opting for ethical actions. Situational factors like pressure from a superior have significant and negative effect on the choice of ethical action. However, the positive effect of vignette viewing remains significant even when superior's pressure (SP hereafter) is present in the model. We believe these findings are relevant to both educators and accounting firms making hiring and training decisions.

The remainder of this paper is organized as follows: The next section presents the literature review. Then a section that introduces research hypotheses, followed by a section that discusses methodology. The final section presents the summary and discussion.

LITERATURE REVIEW

The American Accounting Association in the report of The Bedford Committee 1986 recommends a general professional accounting program that would “instill the ethical standards and commitment of a professional. The [American Institute of Certified Public Accountants \(1998\)](#) emphasizes the importance of ethics in education. The heads of the then Big Six (now Big Five) CPA firms state that: “practitioners also must be able to identify ethical issues and apply a value-based reasoning to ethical question” ([AICPA, 1989](#)). The [American Assembly of Collegiate Schools of Business \(1993\)](#) recommends increased emphasis on ethics in course content. [Loeb \(1990\)](#) suggests including discussions of whistle blowing in accounting courses. Suggestions for handling conflicts of interest can be found in the [AICPA's Code of Professional Conduct \(1998\)](#), [Institute of Internal Auditors Code of Ethics \(1988\)](#), [Institute of Management Accountants Standards of Ethical Conduct \(1998\)](#), [Causey \(1988\)](#), and [Courtemanche \(1988\)](#).

To introduce ethical issues in curricula, public accounting firms and accounting institutions like the Institute of Management Accountants provide professors with vignettes and other lecture materials. These deal with ethical issues pertinent to accounting, auditing, taxation, and management services. Other disciplines like medicine use vignettes as instruments to evaluate medical student sensitivity to ethical dilemmas (Hebert et al., 1990; Pellegrino et al., 1985). The use of vignettes helps to standardize the social stimulus across respondents and at the same time makes the decision-making situation more real (Alexander & Becker, 1978).

Integration of vignettes into course material takes up valuable learning time, and some professors cite various curriculum coverage reasons for not addressing ethics issues in their courses (Cohen & Pant, 1989; Loeb, 1988). It certainly makes sense to find out whether classroom use of such material provides students with a better understanding of ethical issues.

To enhance diversity, accounting firms are making major efforts to hire and retain female professionals. An example of such an effort is the Coopers and Lybrand's Strategic Selection Advantage approach (Coopers & Lybrand, 1996). It is appropriate to ask if there are differences in responses of men and women to job-related ethical issues. An awareness of significant differences may allow accounting firms to tailor training methods for employees appropriately. Information on response differences in male and female subjects may alert potential employers to gender disparities and help them tailor their "whistle blowing" standards.

The study by Betz et al. (1989) supports the gender socialization approach used to explore possible connections between gender and one's willingness to engage in actions considered unethical. The male subjects in their study are found to be more willing to engage in actions considered unethical; 50% of the men were prepared to buy stocks on insider information.

Rest (1979, 1986) carried out a significant review of the hundreds of studies in moral development research. Rest reports that sex differences explained less than 0.5% of the variance in the DIT (Defining Issues Test) scores in some of these studies. However, in the studies that found gender differences, females scored higher than males. Bernardi (1997) uses Rest's (1986) DIT scores to measure moral development of male and female managers in auditing firms. He finds higher DIT scores to be associated with gender (women scored higher than men). Elm et al. (2001) find higher levels of moral reasoning among students with higher levels of education.

Giacomino and Akers (1998) find significant gender differences in their study of personal values and value types of female and male accounting and non-accounting students. They suggest that business managers can use these findings for human resource management decisions like recruiting, retention, training, scheduling and organizational change. Some studies indicate positive

results in moral development following interventions (Shaub, 1994); others do not (Davis & Welton, 1991; Poneman, 1993).

Employees in the workplace face a variety of ethical dilemmas and are subjected to pressure from superiors to take less-than-ethical courses of action. Would students react differently to such pressures themselves? Do men and women react differently to such pressures? There are no answers to these questions provided by studies in this area.

HYPOTHESES DEVELOPMENT

The first research hypothesis is used to test the statistical significance of the vignettes and whether responses are significantly different in viewers and non-viewers. Thus, the first hypothesis is developed as follows:

H_a1. Vignettes significantly enhance ethical decision-making.

Gender effect is significant in studies by Miesling and Preble (1985), Kidwell et al. (1987), Betz et al. (1989), and Shaub (1994). Anderson et al. (1984) also find that a demographic factor like gender (a surrogate for socialization) affects subordinates' courses of action. However, McNichols and Zimmerer (1985), Fritzsche (1988) and Buttross (1991) report no significant gender differences. Because of these contradictory results, reassessing the differences is one of our objectives. Thus, the second hypothesis is formulated to test the significance of gender and it is defined as follows:

H_a2. Significantly larger numbers of women make ethical choices.

Work-related pressures sometimes lead subordinates to comply with superiors' orders even if such actions are inconsistent with their personal ethical beliefs. Vitell's (1986) model includes individual and situational variables expected to influence an individual's decision-making process. Buttross (1991) and Lightner (1981) find that more respondents are inclined to take unethical actions following such pressure. Specifically, Lightner (1981) reports that supervisors' requests to underreport hours were significant in explaining underreporting ("eating time") behavior for audit and tax practitioners in public practice, even by those who strongly disapproved of such a practice. Akers and Eaton (1998) examine the current state of "eating" time. Their survey of practicing public accountants at all professional levels indicates that a majority of the respondents believe that underreporting time is unethical. But they did not report all of their chargeable hours in the prior year to: (1) receive better periodic performance evaluations; (2) be viewed as competent by superiors; and (3) receive promotions.

Objectives of business ethics education include developing a capacity to appreciate and withstand business pressure, and understanding organizational and structural factors that affect individual ethical behavior (Reiter & Flynn, 1997). Mihalek, Rich and Smith (1987) report that respondents in their study (CPAs, CMAs and CIAs) indicated that they were actually involved in or witnessed misclassification of expenses that materially altered financial results as a result of pressure from superiors. Loeb (1990) advocates incorporating modules in accounting education to help students cope with such pressure and to use “whistle blowing” to uphold their principles. The third hypothesis tests the efficacy of ethical “understanding” which leads respondents to ethical decisions in spite of such pressures. Therefore, the third hypothesis is defined as the following:

H₃. Pressure from superior adversely affects ethical choices.

METHODOLOGY

Sample Selection

Subjects included in the experiment were senior year accounting students enrolled in an Accounting Theory course at an AACSB-accredited institution. Students in these classes were not required to take any courses in business ethics. They had completed all the required courses for comprehending the technical issues discussed in the various scenarios depicted in the vignettes. Participants were informed of the importance of the issues discussed in the vignettes. Participation was voluntary, and students were assured of anonymity. A second section of the course functioned as the control group, responding to the questionnaire without viewing or discussing the vignettes. After eliminating invalid and incomplete responses, fifty-eight usable questionnaires resulted.¹

Questionnaire Development

A questionnaire that depicts certain tax dilemmas dealing with the deductibility of business travel and entertainment (T&E) expenses is designed for this research. The participants assume the role of tax preparers. All these students have taken the required tax courses (which includes courses that instruct them in personal and corporate tax preparation at the basic levels) since this is their last semester before they graduate. They are expected to be familiar with tax law provisions dealing with T&E expenses from their required tax courses. The instrument for data

Table 1. Tax Scenarios in the Questionnaire.

Nature of Expense	No Pressure	Pressure
Business expense	\$1,000	\$1,000
Business expense	15,000	15,000
Personal expense	1,000	1,000
Personal expense	15,000	15,000

collection for the tax related ethical dilemma is adapted from a version tested for both internal and external validity (Buttross, 1991). The scenarios in the dilemmas are reproduced in Table 1. Compliance with the law is believed to form a floor for ethical behavior.

Questionnaire responses are measured in terms of probabilities ranging from zero to one. A score of zero indicates that the respondent will not take a certain course of action, while a score of one indicates that the respondent will take a certain course of action. The mean score for each response is a summation of all probabilities assigned to each question divided by the number of responses. Summing up the averages for each classification yields the scores for ethical, unethical, and ambiguous variables. Higher scores for ethical choices indicate an ethical course of action, and higher scores for unethical choices indicate unethical actions. Higher scores for ambiguous actions are interpreted to indicate that the respondents would take actions not allowed by professional or personal ethical standards (see Table 3).

Tax preparation was selected because research indicates that pressure is exerted on management accountants (Merz & Groebner, 1982) and CPAs (Finn et al., 1988) to perform unethical acts in income tax transactions. The Institute of Management Accountants and the American Institute of CPAs have codes of conduct for their membership indicating that filing incorrect information with the Internal Revenue Service is very unethical. This points to the general agreement that tax compliance involves ethics, and that tax non-compliance, in the absence of some legal justification, is unethical. Also, Cruz et al. (2000) in their study of Big 5 professional tax practitioners' ethical judgments and behavioral intentions in cases involving client pressure to adopt aggressive reporting positions, find that decision making is most heavily influenced by moral equity² dimension, followed by the contractualism dimension.³

Researchers look at various levels of ethical development. Some studies undertake in-depth analysis of ethical development, and examine the effect of classroom ethical interventions on levels of students' moral reasoning using Rest's (1979) Defining Issues Test scores. Others use vignettes to evaluate ethical dilemmas or provide minimal ethical education to enhance moral development (Jeffrey, 1993).

We adopt the use of vignettes. The ethical situations in the questionnaire are exclusively job-related. [Appendix](#) depicts the case dilemma in detail.

The experiment requires students to watch the vignettes in the classroom and discuss the ethical issues as suggested. They are to formulate their answers as per the six-step approach used to resolve ethical dilemmas as below:

- (1) Obtain and list the relevant facts.
- (2) Name the ethical issues from the facts.
- (3) Identify the individual or individuals affected by the outcome of the dilemma and state how each person or group is affected.
- (4) Specify the alternative actions available to each person who must resolve the dilemma.
- (5) Identify the most likely outcome of each alternative.
- (6) Pick the appropriate action.⁴

Students form informal groups of three or four members to discuss the issues in the vignettes. The instructor writes up each group's discussion and decision to resolve the dilemma on the black board. The whole class participates in deciding which group followed the best procedure and had the optimal solution for the dilemma.

The exposure and discussion are intended to create ethical awareness in the viewers. Immediately after viewing and discussing the ethical dilemmas in the vignette, the students respond to a questionnaire that uses similar ethical situations as those enacted in the vignettes.

Tests for realism of ethics cases: The realism of the scenarios is measured on a seven-point Likert scale. A score of 1 indicates the scenario is not realistic, and a score of 7 indicates that it is very realistic. Ethical content is also evaluated on a similar scale and scored the same way. [Table 2](#) indicates the values for these scores. The senior level accounting students were familiar with the tax issues

Table 2. Statistics for Realism and Ethical Content of Questionnaire.

Situations	Experimental Group		Control Group	
	Mean	Std. Dev.	Mean	Std. Dev.
1 Real	5.500	1.180	5.588	1.635
2 Real	5.833	1.167	5.500	1.674
3 Real	5.542	1.141	5.618	1.101
4 Real	5.167	1.579	5.647	1.300
5 Ethics	5.708	1.398	5.088	1.583
6 Ethics	6.292	0.859	5.824	1.445
7 Ethics	6.083	1.472	5.589	1.579
8 Ethics	6.625	0.824	5.791	1.591

dealt with in the questionnaire since they had already taken the requisite tax courses. The scores show that most respondents considered the four scenarios in the questionnaire realistic and as presenting ethical dilemmas. Although students may not have sufficient experience to make these types of determination, their scores were similar to respondents used by earlier researchers (Buttross, 1991).

Experiment Design

MANCOVA is used to assess the main effects and interactions of the independent variables (vignettes, gender, and boss pressure) on the dependent variables (ethical, unethical, and ambiguous actions). Mean scores on the dependent variables are adjusted for the effects of the covariates (materiality of dollar amount and nature of the T&E expense which are discussed later).

A MANCOVA (between-subjects) compares the population means of the group that viewed the vignette before answering the questionnaire, and the control group that responded to the questionnaire without viewing the vignette. Differences in the Univariate mean values of the two groups of respondents indicate the significance of the vignette for each decision choice. Multivariate-mean differences indicate the overall effect of the vignette on action choices of respondents.

