

Factors Related to Commitment of Extension Professionals in the Dominican Republic: Implications for Theory and Practice

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The Agricultural Extension Service was established in the Dominican Republic (DR) in 1962 to provide rural populations with opportunities to improve their knowledge and skills in agricultural production and rural development. With as much as 54 percent of the labor force in the DR associated with agriculture and over two-thirds of the country's export earnings derived from agriculture, the extension service is one of the country's most important educational organizations (de los Santos, 1988). As in other developing countries, extension in the DR has suffered from a lack of institutional coordination (currently six institutions conduct extension education), insufficient financial resources, and unclear or nonexistent supporting policies (World Bank, 1978; Cepeda, 1982; Pena, 1982; Marte, 1984). In addition, turnover among the well trained, experienced extension workers is quite high, creating an unstable and unpredictable situation for the organization and its clientele.

An increasing number of employees who do remain with the extension service do not professionally define themselves as extension educators but identify with their technical areas of expertise such as agronomy or animal science. A similar situation was described in the United States in a study of College of Agriculture faculty in Ohio (Poling and Norland, 1991). This apparent lack of job and organizational identification and commitment has been directly linked with absenteeism and turnover which in turn have been associated with organizational performance (Ferris, 1981; Jabs, 1989; Monday, Steers, & Porter, 1979; Rusbult & Ferrell, 1983). Variance among employees' various types of commitment (job, organizational, and professional) is a vital issue to investigate given the importance of the extension service in the DR and the organization's current

problematic condition.

In an organizational context, commitment has been conceptualized as loyalty to, identification with, and involvement in a job, organization, or profession. Commitment to an entity is manifested by the belief and acceptance of its values and goals, willingness to exert considerable efforts on its behalf as well as a definite and relatively strong desire to maintain membership in the job, organization, or profession (Ferris, 1981; Monday, Porter, & Steers, 1982). Commitment has been repeatedly identified as important for understanding work behavior and performance of employees in organizations (Porter, Crampon, & Smith, 1976; Rusbult & Farrell, 1983). Previous studies have identified various characteristics which may be related to commitment. In addition to demographic characteristics (Jones, James & Bruni, 1975; Rabinowitz & Hall, 1977; Sakaran & Monday, 1981) and, work related characteristics (Pfeffer & Lawler, 1980, Rusbult & Farrell, 1983; Saal, 1978), the sociopsychological characteristics of employees have been examined, albeit to a lesser extent (Ferris & Aranya, 1983; Greenhouse & Simon, 1976; Korman, 1967; Morris & Sherman, 1981; Reichers, 1985). Not only have variables apart from commitment been identified as related to job, organizational and professional commitment but the three commitment variables have been linked with each other (Weissenberg & Gruenfeld, 1968).

Given the plethora of literature on commitment and its potential relationships with antecedent variables, a theoretical framework was developed to aid in the conduct of the study. Admittedly, because the literature base for much of the study was from the industrial/organizational psychological perspective, the focus of the study

was on the potential contribution that job, organizational, and professional esteem (within the sociopsychological domain) may have to one's various types of commitments.

Defined as feelings of worth tied to individual perceptions developed from outside evaluations, esteem, in the case of this study, relates to specific individual feelings of worth related to job, organization, and profession. For example, a person's job esteem would be how he/she feels about him/herself in relationships to all aspects of the job. These feelings of worth (of lack thereof) are developed based on perceptions gained from information provided by external sources. "I am what I think you think I am" (Hedges, 1992). The "I" in this case would be the employee and the "you" would be those sources connected with the job (or organization or profession) which provide feedback. Because organizations can control to some extent, the information an employee receives about his/her self-worth, esteem appears to be a very practical yet theoretically based concept to study. In other words, recommendations from this study could actually be used to improve the real world situation from which the research problem emerged.

Purpose and Objectives

The purpose of this study was to investigate factors related to Dominican extension educators' job, organizational, and professional commitment. The objectives guiding the study included:

To examine relationships among selected work related (tenure, organization, job title, profession, program area, and region of work), socio-psychological (job, organizational, and professional esteem), and commitment variables.

To determine the proportion of variance in job, organizational, and professional commitment which could be explained by the set of work related and the set of socio-psychological variables.

To determine the best predictor(s) of job, organizational, and professional commitment.

Procedures

A descriptive correlational research design was used. Main and rival independent variables were selected, based on the review of literature and context specific situation. The target population (N=1055) and the group to which the results are being generalized included the extension agents, subzone and zone coordinators employed by the Secretariat of Agriculture, the Agricultural Bank, and the extension personnel employed by the Program of Water Management at Farm Level in the Dominican Republic. Four of the eight regions of the Dominican Republic (Central, East, North, and Southwest) were randomly selected, from geographic stratifications, as a representative sample of the identified extension personnel. The entire extension professional staff in each of the four regions was included in the study and treated as a cluster sample (n=550) with the cluster being region.

