

University of Richmond **UR Scholarship Repository**

Robins School of Business White Paper Series, 1980-2011

Robins School of Business

1988

A Performance Model for Staff Auditors in an Internal Audit **Environment**

Joseph M. Larkin

James A. Schweikart University of Richmond

Follow this and additional works at: https://scholarship.richmond.edu/robins-white-papers



Part of the Business Commons

Recommended Citation

Larkin, Joseph M. and James A. Schweikart. 1988. "A Performance Model for Staff Auditors in an Internal Audit Environment." E.C.R.S.B. 88-1. Robins School of Business White Paper Series. University of Richmond, Richmond, Virginia.

This White Paper is brought to you for free and open access by the Robins School of Business at UR Scholarship Repository. It has been accepted for inclusion in Robins School of Business White Paper Series, 1980-2011 by an authorized administrator of UR Scholarship Repository. For more information, please contact scholarshiprepository@richmond.edu.

A PERFORMANCE MODEL FOR STAFF AUDITORS IN AN INTERNAL AUDIT ENVIRONMENT

Joseph M. Larkin James A. Schweikart ECRSB 88-1

A PERFORMANCE MODEL FOR STAFF AUDITORS IN AN INTERNAL AUDIT ENVIRONMENT

bу

Joseph M. Larkin, Ph.D., CPA, CIA
Assistant Professor
Saint Joseph's University
Philadelphia, PA

and

James A. Schweikart, Ph.D., CPA
Associate Professor
University of Richmond
Richmond, VA

Address Communications to: James A. Schweikart Accounting Department Robins School of Business University of Richmond Richmond, VA 23173

* The authors want to thank E. I. DuPont Nemours for their help and participation in this study

A PERFORMANCE MODEL FOR STAFF AUDITORS IN AN INTERNAL AUDIT ENVIRONMENT

Labor turnover, especially at the staff level, is a pervasive problem throughout the accounting environment. The related costs can be substantial to the organization. While turnover is not necessarily dysfunctional, managing it is crucial to the success of organizations. Much of this turnover is due to unsuccessful performance of audicors. This study empirically examined selected variables of staff members in the internal audit environment in an attempt to associate them with successful auditor performance. The results showed that motivation to perform and job satisfaction were most strongly related to successful performance.

A PERFORMANCE MODEL FOR STAFF AUDITORS IN AN INTERNAL AUDIT ENVIRONMENT

The purpose of this research is to identify significant variables associated with successful auditor performance within the internal audit environment. A second purpose is to aid managers in controlling turnover within the internal audit function of organizations.

Employee turnover is pervasive within the accounting profession. The costs of turnover are substantial, and the consequences can be dysfunctional to both the organization itself and those it serves. These costs include increased recruiting and training activities, complications and uncertainties in planning operations, and possible decreases in goodwill and efficiency if personnel assigned to a function change too frequently. Shore [1984] offers possible remedies to manage these costs. Among them are periodic job analyses, stratification of migrators into unique categories and conducting exit interviews.

Benefits of turnover include culling nonpromotable personnel, flexibility in maintaining the optimal size of the labor force, and possible increases in goodwill if "loyal," former members obtain responsible positions elsewhere within the organization or outside it. In light of these costs and benefits, turnover should not be viewed necessarily as a problem to be eliminated but as a phenomenon to be understood and controlled, so that organizations can maximize the cost-benefit differential.

Managing turnover is crucial to the success of organizations. Part of this turnover can be attributed to unsuccessful performers. Within the internal auditing environment, there is no specific predictive model of successful auditor performance.

PRIOR WORK

Very little research exists which models auditor performance. Ferris and Larcker [1983], Harrell and Stahl [1984], Jiambalvo [1979], Jiambalvo et al., [1983], Wright [1982], and Frazer [1987] among others have explored the public accounting audit environment of large CPA firms. Little research has addressed the unique and distinct environment of internal auditing. The differences in job tasks and environments of the internal auditor (IA) from the external auditor suggest that research rindings may not be transferable across environments and support an attempt to establish a separate model. Some of the variables used in past external auditor models however, are employed in this study, as they may have significance in both environments.

