Nursing Research in the 1980s: Issues and Implications

Harriet R. Feldman, R.N., M.S. Assistant Professor of Nursing Adelphi University Garden City, New York IN DESCRIBING an attribute of George Orwell, Hynes said "the man who can see a problem clearly, even if he cannot solve it, is valuable..." This article defines and clarifies some problems and issues of the nursing research enterprise, and makes some projections for the future.

Over the past several decades the value of nursing research has been evidenced by increasing support of federal and interstate agencies,² the development of centers for research,³ an increase in research endeavors of all kinds,⁴ the growth of doctoral programs,⁵ a rise in the number of consortia and collaborative efforts, and a change in the nature and number of avenues for reporting research.⁶ The direction of nursing research has also changed from studies about curricula, administration, and nurses themselves to clinical studies and those that expand on the nature of nursing theory and nursing science.⁴

This flurry of activity, and the recognition and popularity of research, have led to

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the emergence of problems and issues within the profession. Although funding has increased, the need for support in many areas of research outweighs monies available. Doctoral programs have increased, but quality may have suffered in attempts to produce quantity. Although the communication of research findings has increased, there are still too few journals in existence and too few research papers accepted; also, there are problems regarding how to report research. A rush to produce research has led to inferior quality in some cases. Research in nursing has been accepted as a legitimate activity in the profession, 7(p150) yet many nurses have little appreciation for the essence of research and an ability to interpret research findings.

Martinson^{8(p3)} has identified other obstacles to research: immediacy and timidity. Nurses as action-oriented professionals are put off by a process that is time-consuming, costly, and demanding in preparation. A poor self-image, reluctance to ask for help, and difficulty in dealing with criticism also prevent nurses from participating in research. These problems will be dealt with below in the discussion of a plan for the future.

CONTEMPORARY ISSUES

Studies that expanded on nursing theory and nursing science increased in the 1970s, ^{9(p1)} and will continue to do so in the 1980s. The nature of theory development, research, and practice is in a state of change, attended by forces that are driving and restraining. These forces impel us to think, to examine, to analyze, and to

synthesize; they are essential for the development of a discipline. Among the contemporary issues found in the literature are (1) What are the boundaries of nursing? Will borrowing ideas affect nursing's uniqueness from other disciplines? (2) Should nursing theory development be grounded in one or several conceptual frameworks? (3) Should nursing be concerned with developing a scientific foundation and generating nursing knowledge? (4) On what mode(s) of theorizing, that is, level(s) of theory, should nursing research concentrate? and (5) Is a common scientific orientation to nursing research necessary? These issues are highly interrelated; however, an attempt at separation is made in this article for the purpose of analysis.

Theory Development in Nursing

Should we develop nursing theories or expand existing knowledge in the basic sciences? While other scientific disciplines have evolved through logical, established methods and the selection of phenomena for study, nursing still asks "For what purpose is a theoretical body of knowledge intended?" and "What phenomena must be studied and what kinds of questions must be asked to develop needed

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knowledge?"^{10(p372)} Such terms as *embryo*, *infant*, *emerging*, *preparadigm*, and *prescience* are used to describe nursing in its quest to identify and develop a theoretical body of knowledge that gives clear direction to education, research, and practice.

Those who oppose nursing theory construction advocate expanding knowledge in the basic sciences that are useful for practice. They believe that no discrete phenomena exist that are specific to nursing.11(p12) One concern over the use of borrowed models and theories relates to the level of theory development attained. Have such theories been substantially supported in other disciplines? Are the theories or models generalizable to nursing? The practice of borrowing has been further complicated by the creation of nurse-scientist programs. Nurses earning doctorates in other disciplines, for example, sociology and anthropology, are using frameworks that relate data to those disciplines. Continued reliance on scientists prepared in other disciplines will hamper the advancement of nursing science. Nursing knowledge cannot be developed simply by testing basic science theories, 12(p373) although the contributions of other sciences should not be negated. "If the borrowing method is to be used by nursing, the theories and models must be supported from a nursing frame of reference before being synthesized into conceptual systems and models for nursing."13(p7)

Proponents of theory development support the uniqueness of nursing ^{12(p375)} and the existence of a frame of reference or boundaries. ¹³⁻¹⁵ The development of more or less elaborate conceptual models by

some nursing leaders attests to the validity of viewing nursing as a discipline. The way humanity is viewed by nursing is unique, and the boundaries of the field are flexible enough to accommodate differing concepts of humanity and the nature of the person-environment relationship. 9(p16),16(p27)