A 2×2 MANCOVA (between-subjects) tests whether vignette viewing affects men and women respondents differently. The independent variables are vignette viewing and respondent gender. Again, Univariate means indicate the effect of gender on individual action choices and Multivariate means show the overall effect of gender on all the actions. A significant interaction between the variables for vignette and gender indicates the differential impact of the vignettes on respondent's gender.

A 2×4 MANCOVA (between-subjects) is used for comparing means of male and female vignette viewers and non-viewers, when they are subjected to pressure from a superior. Univariate means would indicate the effect of such pressure on each action choice of vignette watchers and non-watchers on the basis of their gender. Multivariate means indicate the overall effect of the variable on the four factors. Significant interaction terms among vignette viewing, gender, and SP indicate the mean differences in action choices due to gender, vignette viewing, and SP. The model is depicted in Fig. 1.

Variables Measurement

The three dependent variables are: (1) ethical (X1); (2) unethical (X2); and (3) ambiguous (X3) actions (Nielsen, 1987). The ethical choices are those that conform to current tax law provisions, and the unethical ones are violations. Complying

$$\text{Ethical Actions} = \alpha + \text{Vignette} + \text{Gender} + \text{Superior's Pressure} +$$

(+)	(+)	(-)
Materiality of T&E	+ Nature of T&E	
(-)		(+)

Dependent Variables: X1 = Ethical Action, X2 = Unethical Action, X3 = Ambiguous Action

Independent Variables

- Vignette: 0 = Vignette, 1 = No Vignette
- Gender: 0 = Male, 1 = Female
- Superior's Pressure: 0 = Present, 1 = Absent
- T&E Materiality: 1 = \$1,000, 0 = \$15,000
- T&E Nature: 1 = Personal, 0 = Business

Fig. 1. Model for Predicting Parameter Estimates.

with applicable tax law is considered the lowest threshold for ethical actions. The ambiguous choices are not violations of tax law per se, but rather infractions of personal and/or professional standards (such as client confidentiality), depending on the individual's attitude toward ethical actions and professional affiliations. Table 3 shows the measurement of dependent variables.

The independent variable in the first MANCOVA is the vignette with two levels: (1) viewing (coded as = 0); and (2) no viewing (coded as = 1). The student groups are expected to develop a unique solution to the problem, depending on their knowledge of the tax law and their ethical and personal propensities.

Table 3. Action Choices and Nature of Choices.^a

Classification of Action Choice	Action Choice	Action Sequence
Unethical	A	Deduct the items and sign return
Unethical	B	Deduct the items, but do not sign return
Ambiguous	C	Prepare return, but leave out expense since only preparer will know
Ethical	D	Prepare return, but leave out expense assuming superior's will know
Ethical	E	Discuss the matter with the vice president, and if dissatisfied, the President
Ethical	F	Refuse to prepare or sign tax return
Ambiguous	G	Threaten to notify tax authorities
Ambiguous	H	Notify tax authorities, either secretly or with superior's knowledge
Ethical	I	Quit

Note: Dependent variable names: Ethical X1 Σ (I = Quit, D = Refuse, E = Discuss with boss, F = No Return or signature) \div 4; Unethical X2 Σ (A = Prepare and deduct, B = Deduct, but not sign) \div 2; Ambiguous X3 Σ (C = Prepare, but not deduct, G = Threaten, H = Inform) \div 3.

^aChoices by Nielsen (1987).

Table 4. Independent Variables and Levels.

	Ethical Conditioning (Independent Variable 1)	Gender (Independent Variable 2)		Boss Pressure (Independent Variable 3)	
Level 1	View Vignette	Women	Men	Present	Absent
Level 2	Not View Vignette	Women	Men	Present	Absent

The second 2×2 MANCOVA between-subjects mean difference design includes gender as the second independent variable. Table 4 categorizes the levels for the variables.

The third 2×4 MANCOVA adds pressure from a superior as the third independent variable.

Covariates: Prior studies found that the significance of dollar amount and the nature of the expense could affect the respondent behavior (Hegarty & Sims, 1978). Thus, we control for the effect of these variables as follows: Magnitude of the dollar amounts (\$1,000 or \$15,000) of the T&E expenses highlights the extent of the moral dilemma; that is, smaller dollar values may be more likely to produce unethical actions. The nature of the T&E expenses (either undocumented legitimate business or personal) helps determine when respondents are able to identify the severity of the tax law violation in different scenarios.

ANALYSIS

The assumptions of the model are evaluated using appropriate Multivariate and Univariate tests.⁵ Descriptive statistics for the effect of vignette viewing is presented in Table 5-Panel A. Means for X1 (ethical actions) are higher for vignette viewing ($\mu = 3.367$) than for non-viewers ($\mu = 2.733$). The means for the choice of ambiguous action are also considerably different for vignette viewing ($\mu = 2.398$) vs. for non-vignette viewing ($\mu = 1.325$). However, the means for the choice of unethical action are close ($\mu = 3.758$ for vignette viewing vs. $\mu = 3.729$ for no-vignette viewing).

Effects of Vignette Viewing

MANCOVA Multivariate test results⁶ show that the effect of vignette viewing is significant ($F = 13.030, p < 0.000$). MANCOVA Univariate test results⁷ indicate that the effect of vignette viewing on the choice of ethical action is significant ($F = 13.320, p < 0.000$). These results show that subjects may choose ethical action

Table 5. MANCOVA Results.

Panel A: Descriptive Statistics				
	Video	Mean	Std. Dev.	N
ETHICTACT	0.00	3.3667	1.7230	192
	1.00	2.7332	1.9903	275
	Total	2.9937	1.9088	467
UNETHACT	0.00	3.7578	2.2628	192
	1.00	3.7291	2.3226	275
	Total	3.7409	2.2958	467
AMBIGACT	0.00	2.3978	1.9940	192
	1.00	1.3248	1.8043	275
	Total	1.7659	1.9553	467
Panel B: MANCOVA Test Results				
Effect	F	Sig.		
Intercept				
Pillai's trace	335.743(a)	0.000		
Wilks' lambda	335.743(a)	0.000		
Hotelling's trace	335.743(a)	0.000		
Roy's largest root	335.743(a)	0.000		
IMPOR				
Pillai's trace	4.327(a)	0.005		
Wilks' lambda	4.327(a)	0.005		
Hotelling's trace	4.327(a)	0.005		
Roy's largest root	4.327(a)	0.005		
LEGIT				
Pillai's trace	10.555(a)	0.000		
Wilks' lambda	10.555(a)	0.000		
Hotelling's trace	10.555(a)	0.000		
Roy's largest root	10.555(a)	0.000		
VIDEO				
Pillai's trace	13.030(a)	0.000		
Wilks' lambda	13.030(a)	0.000		
Hotelling's trace	13.030(a)	0.000		
Roy's largest root	13.030(a)	0.000		

Note: Independent Factor: Vignette Viewing⁺, Covariates: Item Significance, Item Legitimacy, Dependent Factor: Ethical Action, Unethical Action, and Ambiguous Action.

Video: 0 = Video, 1 = No Video. ETHICTACT = Ethical Action, UNETHACT = Unethical Action, AMBIGACT = Ambiguous Action.

more often after viewing the vignette, providing support for Hypothesis 1. The test results are controlled for the effect of covariates (significance and legitimacy of T&E expenses). In addition to the evidence supporting Hypothesis 1, we also find that vignette viewing had a significant effect on the choice for ambiguous action ($F = 37.031$, $\rho < 0.000$). However, the mean for ambiguous action is lower than the mean for ethical action ($\mu = 3.367$ for choice of ethical action and vignette viewer vs. $\mu = 2.398$ for choice of ambiguous action and vignette viewers). Also we find that vignette viewing had no significant effect on the choice for unethical action ($F = 0.012$, $\rho < 0.911$).

Effects of Gender

Descriptive statistics for the effect of gender is provided in Table 6-Panel A. Means for the choice of ethical action are 2.853 for females and 3.263 for males. Descriptive statistics also show that means of choice of unethical action for females and males are not considerably different, but the means are noticeably different for choice of ambiguous action and the mean for male is higher ($\mu = 1.493$ for female vs. $\mu = 2.289$ for male).

MANCOVA Multivariate test results show that the effect of gender is multivariately significant ($F = 6.388$, $\rho < 0.000$). However, the MANCOVA Univariate test results presented in Table 6-Panel B show that gender effect is not significant on the choice of ethical action ($F = 2.256$, $\rho < 0.134$). Thus, Hypothesis 2 is not supported. This result is inconsistent with that of studies that find such effect significant (e.g. Akaah, 1989; Betz et al., 1989). However, we find several interesting results based on gender. First, gender is significant on the choice of ambiguous action and such effect is statistically significant ($\mu = 2.289$ for males vs. $\mu = 1.493$ for females). After respondents viewed the vignettes, more male viewers ($\mu = 3.0961$) chose ambiguous actions than females did ($\mu = 1.8989$) and such an effect is significant ($F = 15.290$, $\rho < 0.000$).

Second, the joint effect of vignette and gender (interaction) is significant on the choice of ethical action ($F = 11.964$, $\rho < 0.001$), indicating that females responded to the vignette viewing more positively than males. While the mean for the choice of ethical action remains approximately the same for males who viewed the vignette and who did not, the mean for females improved from 2.473 to 3.513. The estimated parameters for the joint effect of vignette and gender for the case of female and vignette viewers is: 1.310 ($t = 3.535$, $\rho < 0.000$), indicating that vignette viewing may induce females to pick ethical action choices more frequently than male viewers.

Table 6. MANCOVA Results.

Panel A: Descriptive Statistics					
	VIDEO	GENDER	Mean	Std. Dev.	N
ETHICTACT	0.00	0.00	3.1605	1.7185	80
		1.00	3.5139	1.7188	112
		Total	3.3667	1.7230	192
	1.00	0.00	3.3656	2.0552	80
		1.00	2.4738	1.9085	195
		Total	2.7332	1.9903	275
	Total	0.00	3.2631	1.8912	160
		1.00	2.8533	1.9059	307
		Total	2.9937	1.9088	467
	UNETHACT	0.00	0.00	3.4500	2.5453	80
1.00			3.9777	2.0206	112
Total			3.7578	2.2628	192
1.00		0.00	3.8062	2.4294	80
		1.00	3.6974	2.2830	195
		Total	3.7291	2.3226	275
Total		0.00	3.6281	2.4866	160
		1.00	3.7997	2.1917	307
		Total	3.7409	2.2958	467
AMBIGACT		0.00	0.00	3.0961	2.0438	80
	1.00		1.8989	1.8073	112
	Total		2.3978	1.9940	192
	1.00	0.00	1.4831	1.8119	80
		1.00	1.2598	1.8018	195
		Total	1.3248	1.8043	275
	Total	0.00	2.2896	2.0883	160
		1.00	1.4930	1.8271	307
		Total	1.7659	1.9553	467

Panel B: Multivariate

Effect	F	Sig.
Intercept		
Pillai's trace	339.619	0.000
Wilks' lambda	339.619	0.000
Hotelling's trace	339.619	0.000
Roy's largest root	339.619	0.000
IMPOR		
Pillai's trace	4.339	0.005
Wilks' lambda	4.339	0.005

Table 6. (Continued)

Panel B: Multivariate		
Effect	<i>F</i>	Sig.
Hotelling's trace	4.339	0.005
Roy's largest root	4.339	0.005
LEGIT		
Pillai's trace	10.657	0.000
Wilks' lambda	10.657	0.000
Hotelling's trace	10.657	0.000
Roy's largest root	10.657	0.000
VIDEO		
Pillai's trace	12.797	0.000
Wilks' lambda	12.797	0.000
Hotelling's trace	12.797	0.000
Roy's largest root	12.797	0.000
GENDER		
Pillai's trace	5.458	0.001
Wilks' lambda	5.458	0.001
Hotelling's trace	5.458	0.001
Roy's largest root	5.458	0.001
VIDEO × GENDER		
Pillai's trace	12.617	0.000
Wilks' lambda	12.617	0.000
Hotelling's trace	12.617	0.000
Roy's largest root	12.617	0.000

Note: Independent Factor: Vignette Viewing⁺ and Gender⁺⁺, Covariates: Item Significance, Item Legitimacy, Dependent Factor: Ethical Action, Unethical Action, and Ambiguous Action.

⁺Video: 0 = Video, 1 = No Video. ⁺⁺Gender: 0 = Male, 1 = Female. ETHICTACT = Ethical Action, UNETHACT = Unethical Action, AMBIGACT = Ambiguous Action.