Given variables of past research and variables unique to the specific internal audit environment, the following hypotheses are offered:

- H1: There is a direct positive relationship between an internal auditor's (IA) measured performance and his/her job-related abilities.
- H2: There is a direct positive relationship between an IA's measured performance and his/her job satisfaction.
- H3: There is a direct positive relationship between an IA's measured performance and his/her job-related motivation.
- H4: There is a direct positive relationship between an IA's measured performance and his/her organizational commitment.
- H5: There is a direct positive relationship between an IA's measured performance and his/her professional commitment.
- H5: There is a direct positive relationship between the strength of the interpersonal attraction of the supervisor and IA and measured performance.

METHOD

Data were gathered via a questionnaire. A large multinational corporation agreed to cooperate for the study. Names and addresses of auditors in the domestic audit division, an endorsement letter from management and actual

performance appraisals by managers of auditors were provided to the researchers. The study was confined to U.S. domestic operations so not to confound results with foreign cultured bias.

The sample population was composed of two parts. The first portion consisted of the current audit staff of the entire domestic operations. This portion was stratified into three layers; managers, supervisors and staff. The second portion of the sample consisted of 32 recent separations from the audit division. It, too, was stratified into three layers. This second portion was still employed in other areas of the organization and was included to ensure that all levels of performance were in the sample. After removing the pretest participants, the final sample size was 138 professionals. Table 1 shows the stratification of the sample according to organizational level.

Insert Table 1 Here

The overall response rate was 65% and no second mailing was considered necessary. Table 2 shows the survey response rate by category.

Insert Table 2 Here

VARIABLES

Construct: Measured Performance (Dependent Variable)

Definition: The archive rating indicated on the annual performance appraisal form for an individual.

This construct was measured by gathering the individual performance ratings for each respondent from personnel files of the organization. Due

to its confidential nature, the data for the overall performance appraisal only were gathered through phone conversations with management. The performance appraisal ratings are extensive and strongly distinguish varying levels of performance. Five levels, or grades, are used in the rating process. Within the three highest grades are three levels. For example, an employee may be rated outstanding overall and rated further as to falling into the top, middle or lower third of that category. These delineations provide eleven ordered ratings. The lowest two grades, unsatisfactory/weak and pending termination are seldom given. All of the participants in the study received at least a Good minus rating (9); i.e., they were in the top 9 categories. Table 3 shows the rating scale and ratings of those in the sample.

Insert Table 3 Here

Construct: Ability (H1) (Independent Variable)

Definition: The competency of an individual to satisfactorily perform the required tasks of a job.

Based upon previous research, three dimensions were used to measure the ability of an individual. All measurements were by self-report.

The first measurement of ability was the college or university attended. Using <u>Barron's Profile of American Colleges</u> [1986], each school was classified in accordance with its Barron's rating. Nine classifications are used in the rating process. They range form noncompetitive to most competitive.

The second measurement of ability was the highest degree attained. All respondents had either a bachelor's and/or master's degree(s). If the highest degree attained was the master's, it was used as the relevant item of interest.

The third measure was the grade-point average of the individual for

the highest degree earned. That is, the undergraduate averages for holders of bachelor's degrees and the graduate averages for master's degrees were used with a scale ranging from A=4.0, B=3.0,....to F=0.0.

Construct: Job Satisfaction (H2) (Independent Variable)

Definition: The overall level of an individual's personal satisfaction with their position within the organization relative to their co-workers.

A version of Hoppock's Job Satisfaction Measure (1935) was used to measure job satisfaction. It consists of a five-item instrument.

Construct: Motivation (H3) (Independent Variable)

Definition: That which moves someone to a certain course of action or behavior.

This construct was measured within the Expectancy Theory paradigm. Expectancy theory refers to a set of decision theories of work motivation and performance [Vroom, 1964]. The main point of this theory suggests that the motivation of an individual to perform at a particular level of effort is a function of the algebraic sum of the products of: (1) the value (valence) an individual places on an outcome, (2) the individual's probability estimate that effort leads to performance (expectancy) and, (3) that performance leads to the outcome (instrumentality) [Ferris, 1977]. This theory is commonly known as the VIE Theory. Items were developed inquiring about respondents' valences, expectancies, and instrumentalities.

If any single component of the VIE model breaks down, the level of motivation to perform will be affected. The theory suggests that an individual will perform at a level which, based on his or her subjective probability assessment, will lead to certain desired outcomes. In equation form, it may be written as follows:

Motivation = Expectancy x [Instrumentality x Valence]

$$M = (E --> P) \times [(P --> 0) (V)]$$

where:

M = motivation to perform

V = valence

P = performance

E = effort

0 - outcome

Construct: Organizational Commitment (H4) (Independent Variable)

Definition: The degree of loyalty of an individual to his or her organization, as perceived by the individual.

