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Educational Needs of Community Health Nursing Supervisors

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Abstract Recent legislative trends toward early hospital dismissal and cost containment have shifted the setting for health care from the hospital to the home. Consequently, community health nursing supervisors are becoming increasingly responsible both for coordinating care for sicker clients with fewer available resources, and for guiding staff nurses who provide high-tech nursing skills in the home. This has resulted in new educational needs for these supervisors. To determine their educational needs and the barriers to implementing their roles, 160 community health nursing supervisors employed by community health nursing agencies in Michigan were surveyed. They reported educational needs related to labor relations, reimbursement procedures, fiscal management, marketing, and computer systems. Several types of educational experiences were found to influence their abilities to handle supervisory responsibilities, including enrollment in an educational program, highest level of education, and selected content areas taught in their formal educational programs. Nursing implications include using the research results to develop educational programs to meet the needs of community health nursing supervisors. Those who are adequately prepared educationally will be better able to provide effective supervision of staff nurses and ultimately, coordinate high-level client home care.

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Recent legislative trends toward early hospital dismissal and cost containment have made it necessary for community health nursing supervisors to coordinate care for sicker clients with fewer available resources, and to guide staff nurses providing high-tech care in the home. Coordination of this complex community care has resulted in new educational needs for these supervisors. Such needs must be met, since now more than ever, supervision is essential for goal-directed nursing practice to take place in the community. Consequently, the educational needs of the supervisors were explored as part of a larger study examining various aspects of the supervisory process.

SIGNIFICANCE

Community health nursing supervisors have many tasks to accomplish, one of which is providing guidance to staff nurses who are practicing independently and caring for clients across the lifespan. The recent introduction of prospective payment through diagnosis-related groups (DRGs), which limits the amount of time clients spend in the hospital according to their condition, has increased the needs of clients cared for at home (Phillips & Cloonan, 1987). Technologic advances have added to the complexity of client care, thereby increasing the need for an extensive clinical focus in schools of nursing and community health agencies (Archer, 1976; Forrest, 1983; Stevens, 1979). These changing client characteristics have increased the demands relative to clinical expertise on both community health nursing supervisors and the staff nurses. Barriers to effective supervision may be present when supervisors lack educational preparation related to clinical and community health nursing content areas.

When extensive clinical content is integrated into the curriculum, limited time remains for content related to administering patient care. Several authors noted that many nurses have inadequate educational preparation for management roles (Gleeson, Nestor, & Riddell, 1983; Forrest, 1983; Knollmueller, 1979; Howarth, 1982, Lees, 1980a; Stevens, 1979). Having a sound management background is also essential, as supervisors must have both management and clinical skills. Those in community health nursing also must possess a breadth of knowledge in order to guide staff nurses appropriately. Hence, educational preparation is a significant variable in analyzing barriers to effective supervision.

METHODS

Sample

This purposive sample consisted of all the nursing supervisors employed by all agencies named on a list obtained from the Michigan Department of Public Health. The list included 46 official health departments, 11 voluntary agencies, and 94 nonprofit and proprietary agencies. The sample included supervisors employed by five types of agencies: (1) official health departments not providing home health services; (2) official health departments providing home health services; (3) voluntary agencies such as Visiting Nurse Associations (VNAs) or Visiting Nurse Services (VNSs); (4) private nonprofit; and (5) forprofit, proprietary home health agencies.

Procedure

The study sample was selected in two ways: by sending questionnaires directly to supervisors when their names were known to the researchers; and by requesting, in community health agencies when the names were not known, the number of supervisors and the name of the person who would assure distribution of that number of questionnaires. All supervisors from all the agencies named on the list obtained from the Michigan Department of Public Health were mailed a questionnaire. Accompanying each questionnaire was a letter asking each supervisor to participate in the study. Return of the questionnaire implied the supervisor's consent to participate.

Each questionnaire was accompanied by a stamped self-addressed envelope. A cover letter contained assurance that participation in the study was voluntary, that confidentiality would be maintained on all collected data, and that all results would be reported only as group data. The participants were also told that they had the right to skip questions, and they were provided with instructions on how to withdraw from the study. Finally, respondents were asked not to write their agency name or their own name anywhere on the questionnaire and to complete the questionnaire on their own time rather than during work hours.

Reminder postcards were sent one month after the questionnaires were mailed to all participants. Return envelopes were coded only to monitor the response rate. If a researcher had an affiliation with a particular agency, the return envelopes for that agency were addressed to another researcher. All envelopes were destroyed after the names were checked off of the list.