Effects of Superior's Pressure (SP) on Respondent Actions

Descriptive statistics for the effect of superior are presented in Table 7-Panel A. The mean for the choice of ethical action in the absence of SP is 3.665. The mean, however, drops to 2.318 when SP is present. The means for the choice of unethical action is 3.275 in the absence of SP, but the mean increases to 4.208 when SP is present. The mean for the choice of ambiguous choices is almost the same either for presence or absence of SP ($\mu = 1.783$ when SP is absent vs. $\mu = 1.748$ when SP is present).

Table 7. MANCOVA Results.

Panel A: Descriptive Statistics								
	GENDER	PRESS	VIDEO	Mean	Std. Dev.	N		
ETHICTACT	0.00	0.00	0.00	2.5085	1.8765	40		
			1.00	2.8250	2.3628	40		
			Total	2.6668	2.1260	80		
		1.00	1.00	0.00	3.8125	1.2605	40	
				1.00	3.9063	1.5408	40	
				Total	3.8594	1.3995	80	
	Total	Total	0.00	3.1605	1.7185	80		
			1.00	3.3656	2.0552	80		
			Total	3.2631	1.8912	160		
		1.00	0.00	0.00	2.7913	1.8259	56	
				1.00	1.7592	1.8486	97	
				Total	2.1369	1.9009	153	
	Total	1.00	0.00	0.00	4.2366	1.2508	56	
				1.00	3.1811	1.6989	98	
				Total	3.5649	1.6284	154	
		Total	0.00	0.00	3.5139	1.7188	112	
				1.00	2.4738	1.9085	195	
				Total	2.8533	1.9059	307	
	Total	0.00	0.00	0.00	2.6734	1.8427	96	
				1.00	2.0704	2.0615	137	
				Total	2.3188	1.9925	233	
		1.00	0.00	0.00	4.0599	1.2658	96	
				1.00	3.3913	1.6818	138	
				Total	3.6656	1.5572	234	
Total	Total	0.00	3.3667	1.7230	192			
		1.00	2.7332	1.9903	275			
		Total	2.9937	1.9088	467			
UNETHACT	0.00	0.00	0.00	3.9750	2.6213	40		
			1.00	4.2125	2.5593	40		
			Total	4.0938	2.5768	80		
		1.00	0.00	0.00	2.9250	2.3846	40	
				1.00	3.4000	2.2509	40	
				Total	3.1625	2.3164	80	
	Total	Total	0.00	3.4500	2.5453	80		
			1.00	3.8062	2.4294	80		
			Total	3.6281	2.4866	160		
	1.00	0.00	0.00	0.00	4.5982	1.8276	56	
				1.00	4.0773	2.2504	97	
				Total	4.2680	2.1144	153	
		1.00	0.00	1.00	0.00	3.3571	2.0287	56
					1.00	3.3214	2.2638	98

Table 7. (Continued)

Panel A: Descriptive Statistics								
	GENDER	PRESS	VIDEO	Mean	Std. Dev.	N		
	Total	Total	Total	3.3344	2.1746	154		
			0.00	3.9777	2.0206	112		
			1.00	3.6974	2.2830	195		
			Total	3.7997	2.1917	307		
		0.00	0.00	0.00	4.3385	2.2023	96	
			1.00	1.00	4.1168	2.3360	137	
			Total	Total	4.2082	2.2796	233	
			1.00	0.00	3.1771	2.1824	96	
		1.00	1.00	1.00	3.3442	2.2522	138	
			Total	Total	3.2756	2.2206	234	
			0.00	0.00	3.7578	2.2628	192	
			1.00	1.00	3.7291	2.3226	275	
	Total	Total	3.7409	2.2958	467			
	AMBIGACT	0.00	0.00	0.00	3.0917	2.1180	40	
				1.00	1.4750	1.6012	40	
				Total	2.2834	2.0352	80	
				1.00	0.00	3.1005	1.9938	40
			1.00	1.00	1.00	1.4913	2.0214	40
				Total	Total	2.2959	2.1530	80
				0.00	0.00	3.0961	2.0438	80
				1.00	1.00	1.4831	1.8119	80
			Total	Total	Total	2.2896	2.0883	160
				0.00	0.00	1.9346	1.8760	56
				1.00	1.00	1.1993	1.6983	97
Total				Total	1.4684	1.7948	153	
1.00		0.00	0.00	1.8632	1.7522	56		
		1.00	1.00	1.3197	1.9056	98		
		Total	Total	1.5173	1.8641	154		
		0.00	0.00	1.8989	1.8073	112		
Total		1.00	1.00	1.2598	1.8018	195		
		Total	Total	1.4930	1.8271	307		
		0.00	0.00	2.4168	2.0513	96		
		1.00	1.00	1.2798	1.6694	137		
Total		Total	Total	1.7482	1.9161	233		
		0.00	0.00	2.3787	1.9456	96		
		1.00	1.00	1.3694	1.9340	138		
		Total	Total	1.7835	1.9976	234		
Total	0.00	0.00	2.3978	1.9940	192			
	1.00	1.00	1.3248	1.8043	275			
	Total	Total	1.7659	1.9553	467			

Table 7. (Continued)

Panel B: MANCOVA Test Result		
Effect	<i>F</i>	Sig.
Intercept		
Pillai's trace	968.164	0.000
Wilks' lambda	968.164	0.000
Hotelling's trace	968.164	0.000
Roy's largest root	968.164	0.000
GENDER		
Pillai's trace	5.292	0.001
Wilks' lambda	5.292	0.001
Hotelling's trace	5.292	0.001
Roy's largest root	5.292	0.001
PRESS		
Pillai's trace	26.470	0.000
Wilks' lambda	26.470	0.000
Hotelling's trace	26.470	0.000
Roy's largest root	26.470	0.000
VIDEO		
Pillai's trace	12.552	0.000
Wilks' lambda	12.552	0.000
Hotelling's trace	12.552	0.000
Roy's largest root	12.552	0.000
GENDER × PRESS		
Pillai's trace	0.194	0.900
Wilks' lambda	0.194	0.900
Hotelling's trace	0.194	0.900
Roy's largest root	0.194	0.900
GENDER × VIDEO		
Pillai's trace	13.621	0.000
Wilks' lambda	13.621	0.000
Hotelling's trace	13.621	0.000
Roy's largest root	13.621	0.000
PRESS × VIDEO		
Pillai's trace	0.295	0.829
Wilks' lambda	0.295	0.829
Hotelling's trace	0.295	0.829
Roy's largest root	0.295	0.829
GENDER × PRESS × VIDEO		
Pillai's trace	0.068	0.977
Wilks' lambda	0.068	0.977

Table 7. (Continued)

Panel B: MANCOVA Test Result

Effect	<i>F</i>	Sig.
Hotelling's trace	0.068	0.977
Roy's largest root	0.068	0.977

Note: Independent Factor: Vignette Viewing⁺, Gender⁺⁺, Boss Pressure⁺⁺⁺, Covariates: Item Significance, Item Legitimacy, Dependent Factor: Ethical Action, Unethical Action, and Ambiguous Action.

⁺Video: 0 = Video, 1 = No Video. ⁺⁺Gender: 0 = Male, 1 = Female. ⁺⁺⁺Boss Pressure: 0 = Present, 1 = Absent. ETHICTACT = Ethical Action, UNETHACT = Unethical Action, AMBIGACT = Ambiguous Action.

MANCOVA Multivariate test results show that the effect of SP is multivariately significant ($F = 31.878$, $\rho < 0.000$). MANCOVA Univariate test results⁸ show that the SP is statistically significant on the choice of ethical action ($F = 60.934$, $\rho < 0.000$). This result supports Hypotheses 3.

Other findings of Univariate tests include the evidence of positive and significant effect of SP on the choice of unethical action ($F = 19.989$, $\rho < 0.000$). However, SP is not effective on the choice of ambiguous action. Estimation parameters for the effect of SP on the choice of ethical action show that the coefficient for SP on the choice of ethical action is: -1.424 ($t = -5.837$, $\rho < 0.000$)⁹, indicating the magnitude of the significant negative effect of SP on ethical action choices. The coefficient for the effect of SP on the choice of unethical action is 0.757 ($t = 2.420$, $\rho < 0.016$)¹⁰.

Other interesting results include the joint effects of the variables in the model. The joint effect of vignette and SP is not statistically significant on any of the choices of actions. In addition, Table 7-Panel B shows that vignette effect remains significant on the choice of ethical action ($F = 6.271$, $\rho < 0.013$) even when SP is present in the model. These results indicate that vignette viewing is still effective even with the existence of SP. The joint effect of gender and SP is insignificant for all three choices of actions, indicating that SP affects both genders the same way. The three-way interaction of vignette viewing, gender and SP is insignificant, indicating that their joint effect has no impact on the choices of actions.

Analysis of Covariates

Covariates in all three models presented in Tables 5, 6 and 7 are: Materiality (dollar value of T&E expenses – MT&E hereafter) and Nature of the T&E expense

(NT&E hereafter). The effect of MT&E on the choice of ethical action is significant in all three models ($p < 0.100$), indicating a mild effect of MT&E on the choice of ethical action. MT&E, however, is significant in all three models ($p < 0.050$) on unethical action, but is not significant on the choice of ambiguous action. Coefficient analysis shows that the coefficient for the MT&E variable in the case of ethical action is negative ($-0.318, t = -1.837$) indicating that subjects will choose ethical action when the item is considered significant (larger dollar value), and tend to ignore choosing ethical action when the item is considered less significant (smaller dollar value).

The effect of NT&E is significant on the choice of ethical and unethical actions in all three models presented in Tables 5, 6 and 7 ($p < 0.000$), indicating that subjects consider the NT&E in their decisions. The effect of NT&E is significant on the choice of ambiguous action ($p < 0.050$) in all three models. The coefficient analysis indicates that the coefficient for NT&E in the case of ethical action is: $0.648 (t = 3.743)$ indicating that more subjects choose ethical action when the T&E expenses are personal in nature¹¹.

CONCLUSIONS

Outcomes of the analysis indicate that the vignettes have a positive and significant effect on the choice of ethical actions. The effect of vignette viewing continues even when SP is present. Thus, training is effective to enhance accountants' ethics. Also, classroom time devoted to the vignettes may be time well spent for sensitizing accounting students bound for accounting careers where they may face similar ethical problems in their jobs. From time to time, employers must reinforce the effects of ethical awareness, since the duration of this type of exposure to ethical awareness is admittedly short.

The effect of gender was not significant on the choice of ethical or unethical actions. However, test results show that vignette viewing influences more females to choose ethical action. SP is found to have a significant and negative effect on the choice of ethical and unethical actions. The effect of vignette viewing remains even when SP is present. Test results also show that SP negatively affects both genders. These findings suggest that legal or other institutional measures should protect individuals who choose ethical actions against the superior's suggested choices. Effective protection against retribution from superiors may elicit acceptable ethical behavior from a firm's employees. Organizations interested in promoting ethical action must think of means to protect individuals from superiors' recriminations. They can institute appropriate "whistle blowing"

safeguards to protect people doing the right thing from those in positions of authority who may be micromanaging profit outcomes.

In conclusion, it appears that vignettes that dramatize ethical dilemmas are useful in creating an awareness of a methodology to resolve ethical issues. Although researchers acknowledge the limitations of creating a perception vs. permanently changing ethical values, even creating this awareness in students is an acceptable goal, who may otherwise be entering the profession without any exposure to ethical issues. Women employees may respond to ethical training more positively. Accounting firms may be able to take advantage of these findings in their recruitment and training efforts. For example, to withstand pressure from superiors, women employees may be provided with additional training in being more assertive.

By using vignettes in classes faculty may be creating an awareness of ethical issues in decision-making. However, this type of awareness may be short lived and employers may have to be reinforcing ethical values with periodic additional training.

LIMITATIONS OF THE STUDY

The sample of students used in the research comes from one institution. The results may not represent students from other institutions. The questionnaire was administered during class time and participation was 100%. A very small number of students, who were absent from class on that day, did not have a chance to respond. No attempts were made to administer the questionnaires to them later. This may bias the results albeit infinitesimally. Scenarios used are artificial, and responses are best subject's reported behavioral tendencies and may not coincide with behavior in actual situations.

This research continues the quest to answer how an individual's understanding and judgments about a particular ethical situation relate to his or her actions. The search for advances in the understanding of moral action will be accompanied by a focus on the processes used by decision makers in identifying, constructing and implementing of actions within specific situations.

We share McNeel's (1994) assumption that moral development is desirable and must be a natural outcome of higher education. Penn (1990) presented some gains in student's DIT scores by using course interventions in the form of dilemma discussions in the classroom. Thoma (1994) states, "Thus, only by broadening the focus of research on moral development will moral actions be more fully understood." This study contributes to the existing literature in the development of this understanding.