One or More Conceptual Frameworks

Accepting the assertion that the advancement of nursing science is inevitable and desirable leads to a second issue: Should nursing theory development be grounded in one or several conceptual frameworks? Downs and Fleming 7(pp94,95) acknowledge the importance of conceptual models as a stage in theory development and as a contribution toward clarifying the focus of nursing as a discipline. The flexible boundaries referred to earlier certainly support a variety of models within the context of nursing science. Developing multiple frameworks would enable the profession to view nursing from many perspectives, thereby increasing understanding of its nature and scope. Baer defends the Feyerabend approach to evolving theory; this position "articulates the belief that theory proliferation via the challenges of alternative theories is the key to more lively, democratic and fruitful science."17(p73)

Restricting the use to several models of theory development is proposed by others, although this author did not uncover literature advocating grounding in only one framework. A problem that arises when using multiple models relates to their divergence. The more the divergence, the less likely are findings to "converge in a

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cohesive body of knowledge."10(p9) A second concern relates to the rules to be followed in framework development; that is, competitors often disagree about the instrumental, methodologic, and theoretical rules that guide research. 16(p18) Finally, a single, global base may create great difficulty in theory development and be unrealistic in relation to the practice of nursing. 11(p12) Johnson writes about concentrating efforts on a smaller number of conceptual schemata.10(p10) This approach has strong appeal to this author, as it would consolidate the energies of the presently limited number of qualified researchers and lead more rapidly to the point where nursing science achieves social congruence, significance, and utility. 12(p376)

Theory vs Practice Models

A third issue confronting nursing research in the 1980s relates to the continuing debate over theory versus practice. Should research focus on basic theory development or on applied practice models? Stated in another way, should the emphasis be on generating nursing knowledge or on the outcomes of nursing intervention? The debate is also related to the issue of levels of theory, that is, should emphasis be on factor-isolating and factor-relating theorizing or situation-producing theorizing?

Those favoring concentrating on basic theory development believe that earlier stages must provide the foundation for higher ones. They see the move toward prescriptive theories as putting the cart before the horse. Donaldson and Crowley said "the discipline of nursing should be

governing clinical practice rather than being defined by it." 18(p118) A profession, as defined by Flexner in the 1920s (as cited by Johnson^{12(p372)}), must have its own body of knowledge, 12(p372) and that body must be identified clearly enough to support that profession's substance and goals. Basic scientists would contend that one must be concerned with describing, explaining, and predicting phenomena—the production of knowledge. The applied scientist, in contrast, seeks to use existing knowledge. If the existing knowledge is to come from nursing science and not from other disciplines, then the contention of those in support of developing basic theory is well founded.

The other side of this issue has gained momentum over the past decade. The view of nursing as an applied discipline provides impetus to the development of prescriptive theory and supports the move toward the extensive use of borrowed knowledge. Jacox provides this example of practice or situation-producing theory 11(p10):

...a nursing goal may be to prevent a postoperative patient from becoming hyponatremic. Nursing practice theory, states that, to prevent hyponatremia, a particular set of actions must be taken. This kind of theory presupposes and is built upon theory that explains, describes, and predicts, but is not limited to these. It must enable the investigator to go beyond these levels and say, "If I want to produce this condition in the patient (or conversely, to prevent another condition), this is what I must do."

It is believed that a professional discipline must go beyond lower level theory construction to prescription.¹²

Ascription to the practice or applied science view as a central focus at this time

in nursing's development is of great concern to some. 11,15,16,19 While situation-producing theory may be viewed as the most sophisticated level of theory and its goal content "serves as a norm or standard by which to evaluate activity," 20(p422) its development depends on the existence of lower level theories, that is, descriptive, explanatory, and predictive theories. Descriptive theory building has been advocated for dealing with human phenomena and for devising systems of classifying activities, for example, nursing diagnosis. 15

After reviewing the literature on these issues, a consensus is identified regarding the need for prescriptive theory in nursing. However, a rush to prescription without adequate theoretical and empirical bases might be disastrous.

Methodologic Approaches

A final issue to be explored centers around the method of theory development. Should researchers adhere to a common scientific orientation or should alternate ways to derive nursing knowledge be followed? Silva, in listing nontraditional perspectives on the research process, points out the historical acceptance by nursing of the scientific method of inquiry. Scientific criteria emphasize assessment and exclude such methods as introspection and intuition. 21(p62) Adherence to this approach as the sole strategy for deriving knowledge is confining. "We must keep our minds open to all potential avenues which lead to advancement of nursing knowledge."21(p62) Those who favor breaking away from tradition say that research founded on important, relevant questions must stem from creative imagination. Methodologic limitations stifle the adequate expansion of knowledge. Those who advocate a single approach say that nursing research is "hampered by failure to develop a 'method'... like those found in certain other disciplines such as anthropology..."^{23(p719)} The very nature of people and the complexity of nursing knowledge does not seem to support the use of one method, traditional or otherwise.

The next logical question might be: What can be done while waiting for nursing science to evolve? Also, is it necessary to wait? Several paths can be taken that would involve changes in nursing education, research, and practice. Different issues and implications, plans, and realizations arise from each. This author believes that theory development at all levels can occur simultaneously, as long as identified pitfalls are avoided. Nursing does not have to wait!

