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Economics of collective bargaining by nurses

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ECONOMICS OF COLLECTIVE BARGAINING BY NURSES

by

Karen Sue Hawley

A Thesis Submitted to the
Graduate Faculty in Partial Fulfillment of
The Requirements for the Degree of
MASTER OF SCIENCE

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Signatures have been redacted for privacy

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CHAPTER I. INTRODUCTION

A. Statement of Problem

"The depression of the thirties, the rapid growth of labor unions, and the failure of salaried groups to maintain their living standards as a result of inflationary prices have encouraged the expansion of unionism among professional employees."¹

Not only has the growth of unionism per se been encouraged, but also the wider utilization of union tactics by professional associations.

The field of nursing is a good example of how a professional association has developed the use of measures commonly associated with unionism such as collective bargaining. In 1946 the American Nurses' Association (ANA) Convention unanimously approved the adoption of an Economic Security Program, specifically endorsing collective bargaining by its affiliates.² The same Convention also approved a rule prohibiting nurses from having dual membership in a union and the professional association once a collective bargaining program had been put into effect by a state affiliate.³ This view that the professional association is the only adequate and proper spokesman for the nursing profession has been adhered to ever since.

The adoption of tactics associated with unionism by nursing organiza-

¹Herbert Northrup, "Collective Bargaining by Professional Societies," in Richard Lester and Joseph Shister, eds., Insights into Labor Issues, New York, New York: The MacMillan Company, 1948, p. 134.

²Wendell L. French and Richard Robinson, "Collective Bargaining by Nurses and Other Professionals: Anomaly or Trend?," Vol. XI Labor Law Journal (October, 1960), p. 904.

³Northrup, op. cit., p. 153. Also see American Nurses' Association Economic Security Unit, Statement Clarifying ANA Dual Membership Policy, New York, New York: The Association, 1964 (mimeographed).

tions has aroused the interest of students in the various social sciences. This interest has become even greater in recent years due to increasing concern about the national shortage of registered nurses. The result of the accumulation of interest and concern has been a multitude of studies of such problems as the professionalism of using union tactics,⁴ the conflict between nursing ethics and economic action,⁵ legal restraints on organization of, or economic pressures by, nurses,⁶ and the extent of the nursing shortage.⁷

Yet relatively little has been done in trying to relate the two topics of the nursing shortage and the use of collective bargaining by nurses. In this study, therefore, an attempt is made to predict the possible relationship between nursing's use of economic pressures upon employers and the easing of the nursing shortage. The researcher believes that such a relationship is an essential link in dove-tailing group and individual interests concerning the price, supply, and standards of nursing care.

In order to explore the possible relationship between the use of collective bargaining by nurses and the nursing shortage, a labor market analysis must be used rather than a labor relations one. In this respect, the

⁴Harold W. Davey, "Professional Security is Your Professional Right," reprint from Issue 1, Iowa Nurses' Bulletin, (1965).

⁵J. B. Gillingham, "Collective Bargaining and Professional Ethics," Vol. L American Journal of Nursing (April, 1950), pp. 214-216.

⁶Daniel H. Kruger, "Bargaining and the Nursing Profession," Vol. LXXXII Monthly Labor Review (July, 1961), pp. 699-705. Archie Kleingartner, "Nurses, Collective Bargaining and Labor Legislation," reprint from Labor Law Journal (April, 1967), pp. 236-245.

⁷U.S. Government, Public Health Service, Toward Quality in Nursing: Needs and Goals, Washington, D.C.: U.S. Government Printing Office, 1963.

title of this study is somewhat misleading. Economics of Collective Bargaining by Nurses implies that a labor relations approach is used. The rationale for emphasizing a labor market analysis instead is that the study proposes collective bargaining as a possible solution to the nursing shortage. Since collective bargaining is normally viewed as an institution which restricts rather than enlarges supply, the detailed demand-supply analysis of the labor market approach is essential to understanding the unusual role collective bargaining can play in increasing the supply of nurses.

In examining the relationship between the use of collective bargaining and the supply of nurses attention will be limited in the main to nurses employed by nonfederal short-term general hospitals. Recent studies indicate that hospitals employed at least 59% of all active nurses in 1956-1958,⁸ with the proportion reaching 66% by 1962⁹ and still increasing.¹⁰ The remaining active nurses are found mainly in the fields of occupational health, office employment, private duty, and public health. With the possible exception of public health, these are employment areas where the stress upon collective action has not been great. Therefore, to include all nurses in the analysis would probably lead not to clarity but to confusion.¹¹

⁸American Nurses' Association Research and Statistics Unit, "Nurses--Numbers and Characteristics," Vol. LXIII American Journal of Nursing (January, 1963), p. 100.

⁹American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, New York, New York: The Association, 1962 (mimeographed), p. 1.

¹⁰Evelyn B. Moses, "Nursing's Economic Plight," Vol. LXV American Journal of Nursing (January, 1965), p. 68.

¹¹Herbert E. Klarman, The Economics of Health, New York, New York: Columbia University Press, 1965, p. 76.