This is manifested in the individual's assessment of the likelihood that he or she will maintain membership in the organization. Two questions were asked to test this hypothesis.

- 1. Relative to my co-workers on the job, I work very hard.
- 2. From 0 to 100%, please estimate the probability that you will be with your organization three years from now.

8

The data for question one were scaled from strongly agree to strongly disagree. The product of the above item scores served as the respondent's organizational commitment measure.

Construct: Professional Commitment (H5) (Independent Variable)

Definition: The degree of loyalty of an individual to his or her profession, as perceived by the individual.

This is manifested in the respondent's probability assessment of future organizational membership within the Auditing Division. The following question was asked to test this hypothesis.

If you believe that you will be with your organization three years from now, from 0 to 100%, please estimate the probability that you

will be in your current division or position.

₽

Construct: Interpersonal Attraction (H6) (Independent Variable)

Definition: The level of congruency between two individuals concerning their attitude similarities on both professional and general issues.

To test this hypothesis, a series of questions dealing with general interest and professional issues was presented. Each respondent was unobtrusively identified to determine their role in the rater/ratee dyad. With the assistance of management, a rater-ratee pairing was identified for each staff auditor. Thus, for each staff auditor, an absolute attitudinal difference between him/herself and his/her evaluator was computed. This statistic served as the interpersonal attraction measure for the study.

DATA ANALYSIS AND RESULTS

The Kruskal-Wallis (K-W) one-way analysis of variance test was used for data analysis. It is useful for deciding whether "k" independent samples are from different populations. It is an extension of the Mann-Whitney test. The results are shown in Table 4.

Insert Table 4 Here

Job satisfaction and motivation were found to be significantly related to measured performance at the .05 level. Additionally, organizational commitment and interpersonal attraction were found to be slightly less related to measured performance. College prestige, one of the three proxy variables used to measure ability, was also somewhat related to measured performance. Overall, given a criteria of .05 for significance, support was found for hypotheses two and three.

Performance Appraisal and Ability (H1)

The results of this study are similar to those of Ferris [1982), which found limited relationships between the educational factors examined and subsequent employee performance. Ross and Ferris [1981] found the strongest support for quality of school attended, followed by degree attained as the strongest correlates to subsequent performance. Undergraduate grades appeared of little importance for rated performance. These findings are somewhat different from the current study.

The weak relationship between performance appraisal and the highest degree attained and GTA is interesting because it raises some question as to whether the organization is justified in paying a premium for individuals possessing a graduate degree or for those with higher GPAs. However, interpretation of the findings of hypothesis one must be done cautiously. The demographic data concerning the highest degree attained indicate that four of the seven managers responding possess an advanced degree. This may imply that the organization values advanced education in its management. Data indicating at what stage in one's career the advanced degree was attained were not gathered. This may have helped explain the lack of relationship.

The relationship between performance and GPA may have been more pronounced if the actual GPA data were obtained instead of the categorical variable measurement. Using only four categories somewhat limited the variance. However, the researcher were advised, a priori, that most employees had rather high GPAs, since this is a characteristic which recruiters seek in prospective employees. Therefore, there was no assurance that requesting actual data would have improved the measures. Also, some respondents may not actually remember their average, since some have been out of school for

many years. In that case, there may have been a tendency to perhaps, "embellish" the average. Using categorical responses tends to limit this temptation.

The relationship between performance and rated prestige of school attended is of interest. Regardless of whether there is a true relationship between the school attended and subsequent performance, there may be, at least, a perceived institution value. A feeling may exist among management that certain schools traditionally produce high performers. However, an examination of the rated prestige of school attended of the seven responding managers does not indicate a tendency towards any particular category. That is, no clustering was found among responses. The moderate relationship between PA and college prestige suggests that perhaps, the organization should continue to recruit members at the same institutions, since their recruiting efforts appear effective.

Performance Appraisal and Job Satisfaction (H2)

A strong relationship was found to exist between performance appraisal and job satisfaction. The vast majority of respondents indicated high-moderate to high levels of job satisfaction. Again, this is indicative of the sensitivity of management to its employees. Satisfaction was high across all three levels of the organization. The high measures of satisfaction suggest that most workers are satisfied with their jobs.