FUTURE RESEARCH

Groups of students of other geographic locations may be tested using similar media. Ethical dilemmas in other situations besides tax related ones could also be used. If the difficulty of finding data can be overcome, a longitudinal study may enhance generalizing research findings. Use of internally valid cases allows the researcher to manipulate variables of interest but may compromise external validity. The construction of a theoretical model may use other variables not included in this study (for example, age, race, types of institution, etc.)

NOTES

1. The Experiment group has 10 women and 14 men. The control group has 10 women and 24 men. In a $2 \times 2 \times 2$ factorial design there are 80 women observations (10 women \times 8 repetitions for each scenario) in each section and 112 men observations (14 men \times 8 repetitions) in the experimental group and 195 men observations (24 men \times 8 repetitions) in the control group.

2. Moral equity is based on overall concept of fairness and justice and has been very influential in contemporary moral thought.

3. Contralualism deals with the universal principles of right and wrong by judging the morality of an action against individual duties, unwritten contracts, and/or unwritten obligations.

4. Alvin A. Arens et al. *Auditing and Assurance Services – An Integrated Approach*, 9th Edition, Prentice Hal: Upper Saddle River, New Jersey.

5. Tests are for the following assumptions:

- (a) Box M plots and univariate Cochran tests for equality of covariance matrices of dependent variables across groups indicates do not indicate serious violations of this assumption.
- (b) The Bartlett test of sphericity is significant at the 0.001 level, indicating that the assumption of random samples from different populations is independent is met.
- (c) Multivariate normality is tested by analyzing normality plots and Stem and Leaf plots for each variable. These tests indicate that the variables are normally distributed in the sample.
- (d) Existence of outliers (univariate and multivariate) is tested using Z-scores and procedures explained in *Tabachnik and Fidell (1996, pp. 105–106)*. No outliers were detected.
- (e) Multicoliniarity effect is tested using Pearson correlation and factor analysis by producing Eigen values as explained in *Tabachnik and Fidell (1996, p. 104)*. No multicoliniarity effect was found.

6. Test results are not shown.

7. The problem of unequal cell counts is dealt by using SPSS “UNIQUE” method of analysis as suggested by *Tabachnik and Fidell (1996)*.

8. Test results are not presented.

9. Test results are not presented.
10. Test results are not presented.
11. Test results are not presented.

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REFERENCES

- Ahadiat, N., & Mackie, J. J. (1993). Ethics education in accounting: An investigation of the importance of ethics as a factor in the recruiting decisions of public accounting firms. *Journal of Accounting Education, 11*, 243–257.
- Akaah, I. P. (1989). Differences in research ethics judgments between male and female marketing professionals. *Journal of Business Ethics, 8*, 375–381.
- Akers, M. D., & Eaton, T. V. (1998). Underreporting chargeable time: A continuing problem for public accounting firms. *The Journal of Applied Business Research, 15*(1), 13–20.
- American Accounting Association (1986). Committee on the future structure, content and scope of accounting education (The Bedford Committee). *Issues in Accounting Education* (Spring), 168–195.
- American Assembly of Collegiate Schools of Business (1993). *Achieving quality and continuous improvement through self-evaluation and peer review: Standards for business and accounting accreditation*. St. Louis, MO: AACSB.
- American Institute of Certified Public Accountants (1989). *Perspectives on education: Capabilities for success in the accounting profession*. New York: AICPA.
- American Institute of Certified Public Accountants (1998). *Code of professional conduct*. New York: AICPA.
- Armstrong, M. B. (1993). *Ethics and professionalism for CPAs*. Cincinnati, OH: Southwestern.
- Betz, M., O'Connell, L., & Shepard, J. M. (1989). Gender differences in proclivity for unethical behavior. *Journal of Business Ethics, 8*, 321–324.
- Burton, J. C., & Sack, R. J. (1989). Editorial: Ethics and professionalism in accounting education. *Accounting Horizons* (December), 114–116.
- Buttross, T. E. (1991). *The effect of selected personality and situational variables on the ethical judgments of management accountants in federal income tax compliance*. Unpublished doctoral dissertation. Oxford, MS: University of Mississippi.
- Causey, D. Y. Jr. (1988). The CPA's guide to whistle blowing. *The CPA Journal* (August), 26–37.
- Cohen, J. R., & Pant, L. W. (1989). Accounting educators' perceptions of ethics in curriculum. *Issues in Accounting Education, 1*(Spring), 70–81.
- Courtemanche, G. (1988). The ethics of whistle blowing. *Internal Auditor* (February), 36–41.
- Cruz, A. C., Shafer, W. A., & Strawser, J. R. (2000). A multidimensional analysis of tax practitioner's ethical judgments. *Journal of Business Ethics, 24*(April), 223–224.

- Davis, J. R., & Welton, R. E. (1991). Professional ethics: Business student perceptions. *Journal of Business Ethics, 10*, 451–463.
- Douglas, P. C., & Schwartz, W. N. (1998). A longitudinal study of the effect of teaching ethics throughout the accounting curriculum. In: L. A. Poneman (Ed.), *Research on Accounting Ethics*. London: JAI Press.
- Elm, R. D. R., Kennedy, E. J., & Lawton, L. (2001). Determinants of moral reasoning: Sex role orientation, gender and academic factors. *Business and Society, 40*(3) (September), 241–266.
- Fess, R. C. (1987). This in accounting: Can it taught? *Outlook* (Summer), 60.
- Fritzsche, D. (1988). An Examination of marketing ethics: Role of decision maker, consequences of the decision, management position, and sex of the respondent. *Journal of Macromarketing* (Fall), 29–39.
- Giacomino, D. E., & Akers, M. D. (1998). An examination of the differences between personal values and value types of female and male accounting and non-accounting majors. *Issues in Accounting Education, 13*(3), 565–584.
- Hebert, P., Meslin, E. M., Dunn, E. V., Byrne, N., & Reid, S. R. (1990). Evaluating ethical sensitivity in medical students: Using vignettes as an instrument. *Journal of Medical Ethics, 16*, 141–145.
- Hegarty, W. E., & Sims, H. P., Jr. (1978). Some determinants of unethical behavior: An experiment. *Journal of Applied Psychology, 63*, 451–457.
- Huss, H. F., & Patterson, D. M. (1993). Ethics in accounting: Values education without indoctrination. *Journal of Business Ethics, 12*, 235–243.
- Institute of Internal Auditors (1988). *Code of ethics*. Florida: IIA.
- Institute of Management Accountants (1998). *Standards of ethical conduct*. New Jersey: IMA.
- Jeffrey C. (1993). Ethical development of accounting students, business students, and liberal arts students. *Issues in Accounting Education* (Spring), 86–96.
- Kidwell, J. M., Stevens, R. E., & Bethke, A. L. (1987). Differences in ethical perceptions between male and female managers: Myth or reality? *Journal of Business Ethics, 6*, 489–493.
- Kulberg, D. (1988). Business ethics: Pace provides lessons from 'real life'. *Management Review, 77*(8), 54–55.
- Langenderfer, Q. H., & Rockness, J. W. (1989). Integrating ethics into the accounting curriculum: Issues problems, and solutions. *Issues in Accounting Education* (Spring), 58–69.
- Lightner, S. M. (1981). An examination of underreporting of hours by auditors in public accounting firms. *The Ohio CPA Journal, 40*(Summer), 97–100.
- Loeb, S. E. (1988). Teaching students accounting ethics: Some crucial issues. *Issues in Accounting Education* (Fall), 316–327.
- Loeb, S. E. (1990). Whistle blowing and accounting education. *Issues in Accounting Education* (Fall), 5–2, 281–294.
- McNeel, S. P. (1994). College teaching and student moral development. In: J. Rest & D. Narvaez (Eds), *Moral Development in the Professions* (pp. 27–49). Hillsdale, NJ: Lawrence Erlbaum.
- McNichols, C. W., & Zimmerer, T. W. (1985). Situational ethics: An empirical study of differentiators of student attitudes. *Journal of Business Ethics, 4*, 175–180.
- Miesling, P., & Preble, J. F. (1985). Situational ethics: An empirical study of differentiators of student attitudes. *Journal of Business Ethics, 4*, 175–180.
- Mihalek, P. H., Rich, A. J., & Smith, C. S. (1987). Ethics and management accountants. *Management Accounting, 69*(December), 34–36.
- Nielsen, R. P. (1987). What can managers do about unethical management. *Journal of Business Ethics, 6*, 309–320.

- Pellegrino, E. D., Hart, R. J. Jr., Hendersen, S. R., Loeb, S. E., & Edwards, G. (1985). Relevance and utility of courses in medical ethics: A survey of physicians' perceptions. *Journal of American Medical Association* (January), 49–53.
- Penn, W. Y., Jr. (1990). Teaching ethics – A direct approach. *Journal of Moral Education*, 19(2), 124–138.
- Poneman, L. A. (1993). Can ethics be taught in accounting? *Journal of Accounting Education*, 11, 185–209.
- Reiter, S. A., & Flynn, L. (1997). Moral imagination and accounting ethics. *Research on Accounting Ethics*, 5, 217–240.
- Rest, J. R. (1979). *Development in judging moral issues*. Minneapolis: University of Minnesota Press.
- Rest, J. R. (1986). *Manual for defining issues test* (3rd ed.). Minneapolis: University of Minnesota Press.
- Shaub, M. K. (1994). An analysis of the association of traditional demographic variables with the moral reasoning of auditing students and auditors. *Journal of Accounting Education*, 12(Winter), 1–26.
- Smith, L. M. (1993). Teaching ethics: An update – Part II. *Management Accounting* (April), 18.
- Tabachnik, B. G., & Fidell, L. (1996). *Using multivariate statistics*. New York: Harper Collins College Publishers.
- Thoma S. (1994). Moral judgments and moral action: College teaching and student moral development. In: J. Rest & D. Narvaez (Eds), *Moral Development in the Professions* (pp. 199–211). Hillsdale, NJ: Lawrence Erlbaum.
- Vitell, S. J. Jr. (1986). *Marketing ethics: Conceptual and empirical foundations of a positive theory of decision making in marketing situations having empirical content*. Unpublished doctoral dissertation, Texas: Texas Tech University.
- Wright, G. B., Cullinan, C. P., & Bline, D. M. (1998). Recognizing ethical issues: The joint influence of ethical sensitivity and moral intensity. In: L. A. Poneman (Ed.), *Research on Accounting Ethics* (Vol. 4). London, England: JAI Press.
- Zych, J. M. (1999). Integrating ethical issues with managerial decision making in the classroom: Product support program decisions. *Journal of Business Ethics*, 18, 255–266.

APPENDIX: DESCRIPTION OF THE TAX DILEMMA IN THE ARTHUR ANDERSEN VIGNETTE

The scene starts with a young female (Employee), obviously new to the firm, having a discussion with a superior (Boss) who appears to be of a higher status in the firm. The Boss tells the Employee that he has just heard from an important client whose tax return she had prepared. He proceeds to tell her that the client is very unhappy with the return prepared. The problem seems to be the reporting of gambling gains and losses incurred by the taxpayer. Since the losses were far greater than the gains, the client wants the gambling gains and losses kept out of the return. The Boss tells the Employee that preparing the tax return as per the desires of the client would not make any difference to the income reported. Since

he expects the client's audit business, he wants the client kept happy with the tax work. When the employee tries to reason with the Boss, saying that the tax law requires all income to be reported, the Boss suggests that he is very pleased with the work done by her so far, but she must evaluate her present situation if she wants to stay and progress with the firm. The scene ends with this remark.

ETHICAL CONSIDERATIONS IN CPA ATTITUDES REGARDING THE ACCEPTANCE OF COMMISSIONS AND CONTINGENT FEES

Elizabeth Vallery Mulig, Thomas J. Phillips Jr.
and L. Murphy Smith

ABSTRACT

This study examined certified public accountants' ethical judgments and behavioral intentions concerning commission and contingent fee type arrangements. This analysis makes use of a multivariate measure, titled "The Multidimensional Ethics Measure" (MEM). The MEM approach, developed and refined by Reidenbach and Robin (1990) was previously introduced in accounting literature by Flory et al. (1992) and used in recent studies by Cohen et al. (1993, 1995, 1996), Patel et al. (1999), Guffey and McCartney (1999), and Cruz et al. (2000). The MEM hypothesizes a three-dimensional ethics measure, with the dimensions being moral equity, relativism, and contractualism. Regression analysis of CPAs' ethical judgments and behavioral intentions on the MEM dimensions (using responses from a sample of 478 CPAs) indicate that ethical decision making is primarily impacted by the moral equity and contractualism dimensions. The study also employs cluster analysis in an effort to better understand the decisions of CPAs

concerning commissions and contingent fees. Clustering of the CPAs defines different groups and provides insight into the subjects. The cluster analysis indicates that the MEM does measure a respondent's ethical judgment. While generalization cannot be made about the perceived ethicality of contingent fees or commissions, this study provides further evidence that CPAs are not entirely comfortable with these type fee arrangements. The results provide further support of the Multidimensional Ethics Measure as a useful tool for improving our understanding of CPAs' ethical judgments.