The Instruments

Two sets of questionnaires were used in the study: the supervisory roles, functions, and barriers questionnaire and the demographic questionnaire. The former asked questions about six potential barriers to the implementation of functions listed under three major supervisory role categories: administrative; linchpin (liaison); and staff development. The six barrier choices included governmental and third-party regulations, agency regulations, personal limitations, educational barriers, no barriers, and other barrier (to be written in). Administrative role functions included items relating to the hiring, scheduling, and firing of staff; program planning and evaluation; and participating in budgetary and research processes. Linchpin role functions included such items as acting as a middle person between administration and staff, and coordinating the activities of the unit with other departments and agencies. Staff development functions included such items as assisting staff to develop new skills and evaluating performance.

The demographic questionnaire included items relating to the educational preparation of the supervisors and the types of agencies that employed them. It was thought that the type of agency might influence the educational needs of the supervisors.

Both questionnaires were reviewed for content validity and ease of administration by three community health nursing faculty and three administrative personnel who had in the past been in supervisory positions. The tools were pretested for clarity and completeness by three practicing community health nursing supervisors. Revisions were made on input received.

RESULTS

The return rate was 47.8% ($N = 160$). Since few respondents completed all of the questions, the number of respondents for each question varied. For this reason, the number of respondents for each question is reported.

All levels of educational experience were represented in the sample, with 69.8% of the respondents ($N = 155$) holding baccalaureate, associate degrees, or diplomas,

TABLE 1. *Respondents' Highest Level of Education (N = 159)*

Level of Education	Number	%
Associate degree	6	3.8
Diploma	29	18.2
B.S.N.	71	44.7
B.S. (nonnursing)	5	3.1
M.S.N.	31	19.5
M.S. (nonnursing)	16	10.1
Ph.D. (nonnursing)	1	0.6

and only 30.2% holding master's degrees. One respondent held an earned doctorate (Table 1).

Of those holding a baccalaureate degree, only 6.6% ($n = 5$) had a nonnursing degree while of those holding a master's degree, approximately one-third ($n = 16$) had a nonnursing degree. Of the 156 respondents, 36.5% indicated that they were currently enrolled in an educational program to obtain a higher degree.

Respondents were asked to indicate if 13 supervisory-related content areas were taught in their formal educational programs (Table 2). The original question requested a yes or no response. After reviewing the distributions related to this question, the researchers decided to group the responses into three major categories: high, 71 to 100%; moderate, 31 to 70%; and low, 0 to 30%. A high percentage of the respondents agreed that three content areas had been taught in their educational programs: public health nursing, team leading, and interpersonal management. In contrast, a low percentage reported that the five following content areas had been taught in their educational programs: marketing, computer systems, fiscal management, reimbursement procedures, and labor relations.

Respondents were also asked to rate their adequacy of knowledge of the 13 supervisory-related content areas. The original question format was a 5-point Likert scale. Responses of 1 and 2 (strongly agree and agree) were counted as agreement, while responses of 3, 4, and 5 (uncertain, disagree, and strongly disagree) were counted as lack of agreement. Once again, the researchers decided to group the responses into three major categories: high, 71 to 100%; moderate, 31 to 70%; and low, 0 to 30%. A high percentage of the respondents agreed that they had adequate knowledge in only 6 of the 13 content areas: public health nursing, team leading, assertiveness skills, interpersonal management, administrative/supervisory, and personnel management. A low percentage agreed that they had adequate knowledge in the areas of fiscal management and computer systems.

To determine if the educational coverage of supervisory-related content areas and adequacy of knowledge of these areas were different among supervisors with various levels of education, a chi-square test was used. Supervisors were divided into three groups: associate degree/diploma, baccalaureate (including both nursing and nonnursing preparation), and master's or above

TABLE 2. *Percentage of Respondents Who Agreed that Selected Content Areas Were Taught in Formal Educational Program and Perceived Adequacy of Knowledge of Content Area*

Content Areas	N^*	% Agreement Content Area Taught	N^*	% Agreement Knowledge Adequate
Public health nursing	155	93.5	149	89.9
Team leading	152	84.2	141	86.5
Interpersonal management	154	78.6	147	81.0
Administrative supervisory	152	65.8	148	79.1
Personnel management	153	62.1	146	71.2
Assertiveness skills	152	57.2	149	81.2
Legislative processes	153	51.6	145	38.6
High-tech nursing	149	35.6	146	44.5
Labor relations	154	20.1	148	36.5
Reimbursement procedures	153	15.0	147	59.9
Fiscal management	153	15.0	146	19.2
Computer systems	150	14.0	147	15.0
Marketing	153	12.4	146	37.7

N = total number of respondents.