Performance Appraisal and Motivation (H3)

The significant relationship between performance and motivation to perform supports the findings of Ferris [1977] and Jiambalvo [1979]. These prior studies were able to explain modest portions of the variation on performance among public accountants. However, comparison of their findings and the

results of this study should be made only after considering two important factors. First, both studies involved the public accounting environment. Second, different analytical techniques were used (Ferris used path analysis; Jiambalvo used multiple analysis of variance). The current study used a less restrictive, nonparametric test. Some caution is required when analyzing the computed motivational levels. Generally, motivation was low across all levels, despite a very high correlation with performance appraisal. If the measure is considered in relative, rather than absolute terms, the findings become more meaningful.

Performance Appraisal and Organizational Commitment (H4)

A priori, it was expected that organizational commitment would be reasonably strong. The participating company is known for high levels of concern for its employees, and long tenures with the organization are common. This notion was supported, as most respondents indicated high probabilities of remaining with the organization. A moderate relationship (significant at the .08 level) was found between the two variables. The results are similar to prior research [Mowday et al., 1974; Ferris, 1981]. In each of these studies, organizational commitment was related to measured performance. Lawler [1966] found ability to be a moderating variable in the relationship between performance and organizational commitment.

Performance Appraisal and Professional Commitment (H5)

The proxy measure of professional commitment, the intent to remain in the current position, may be only a partial measure of commitment to the profession. There may be other intervening variables which are relevant.

Again, management tends to encourage employees to migrate within the organization. Thus, current positions within the audit division may be viewed

as interim in the sense that they are a training ground for future positions.

The weak correlation could be a result of a strong skewness towards the low likelihood of remaining.

Demographically, the low levels of professional certification (e.g. CIA and/or CPA) among respondents may indicate a short-term commitment to the internal auditing profession. This should not be misinterpreted to conclude that the performance of current tasks is deficient. It is quite possible to perform well, yet intend to remain in a position for a relatively short while.

Managers reported higher levels of intent to remain in their current positions. This is understandable since they are further along in their careers and may have made a conscious decision earlier in their careers to remain within the audit division.

Performance Appraisal and Interpersonal Attraction (H6)

Corporate "culture" can be manifested in attitude similarity. It is plausible to suggest that superiors and subordinates may share common opinions and that the similarities may be related to measured performance. The significance level of .08 may indicate a moderating effect.

A discussion with management revealed a conscious effort to recruit those individuals who, at least, share viewpoints of their prospective managers. There are other measures of interpersonal attraction which could have been used. For instance, physical characteristics, including physical attractiveness, have served as predictor variables of measured performance. These were not considered in this study.

LIMITATIONS

The variables tested were selected carefully from a review of previous research. In part, selection of the variables is a subjective decision. Many of the variables selected for this study have, in the past, withstood tests of validity and reliability. The instruments used to measure the variables also have withstood testing. No attempt has been made in this project to identify causal relationships in the model. This task remains for future research.

A possible drawback is that the results obtained may be misleading because of the omission of other relevant variables. The variable list is not exhaustive. Thus, one of the variables included might have been found to be significant not because it was actually related to the dependent variable, but because it was correlated with another relevant variable not included in the study. Since relevant variables may have been omitted, this study may be considered exploratory in nature.

When dealing with attitudinal variables and opinion research, measurement error is of concern. Accordingly, the same concern exists for this study and its findings. Some imprecision is to be expected.

Caution, too, should be exercised in generalizing the results beyond the participating organization. However, it would be reasonable to generalize the findings to other similar companies.

CONCLUSION

A model for internal auditor performance is needed. Insights for recruitment, staffing, performance appraisal, professional education and job design can then be gained. As significant variables are found, recruiters can more easily identify potentially successful internal auditors. Also,

tasks can be designed to maximize organizational commitment based upon the employees' perceptions of their tasks.

This study has offered two seemingly important factors related to internal auditor success: job satisfaction and motivation. The model however, is far from complete. Accordingly, further work is needed to ascertain those missing variables and to determine the impact of one company culture on the reported results of this study.