INTRODUCTION

The AICPA recently changed its Code of Professional Conduct (ethics code) to allow commissions and contingent fees, which were expressly prohibited in the past. However, the AICPA rules do not prevail over state laws or rules of the state boards of CPAs. As of August 2001, CPAs in 9 states were still expressly forbidden to accept commissions or contingent fees. The AICPA's historical opposition and the conflicting rules in different states evidence the differences of ethical perspective concerning the issues of acceptance of commissions and contingent fees by CPAs.

This study analyzes CPAs' attitudes about the desirability of commission and contingent fee type arrangements. This analysis makes use of a multivariate measure, titled "The Multidimensional Ethics Measure" (MEM). Reidenbach and Robin (1988) initially developed a 33-item MEM based on a content analysis of five moral philosophies: (1) justice; (2) relativism; (3) egoism; (4) utilitarianism; and (5) deontology. They applied the scale to various marketing scenarios, and later refined it to an 8-item instrument (Reidenbach & Robin, 1990).

The refined instrument measures three orthogonal constructs: (1) a broad-based moral equity dimension, which includes items related to the philosophies of justice (fair/unfair, just/unjust), relativism (acceptable/unacceptable to my family), and deontology (morally right/not morally right); (2) a relativistic dimension, which includes two relativist items (traditionally acceptable/unacceptable, culturally acceptable/unacceptable); and (3) a contractualism dimension, which includes two deontological items (violates/does not violate an unspoken promise, violates/does not violate an unwritten contract). The MEM approach was previously introduced in the accounting literature by Flory et al. (1992) and used in recent studies by Patel et al. (1999) and Guffey and McCartney (1999). Also in an accounting context, Cohen et al. (1993, 1995, 1996) have modified Reidenbach and Robin's scale to include 12 items representing five moral philosophies: (1) moral equity; (2) contractualism; (3) relativism; (4) egoism; and (5) utilitarianism.

This study utilizes the Reidenbach and Robin (1990) 8-item instrument. It explores CPAs' attitudes concerning commission and contingent fee arrangements using ethical judgments and behavioral intentions given for scenarios involving such fee types. It also provides further testing of the MEM as a research tool for studies concerning accounting ethics. Additionally, the study employs cluster analysis in an effort to better understand the ethical decisions of CPAs concerning the acceptance of commissions and contingent fees. The study looked first for possible subgroups of CPAs and then looked for significant differences between those subgroupings.

Data for this study were obtained from a questionnaire mailed to 1,500 CPAs in public accounting. Respondents were asked to give ethicality ratings, using the multivariate measure's eight bipolar scales, on scenarios involving commissions and contingent fees. The respondents were also requested to assess the likelihood (behavioral intention) that they would enter into a similar type fee arrangement. The 478 usable responses represented an overall response rate of 31.87%. The first and second halves of responses were compared for non-responder bias and none was detected.

Results of the analyses conducted in this study show that most of the variation in the CPAs' *univariate ethicality measure* ratings of the scenarios, and most of the variation in their *behavioral intent measure* scores, can be explained by their ethical perspectives. These findings lend credence to the theory that CPAs view the acceptance of commissions and contingent fees as ethical decisions. Generalization cannot be made about the perceived ethicality of contingent fees or commissions; however, the results stand as further evidence that CPAs are not entirely comfortable with these type fee arrangements. Knowledge of CPAs' attitudes on the acceptance of commissions and contingent fees may help determine appropriate rules and useful codes of professional conduct, and can serve to guide training efforts of licensing and regulating bodies. The information may be useful in the political influence process as well. Policymakers who wish to maintain prohibition of these type fees could cite this knowledge concerning CPAs' judgments on commissions and contingent fees.

Concerning the MEM as a research tool, results of a factor analysis (of the eight items on the instrument) indicated that only two factors (dimensions) should be extracted, not the hypothesized three factors. The measurement items for the moral equity and contractualism factors loaded as expected, but the factor structure did not provide evidence of an independent relativism factor.

The study checked the content validity of the two dimensions by comparing it with a *univariate ethical measure* (obtained by participants' ranking of scenarios on a 7-point ethical/unethical scale.) The results support the hypothesis that the multivariate measure (when excluding the hypothesized third dimension) captures

the appropriate domain of content. Adjusted R square values for the two scenarios were 0.7792 (contingent fee) and 0.8034 (commission) when the *univariate ethical measure* was regressed against the multivariate measure.

A realization of predictive validity was obtained by comparing the MEM with a *behavioral intent measure* for the respondent. (This measure was a combination of four scales measuring varieties of behavioral intent.) Adjusted R square values were 0.6012 (contingent fees) and 0.6388 (commissions) for the two scenarios tested, indicating that the two dimensions used from the MEM “explain” a sizable portion of the variance in the behavioral intent of the individual.

Although this study failed to support the hypothesized three-dimensional aspect of the MEM, the two existing dimensions were significant. These results, and the findings by means of cluster analysis, support the MEM as a useful tool for future research into how accountants make ethical judgments. The results are also consistent with findings in previous studies.

BACKGROUND AND RELATED LITERATURE

Accountants have always been attentive to preserving their image both within their own ranks and in the eyes of the public. They have striven continually to maintain the standards of independence, integrity, and objectivity. Some believe that these three issues are paramount to all other issues faced by CPAs (Allen, 2001; American Accounting Association, 1993; Lowe, 1987; Ponemon, 1990).

The AICPA prides itself in having earned the public’s trust by being adaptable and sensitive to its changing needs, anticipating those needs when possible, and taking a proactive stance on them. The Institute has always had to deal with a rapidly changing practice environment and the issues addressed here are further evidence of the ongoing changes in the practice of public accountancy (cf., Cook, 1987).

For years, commissions and contingent fees were expressly prohibited by the AICPA. Commissions are fees paid by a third party for a referral of a client who in turn purchases from that third party. Contingent fees are arrangements whereby the CPA agrees to make his fee dependent upon a certain finding or outcome. The CPA profession has long held that either of these type fee arrangements is unethical because they could potentially negatively influence the CPA’s work and advice for a client, and thus negatively affect the image of the profession. The fear was that allowing such fee arrangements might cause the CPA to choose a route that would generate more fees, rather than a route that would protect the client’s interests.

As public accounting evolved from encompassing solely audit and attestation functions, however, some clients (and some CPAs) demanded that fee schedules

and practices should also change. Many of the new endeavors of CPAs did not mandate independence on the part of the accountants, and the parties involved were unwilling to accept the traditional fee arrangements of an accountant performing attestation services.

When faced with an investigation by the Federal Trade Commission (FTC), the AICPA was forced to agree that a change was needed in the existing code prohibiting any acceptance of such fee arrangements. The FTC contended that AICPA sanctions against these type fee arrangements were a restriction of competition and orders were issued for the AICPA to eliminate rules prohibiting CPAs from charging commissions and contingent fees ([United States of America Before Federal Trade Commission, 1988](#)).

The AICPA wanted to ensure that such a change did not lead to loss of public trust. In order to guard against that possibility, the Institute has taken a position that effectively allows its members to accept contingent fees and commissions from non-audit clients only (cf., [Wall Street Journal, 1990](#)). The Institute stresses that those accountants having an auditing relationship with their clients are banned from accepting commissions or contingent fees and that acceptance of such fees can result in a member's suspension from the AICPA (cf., [Blumenthal, 1990](#)).

The lifting of the AICPA ban on commissions and contingent fees from non-audit clients caused many states to review their rules on the commissions and contingent fees issues (cf., [Society of Louisiana CPAs, 1992](#)). The outcomes of the debates by the states are varied as to which view they support.

Throughout the debates with the FTC, the AICPA maintained that its sanctions on commissions and contingent fees were due to ethical considerations, not a means of restricting competition. This study hypothesizes that if these fees are indeed an ethical issue, the Multidimensional Ethics Measure will explain the variation in CPAs' attitudes about the acceptance of such fees, and it will further define those attitudes by dividing them into the dimensions of moral equity, relativism, and contractualism.

THE ASSESSMENT INSTRUMENT

This study uses an established instrument, with satisfactory validity and reliability, to determine if the commissions and contingent fees issue is indeed linked to ethical concerns. The Multidimensional Ethics Measure developed by [Reidenbach and Robin \(1990\)](#) is used to address the issue of ethical concerns. This is accomplished by assessing a person's ethical orientation on three dimensions: moral equity, relativism, and contractualism. In this study, a determination is made as to whether CPAs are influenced by these three dimensions.

Exhibit 1. The Multidimensional Ethics Measure.

Moral equity dimension		
Fair	.....	Unfair
Just	.....	Unjust
Not morally right	.....	Morally right
Acceptable to my family	.....	Unacceptable to my family
Relativism dimension		
Culturally acceptable	.....	Culturally unacceptable
Traditionally acceptable	.....	Traditionally unacceptable
Contractual dimension		
Does not violate an unwritten contract	.....	Violates an unwritten contract
Violates an unspoken promise	.....	Does not violate an unspoken promise

Reidenbach and Robin (1990) reduced their original 33 item inventory (Reidenbach & Robin, 1988) to the eight items seen in Exhibit 1, which formed the following three orthogonal constructs (factors): (1) moral equity, which included items relating to the philosophies of justice (fair/unfair, just/unjust), relativism (acceptable/unacceptable to my family), and deontology (morally right/not morally right); (2) relativism, which included two items (traditionally acceptable/unacceptable, culturally acceptable/unacceptable); and (3) contractualism, which included two deontological items (violates/does not violate an unspoken promise, violates/does not violate an unwritten contract). The following paragraphs relate the relevance of each of these philosophies to CPAs’ attitudes regarding commissions and contingent fees.

The moral equity philosophy is based on the concept of fairness and justice. Other literature, for instance Kohlberg’s (1969) Cognitive Moral Development Theory also draws greatly on moral equity. These concepts are apparent in the question of whether CPAs should accept commissions or contingent fees for their services. First is the question of whether it is fair for the CPA, who is presumably already charging the client a fee for his services, should also make money from referring that client to another business. Next is the issue of whether it is “right” or just to have the payment of a professional, the CPA in this case, depend on some specified outcome. Other professions (law, for example) use this type fee structure extensively, but this has traditionally been against CPAs’ code of ethics. If CPAs believe the fee structures being addressed here are not fair or just, they should be less likely to engage in these type fee arrangements.

The moral philosophy of relativism focuses on societal and cultural acceptability. It bases judgments of the acceptability of a course of action on whether it is traditionally the norm. If commission and contingent fee arrangements are not culturally accepted, and CPAs have a relativistic viewpoint, they should have lower intent to engage in these type fee arrangements and believe that such arrangements are not morally justified.

The third philosophy, contractualism, centers on the principle of right and wrong by judging the morality of a situation against unwritten contracts and unspoken promises. As noted by [Cruz et al. \(2000\)](#), the fact that the accounting profession is dependent upon public confidence provides CPAs with an obligation to act in the public interest; however . . . CPAs also have obligations to serve their clients and protect those clients' interests. CPAs should judge a commission or contingent fee arrangement less favorably and be less likely to engage in such arrangements if they violate contractual obligations of the profession.

[Reidenbach and Robin \(1990\)](#) used three scenarios to test their scale. Each of the scenarios pertained to a retail situation (one concerning a warranty, one concerning a salesman, and one concerning prices of merchandise) and each averaged 100 words. The initial tests were conducted with retail managers.

[Nunnally \(1978\)](#) states that repeated use of the same measurement items by different individuals to evaluate different situations or applications is an important test of the construct's validity. [Flory et al. \(1992\)](#) sought to further validate the Multidimensional Ethics Measure in the accounting environment. They felt that the retail managers involved in the initial tests would have a somewhat different set of demands operating on them from those affecting professional accountants, and that the validation of this measure in the accounting environment would add to its applicability.