Exclusion of federal employers was based on the consideration that most federal hospitals are long-term hospitals,¹² a category also excluded from the study. Federal hospitals experience nursing shortages, but they affect only a very small proportion of the population. On the other hand,

"Of primary interest to the public are the 5,700 short-term hospitals. With 44% of all beds, they admit 95% of the 25.5 million inpatients, provide almost all of the outpatient and emergency services rendered by hospitals, and account for 67% of the capital investment in hospitals and 73% of the annual expenditures. Among short-term hospitals the general hospital is predominant."¹³

Klarman's concluding statement, quoted above, supports the emphasis here on general hospitals in broad terms. The Master Inventory of the National Center for Health Statistics reaches the same conclusion in more precise terms. Of the 6,953 short-term hospitals included in the inventory, 6,586 were classified as offering general services.¹⁴

B. Methodology

This study is based both on the analysis of pertinent literature and on original empirical research. Published studies have been relied on to test the first of several research hypotheses, set forth as follows:

Hypothesis 1: The activity status of trained nurses is determined by salary considerations.

Hypothesis 1 is directly pertinent to this study because the United

¹²U.S. Government, National Center for Health Statistics, Development and Maintenance of a National Inventory of Hospitals and Institutions, Washington, D.C.: U.S. Government Printing Office, 1964, p. 10.

¹³Klarman, op. cit., p. 103.

¹⁴National Center for Health Statistics, op. cit., p. 8.

States has a large reservoir of inactive nurses* which must be tapped if the nursing shortage is to be eased. Therefore, the factors which influence the activity status of trained nurses need to be discussed if valid policy recommendations are to be made.

The original research involved a survey of all nonfederal short-term general hospitals in Iowa, 122 in number. A one-state survey was made for reasons of economy but also because this limitation minimized any influence of geographic variation. It was thus possible to examine the relationship between salaries and vacancies without explicitly considering regional variations in salaries and living costs.

The survey has furnished current data on earnings of registered nurses in Iowa. The data include both full-time and part-time registered nurses. Also, information on the relationship between education and earnings was obtained by asking hospitals what financial inducements they offer to nurses with a baccalaureate degree and what incentives are given for nurses to continue their education while employed.

Second, the survey represents an effort to discover the determinants of nursing salaries, the determinants of hospital vacancies for nursing personnel, and the relationship between salaries and vacancies. Hospital administrators were asked for their opinions concerning the effects of higher nursing salaries upon their demand for nursing personnel and upon the supply of nursing personnel.

The survey data have been examined with the objective of testing research Hypotheses 2 through 12 as set forth below.

* Refer to Table 11, herein.

- Hypothesis 2: The size of the cities in which hospitals are located has a significant positive effect upon the salaries the hospitals pay their nursing personnel.
- Hypothesis 3: The bed size of hospitals has a significant positive effect upon the salaries the hospitals pay their nursing personnel.
- Hypothesis 4: Bed size and city size are of equal influence in determining the salaries hospitals pay their nursing personnel.
- Hypothesis 5: The size of the cities in which hospitals are located has a significant effect upon the hospitals' vacancies for nursing personnel.
- Hypothesis 6: The bed size of hospitals has a significant effect upon the hospitals' vacancies for nursing personnel.
- Hypothesis 7: Bed size and city size are of equal influence in determining hospitals' vacancies for nursing personnel.
- Hypothesis 8: The salaries which hospitals pay their nursing personnel have a significant negative effect upon the hospitals' vacancies for nursing personnel.
- Hypothesis 9: General duty nurses with a baccalaureate degree are given starting salary incentives.
- Hypothesis 10: Part-time general duty nurses receive on a prorated basis the same fringe benefits as do full-time general duty nurses.
- Hypothesis 11: Hospital administrators in Iowa believe that raising the salaries of general duty nurses will decrease their demand for general duty nurses.
- Hypothesis 12: Hospital administrators in Iowa believe that raising the salaries of registered nurses will increase the supply of registered nurses.

Hypotheses 2 through 8 were tested by regression analysis. Hypothesis 8, the relationship between salaries and vacancies, is especially pertinent to this study. If salaries are negatively correlated with vacancies on the

basis of statewide data, this would tend to support the conclusion that there is a significant degree of nurse mobility in the search for higher salaries. If the existence of a negative correlation is not supported, this would appear to indicate a limited degree of nurse mobility. Lack of mobility would mean that in local labor markets the intensity of local nursing shortages is a function of the local supply of nurses.

Hypotheses 9 through 12 could not be tested by regression analysis. Their validity was examined by using the responses of the hospital administrators to the survey questionnaire.

The primary purpose of Hypotheses 1 through 12 is to provide information and relationships which are pertinent to Hypothesis 13.

Hypothesis 13: Collective bargaining by registered nurses will have a significant positive effect upon the supply of nurses in both the short run and long run.

Although Hypothesis 13 does not represent the major subject of this study, it does represent the goal towards which the study progresses. For example, the nursing shortage is discussed quite extensively. One of the primary purposes of this discussion is to point out probable causes of the shortage. This examination of probable causes subsequently serves as an outline of corrective steps which collective bargaining must take if it is to exert a positive effect on the supply of nurses. Thus the discussion of the nursing shortage serves as a foundation for the evaluation of Hypothesis 13.

C. Definitions

Terms used extensively in this study will now be defined.