Appendix A
Summary of Questionnaire Items * (Appendix B)

Part	Quest. #	Hypothesis	Construct/Variables
I	1-2	demographic	
	3	H1	Ability (Education)
	4-6	demographic	
	7	H1	Ability (College Prestige)
	8	H1	Ability (GPA)
II	1-20	Н6	Interpersonal
			Attraction
	21-22	H4	Organizational
			Commitment
	23	Н5	Professional
			Commitment
III	1-12(set 1)	Н3	Motivation
			(valence)
	1-12(set 2)	Н3	Motivation
			(instrumentality)
	13-14	Н3	Motivation
			(expectancy)
IV	1-5	H2	Job Satisfaction

^{*} This table summarizes the questionnaire items with the applicable hypotheses and the constructs.

Appendix B Questionnaire

Part	I Please cir	rcle t	the charac	cteris	tic which pertains t	o you.
1.	Age. a. 22	2-25	b. 2	26-29	c. 30-34	d. over 34
2.	Gender. a. Ma	ale	b. I	Female		
3.	Education.	Highe	est degree	atta	ined:	
			Bachelor' Master's Other	degre		
4.	Certification.					
		a. b.	CPA CIA	c. d.	CMA Other	
5.	Length of time with	emplo	oyed		Less than 6 months 6 months - 2 years More than 2 years	
6.	Length of time in current pos				Less than 6 months 6 months - 2 years More than 2 years	
7.	College/Univers	sity a	attended.			
		Name :	tion:			
8.	Grade point av	erage	. (A=4.0	, B=3.	0, etc.)	
			2.0 - 2.4 2.5 - 2.5 3.0 - 3.4 3.5 or al	9		
9.	As an active a been approxima		r, I expe	ct/exp	ected out-of-town tr	avel to be/have
		a. b. c. d.	0% - 250 26% - 500 51% - 750 more than	8		
10.	I do not/did n	ot mi	nd the ou	t-of-t	own travel estimated	l above:
		stro	DESCRIPTION OF THE PROPERTY OF	stro agr	ngly	

Please circle the appropriate response which corresponds to your feelings towards each statement

Part II

		strongly			stro	ť	
		disa	gree		agre	2	Inter-
1.	The CIA designation will make me a better auditor	1	2	3	4	5	personal Attraction H6
2.	Oral and written communication skills are essential for successful IA's.	1	2	3	4	5	
3.	The current structure of audit teams unnecessarily restricts the auditor autonomy.	1	2	3	4	5	
4.	As a profession, internal auditing is as prestigious as public accounting.	1 .	2	3	4	5	
5.	Internal auditing is usually not the first job choice of a college senior.	1	2	3	4	5	
6.	As an IA, there is a legitimate area of influencing people to serve organizational goals that is good for the organization.	1	2	3	4	5	
7.	IA's should be willing to accept significant amounts of out-of-town travel.	1	2	3	4	5	
8.	Internal auditing is not a "profession" in the true sense of the word.	1	2	3	4	5	
9.	The IA function should assist external auditors when possible.	1	2	3	4	5	
10.	Internal auditing provides a valuable service to the organization.	1	2	3	4	5	
11.	The political party in office in Washington really has little overall effect on what happens in the country.	1	2	3	4	5	
12.	The money spent on space exploration could be better used in other ways.	1	2	3	4	5	
13.	Television shows contain too much violence.	1	2	3	4	5	

			ngly gree			ngly ee
14.	A person's physical appearance provides you with a lot of information about them.	1	2	3	4	5
15.	President Reagan has proven to be a strong leader.	1	2	3	4	5
16.	Defense spending should be decreased by the government.	1	2	3	4	5
17.	The Soviet Union is the biggest security threat to our country.	1	2	3	4	5
18.	The environment should be protected by everyone.	1	2	3	4	5
19.	The credibility of some religious groups has suffered recently.	1	2	3	4	5
20.	As a nation, the quality of life here is probably better than most countries	1	2	3	4	5
21.	Relative to my co-workers on the job, I work very hard.	1	2	3	4	Organiza 5 Commitme H4
22.	From 1 to 100%, please estimate the pro	babil	ity	that	you	

will be with DuPont three years from now.

23. If you believe that you will be with DuPont three years from now, from 0 to 100% please estimate the probability that you will be in your current division or position.

Professional Commitment H5

Please circle the appropriate response which corresponds to your feelings towards each item as they apply to you in you job.