In their study, [Flory et al. \(1992\)](#) developed a questionnaire with four scenarios concerning ethical issues faced by accountants. Each scenario ended with a certain action taken by the accountant. The questionnaire was mailed to 500 randomly selected Certified Management Accountants (CMAs) who were asked to respond to the action (taken by the individual in the scenario) by using the Multidimensional Ethics Measure. The respondents were also asked to rate the individual's action as ethical/unethical and to state what their behavioral intention would be in the same situation. The study showed that the three proposed dimensions of this measure, moral equity, relativism, and contractualism, capture a substantial amount of the decision dynamics used by CMAs to make ethical judgments.

[Flory et al. \(1992\)](#) evaluated three types of validity (as stated by [Nunnally, 1978](#)) of the Multidimensional Ethics Measure. The three types of validity assessed were as follows: (1) construct validity: the degree to which the assessment is a valid

measure of the target construct, (2) content validity: the degree to which the items measuring the construct are a representative sample of the complete universe or domain of the construct, and (3) predictive validity: the degree to which the scores on the measure demonstrate the predicted statistical relationship with another variable. Results for each assessment of validity supported the overall validity of the Multidimensional Ethics Measure.

Cohen et al. (1993, 1995, 1996) have also used Reidenbach and Robin's instrument in the accounting context, further altering it to include other ethical philosophies. The MEM, as modified by Cohen et al., was used by Cruz et al. (2000) in an analysis of tax practitioners' ethical judgments. Results indicated that ethical decision making is most heavily influenced by the moral equity dimension, followed by the contractualism dimension.

The Multidimensional Ethics Measure (using Reidenbach and Robin's 8-item instrument) is employed in this study to help determine whether the commissions and contingent fees issues are ethical propositions. In the questionnaire, two scenarios are presented to the participants. One pertains to a commission and one concerns a contingent fee. The participants rate their beliefs on the fee agreement in each scenario according to the established Multidimensional Ethics Measure (e.g. fair/unfair, etc.). Next, they are asked to rate the action in each scenario as ethical/unethical (where the low end of the scale = totally ethical and the high end = totally unethical). This serves as a *univariate ethical measure* of the scenarios.

Fishbein and Ajzen (1975) demonstrated that intention can be used as an immediate precursor to behavior. They show, through the use of their Theory of Reasoned Action (Ajzen & Fishbein, 1980), that attitudes (and subjective norms) are sufficient to predict intentions. In addition, Ajzen (1991), in his Theory of Planned Behavior, finds that attitudes toward the behavior, subjective norms with respect to the behavior, and perceived control over the behavior are usually found to predict behavioral intentions with a high degree of accuracy. These intentions, in turn, can account for a large portion of the variance in actual behavior. In keeping with these findings, this study uses behavioral intention as a proxy of behavior. Each participant indicates his/her behavioral intention by declaring whether he/she would take the same action as the individual in the scenario. These scores serve as a *behavioral intent measure*.

Flory et al. (1992, 1993) assert that an adequate understanding of ethical behavior and the factors that influence behavior is imperative. Other related literature, such as Guffey and McCartney (1999), Patel et al. (1999), Reidenbach and Robin (1990), Cohen et al. (1993, 1995, 1996), and Cruz et al. (2000), has demonstrated the viability of the MEM approach for examining ethical behavior. By also using the MEM, this study adds to that body of knowledge.

THE SURVEY

A mail survey was selected as the method to be used to gather data for this study. The survey was sent to 1,500 randomly selected CPAs in the United States engaged in the practice of public accounting whose names were furnished (for a fee) by the AICPA. The respondents in this study were presented with two scenarios (see Appendix), one involving a commission and one involving a contingent fee, and asked to rate each.

The participants were asked to rate the action in each scenario on an ethical/unethical dimension (where the low end of the scale = totally ethical and the high end = totally unethical). This served as a univariate measure of perceived ethicality (designated in the study as the *univariate ethical measure*) of the action in the scenarios. Next, they rated each scenario according to the multidimensional Ethics Measure (for example, fair/unfair, etc.).

Each participant then indicated his/her behavioral intention (designated in the study as the *behavioral intent measure*) by declaring the likelihood that he/she would take the same action as the individual in the scenario. The four scales for measuring varieties of behavioral intent were combined to calculate this measure.

Approximately 32% of the surveys were returned (478 of the 1,500). This return rate is more than satisfactory for statistical analysis (Alreck & Settle, 1995), so no follow-up mailing was necessary. The first and second halves of responses were compared for non-responder bias and none was detected.

RESULTS

The responses to the Multidimensional Ethics Measure (pertaining to the two scenarios) were first factor analyzed to determine whether the CPAs' attitudes could, in fact, be attributed to the three predicted factors: moral equity, relativism, and contractualism. Cluster analysis was also employed looking first for possible subgroups of CPAs and then looking for significant differences between those subgroupings.

Factor Analysis and Multiple Regressions

Factor analysis refers to a variety of statistical techniques whose common objective is to represent a set of variables in terms of a smaller number of hypothetical variables. When the researcher has no idea as to how many underlying dimensions there are for the data, factor analysis is used as an "exploratory" tool to ascertain

the minimum number of hypothetical factors that can account for the observed covariation (Kim & Mueller, 1978).

This study uses exploratory factor analysis to generate dimensions from the Multidimensional Ethics Measure. The results are examined to determine whether they conform to the expectation of three factors: moral equity, relativism, and contractualism. Next, the factor scores from the Multidimensional Ethics Measure are employed as possible explanatory (predictor) variables in multiple regression models.

The dependent variables (the “Y” responses) are (a) the *behavioral intent measure* concerning the acceptance (in the hypothetical scenarios detailed on the questionnaire) of a commission or contingent fee and (b) the *univariate ethical measure*.

The survey results of the Multidimensional Ethics Measure were subjected to a principal components factor analysis with an orthogonal (varimax) rotation. Factor analyses were conducted on each of the two scenarios, with the outcome constrained to confirm (test) the three anticipated factors. As Table 1 indicates, the anticipated dimensions in their exact form were not readily apparent. The measurement items for the moral equity and contractualism factors loaded as expected. (See exhibit one for items included in each dimension.) The two items (culturally acceptable/unacceptable and traditionally acceptable/unacceptable) expected to form the third factor, relativism, did not load together.

When the factor analysis was conducted, with the criterion of a minimum eigenvalue of 1, the factor structure did not provide evidence of an independent relativism factor. Both the items expected to comprise the relativism dimension

Table 1. Three Factor Solution for the Two Scenarios.

	Scenario					
	A	B	A	B	A	B
Factor 1						
Fair/unfair	0.91	0.91	0.25	0.26	0.13	0.19
Just/unjust	0.92	0.90	0.25	0.27	0.15	0.21
Morally right/not morally right	0.90	0.88	0.26	0.23	0.17	0.30
Acceptable/unacceptable to family	0.89	0.87	0.24	0.21	0.16	0.30
Traditionally acceptable/unacceptable	0.77	0.64	0.20	0.21	0.34	0.56
Factor 2						
Violates/does not violate promise	0.27	0.23	0.94	0.94	0.07	0.12
Violates/does not violate contract	0.28	0.27	0.93	0.93	0.08	0.11
Factor 3						
Culturally acceptable/unacceptable	0.26	0.31	0.09	0.11	0.95	0.92

loaded with the moral equity factor. The items, however, had the lowest loadings on that factor. The two items could therefore be considered for removal from the analysis.

To test this assumption, multiple regressions were conducted with the *univariate ethical measure* and the *behavioral intent measure* as the dependent variables. The three factors from the solution including all scale items were first used as the explanatory (independent) variables. Next, the two factors from the solution eliminating the two items theoretically comprising the relativism dimension were used as the independent variables. The adjusted R^2 values for the multiple regressions differed by less than 0.01 for each scenario/dependent variable analysis. It was determined, therefore, that the items for the relativism dimension would not be used further.

Analyses were conducted to determine whether the remaining multidimensional ethics survey items (i.e. moral equity and contractual dimension items) were suitable for factor analysis. Three different criteria for suitability were applied. First, the size of the coefficients in the correlation matrix was examined. Kaiser's measure (Kaiser & Rice, 1974) of sampling adequacy (MSA) was also analyzed to assess the appropriateness of the matrix for factor analysis. The third analysis used to determine appropriateness of the matrix for factoring was an inspection of the scree plot. All three analyses imply suitability for factoring. Results of the two factor analysis for both Scenario A and Scenario B are presented in Table 2.

Cronbach's coefficient alpha tests were performed for the two factors. The coefficient alpha test is designed to measure the extent to which the items making up a construct consistently covary with the other variables making up the construct. According to Peter (1979), coefficient alpha is the recommended measure of internal consistency for assessing the quality of an instrument. The possible values of coefficient alpha range from 0, which suggests there is no relationship

Table 2. Two Factor Solution for the Two Scenarios.

	Scenario			
	A	B	A	B
Factor 1 (moral equity dimension)				
Fair/unfair	0.92	0.93	0.27	0.27
Just/unjust	0.93	0.93	0.27	0.28
Morally right/not morally right	0.92	0.93	0.28	0.24
Acceptable/unacceptable to family	0.91	0.92	0.26	0.23
Factor 2 (contractualism dimension)				
Violates/does not violate promise	0.27	0.24	0.94	0.95
Violates/does not violate contract	0.28	0.28	0.94	0.94

among the items in the instrument, to 1.0, which indicates that the items are perfectly consistent.

Nunnally (1970) suggests that in basic research reliabilities of 0.50 to 0.60 suffice and that reliabilities greater than 0.80 are most likely of little additional value. More recently, however, the acceptable value has increased somewhat. Hair et al. (1992), for example, gives 0.70 as the commonly used threshold value for acceptable reliability. They also state, though, that this is not an absolute standard and that values below 0.70 have been deemed acceptable if the research is exploratory in nature.

For Scenario A, a contingent fee type arrangement, the alpha test result was 0.969 for the Moral Equity Dimension and 0.954 for the Contractualism Dimension. For Scenario B, a commission type fee arrangement, the alpha test result was 0.972 for the Moral Equity Dimension and 0.948 for the Contractualism Dimension. The results of the Cronbach's alpha tests show that the scales appear to have acceptable levels of reliability, providing limited evidence of validity of the dimensions. As noted before, a commonly used threshold value for acceptable reliability is 0.70, and each of the coefficient alphas shown above exceed that threshold.

These tests on the Multidimensional Ethics Measure results indicated that CPAs' attitudes may, in fact, be attributed to two of the three predicted factors: moral equity and contractualism, but not relativism. Next, tests were conducted to establish the content validity and predictive validity of the measure.

Content Validity

To test the thesis that these constructs in fact measure ethical perception (content validity), a comparison was made of the two dimensions versus the *univariate ethical measure*. To achieve this, multiple regressions were run for each scenario with the *univariate ethical measure* as the dependent variable and the two dimensions from the MEM as the independent variables. (See Table 3 for *univariate ethical measure* statistical data.)

The high covariations (adjusted *R*-squares) suggest that the multivariate measure captures much of what the survey respondents mean by "ethical." As Table 4, Panel A indicates, 77.92% of the variance in what was defined by the

Table 3. Various Statistical Data for Selected Study Variables.

Variable	Minimum	Maximum	Mean	Std Dev
Univariate ethical measure (contingent fee)	1.0000	7.0000	2.9195652	2.061169
Behavioral intent measure (contingent fee)	4.0000	28.0000	14.636160	8.381519
Univariate ethical measure (contingent fee)	1.0000	7.0000	4.6077586	2.100402
Behavioral intent measure (contingent fee)	4.0000	28.0000	20.703786	7.664506

Table 4.

Panel A: A Comparison of the Multivariate and Univariate Ethics Measures Regression Results

Scenario	Overall R^2	B1	B2
A	0.7792	0.82244	0.31896
B	0.8034	0.85318	0.27460

Panel B: Contingent Fee Scenario Regression Results (Model: Univariate Measure = B0 + B1 Moral Equity + B2 Contractualism)

Variable	Parameter Estimate	<i>t</i> -Value	Prob > |T|
Intercept	2.867751	62.583	0.0001
Moral equity	1.67975	36.635	0.0001
Contract	0.648199	14.173	0.0001
R^2	0.7802	<i>F</i> value	770.235
Adjusted R^2	0.7792	Prob > <i>F</i>	0.0001
Variable	Standardized estimate		
Moral equity	0.82446	Contract	0.31896

Panel C: Commission Scenario Regression Results (Model: Univariate Measure = B0 + B1 Moral Equity + B2 Contractualism)

Variable	Parameter Estimate	<i>t</i> -Value	Prob > |T|
Intercept	4.601425	103.453	0.0000
Moral equity	1.794139	40.408	0.0001
Contract	0.578953	13.006	0.0001
R^2	0.8043	<i>F</i> value	902.063
Adjusted R^2	0.8034	Prob > <i>F</i>	0.0001
Variable	Standardized estimate		
Moral equity	0.85318	Contract	0.27460

Note: B1 = The beta value for moral equity dimension; B2 = The beta value for contractualism dimension. The dependent variable is the univariate measure.

respondents as ethical, in the scenario concerning a contingent fee, was explained by the two dimensions from the MEM. In the scenario involving a commission, the two dimensions explained 80.34% of the variance in the *univariate ethical measure*. More detailed regressions results are shown in Table 4, Panels B and C.