(including both nursing and nonnursing master's and a nonnursing doctoral degree). There were weak significant differences for content areas taught among respondents with different educational levels for personnel management, fiscal management, administrative/supervisory, and labor relations. The master's degree group had the highest percentage of respondents who reported that one or more of these four content areas had been taught during their educational programs. In addition, the group with associate degree/diploma had the lowest percentage of respondents who reported that these four content areas had been taught in their educational program. The baccalaureate degree group consistently fell in the middle (Table 3).

When adequacy of knowledge regarding these content areas was compared by the same three levels of education, there was only one significant finding. A significant, weak association was identified between level of education and administrative/supervisory content. The highest percentage of respondents who reported adequacy of knowledge in this area was among those with master's degrees, while the lowest was among those with baccalaureate degrees. The associate degree/diploma group fell in the middle.

To identify the highest level of education by agency type, a chi-square test was again used for analysis. A significant, but weak association was found between agency type and level of education (Cramer's *Phi* 0.26; χ^2 21.0; *df* 8; *P* 0.01). As Table 4 shows, proprietary agencies had the highest percentage of associate degree/diploma respondents; private, nonprofit agencies had the highest percentage of baccalaureate degree respondents; and voluntary agencies had the highest percentage of master's degree respondents. In addition, official health departments and official health departments that offer home health services had a considerably higher percentage of master's degree respondents than the private, nonprofit or the proprietary agencies.

The researchers were interested in whether or not selected educational characteristics of the respondents were related to perceived barriers to effective supervision. Supervisors were also asked to choose one or

TABLE 3. *Respondents' Agreement with Coverage of Selected Supervisory-Related Content Areas, Adequacy of Knowledge Regarding these Areas, and Level of Education*

Content Area	Level of Education		
	Associate/Diploma (%)	Baccalaureate (%)	Master's (%)
Coverage			
Personnel management*			
Taught	39.4	61.1	78.7
Not taught	60.6	38.9	21.3
Fiscal management†			
Taught	5.9	12.5	26.1
Not taught	94.1	87.5	73.9
Administrative/supervisory‡			
Taught	45.5	63.4	85.1
Not taught	54.5	36.6	14.9
Labor relations§			
Taught	2.9	19.4	34.0
Not taught	97.1	80.6	66.0
Adequacy of knowledge			
Administrative/supervisory‖			
Adequate	84.8	69.6	91.1
Inadequate	15.2	30.4	8.9

* Cramer's *Phi* 0.29; χ^2 12.7; *df* 2; *P* 0.00.
† Cramer's *Phi* 0.21; χ^2 7.0; *df* 2; *P* 0.03.
‡ Cramer's *Phi* 0.31; χ^2 14.1; *df* 2; *P* 0.00.
§ Cramer's *Phi* 0.28; χ^2 11.9; *df* 2; *P* 0.00.
‖ Cramer's *Phi* 0.24; χ^2 8.5; *df* 2; *P* 0.01.

TABLE 4. *Educational Preparation of Respondents by Agency Type*

Agency Type	Level of Education		
	Associate/Diploma (%) ($n = 35$)	Baccalaureate (%) ($n = 76$)	Master's (%) ($n = 48$)
Official health department without home health services ($n = 42$)	14.3	47.6	38.1
Official health department with home health services ($n = 31$)	22.6	38.7	38.7
Voluntary agency ($n = 17$)	17.6	23.5	58.5
Private, nonprofit ($n = 42$)	21.4	64.3	14.3
Proprietary ($n = 27$)	37.0	48.1	14.8

more of six barriers that prevented them from performing specific functions listed under the administrative, linchpin, and staff development roles. The six barrier choices included governmental and third-party regulations, agency regulations, personal limitations, educational barriers, no barriers, and other barrier (write-in response). In the last category, lack of time was the prevailing response.

The researchers then created three categories of composite scores: the percentage of each barrier reported for functions listed under each of the three roles. These composite scores were treated as interval level variables and were related to educational characteristics of the respondents. A one-way analysis of variance (ANOVA) was computed to determine if the educational characteristics of the supervisors made a difference in the percentage of barriers identified to each of the three roles.

As one might expect, supervisors enrolled in an educational program to obtain a higher degree reported significantly (F 4.78; *df* 1.154; *P* 0.03) fewer barriers in implementing the staff development role (*M* 3.3) than those who were not (*M* 9.2). It was surprising that supervisors who had the following seven content areas taught in their formal educational programs actually identified more barriers to the three roles than those who did not: administrative/supervisory, personnel management, interpersonal management, fiscal management, high-tech nursing, marketing, and labor relations. In other words, supervisors who were exposed to these areas during their formal education actually identified more barriers to each of the three supervisory roles (Tables 5, 6, and 7).