Part III

		not <u>impo</u>	rtant		very	rtant	
1.	High pay.	1	2	3	4	5	H3 Motivation
2.	Increased support from supervisors	. 1	2	3	4	5	(Valence)
3.	Greater opportunity to develop skills and abilities.	1	2	3	4	5	
4.	Job security.	1	2	3	4	5	
5.	Increased responsibility.	1	2	3	4	5	
6.	More enjoyment from doing my job.	1	2	3	4	5	
7.	Greater opportunity for advance- ment.	1	2	3	4	5	
8.	More opportunity to supervise others.	1	2	3	4	5	
9.	More opportunity to try out my own ideas.	1	2	3	4	5	
10.	Greater feeling of doing something worthwhile.	1	2	3	4	5	
11.	More praise and recognition for completed work.	1	2	3	4	5	
12.	More opportunity to do different things.	1	2	3	4	5	
Perf	ormance of my job enables me to achi	.eve/c	btair	thes	se out	comes	
		stror disag			stror	_	(Instrumentality)
1.	High pay	1	2	3	4	5	
2.	Increased support from supervisors.	1	2	3	4	5	
3.	Greater opportunity to develop.	1	2	3	4	5	
4.	Job security.	1	2	3	4	5	
5.	Increased responsibility.	1	2	3	4	5	

			ngly		stro agre	ngly e	
6.	More enjoyment from doing my job.	1	2	3	4	5	
7.	Greater opportunity for advancement.	1	2	3	4	5	
8.	More opportunity to supervise others.	1	2	3	4	5	
9	More opportunity to try out my own ideas.	1	2	3	4	5	
10.	Greater feeling of doing something worthwhile.	1	2	3	4	5	
11.	More praise and recognition for completed work.	1	2	3	4	5	
12.	More opportunity to do different things.	1	2	3	4	5	
13.	The harder I work at my job, the better my performance appraisal is.	1	2	3	4	5	Motivation (Expectancy)
14.	If I complete an assignment thoroughly and on time, I will receive a good evaluation from my supervisor.	1	2	3	4	5	

Part IV

 Which on of the following shows how much of the time you feel satisfied with your job.

Job Satisfaction H2

(Hoppock)

- a. Never
- b. Seldom
- c. About half of the time
- d. Most of the time
- e. All of the time
- 2. Choose one of the following statements which best tells how well you like your job?
 - a. I hate it.
 - b. I dislike it.
 - c. I am indifferent to it.
 - d. I like it.
 - e. I love it.

PLEASE ANSWER: Question 3 if you are currently in the Auditing Division, or question 4 if you are no longer in the Auditing Division. All respondents please answer question 5.

- 3. Which one of the following best tells how you feel about changing your job?
 - a. I would quit this job at once if I could.
 - b. I would like to change both my job and my occupation.
 - c. I like to exchange my present job for another one.
 - d. I am not eager to change my job, but I would do so if I could bet a better job.
 - e. I would not exchange my job for any other.
- 4. Which one of the following best tells how you felt when you left your position in the Audit Division?
 - a. I was very anxious to leave the position.
 - b. I was somewhat anxious to leave the position.
 - c. I was indifferent on leaving the position.
 - d. I was somewhat sad to leave the position.
 - e. I was very sad to leave the position.
- 5. Which one of the following shows how you think you compare with other people?
 - a. No one dislikes his/her job more than I dislike mine.
 - b. I dislike my job more than most people dislike theirs.
 - c. I like my job about as well as most people like theirs.
 - d. I like my job better than most people like theirs.
 - e. No one likes his/her job better than I like mine.

REFERENCES

- Barron's Educational Series, Inc., <u>Barron's Profiles of American</u>
 <u>Colleges</u>, Fifteenth Ed., 1986.
- Ferris, Kenneth R., "A Test of The expectancy Theory of Motivation in an Accounting Environment," <u>The Accounting Review</u>, July, 1977, pp. 605-615.
- _______, "Organizational Commitment and Performance in a Professional Accounting Firm," <u>Accounting Organizations and Society</u>, 1981, pp. 317-325.
- and Performance," <u>Accounting</u>, <u>Organizations and Society</u>, 1982, pp. 225-230.
- ______, and Larcker, David F., "Explanatory Variables of Auditor Performance in a Large Public Accounting Firm,"