Predictive Validity

Fishbein and Ajzen (1975) have demonstrated that intention can be used as an immediate precursor to behavior. This study hypothesized that the respondents'

opinion as to the ethicality of the scenario (as evidenced by their scores on the MEM) could be used to “predict” behavior. In order to investigate this premise, multiple regressions were run with the *behavioral intent measure* as the dependent variable and the scores for the two dimensions as the independent variables. (See Table 3 for *behavioral intent measure* statistical data.)

As seen in Table 5, Panel A, the factors from the MEM did explain a large portion of the variability in the *behavioral intent measure*. For the contingent

Table 5.

Panel A: A Comparison of the Multivariate Ethics Measure and Behavioral Intention Regression Results

Scenario	Overall R^2	B1	B2
A	0.6012	0.73366	0.25058
B	0.6388	0.75443	0.26717

Panel B: Contingent Fee Scenario Regression Results (Model: Behavioral Intent = B0 + B1 Moral Equity + B2 Contractualism)

Variable	Parameter Estimate	t -Value	Prob > |T|
Intercept	14.319517	56.363	0.0001
Moral equity	6.123056	24.063	0.0001
Contract	2.108313	8.219	0.0001
R^2	0.6031	F value	324.396
Adjusted R^2	0.6012	Prob > F	0.0001
Variable	Standardized estimate		
Moral equity	0.73366	Contract	0.25058

Panel C: Commission Scenario Regression Results (Model: Behavioral Intent = B0 + B1 Moral Equity + B2 Contractualism)

Variable	Parameter Estimate	t -Value	Prob > |T|
Intercept	20.711491	93.725	0.0001
Moral equity	5.838738	26.18	0.0001
Contract.	2.057410	9.271	0.0001
R^2	0.6404	F value	385.626
Adjusted R^2	0.6388	Prob > F	0.0001
Variable	Standardized estimate		
Moral equity	0.75443	Contract	0.26717

Note: B1 = The beta value for moral dimension; B2 = The beta value for contractualism dimension. The dependent variable is the behavioral intent measure equity.

fee scenario, the two dimensions explained 60.12% of the variability, and for the commission scenario, 63.88% was explained. More detailed results of the regressions are shown in [Table 5](#), Panels B and C.

Cluster Analysis

A cluster analysis was conducted to determine whether the ethical evaluations of the CPAs in this study yield any distinct clusters of CPAs. The analysis used a K-means approach, with each object (respondent) placed in one and only one cluster. The ethical evaluations of the CPAs in this study (as measured by the Multidimensional Ethics Measure) were successfully used to divide the CPAs into separate clusters.

A three-cluster solution was chosen for both the contingent fee scenario and the commission scenario. A four-cluster solution yielded too few members, and sufficient cluster size was needed to conduct additional analyses of the individual clusters. [Table 6](#) shows the number of observations, and the percentage of the observations, in each cluster for the scenarios.

The three clusters for each scenario were defined in terms of the scores of variables included on the questionnaire. *T*-tests of the means of these defining scores were conducted to determine whether there were significant differences in the make-up of the clusters. For both scenarios (contingent fee and commission) significant differences were found.

Contingent Fee Scenario

[Table 7](#) gives the defining (mean) scores for each variable which had a significant difference between clusters for the contingent fee scenario. Cluster sizes are also given, shown in both percentage terms as well as absolute terms. Cluster 3 was the largest group, containing 72% of the CPAs. Cluster 1 contained 15% and cluster 2 consisted of 13% of the respondents.

Table 6. Number and Percentage of Observations Per Cluster.

Cluster	Contingent Fee Scenario		Commission Scenario	
	Number	Percentage	Number	Percentage
1	68	15	209	47
2	56	13	76	17
3	320	72	162	36

Table 7. Cluster Size and Defining Scores (Means) for Contingent Fee Scenario.

Cluster	<i>N</i>	%	Ethics Judgment (1)	Behavioral Intent (2)	Age	Sex (3)	Moral Equity (4)	Relativism (5)	Contract Score (6)	Size of Company (7)
1	68	15	4.97 ^{a,b}	21.93 ^{a,b}	43.60 ^a	0.89 ^{a,b}	5.17 ^{a,b}	5.11 ^{a,b}	2.16 ^a	1.71 ^b
2	56	13	3.05 ^{a,c}	14.35 ^a	38.29 ^a	0.67 ^a	2.54 ^a	3.80 ^a	5.30 ^{a,c}	2.24
3	320	72	2.38 ^{b,c}	12.78 ^b	40.66	0.72 ^b	2.30 ^b	3.37 ^b	2.27 ^c	2.32 ^b

Note: (1) The lower the score, the more ethical; (2) The lower the score, the more likely to enter into such a fee arrangement; (3) The lower the score, the more females; (4) The lower the score, the more morally equitable; (5) The lower the score, the more culturally/traditionally acceptable; (6) The lower the score, the less perceived violation of contract/promise; (7) The higher the score, the larger the company.

^aSignificant difference (at 0.01 level) between Cluster 1 and 2.

^bSignificant difference (at 0.01 level) between Cluster 1 and 3.

^cSignificant difference (at 0.01 level) between Cluster 2 and 3.

Examination of [Table 7](#) reveals a correlation between the clusters with respect to their ethical judgment and behavioral intent scores. Cluster 1 had the highest ethicality score and the highest behavioral intent score. This indicated that this cluster saw the contingent fee arrangement as most unethical, and that they were the most unlikely of the respondents to enter into a similar type fee arrangement. Cluster 2 ethicality and behavioral intent scores were both lower than those of Cluster 1. The difference in the behavioral intent score between Clusters 1 and 2 was, in fact, a significant one. Cluster 3 had ethicality and behavioral intent scores which are lower than those of either Cluster 1 or Cluster 2. The ethicality score for Cluster 3 was significantly different (lower) from that of Cluster 1 and that of Cluster 2. The behavioral intent score, while not significantly lower than that of Cluster 2, was significantly lower than that of Cluster 1.

The analysis of the clustering with respect to ethicality and behavioral intent scores showed that the largest portion of CPAs, Cluster 3, were less critical of a contingent fee type arrangement, and more likely to enter into such an agreement, than were the other two clusters. Further analysis showed also that the CPAs in Cluster 3 worked for larger companies than did those in Clusters 1 and 2. The difference in company size was significant between Clusters 1 and 3.

Scrutiny of [Table 7](#) concerning the Multidimensional Ethics scores reveals other relationships between the clusters. Those in Cluster 3 judged the contingent fee scenario as more morally equitable and more traditionally/culturally acceptable (i.e. the moral equity and relativism scores were lower for Cluster 3) than did their complements in the other two clusters. With respect to contract/promise violation, however, Cluster 2 CPAs perceived more contract violation than did those in Clusters 1 and 3.

Age and sex were the other two variables with significant differences between clusters. Cluster 3 respondents were older than those in Cluster 2, but not significantly. The respondents in Cluster 3 were younger than those in Cluster 1, but again, not significantly. The significant age difference was between Clusters 1 and 2. Some inferences can still be drawn from the average ages in the clusters, however. Cluster 2 and 3 contain the youngest of the respondents, and have the lower ethicality and behavioral intent scores, indicating that younger CPAs find a contingent fee arrangement more ethical, and that they are more likely to enter into such an arrangement.

Cluster 1 had a higher percentage of males than Cluster 2 or Cluster 3. Both differences were significant. Cluster 3 had the next highest percentage of males. It did not appear that the male/female makeup of the clusters indicated the values or strengths of other relationships between the clusters. The only possible exception was with the contract score, where Cluster 2, with the highest percentage of females, also showed the highest perception of contract/promise violation.

Table 8. Cluster Size and Defining Scores (Means) for Commission Scenario.

Cluster	N	%	Ethics Judgment (1)	Behavioral Intent (2)	Age	Sex (3)	Moral Equity (4)	Relativism (5)	Contract Score (6)
1	209	47	3.11 ^{a,b}	15.72 ^{a,b}	40.12 ^b	0.77 ^a	2.91 ^{a,b}	3.65 ^{a,b}	2.56 ^{a,b}
2	76	17	4.89 ^{a,c}	22.69 ^{a,c}	39.19 ^c	0.56 ^{a,c}	4.36 ^{a,c}	4.69 ^{a,c}	6.05 ^{a,c}
3	162	36	6.41 ^{b,c}	26.32 ^{b,c}	43.02 ^{b,c}	0.81 ^c	6.39 ^{b,c}	5.97 ^{b,c}	4.16 ^{b,c}

Note: (1) The lower the score, the more ethical; (2) The lower the score, the more likely to enter into such a fee arrangement; (3) The lower the score, the more females; (4) The lower the score, the more morally equitable; (5) The lower the score, the more culturally/traditionally acceptable; (6) The lower the score, the less perceived violation of contract/promise.

^aSignificant difference (at 0.01 level) between Cluster 1 and 2.

^bSignificant difference (at 0.01 level) between Cluster 1 and 3.

^cSignificant difference (at 0.01 level) between Cluster 2 and 3.

Commission Scenario

The defining (mean) scores are given in [Table 8](#) for each variable having a significant difference between clusters for the commission scenario. The scores are shown by cluster, along with the absolute size, and percentage, of each cluster. The largest group was Cluster 1, with 47% of the total. Clusters 2 and 3 had 17% and 36%, respectively.

Examination of [Table 8](#) shows a correlation between the scores for ethicality and behavioral intent. For both these scores, Cluster 1 showed the lowest scores. Cluster 2 scores were higher for both variables, and Cluster 3 had the highest scores. This indicated that the CPAs in Cluster 1 believed the commission type fee arrangement was more ethical than did the CPAs in Clusters 2 and 3. Cluster 1 CPAs were also more likely to enter into this type fee arrangement than were CPAs in Clusters 2 and 3.

Cluster 1 yielded the lowest moral equity, relativism, and contract scores, when compared to the other two clusters, indicating that they viewed the commission type fee arrangement as more ethical (based on the Multidimensional Ethics Measure) than did the other clusters. This seems logical, since this cluster gave the most ethical evaluation of the scenario, and showed the most inclination to behave similarly.

The moral equity and relativism dimensions were both lower for Cluster 2 than Cluster 3, indicating more ethical evaluations on the Multidimensional Ethics Measure. For the contract/promise dimension, however, Cluster 2 was higher than Cluster 3, indicating more of a perception of violation on this dimension. Cluster 2 also contained the youngest members, and the highest percentage of females.

The oldest grouping of CPAs was Cluster 3. The members of this group were significantly older than those in Clusters 1 and 2. Since Cluster 3 also had the highest ethics judgment score and the highest behavioral intent score, these data indicate that older CPAs have a less favorable perception of a commission type fee arrangement than younger CPAs and less inclination to enter into such a fee arrangement.

Males comprised a higher percentage in Cluster 3 than in the other two clusters. The difference was significant in sexual makeup between Clusters 2 and 3. Cluster 2 had the lowest percentage of males (56%) followed by Cluster 1 (with 77%) and Cluster 3 (with 81%). Since the ethics judgment and behavioral intent scores increased in the order of Cluster 1, Cluster 2, and Cluster 3, sex of the respondent did not seem to indicate whether the ethics judgment and behavioral intent score would be high or low. In any event, the significance of findings concerning gender differences is limited due to the limited sample size (127 respondents) for which gender is known.

Cluster Analysis Summary

The cluster analysis results indicated that CPAs can be differentiated with respect to ethical decision making. In the case of both contingent fee and commission type arrangements, differences between clusters in their ethical judgments were all significant. There were also (some) significant differences shown for both type fee arrangements in CPAs' behavioral intent scores.

The cluster analyses also showed that lower scores for the moral equity and relativism dimensions of the Multidimensional Ethics Measure (indicating a more ethical perception), for both scenarios, corresponded with lower ethical judgment scores (also indicating a more ethical perception) and with lower behavioral intent scores (indicating more inclination on the part of the CPA to accept the same type fee arrangement presented in the scenario). These results indicate that the Multidimensional Ethics Measure does, in fact, measure a respondent's ethical judgment, and that a CPA's ethical judgment is an indicator of behavioral intent.