A self-administered questionnaire, designed by the researcher, based on reviews of appropriate literature and existing instrumentation, was used to gather data for the study. The instrument consisted of four main question areas: job, organization, profession, demographics. Six-point Likert scales were used to measure the main independent variables and dependent variables. Other data were collected using a variety of question formats. Content and face validity were assessed on an English version and Spanish version of the instrument by a panel of English-speaking and Spanish-speaking researchers. Additionally, content validity was rechecked, in country, by a local panel of experts. After making appropriate revisions per panel suggestions, reliability of the Likert-type scales was calculated on data obtained during a pilot test (again, in country) with 18 extension agents (Cronbach's alphas ranged from .79 to .95). After final revisions were made, the instrument was printed, assembled, coded and readied for distribution.

The researcher traveled throughout the regions distributing and collecting questionnaires. Data from 488 respondents (93%) were used as the data sample for the study. Even though a high response rate was obtained, comparisons were made of respondents and the target population on selected characteristics. No differences between those participating and those implicated were found (Miller and Smith, 1983) thus, the generalization to

the target population.

Results

Objective One

Correlational analyses indicated that all nine variables were significantly related to at least one of the three commitment variables (Table 1).

Table 1. Correlation Coefficients for the Relationships Between the Independent Variables and the Three Commitment Dependent Variables

Independent variable	Job	Organizational	Professional
Job esteem (a)	.67***	.59***	.49***
Organizational esteem (a)	.57***	.72***	.33***
Professional esteem (a)	.48***	.39***	.49***
Tenure (a)	.00	-.13*	-.06
Program area (b)	.33*	.30***	.13*
Position (c)	-.02	-.19**	.02
Employing organization (b)	.25***	.41***	.12
Salary range (b)	.04	.05	-.07
Region of work (b)	.14*	.14*	.12
Age (a)	.06	.05	.01
Gender (c)	.02	-.01	.03
Educational level (c)	-.04	-.01	.01
Profession (b)	.14*	.13	.10
a=Pearson correlation	*	p<.05	
b=Cramer's V	**	p<.01	
c=Kendalls Tau C	***	p<.001	

Substantial positive relationships were found between job esteem and job commitment ($r=.55$) and organizational esteem and job commitment ($r=.57$). A positive moderate relationship was found between professional esteem and job commitment ($r=.48$). Organizational esteem and organizational commitment had a strong positive relationship ($r=.72$); there was a positive substantial correlation between job esteem and organizational commitment ($r=.59$); and a positive moderate correlation between professional esteem and organizational commitment ($r=.39$). Positive moderate correlations were found between professional esteem and professional commitment ($r=.49$), job esteem and professional commitment ($r=.49$), and organizational esteem and

professional esteem ($r=.33$). Substantial positive correlations between job commitment and organizational commitment ($r=.68$) and between job commitment and professional commitment ($r=.55$) were found. A moderate positive correlation ($r=.40$) was found between organizational commitment and professional commitment.

Objective Two

A conceptual model was developed which included the three dependent (commitment) variables and two sets of (socio-psychological and work related) independent variables. In testing this model, the results indicated that, as a set, the work related independent variables accounted for 1.8 percent of the variance explained in the dependent variable "job commitment" (not significant). The socio-psychological independent variable set accounted for a significant proportion (37.4%) of the total variance explained in job commitment, after controlling for the work related variable set. The total variance in job commitment explained by the two independent variable sets was 52.7 percent. The work related set accounted for 5.7 percent and 2 percent of the organizational and professional commitment, respectively, and the socio-psychological set accounted for 28 percent each for organizational and professional commitment. Total variance explained was 52.7 percent (job), 61.7 percent (organizational) and 33.8 percent (professional). (Tables 2,3,4)

Objective Three

Using all socio-psychological, work-related, and two commitment variables in the stepwise regression, best predictors of job commitment were organizational and professional commitment and job esteem (61.4 percent of the variance explained). In predicting organizational commitment, organizational esteem and job commitment accounted for 62.3 percent. Concerning professional commitment, the variables selected as the best predictors were job commitment and professional esteem (37.0%). (Tables 5, 6, 7)

Conclusions and Recommendations

Extension workers' commitment to job, employing organization, and profession was related to esteem. Esteem is based on both the

Table 2. Semi-Partial Multiple Regression Coefficients for Sets Independent Variables (Job Commitment)

Independent variable set	Ka	Kb	sR2	F	df
Work-related	3	5	.02	1.35	5,469
Socio/Psychological	5	3	.38	123.8**	3,469

** p<.0000

Total R2 = 527

Table 3. Semi-Partial Multiple Regression Coefficients for Sets Independent Variables (Organizational Commitment)

Independent variable set	Ka	Kb	sR2	F	df
Work-related	3	5	.06	5.38**	5,469
Socio/Psychological	5	3	.28	114.6**	3,469

** p<.0000

Total R2 = .6173

Table 4. Semi-Partial Multiple Regression Coefficients for Sets Independent Variables (Professional Commitment)

Independent variable set	Ka	Kb	sR2	F	df
Work-related	3	5	.03	1.5	5,469
Socio/Psychological	5	3	.28	66.34**	3,469