 Accounting, Organizations and Society, 1983, pp. 1-11.
- Frazer, J. Douglas, "Performance Evaluation of Auditors: The Importance of Time-Budget Pressure Through a Focus on the Evaluator", unpublished Ph.D. dissertation (Temple University, 1987).
- Harrell, Adrian M., and Stahl, Michael J., "McClelland's Trichotomy of Needs Theory and the Job Satisfaction and Work Performance of CPA Firm Professionals," <u>Accounting</u>, <u>Organizations and Society</u>, 1984, pp. 241-252.
- Hoppock, R., Job Satisfaction, Harper & Row, 1935.
- Jiambalvo, James, "Performance Evaluation and Directed Job Effort:

 Model and Analysis in A CPA Firm Setting," <u>Journal of Accounting</u>

 <u>Research</u>, Autumn, 1979, pp. 436-455.
- _______, Watson, David H. and Baumler, John V., "An Examination of Performance Evaluation Decisions in a COA Firm Subunit,"

 Accounting, Organizations and Society, 1983, pp. 13-29.
- Lawler, E. E., "Ability as a Moderator of the Relationship Between Job Attitudes and Job Performance," <u>Personnel Psychology</u>, 1966, pp. 153-164.
- Mowday, R.T., Porter, L.W., and Dubin, R., "Unit Performance, Situational Factors and Employee Attitudes in Spatially Separated Work Units," <u>Organizational Behavior and Human Performance</u>, 1974, pp. 232-248.
- Ross, Jerry and Ferris, Kenneth R., "Interpersonal Attraction and Organizational Outcomes: A Field Examination," <u>Administrative Science Quarterly</u>, 1981, pp. 616-633.

- Shore, Lys Ann, "Staff Turnover: When Should the Revolving Door Stop?" Association Management, v. 36, September, 1984, pp. 100-01, 103, 105, 107.
- Vroom, V.H., Work and Motivation, Wiley and Sons, 1964.
- Wright, Arnold, "An Investigation of the Engagement Evaluation Process for Staff Auditors," <u>Journal of Accounting Research</u>, Spring, 1982.

Table 1
Stratified Sample
Current and Former Auditors
by Level

411 2000 000 000 000 000 000	Staff	Supervi	sor Manager	Total
Current	88	8	10	106
Former	<u>24</u>	7	_1	_32
Total	112	<u>15</u>		138

Table 2 Survey Response Rate By Level

Level	Max. Response	Act. Response	Percentage
Staff Supervisor Manager	112 14 _12	71 12 7	63% 86 58
Total	138	90	65%

Table 3
Performance Appraisal Levels
And Rating by Level

	Overall	Within Category	Rating	by Level	
Code	Rating	Rating	Staff	Supervisor	Total
9	Outstanding	high	4	1	5
8		medium	9	3	12
7		low	7	0	7
6	Very good	high	8	3	11
5	, ,	medium	23	1	24
4		low	6	2	8
3	Good	high	4	1	5
2		medium	5	0	5
1		low	4	0	4
Missing	observations #		0_	0	_10_
Total			_70		90

[#] includes 7 managers (no PA data gathered) and 3 staff
 (1 intern and 2 new hires who received no annual review)

Table 4 Kruskal - Wallis ANOVA Independent Variables with Performance

			Correct	for Ties			
Variable/Item (Chi Square	Signif.	Chi Square	Signif.			
		_					
Ability							
,							
Education	.03	.87	.03	.87			
College Prestige	2 12.40	.09	12.83	.08			
GPA	4.60	. 20	4.81	.19			
Job Satisfaction	9.60	.01	9.94	.01 *			
Motivation	15.37	.03	15.92	.01 *			
Organizational Commitment	8.15	.81	8.45	.08			
Professional Commitment	12.02	. 68	12.44	.65			
Interpersonal Attraction	15.08	.09	15.56	.08			

^{*} Significant at .05 level

1988 E. CLAIBORNE ROBINS SCHOOL OF BUSINESS WORKING PAPERS

- 1. Larkin, Joseph M. and James A. Schweikart.
 A PERFORMANCE MODEL FOR STAFF AUDITORS IN AN INTERNAL AUDIT ENVIRONMENT (88-1)
- 2. Litteral, Lewis A. and Grover L. Stell, Jr.
 MODELING THE BOTTLENECK PROCESS IN ELECTRICAL CABLE PRODUCTION (88-2)
- 3. Rose, John S. OPTIMAL SELECTION WITH HOLDING (88-3)
- 4. Jones, Clifton T.
 AN UPDATE ON OPEC BEHAVIOR: CARTEL STABILITY UNDER FALLING PRICES (88-4)