1. Nurses shall refer only to registered professional nurses except those who are members of religious orders.
2. Nursing personnel will refer to registered nurses and licensed practical nurses.
3. Director of nursing service: "A registered professional nurse who is responsible for all nursing services concerned with care of patients in the hospital."¹⁵
4. Supervisor: "A registered professional nurse who is responsible for the nursing service and patient care in two or more organized units."¹⁶
5. Head nurse: "A registered professional nurse who is responsible for the nursing service and patient care on one organized nursing unit."¹⁷
6. General duty nurse: "A registered professional nurse who gives direct and/or indirect nursing care to patients within an organized nursing unit."¹⁸
7. Practical nurse: "A licensed practical or vocational nurse who gives direct care to the patients under the supervision of a professional nurse. Excludes personnel trained on the job to assist nurses in the care of patients."¹⁹
8. Hospitals shall refer to all short-term general hospitals with the exclusion of those under federal control.
9. A government hospital shall refer to one under the control of the state or local government.
10. Unions shall refer to those associations organized primarily to increase the economic standards and improve the conditions of employment of their members. In contrast, professional associations are those organizations

¹⁵ American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, Appendix.

¹⁶ Idem

¹⁷ Idem

¹⁸ Idem

¹⁹ Idem

which include a stress on the promotion of professional ethics, standards, and contribution to society.

11. Collective bargaining is defined to cover the negotiation, administration, interpretation, application, and enforcement of written agreements between hospitals and professional associations representing their employees setting forth joint understandings as to policies and procedures governing salaries, hours of work, and other conditions of employment.
12. Nurses defined as being members of the secondary work force include those who are not the primary source for meeting their families' financial needs.

CHAPTER II. PRESENT ECONOMIC STATUS OF NURSES

A. Salaries

1. Description of studies used

This chapter presents and analyzes the data on nursing salaries contained in four surveys. Two new sources did not become available until the summer of 1967. Therefore, their data are used solely to describe recent changes in nursing salaries. They are not used here to analyze the determinants of nursing salaries.

The two main sources used here for analytical purposes are the Mid-1963 Hospital Survey of the Bureau of Labor Statistics¹ and the Spot Check on Employment Conditions as of November 1962 undertaken by the American Nurses' Association, hereafter usually referred to as the BLS 1963 study and the ANA 1962 study. These two surveys will be the major sources of data for analyzing the determinants of nursing salaries and the economic status of the nursing profession. Since the BLS 1963 study and the ANA 1962 study are extensively used in Chapter II, the methodological differences between the two studies will now be discussed.

First, the BLS 1963 survey concentrated upon 15 selected metropolitan areas where salaries tend to be higher.³ The ANA 1962 study uses a broader

¹U.S. Government, Bureau of Labor Statistics, Industry Wage Survey: Hospitals Mid-1963, Washington, D.C.: U.S. Government Printing Office, 1964.

²American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, New York, New York: The Association, 1962 (mimeographed).

³Bureau of Labor Statistics, op. cit., p. 3.

cross-section of city sizes reaching down into areas of less than 10,000 population.⁴ Therefore, the BLS survey tends to be weighted towards comparatively higher salary levels than those reported by the ANA. Support for this conclusion comes from the close correlation found between the ANA salary for a general duty nurse employed in a city of 500,000 or more and the monthly salary for the same nursing position found by the BLS; \$379 and \$375 respectively. However, the bias towards metropolitan areas should not affect the findings of the BLS survey as to the relative status of nursing positions within hospitals, especially since these standings are consistent with those found by the ANA.⁶

A second distinction is that the BLS uses the mean average salary while the ANA uses the median. A visual examination of the clustering of nurses' salaries found around the median class of \$320-\$339 in Table 1 indicates that the median is less than the mean. This conclusion is due to both halves tending to have a heavy concentration of observations in their upper limits.

A final factor is that the BLS study was completed not quite one year after the completion of the survey by the ANA. Although this is a relatively short length of time, it would still allow individual hospitals sufficient time to revise their salary schedules. The assumption that such revisions would be in the direction of higher salaries is supported by the

⁴The Association, op. cit., p. 1.

⁵Calculations based on data adapted from Bureau of Labor Statistics, op. cit., p. 10 and Ibid., p. 18.

⁶The Association, op. cit., p. 11 and Bureau of Labor Statistics, op. cit., p. 10.

Table 1. Monthly cash salaries^a of full-time general duty nurses in non-federal general hospitals, November 1962^b

	Starting Sal- aries (Filled positions)	Maximum Sal- aries (Filled positions)	Current Sal- aries (Number of Nurses)
Totals	15,570	15,570	15,570
No established salary	53	436	-
Less than \$200	78	77	78
\$200-219	8	2	7
220-239	27	4	33
240-259	335	19	153
260-279	1,002	109	408
280-299	1,969	253	920
300-319	3,374	1,039	1,892
320-339	1,830	1,246	2,166
340-359	1,845	1,685	1,520
360-379	2,362	1,441	1,446
380-399	1,902	1,535	1,242
400-419	579	2,139	942
420-439	10	807	528
440-459	-	1,429	236
460 and over	-	2,251	128
No answer	196	1,098	3,871
Median salary	\$325	\$390	\$340

^aSalaries are basic gross cash salaries, before deductions, for nurses who live out or who live in and have cost of maintenance deducted from salary.

^bSource: American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, New York, New York: The Association, 1962 (mimeographed), Table 12, p. 15.