There were two exceptions to this. First, supervisors who had had public health nursing content reported fewer educational barriers to the implementation of the linchpin role than those who did not. Second, those who had had interpersonal management content taught in their formal education reported significantly fewer agency barriers to the implementation of the staff development role than those who did not.

TABLE 5. *Comparison of Reported Barriers to Implementing the Administrative Role Between Supervisors Who Did and Did Not Have Various Content Areas Taught in Their Educational Programs*

Barrier	x	SD	F
Lack of time			
Personnel management			
Taught	20.0	20.7	8.11*
Not taught	11.0	14.7	
Administrative/supervisory			
Taught	19.4	21.0	5.46*
Not taught	11.8	14.4	
Labor relations			
Taught	23.4	22.8	4.35*
Not taught	15.3	18.2	
Education			
High-tech			
Taught	7.1	17.5	6.57†
Not taught	2.2	5.3	

* $p < 0.05$.
† $p < 0.01$.

IMPLICATIONS FOR PRACTICE

The study shed some interesting light on the educational characteristics of community health nursing supervisors in Michigan. Approximately two-thirds of them had educational preparation at the baccalaureate level or less, even though the master's level is preferred for community health nursing supervisors (Fish, 1984). In addition, supervisors indicated a need for further edu-

TABLE 6. *Comparison of Reported Barriers to Implementing the Linchpin (Liaison) Role Between Supervisors Who Did and Did Not Have Various Content Areas Taught in Their Educational Programs*

Barrier	x	SD	Sig. F Test
Educational			
Hi-tech content			
Taught	3.3	9.4	4.11*
Not taught	0.9	4.8	
Interpersonal management			
Taught	4.2	11.8	5.54†
Not taught	1.0	4.6	
Public health nursing			
Taught	1.3	6.0	6.92*
Not taught	7.0	15.7	
Agency regulations			
Marketing			
Taught	21.4	23.6	7.08*
Not taught	9.7	17.0	
Lack of time			
Personnel management			
Taught	15.3	22.0	4.67†
Not taught	7.9	16.5	
Personal			
Personnel management			
Taught	12.2	22.9	7.60*
Not taught	3.4	8.1	
None			
Personnel management			
Taught	59.8	33.3	11.88*
Not taught	77.9	26.4	

* $p < 0.01$.
† $p < 0.05$.

TABLE 7. *Comparison of Reported Barriers to Implementing the Staff Development Role Between Supervisors Who Did and Did Not Have Various Content Areas Taught in Their Educational Programs*

Barriers	x	SD	Sig. F Test
Agency barriers			
Interpersonal management			
Taught	5.6	10.4	6.40*
Not taught	11.2	13.6	
Personal			
Personnel management			
Taught	9.3	20.2	4.46†
Not taught	3.4	7.5	
Governmental			
Fiscal management			
Taught	6.2	18.0	7.30*
Not taught	0.9	6.0	

* $p < 0.01$.
† $p < 0.05$.

cational preparation related to marketing, computer systems, fiscal management, reimbursement procedures, and labor relations. The data indicate that close consideration should be given to integrating these content areas into community health nursing curricula at both the baccalaureate and master's levels. Furthermore, the type of agency that employs the supervisor may be an avenue for recruitment for both baccalaureate completion and master's programs. For example, since the greatest number of supervisors with an associate degree/diploma are employed by proprietary agencies and the greatest number of those with a baccalaureate degree are employed by private, nonprofit agencies, recruitment efforts for baccalaureate completion and master's programs could be respectively directed toward these agencies.

Supervisors who had had selected content areas taught in their formal educational programs actually reported more barriers to implementing administrative, linchpin, and staff development roles. This was surprising since one would assume that supervisors who were exposed to these concepts would perceive fewer barriers. Perhaps exposure to these content areas made the supervisors more aware of the related issues and consequently they were able to identify barriers more easily. Because the first step in alleviating a problem is to recognize that it exists, that is what their education appears to have provided—a better understanding of what their roles and their functions ought to be.

When examining barriers to supervision by content areas taught in formal education programs, one must also consider the degree to which content varies across baccalaureate and master's programs. Some master's programs, for example, have an administrative/management focus, while others may concentrate on the clinical aspects of community health nursing practice. Some of the differences identified could relate to the fact that the respondents had limited content in their educational programs, but through their employment did gain a broader perspective of how to organize role responsibilities.

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