The cluster analysis also revealed that, while factor analysis did not provide evidence of an independent relativism dimension, the clusters for both scenarios differed on mean scores for this dimension. Several differences between clusters were significant (as shown in Tables 11 and 12). These findings indicate that the relativism dimension *is* a measure that differentiates CPAs.

Clustering of the CPAs also revealed that older CPAs perceive commission and contingent type fee arrangements as less ethical than do younger CPAs. The older CPAs also indicated that they were less likely to enter into such type fee arrangements.

The size of company where a CPA worked did not differ significantly between clusters for the commission fee type scenario, but there were some significant company size differences between clusters for the contingent type fee scenario. CPAs in Cluster 3, who gave a more ethical rating to this type fee and indicated a stronger inclination to accept such a fee themselves, tend to work for larger firms. Since they work for larger firms, perhaps the broader range of services to which they have been exposed has affected their perception of acceptable fee arrangements.

These results also link to Ponemon's (1992) work on the regression in moral reasoning that occurs as one moves through the ranks of large CPA firms. His studies of large firms indicate that the ethical culture of large CPA firms inhibit an individual's development to higher levels of ethical reasoning.

CONCLUSIONS

The research presented in this article further tested the multidimensional ethics measure, previously used in accounting research by Flory et al. (1992), Cohen et al. (1993, 1995, 1996), Cruz et al. (2000) and others, by applying it to different business situations with a different group of participants. The researchers hoped to improve the understanding of ethical judgments in the practice of accounting, specifically in the areas of commission and contingent fee arrangements.

In the analysis, using two different business scenarios, two of the three factors from the Multidimensional Ethics Measure (moral equity and contractualism) explained a significant portion of the variability in both the *univariate ethical measure* ratings (77.92% and 80.34%) and the scores of the *behavioral intent measure* (60.12% and 63.88%).

The significant results for the moral equity dimension are consistent with previous MEM studies in accounting (Cohen et al., 1996, 1995, 1993; Cruz et al., 2000; Flory et al., 1992). This finding suggests that perceptions of fairness, justice, morality, and acceptability to one's family influence CPAs' willingness to accept commission and contingent fee type compensation arrangements.

The contractualism dimension has also proved significant in previous MEM studies. This philosophy reflects the extent to which a certain behavior violates individual duties and obligations.

The relativism dimension did not prove significant in this study. Relativism considers ethical perceptions in regard to a cultural norm, measured in the MEM construct as "traditionally acceptable/unacceptable" and "culturally acceptable/unacceptable." Cruz et al. (2000) also showed limited significance of relativism in their study of tax practitioners' ethical judgments, which is

consistent with the mixed results for this dimension shown by other previous studies. Cluster analysis revealed, however, that, while factor analysis did not provide evidence of an independent relativism dimension, the clusters for both scenarios differed on mean scores for this dimension. Several differences between clusters were significant (as shown in Tables 11 and 12). These findings indicate that the relativism dimension *is* a measure which differentiates CPAs.

Cluster analysis of the data also revealed that CPAs can be differentiated with respect to ethical decision making, and that CPAs' ethical judgments serve as an indicator of behavioral intent. Older CPAs, clustering shows, perceive commission and contingent type fee arrangements in a less favorable light (i.e. as more unethical) than do younger CPAs, and the older CPAs are less likely to enter into such fee arrangements. Clustering also disclosed that CPAs who gave a more ethical rating to the contingent type fee, and indicated a stronger inclination to accept such a fee themselves, tend to work for larger firms.

The portion of variability explained was greater in both scenarios, by almost 20%, for the *univariate ethical measure* than it was for the *behavioral intent measure*. This indicates that other variables not addressed here must also have some, possibly substantial, impact on the behavioral intent of CPAs concerning these type fee arrangements. Future research could investigate whether personal characteristics influence an individual's evaluation of ethical dilemmas and whether those evaluations in turn affect ethical judgments and behavioral intent.

Knowledge of CPAs' attitudes on the acceptance of commissions and contingent fees may help determine appropriate rules and useful codes of professional conduct and can serve to guide training efforts of licensing and regulating bodies. The information may be useful in the political influence process as well. Policymakers who wish to maintain prohibition of these type fees could cite this knowledge concerning CPAs' judgments on commissions and contingent fees. The results also provide further support of the Multidimensional Ethics Measure as a useful tool for improving our understanding of CPAs' ethical judgments.

REFERENCES

- Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50, 179–211.
- Ajzen, I., & Fishbein, M. (1980). *Understanding attitudes and predicting social behavior*. Englewood Cliffs, NJ: Prentice-Hall.
- Allen, C. (2001). New AICPA independence rules address ethics issues. *Journal of Accountancy* (Nov), 22–23.
- Alreck, P. L., & Settle, R. B. (1995). *The survey research handbook second edition*. Chicago, IL: Richard D. Irwin.

- American Accounting Association (1993). *A special issue: Ethics in accounting*, 18 (March).
- Blumenthal, R. G. (1990). Accounting body effectively clears certain new fees. *Wall Street Journal*, 5(June), 13A.
- Cohen, J. R., Pant, L. W., & Sharp, D. J. (1993). A validation and extension of a multidimensional ethics scale. *Journal of Business Ethics*, 12, 13–26.
- Cohen, J. R., Pant, L. W., & Sharp, D. J. (1995). An international comparison of moral constructs underlying auditors' ethical judgments. *Research on Accounting Ethics*, 1, 97–126.
- Cohen, J. R., Pant, L. W., & Sharp, D. J. (1996). Measuring the ethical awareness and ethical orientation of Canadian auditors. *Behavioral Research in Accounting*, 8(Suppl.), 98–119.
- Cook, J. M. (1987). The AICPA at 100: Public trust and professional pride. *Journal of Accountancy, AICPA Centennial Issue* (May), 370–379.
- Cruz, C. A., Shafer, W. E., & Strawser, J. R. (2000). A multidimensional analysis of tax practitioners' ethical judgments. *Journal of Business Ethics*, 24(3), 223–244.
- Fishbein, M., & Ajzen, I. (1975). *Belief, attitude, intention and behavior: An introduction to theory and research*. Reading, MA: Addison-Wesley.
- Flory, S., Phillips, T., Jr., Reidenbach, R., & Robin, D. (1992). A multidimensional analysis of selected ethical issues in accounting. *The Accounting Review*, 67(2), 284–302.
- Flory, S., Phillips, T., Jr., Reidenbach, R., & Robin, D. (1993). A reply to: A comment on a multidimensional analysis of selected ethical issues in accounting. *The Accounting Review*, 68(2), 417–421.
- Guffey, D. M., & McCartney, M. W. (1999). *The ethics construct: A multidimensional analysis in an academic setting*. American Accounting Association Annual Meeting. San Diego, California.
- Hair, Jr., J. F., Anderson, R. E., Tatham, R. L., & Black, W. C. (1992). *Multivariate data analysis*. New York, NY: Macmillan.
- Kaiser, H. F., & Rice, J. (1974). Little Jiffy, Mark IV. *Educational and Psychological Measurement* (Spring 1974), 111–117.
- Kim, J.-O., & Mueller, C. W. (1978). *Introduction to factor analysis: What it is and how to do it*. Beverly Hills and London: Sage.
- Kohlberg, L. (1969). *Stages in the development of moral thought and action*. New York: Holt, Rinehart and Winston.
- Lowe, H. J. (1987). Ethics in our 100-year history. *Journal of Accountancy, AICPA Centennial Issue* (May), 79–87.
- Nunnally, J. C. (1970). *Introduction to psychological measurement*. New York: McGraw-Hill.
- Nunnally, J. (1978). *Psychometric methods* (2nd ed). New York: McGraw-Hill.
- Patel, C., Harrison, G., & McKinnon, J. (1999). *Cultural influences on judgments of professional accountants in relation to auditor-client conflict resolution*. Emerging Issues in International Accounting Conference. Niagara Falls, NY.
- Peter, J. P. (1979). Reliability: A review of psychometric basics and recent marketing practices. *Journal of Marketing Research*, 16, 6–16.
- Ponemon, L. A. (1990). Ethical judgments in accounting: A cognitive-developmental perspective. *Critical Perspectives on Accounting*, 1(2), 191–215.
- Ponemon, L. A. (1992). Ethical reasoning and selection-socialization in accounting. *Accounting Organizations and Society*, 17(3/4), 239–258.
- Reidenbach, R. E., & Robin, D. P. (1988). Some initial steps toward improving the measurement of ethical evaluations of marketing activities. *Journal of Business*, 7, 871–879.

Reidenbach, R. E., & Robin, D. P. (1990). Toward the development of a multidimensional scale for improving evaluations of business ethics. *Journal of Business Ethics*, 9, 639–653.

Society of Louisiana CPAs Commissions and Contingent Fees Task Force Committee: September 24 Meeting (1992). Minutes. Society of Louisiana CPAs.

U.S.A. Before Federal Trade Commission (1988). File No. 851 0020 Agreement Containing Consent Order to Cease and Desist in the Matter of American Institute of Certified Public Accountants, a Corporation, September 8.

Wall Street Journal (1990). AICPA to implement proposed FTC accord allowing commissions, contingency fees, 5 June.

APPENDIX

Scenario A

Please assume (in stating your beliefs in regard to the following two scenarios) that commissions and contingent fees are totally legal in your state. In other words: Assume that such fee arrangements are not against the rules of the state society or the state board, nor are they against any state law.

Tom Phillipman is a partner in a CPA firm in your state. He works in the management consultant area of the practice. He believes that alternative fee arrangements, rather than a flat rate, are sometimes necessary in order to obtain new business.

Recently, Tom entered into an agreement with a client whereby the fees to Tom’s CPA firm will be contingent upon the savings in manufacturing cost that the firm is able to secure for the client. In other words, the firm’s fees will be a percentage of the savings realized by the client as a result of the CPA firm’s services.

(1) Please rate Tom’s fee agreement with his client by placing a check between each of the opposites that follow.

Totally ethical _____:_____:_____:_____:_____:_____:_____:_____ Totally unethical

(2) Please give your beliefs on the agreement made by Tom with his client by placing a check (ü) between each of the opposites that follow.

Fair	_____:_____:_____:_____:_____:_____:_____:_____	Unfair
Just	_____:_____:_____:_____:_____:_____:_____:_____	Unjust
Morally right	_____:_____:_____:_____:_____:_____:_____:_____	Not morally right
Acceptable to my family	_____:_____:_____:_____:_____:_____:_____:_____	Unacceptable to my family
Culturally acceptable	_____:_____:_____:_____:_____:_____:_____:_____	Culturally unacceptable

Traditionally acceptable	-----	Traditionally unacceptable
Violates an unwritten contract	-----	Does not violate an unwritten contract
Violates an unspoken promise	-----	Does not violate an unspoken promise

(3) Please rate the likelihood that you would enter into the same type fee agreement. (Remember, please assume that commissions and contingent fees are totally legal in your state.)

Likely	-----	Unlikely
Probable	-----	Improbable
Possible	-----	Impossible
Definitely would	-----	Definitely would not

Scenario B

Ron German, a partner in a CPA firm in your state, recommended that his client, Markson Grocers, purchase their computer hardware and software from ABC Computers. Upon completion of Markson’s purchase from ABC, Ron (with Markson’s knowledge) was paid a commission on the sale.

(1) Please rate Ron’s fee agreement with his client by placing a check between each of the opposites that follow.

Totally ethical	-----	Totally unethical
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(2) Please give your beliefs on the agreement made by Ron with his client by placing a check (ü) between each of the opposites that follow.

Fair	-----	Unfair
Just	-----	Unjust
Morally right	-----	Not morally right
Acceptable to my family	-----	Unacceptable to my family
Culturally acceptable	-----	Culturally unacceptable
Traditionally acceptable	-----	Traditionally unacceptable
Violates an unwritten contract	-----	Does not violate an unwritten contract

Violates an	-----:-----:-----:-----:-----:-----	Does not violate an
unspoken promise		unspoken promise

(3) Please rate the likelihood that you would enter into the same type fee agreement. (Remember, please assume that commissions and contingent fees are totally legal in your state.)

Likely	-----:-----:-----:-----:-----:-----	Unlikely
Probable	-----:-----:-----:-----:-----:-----	Improbable
Possible	-----:-----:-----:-----:-----:-----	Impossible
Definitely would	-----:-----:-----:-----:-----:-----	Definitely would not