Bureau's calculation of increases in the average earnings of general duty nurses from mid-1960 to mid-1963.⁷

One important similarity of the two surveys is that both used the same

⁷Bureau of Labor Statistics, op. cit., p. 5.

master list to obtain their samples of hospitals. The common list was that provided by the August 1962 Guide issue of Hospitals, journal of the American Hospital Association.⁸ Both surveys were, therefore, attempting to make inferences regarding the same hospital population although the BLS narrowed the applicability of its data by the emphasis on metropolitan areas.

These points should illustrate that the absolute values of the two surveys may not coincide, but that this result is due to differences in methodology rather than basic inconsistencies within each individual survey. Therefore, it appears valid to use both sets of data provided that the limitations and bias of each are always kept in mind.

2. Description and analysis of salaries

In November of 1962 the Research and Statistics Unit of the ANA conducted a survey of hospital nursing employment conditions. A questionnaire was sent to a sample of 1,050 of the 5,254 hospitals listed in the August 1962 Guide issue of Hospitals. The sample was selected so as to be representative of the entire hospital population as to type of hospital control, hospital size, city size, and geographic location. Of those questionnaires mailed, 55% were returned and used as data sources. Thus the hospitals contributing information for tabulation represented 11% of the total hospital population.⁹

The survey included some 25,000 full-time nurses, 9,000 part-time

⁸The Association, op. cit., p. 1 and Bureau of Labor Statistics, op. cit., p. 70.

⁹The Association, op. cit., p. 1.

nurses, and 10,000 full-time licensed practical nurses.¹⁰ Table 1 gives the results for the monthly cash salary of the full-time general duty nurses. The national median starting salary for filled positions in 1962 was \$325 while the median salary for general duty nurses at the maximum salary level of their hospital was \$390. Between these two figures was the median for all current general duty salaries of \$340 a month.

Also of interest is the general duty nurse's economic standing relative to other members of her profession and to licensed practical nurses (LPN). Column 1 of Table 2 gives the national median monthly salaries of four nursing positions; director of nursing service, supervisor, head nurse, and general duty nurse. The salary for licensed practical nurses is also given. According to this ranking of salaries as of November 1962, the general duty nurse occupied the lowest rung of the national salary schedule for professional nurses. The general duty nurse did, however, earn a substantially higher salary than that earned by licensed practical nurses.

The relative and absolute status of general duty nurses appears to be influenced by variables such as type of hospital control, city size, geographic location, and hospital size. Table 2 shows the influence of city size upon salary schedules. As city size increases, the salaries for all registered nurse positions and for licensed practical nurses tend to rise.

City size also affects the relative status of nursing personnel. For example, a general duty nurse employed in a city of 500,000 or more might earn a higher salary than a supervisor employed in a city with less than 30,000 population. She also might earn more than a head nurse employed in

¹⁰Idem

Table 2. Median monthly salaries^a of full-time registered and licensed practical nurses in nonfederal general hospitals, by type of position and size of city, November 1962^b

Position	U.S.	Size of City				
		500,000 and over	100,000 up to 500,000	30,000 up to 100,000	10,000 up to 30,000	Less than 10,000
Director of nurses	\$498	\$608	\$548	\$550	\$500	\$415
Supervisor	410	491	428	410	375	340
Head nurse	380	445	381	370	350	345
General duty	340	379	345	335	325	306
Licensed practical nurse	242	294	240	238	220	220

^aSalaries are basic gross cash salaries, before deductions, for nurses who live out or who live in and have cost of maintenance deducted from salary.

^bSource: Adapted from American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, New York, New York: The Association, 1962 (mimeographed), Table 15, p. 18.

a city of 100,000 or less. Therefore, city size may affect relative as well as absolute economic status. This effect means that it would be an oversimplification to state that general duty nurses always earn less than professional nurses employed in other hospital capacities. The important fact still remains, however, that within each city classification the general duty nurse earned the lowest median salary of all professional nurses.

The data of Table 2 has several other implications. First, within the nursing hierarchy the positions of head nurse, supervisor, and director

denote increasing salaries. These positions also contain an increasing amount of administrative duties and responsibilities. So in general a nurse has to progress upward administratively in order to increase her financial rewards. This conclusion does not hold only for data categorized according to city size and can be widened to include the entire hospital population.

"The important difference among nurses is not in the field of specialization but in the level of administrative responsibility. Traditionally, promotion takes place on the administrative ladder, for clinical nursing carries a low salary range."¹¹

Klarman's remarks also touch upon, and bring out, another important question; the degree to which specialization at the clinical or general staff level is rewarded financially. Are the nurses who undertake further training in order to specialize in non-administrative functions expected to do so to fulfill their own personal interests without receiving any financial recognition of their accomplishments from employers? The answer to this question might have an influence upon the supply of high quality general duty nursing care, upon the opportunities for personal advancement, and upon the on-the-job satisfaction of nursing personnel.

A second variable, geographic location, also seems to influence salary schedules. Table 3 gives the salary schedules for seven geographic regions. If salary is to have a favorable effect upon labor force participation by nurses, an indication of this effect would be a negative correlation between salaries and intensity of the nursing shortage as expressed by Hypothesis 8. Using the ratio of active nurses to population as a measure

¹¹Herbert E. Klarman, The Economics of Health, New York, New York: Columbia University Press, 1965, p. 84.