** p<.0000

Total R2 = .3385

Table 5. Regression of Job Commitment on Selected Variables (Stepwise Entry)

Independent variable	R	R2	R2 change	Signif. f
Organizational commitment	.68	.46	.46	.000
Job esteem	.76	.58	.11	.000
Professional commitment	.78	.61	.04	.000
Professional (Agronomist)	.79	.62	.01	.000
Organization (Agricultural Bank)	.79	.63	.01	.000

F=159.79

p<.05

individual's feelings and beliefs about self, and the individual perceptions from his/her environment regarding his/her value, importance, contributions, and competence in a given role or roles. A possible explanation for extension workers not being sufficiently committed to their job as extension educators, to their employing organization, and/or to their profession of training, may originate in feelings, perceptions, and beliefs of low importance and value, low or unsatisfactory contributions, and/or lack of competence of self with respect to one or more of these specific roles.

Table 6. Regression of Organizational Commitment on Selected Variables (Stepwise Entry)

Independent variable	R	R2	R2 change	Signif. f
Organizational esteem	.72	.51	.51	.000
Job commitment	.79	.62	.11	.000
Organization (Secretariat of Agriculture)	.82	.67	.04	.000
Position (Subzone Coordinator)	.82	.67	.01	.000
Region of Work (North region)	.82	.67	.00	.000

F = 198.289

p<.05

Regression Model: $Y' = .9694 + .4230$ (organizational esteem) + .4422 (job commitment) - .6085 (organization = Secretariat of Agriculture) - .2956 (position = subzone coordinator) - .1868 (region = North).

Table 7. Regression of Professional Commitment on Selected Variables (Stepwise Entry).

Independent variable	R	R2	R2 change	Signif. f
Job commitment	.54	.30	.30	.000
Professional esteem	.61	.37	.07	.000
Region of Work (Central region)	.61	.38	.01	.000

F=97.323, p<.05

Regression Model: $Y' = 2.1056 + .3353$ (job commitment) + .3364 (professional esteem) - .2019 (region = Central).

Extension administrators may want to examine the messages being sent to the extension workers in their jobs and by their organizations that may be contributing to the extensionist's perception as to whether he/she is valued, is important, has a significant contribution, and/or possess competence. Messages could be sent through comments and memos, the reward system in place, availability and accessibility of support and facilities, as well as others.

The results of this study may be the first step toward the definition and adoption of policies and strategies to improve extension workers' levels of esteem and consequently their commitment to their job and organization. The findings may also have implications for training institutions and extension professional organizations in terms of considering and possibly adopting options and strategies to improve esteem among extensionists.

The apparent associations between job, organizational, and professional commitment seem to suggest that improving one type of commitment could positively influence the others. It could mean that any situation in job, organization, or profession that tends to diminish one type of commitment could affect the other two.

The extent to which an extension worker is committed to his/her job, employing organization, and/or profession can be substantially explained by the individual's socio-psychological characteristics (esteem), or a combination of his/her socio-psychological and selected work-related characteristics. To understand commitment of the extension worker regarding his/her job, employing organization, or profession, extension administrators and professionals in the field of extension education should focus on those characteristics (socio-psychological and work-related) as primary possible explanations.

Efforts to raise the level of commitment to job, employing organization, and profession could be exerted through improving and/or supporting these particular extension workers' characteristics.

The attitude of being committed to an entity (person, job, organization, profession) has been associated to actual and/or potential outcomes including survival, health, and effectiveness of the entity. To the degree that commitment exists, outcomes (desirable or undesirable) are expected.

That is, from an organizational perspective, a high level of commitment will be associated with desirable outcomes such as low rate of tardiness and absenteeism, high satisfaction and motivation, and low rate of turnover. A low level of commitment, on the other hand, will be associated with the undesirable outcomes of a high rate of tardiness and absenteeism, low satisfaction and motivation, and a high rate of turnover (Bateman & Strasser, 1984; Eisenberg, Huntington, Hutchinson, & Sowa, 1986; O'Reilly & Chatman, 1986; Shore, Newton, & Thornton, 1990).

The degree to which those desirable/undesirable outcomes occur is essential for understanding, defining, and evaluating performance and effectiveness of the entity to which commitment is devoted. Any employing system needs employees with the highest degree of commitment possible, and in most cases would try to manipulate factors considered to be antecedents to employees' commitment to the system which, in turn, is assumed to determine the ability of the system (organization) to carry out certain missions or achieving important goals such as providing identifiable services. By becoming a committed member and staying with an organization the employee expects to derive social, economic, and psychological rewards such as salary, promotion, security and support, and satisfaction. This study was conducted in the Dominican Republic but was conceptualized almost exclusively from North American literature and research findings. The study findings provided a variety of recommendations specifically related to the situation in the Dominican Republic. Those same findings can provide insight into similar situations in the United States.

For example, esteem, whether of a Dominican or American employee, can be considered to be an important link from organizational behavior to employee behavior. Messages sent to and/or received by employees play a major role in how those employees see themselves.

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