DIRECTIONS FOR THE FUTURE

As pointed out earlier, some of the problems and issues facing the nursing research enterprise concern funding, reporting, collaborating, educating, and "marketing." Monies from federal and state sources are not sufficient to meet present needs in theory-building and testing. If the nursing profession truly supports nursing science, it must contri-

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bute to nursing's evolution. Hospital nursing services, professional nursing organizations, and educational facilities should encourage research by contributing a percentage of their income to this endeavor. Also, positions should exist for nurse researchers to be hired in clinical and educational settings.

Reporting

Increased reporting of research in journals designed for that purpose is certainly advocated. However, new ideas are needed about ways to communicate findings in a fashion acceptable to clinical practitioners. Additionally, prestige must be given to the replication of selected studies, and replication studies must be reported as readily as originals.²²

Collaboration

Collaboration takes many forms, and may occur in developing research questions, designing and implementing studies, providing forums for developing theory and reporting investigative work, and establishing networks for sharing all kinds of information. Newman⁹ and Martinson⁸ refer to "think tanks," which employ brainstorming techniques to unearth researchable problems and tap unrealized creativity. Symposia must continue to increase, involving nurses at all levels and from all types of practice. A nationwide research network²⁴ could be established using computers; the technology is available to set up an international network via satellite. Downs and Fleming envision "an Institute of Nursing, a Bureau of Nursing or even a Department of Nursing in the system of our government."7(p176)

Education

The process of educating nurses to perform research must be stepped up to meet the demands of a developing science. How should this task be approached so that the quality of education is not adversely affected? One part of the answer involves recruitment, and the literature reflects a steady increase in the doctoral student population. Additional doctoral programs will attract more students. Concerning the problem of quality, this author supports the idea set forth by deTornyay: "Doctoral programs in nursing must be developed only in those institutions where a critical mass of productive nurse researchers exists."25(p406) One of the weaknesses of the profession has been the lack of philosophers and "stars" to guide us.²⁶ The use of role models or mentors must be facilitated to draw selected students to institutions to study specific problems. This would enhance theory development by encouraging greater concentration on concerns of highest priority. It would also involve students in the research process in such a way that their enthusiasm and creativity would be nurtured. However, doctoral preparation for research is just the beginning; postdoctoral work will enable the scientist to pursue particular areas of need and interest and to more fully develop the researcher role.

Marketing

One of the concerns of research in nursing centers around utility. If the outcome is of little value, why agonize over the process? If nursing has few unique attributes, why bother creating a

distinct body of knowledge? If the clinical practitioner cannot comprehend research literature, why report it? What can be done to change the climate to one of receptivity, valuing, learning, and involvement? This author proposes an intensive effort in "marketing" research.

There is a logical approach or set of strategies useful in marketing products: (1) segment the market; (2) identify common characteristics within each of the target markets; (3) identify the needs of those markets; and (4) develop a marketing plan to appeal to the target markets. This approach can be adapted to the problem of increasing receptivity to research among nursing professionals.

- 1. Segment the market. To attempt to change the nursing profession in a single motion would be ludicrous. Different strategies must be considered in dealing with a population so variable as to include individuals with diplomas and those with doctorates. Each level or target must be clearly identified.
- Identify common characteristics. This
 includes the identification of attitudes toward and knowledge about
 the research enterprise.
- Identify needs. Once characteristics have been enumerated, gaps in knowledge and areas amenable to attitude change can be identified.
- 4. Develop a marketing plan. How can knowledge gaps be bridged? How can attitudes and behaviors be repatterned? Marketing personnel must find ways to reduce resistance, for example, by involving clinical practitioners in every phase of research, introducing research terminology

early in the educational process, and bringing scientists back to the practice setting to gain new insights and create a more cooperative environment. Dual appointments, for example, education and practice, research and education, should be considered. Nursing leaders should be developed and marketed as well; this would foster a sense of pride in the profession and the use of role models to implement change. Centers for research should be publicized and invite membership by nurses at all levels and types of practice. Existing organizations, for example, the Council of Nurse Researchers, Sigma Theta Tau, the Commission on Nursing Research, and others should be included in the planning of strategies, as should representatives from administration, education, and clinical practice.

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This author believes that the future holds excitement and numerous challenges. Nursing researchers must be committed to meet those challenges and must be supported by a core of capable, willing, and patient professionals. Work should begin with the profession's own conceptual models, follow the master plan of Dickoff et al,20 and replicate research at all levels of theory development. All nursing research should be directed toward building or testing theory.27 At the same time, researchers need to ensure that our endeavors are understood and valued by those involved in the practice of nursing. The nursing research enterprise is less than valid if it pursues the former and ignores the latter.

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