Table 3. Median monthly salaries^a of full-time registered and licensed practical nurses in nonfederal general hospitals, by type of position and region,^b November 1962^c

Region	Director	Supervisor	Head nurse	General duty	Licensed practical nurse
U.S.	\$498	\$410	\$380	\$340	\$242
New England	- ^d	408	381	324	254
Middle Atlantic	570	460	425	330	277
Border States	434	373	355	315	224
Southeast	453	375	328	295	200
Great Lakes	499	417	403	360	265
Middle West	423	354	350	330	230
Southwest	433	375	345	315	205
Mountain	476	403	362	343	225
Pacific	600	500	458	400	315

^aSalaries are basic gross cash salaries, before deductions, for nurses who live out or who live in and have cost of maintenance deducted from salary.

^bThe states included in each region are: New England -- Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island and Vermont; Middle Atlantic -- New Jersey, New York and Pennsylvania; Border States -- Delaware, District of Columbia, Kentucky, Maryland, Virginia and West Virginia; Southeast -- Alabama, Florida, Georgia, Mississippi, North Carolina, South Carolina and Tennessee; Great Lakes -- Illinois, Indiana, Michigan, Minnesota, Ohio and Wisconsin; Middle West -- Iowa, Kansas, Missouri, Nebraska, North Dakota and South Dakota; Southwest -- Arkansas, Louisiana, Oklahoma and Texas; Mountain -- Arizona, Colorado, Idaho, Montana, New Mexico, Utah, and Wyoming; Pacific -- Alaska, California, Hawaii, Nevada, Oregon and Washington.

^cSource: Adapted from American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, November 1962, New York, New York: The Association, 1963 (mimeographed), Table 14, p. 17, and Table 1, p. 7.

^dInsufficient number to compute median.

Table 4. National figures on the earnings^a of full-time registered nurse employees in government and nongovernment hospitals, mid-1963^b

Position	Weekly Earnings	
	Government	Nongovernment
Director of Nurses	\$163.00	\$149.50
Supervisor of Nurses	117.00	108.50
Head Nurse	105.00	96.50
General Duty Nurse	90.50	85.50
Nursing Instructor	108.00	104.50

^aEarnings relate to standard salaries that are paid for standard work schedules and exclude extra pay for work on late shifts, as well as the value of room, board, or other perquisites provided in addition to cash payments. Average weekly earnings are rounded to the nearest half dollar. Based on a 40-hour work week.

^bSource: Adapted from U.S. Government, Bureau of Labor Statistics, Industry Wage Survey: Hospitals, Mid-1963, Washington, D.C.: U.S. Government Printing Office, 1964, Table 3, p. 13 and Table 16, p. 42.

of relative standings in nursing shortages, the study by Pennell and Baker indicates that such a correlation may exist. According to their findings, Arkansas had the lowest ratio of active nurses to population in 1962, 123.0 per 100,000.¹² Table 3 shows that Arkansas is also a member of the Southwest region which exhibits a low salary schedule relative to the national median. However, the Southwest is not the lowest-paying region and the degree to which such a correlation exists, if it does, needs to be better

¹²U.S. Government, Maryland Y. Pennell and Kathryn I. Baker, Location of Manpower in Eight Occupations, 1962, Health Manpower Source Book 19, Public Health Service, Washington, D.C.: U.S. Government Printing Office, 1965, p. 7.

supported before generalizations for analytical purposes can be made.

Still another variable affecting salary is the type of hospital control. Table 4 shows data adapted from the BLS survey which states that government hospitals tend to pay better than nongovernment hospitals. The nongovernment category includes both voluntary and proprietary hospitals. The statisticians found, however, that the voluntary hospital contributed all but 2% of the employment offered by this classification.¹³

A final variable to be considered is hospital size, usually measured by bed capacity. Here again, the 1962 ANA survey found that increasing size tends to be paralleled by rising salaries for all nursing personnel.¹⁴ The 1963 BLS study substantiated this finding, although adequate data was available only for metropolitan areas with a population of a million or more. The 1963 BLS study also classified hospitals into just two divisions; those with 500 or more employees and those with less than 500.¹⁵

Thus far it has been shown that geographic location, hospital size, city size, and type of hospital control influence the absolute and relative standings of salaries received by all nursing personnel. That the general duty nurse occupies the lowest salary rung within the professional nursing salary schedule has also been shown.

The 1963 BLS study and the 1962 ANA study also indicate that registered nurses receive low salaries, particularly general duty nurses. However, the data contained in these two studies gives an inadequate picture of the

¹³Bureau of Labor Statistics, op. cit., p. 1.

¹⁴The Association, op. cit., Table 17, p. 19.

¹⁵Bureau of Labor Statistics, op. cit., Table 4, p. 15.

absolute level of nursing salaries. The salaries received by registered nurses are experiencing rapid increases. The dramatic nature of these increases is illustrated by the 1966 BLS survey of the wages and supplementary benefits offered by hospitals.¹⁶ Table 5 compares the 1966 data for short-term hospitals with the findings of the 1963 BLS survey. The absolute and percentage increases in salaries which occurred between 1963 and 1966 are given for each region and nursing position.

The salaries for general duty nurses and nursing supervisors have risen the fastest in percentage terms. An increase of 19.9% occurred in the national average salary of nursing supervisors between 1963 and 1966 while the general duty position experienced an increase of 19.7%.

"The increase between 1963 and 1966 for general duty nurses was double those recorded for industrial nurses and for employees in entry and development professional levels, including engineering, chemistry, legal, and accounting work."¹⁷

When analyzed according to region, the largest salary increases for all of the nursing positions occurred in the Northeast and South. The Northeast exhibits the highest percentage increase in salaries for supervisors and general duty nurses. The largest increases in the salaries of head nurses and licensed practical nurses are found in the South.

In 1967 the ANA conducted a survey¹⁸ which also found salaries to be

¹⁶George L. Stelluto, "Earnings of Hospital Nurses," Vol. XC Monthly Labor Review (July, 1967), p. 55.

¹⁷Ibid., p. 58.

¹⁸American Nurses' Association Research and Statistics Unit, Survey of Salary Ranges and Other Employment Conditions for Staff-Level Nurses in Nonfederal Short-Term General Hospitals, New York, New York: The Association, 1967 (mimeographed).

Table 5. Comparison of 1963 and 1966 average straight-time monthly salaries for registered nurses and licensed practical nurses employed by short-term nonfederal hospitals,^a U.S. and regions^b

Region ^c	Directors	Supervisors	Head Nurses	General Duty Nurses	Licensed practical Nurses
United States					
1966	\$730.17	\$574.17	\$502.67	\$448.50	\$325.00
1963	658.67	478.83	426.83	374.83	279.50
Absolute increase	71.50	95.34	75.84	73.67	45.50
Percent increase	10.9%	19.9%	17.8%	19.7%	16.3%
Northeast					
1966	\$793.00	\$598.00	\$522.17	\$450.67	\$348.83
1963	695.50	489.67	439.83	370.50	294.67
Absolute increase	97.50	108.33	82.34	80.17	54.16
Percent increase	14.0%	22.1%	18.7%	21.6%	18.4%

^a Survey limited to hospitals located in standard Metropolitan Statistical Areas which employed at least 100 employees.

^b Source: Adapted from George L. Stelluto, Earnings of Hospital Nurses, July 1966, Monthly Labor Review (July 1967), Table 1, p. 56 and U.S. Government, Bureau of Labor Statistics, Industry Wage Survey: Hospitals Mid-1963, Washington, D.C.: U.S. Government Printing Office, 1964, Table 1, p. 10-11.

^c The regions used in the survey were: Northeast--Connecticut, Maine, Massachusetts, New Hampshire, New Jersey, New York, Pennsylvania, Rhode Island, and Vermont; South--Alabama, Arkansas, Delaware, D. C., Florida, Georgia, Kentucky, Louisiana, Maryland, Mississippi, North Carolina, Oklahoma, South Carolina, Tennessee, Texas, Virginia, and West Virginia; North Central--Illinois, Indiana, Iowa, Kansas, Michigan, Minnesota, Missouri, Nebraska, North Dakota, Ohio, South Dakota, and Wisconsin; and West--Arizona, California, Colorado, Idaho, Montana, Nevada, New Mexico, Oregon, Utah, Washington, and Wyoming.

Table 5 (Continued)

Region	Directors	Supervisors	Head Nurses	General Duty Nurses	Licensed practical Nurses
South					
1966	\$621.83	\$511.33	\$444.17	\$405.17	\$277.33
1963	595.83	426.83	372.67	333.67	234.00
Absolute increase	26.00	84.50	71.50	71.50	43.33
Percent increase	4.4%	19.8%	19.2%	21.4%	18.5%
North Central					
1966	\$732.33	\$572.00	\$507.00	\$446.33	\$329.33
1963	641.33	491.83	435.50	383.50	288.17
Absolute increase	91.00	80.17	71.50	62.83	41.16
Percent increase	14.2%	16.3%	16.4%	16.4%	14.3%
West					
1966	\$773.50	\$595.83	\$546.00	\$478.83	\$361.83
1963	689.00	522.17	465.83	405.17	316.33
Absolute increase	84.50	73.66	80.17	73.66	45.50
Percent increase	12.3%	14.1%	17.2%	18.2%	14.4%

rapidly changing, thus supporting the findings of the 1966 BLS survey. The ANA questionnaire asked hospitals to indicate the salary ranges currently used for staff-level positions and the salary ranges immediately preceding the current salaries.

"In nearly all cases, the time period between the date on which the current salary ranges went into effect and when the immediately preceding range went into effect was no more than a year. The range of increases reported in the starting salaries for a diploma graduate RN in a staff-level position by the 103 hospitals was \$128-\$1,200 on an annual basis. Three-quarters of the reporting hospitals indicated increases of at least \$480 with 25 percent of all reporting hospitals showing increases of at least \$958. The median increase was \$603."¹⁹

Since the 1967 ANA survey did not attempt to calculate average salaries, no comparison can be made between the 1966 salaries tabulated by the BLS and the 1967 ANA findings.

3. Salary comparisons

The previous section discussed the absolute level of salaries received by general duty nurses and compared these salaries to those received by other hospital nursing personnel. Yet the relationship of hospital nursing salaries to salaries received by non-hospital nurses or other occupations attractive to women is also important. These comparisons can be considered as possible criteria for determining that the salaries offered to general duty nurses are too low to maintain an adequate supply.

One specific criterion might be the general duty nurse's financial standing relative to other hospital professional personnel. In the previously cited 1963 BLS survey it was found that the general duty nurse's

¹⁹Ibid., pp. 1-2.

salary was lower than the remuneration for seven other professional and technical occupations employed by hospitals with the exception of the woman x-ray technician.²⁰

Another criterion could be the general duty nurse's wage in comparison with that earned by professional nurses employed outside of the hospital. According to a survey giving average monthly earnings of professional registered nurses as of September 1949, the relationships given in Table 6 were found.

Again, the hospital general duty nurse was the lowest paid, but this time in comparison to her professional peers outside of the hospital walls. Her position relative to public and industrial nurses has not changed since 1949. This is verified by the national average earnings for these same nursing groups in 1964-1965 given in Table 7. For the 1964-1965 data the term occupational health nurse was used to cover nurses previously defined as industrial. Also, average earnings are used in the 1964-1965 survey while median earnings were used for the 1949 study.

Although both sets of data show the general duty position receiving low wages in comparison with all major non-hospital positions utilizing professional nurses, the differential which seems to cause some hospital administrators the most concern is that between the general staff nurse and the industrial or occupational position. Typical of voices which point out the financial lure which industry holds for newly graduated nurses is that of Dr. Thomas Hale, Jr., administrative vice-president and director of the Albany, New York, Medical Center. Dr. Hale has written that unless hospi-

²⁰Bureau of Labor Statistics, op. cit., Table 1, p. 10.

Table 6. Median earnings of nurses classified as to field of employment and position, 1949^a

Field and Position	Median monthly earnings (actual cash salary)
Institutional nurses living outside hospital quarters:	
All positions ^b	\$211
Head nurses	218
General staff (duty)	205
Public health:	
All positions ^b	239
Staff nurses	219
Industrial	239
Nurse educators living out- side hospital quarters	256
Office	207

^aSource: American Nurses' Association Research and Statistics Unit, "Salaries of Registered Professional Nurses," Vol. L American Journal of Nursing (June, 1950), p. 330.

^bIncludes positions not shown separately.

tals improve their salary schedules in comparison to the better paying positions of equal responsibility in industry, a possible deterrent exists to girls entering hospital employment specifically and to the nursing profession in general.²¹

The National Manpower Council explains the existence of the differential and the differential's effect on draining personnel from the hospital

²¹Thomas Hale, Jr., "Why the Nursing Supply is Failing to Meet the Demand," Vol. VC Modern Hospital (September, 1960), p. 131.

Table 7. Average earnings of nurses classified as to field of employment and position, 1964-1965^a

Field of employment	Average monthly earnings
Occupational health nurse	\$470
Public health staff nurses	
In non-official health agencies	421
In local official health units	467
General duty nurses in nonfederal short-term hospitals in metropolitan areas	392

^aSource: Adapted from American Nurses' Association Economic Security Unit, Statement in Support of the Resolution on a National Salary Goal for Entrance into Nursing, New York, New York: The Association, 1966 (mimeographed), p. 3.

to industry:

"The salaries of non-commercial employers. . . are much more inflexible than those of commercial employers. Non-commercial institutions tend, in consequence, to lose employees to industry. . . in periods of full employment and inflation."²²

Another aspect which can serve both as a possible criterion for classifying the wages of nurses as low and as a partial explanation of the decreasing proportion of girls entering nursing²³ is a comparison between nursing and two other occupations noted for their appeal to women, the teaching and secretarial fields.

A survey of secretarial earnings as of February 1963 in selected metro-

²²National Manpower Council, A Policy for Scientific and Professional Manpower, New York, New York: Columbia University Press, 1953, p. 74.

²³Hale, op. cit., p. 101.

politan areas showed an average weekly salary of \$96.50 or an average yearly salary of \$5,018.²⁴ Thus the average secretarial salary was \$10 a week or \$520 a year higher than that of a general duty nurse employed in metropolitan areas.²⁵ This contrast should point up the danger of uncritically accepting ratios between two occupations by job title alone. The definition of secretary used by Jarrell was a highly technical one, corresponding to the popular definition of an executive secretary.²⁶

The comparison between nursing and teaching salaries is of more importance, and hence deserves a lengthier discussion, than the comparison between secretarial and nursing wages. The greater importance is due to the stress which the nursing profession itself tends to place on comparisons with teachers as a valid measure of the inter-professional status of nursing.

Examples of this emphasis are not hard to find. In a discussion of the economic plight of nurses Moses places considerable stress upon the comparison between the 1963 BLS yearly salary of \$4,498 for general duty nurses²⁷ and the \$5,963 annual wage for classroom teachers in 1963-1964 as estimated by the National Education Association.²⁸ Similarly, the official

²⁴A. N. Jarrell, "Job Pay Levels and Trends in Metropolitan Areas, 1963," Vol. LXXXVII Monthly Labor Review (February, 1964), p. 174.

²⁵Bureau of Labor Statistics, op. cit., p. 1.

²⁶U.S. Government, Bureau of Labor Statistics, Metropolitan Areas, U.S. and Regional Summaries, 1962-1963, Washington, D.C.: U.S. Government Printing Office, 1964, p. 85.

²⁷Bureau of Labor Statistics, Industry Wage Survey: Hospitals Mid-1963, p. 12.

²⁸National Education Association, Research Report R-12, Washington, D.C.: National Education Association, 1963, p. 14.

statements of the ANA make widespread use of the teacher-nurse comparison with a conclusion being that, "By whatever standards of equity or justice are applied, nurses' salaries are inadequate."²⁹

Seen in the context of these examples, the teacher-nurse comparison could be thought of as just another possible standard with which the unsatisfactorily low level of nursing salaries can be measured. Yet it is a standard full of misconceptions when the concept is transposed from the theoretical to the empirical field. Or, to state it alternatively, when inferences are made from the comparative data, the results may be misleading.

The major problem is that of comparing two distinct professions such as secretary-nurse or teacher-nurse. The misconceptions arise when one profession is used as a "norm" to which the nursing salaries are compared. The goal is that nursing salaries, at the very minimum, should equal the average salary of the norm. In doing this, cognizance is often not taken of the differences between the two professions which may justify a limited amount of inter-wage differentials. This error results in all existing wage differentials being classified as unjust. So the "norm" approach seems to require an assumption that differences in factors such as length and cost of preparation requirements are of a sufficiently small magnitude as to be of no consequence. If the requirement is not met, the comparison contains strong value, as well as economic, judgments which tend to bias inferences drawn from the data.

²⁹American Nurses' Association Economic Security Unit, Statement in Support of the Resolution on a National Salary Goal for Entrance into Nursing, New York, New York: The Association, 1966 (mimeographed), p. 3.

In addition, the method of data presentation may be a source of trouble. For example, if data is presented in a generalized fashion with no clarification as to the specific limitations of the samples or inherent conflicts between the composition of the two professional groups, a distorted picture may result.

When the teacher-nurse comparison is used as a specific example, the dangers of the generalized "norm" approach should become clear. In the previously cited article by Moses the teaching profession was used as a norm for nursing salaries. The acceptance of the author's salary estimates at face value would make it appear that a considerable amount of inequitable wage differential exists. Yet, when the composition or "mix" of the professional members used for the estimates is taken into consideration, the true differential appears to be reduced.

The BLS figure for nurses cited by Moses was the average salary for general duty nurses, of whom approximately 96% have diploma or associate degrees.* The \$5,963 salary cited for teachers was based upon all classroom teachers, regardless of educational level.³⁰ In 1960-1961 a substantial majority of teachers had a bachelor's degree while 23% had a master's degree and a little over 1% had doctorates.³¹ In the research report which contained the original salary estimate the National Education Association specifically and emphatically stressed that educational attainment has a

³⁰ National Education Association, op. cit., p. 14.

³¹ National Education Association, Research Report R-9, Washington, D.C.: National Education Association, 1963, p. 6.

* Refer to Table 9, p. 36, herein.

definite positive effect on teachers' salaries.³² When no mention is made of the large differences in educational preparation between the two professional groups, a decidedly structured conclusion is reached.

If the nursing profession strongly desires to retain the use of teacher-nurse comparisons, perhaps the best approach would be to reduce the professional groups studied from the entire professions to specified segments of the professions. An example of such an approach would be a comparison between the salaries of baccalaureate general duty nurses and teachers with bachelors' degrees. Problems will still arise due to differences in factors such as requirements for professional growth and length of working year but compensating adjustments should be easier to make.

All of the points brought up for discussion should serve to illustrate the complexity of inter-profession comparisons. Although data on the secretary-nurse comparison were given, and it was stated that the importance of the teacher-nurse comparison comes from its utilization by nurses themselves, these comments should not be taken to mean that this type of "norm" approach is always valid. Much attention and care must be given to the methods used in securing comparisons, differences in the "mix" of the professional groups, and the manner in which the comparisons are presented. In general, the methods and type of presentation utilized by nurses do not appear to exhibit sufficient validity for their comparisons to be used as the primary foundation for justifying wage demands.

From this line of reasoning it should follow that the researcher agrees

³²Ibid., p. 9. Also, National Education Association, Research Report R-11, Washington, D.C.: National Education Association, 1963, p. 13.

with the conclusion of the National Education Association ". . . that no two professions are directly comparable."³³ Therefore, the salaries of nurses will henceforth be compared only with other nursing personnel, or with non-nursing personnel whose positions require similar training and/or whose salaries have tended to occupy a constant position in the hospital hierarchy relative to nurses.

Perhaps the most important salary comparison and the one with the greatest implication for the solution of the nursing shortage is only a hypothetical comparison. It would be between the salaries necessary to attract more young women (or men) into nursing and the present salary levels. This differential is not likely to be inconsequential. The National Manpower Council has pointed out that the manipulation of salary to affect supply is harder to do for professions than for other labor groups since in many cases ". . . they are committed to their work and to the conditions surrounding both their work and life. They are not, therefore, particularly sensitive to small monetary incentives."³⁴

C. Non-wage Factors

Within this category are included fringe benefits such as paid holidays, paid vacations, life and health insurance, and pension plans which are of vital importance to the economic welfare of individual workers. However, the previously cited conclusion of the National Manpower Council was that monetary rewards, if large enough, are the only major economic measures

³³National Education Association, Research Report R-9, p. 14.

³⁴National Manpower Council, op. cit., p. 156.

to which potential or active professionals will respond. From this statement it seems logical to deduce that small divergences in non-wage benefits will have only negligible local effects on the allocation and supply of full-time nurses. However, large divergences in the array of fringe benefits offered by competing hospitals may have a stronger influence upon the allocation of nursing services. In addition, a substantial fringe-benefit program coupled with strong enough monetary incentives might influence the labor force participation of local nurses.

Fringe benefits may exert a somewhat stronger influence in the analysis of part-time nurses. The effects of a complete absence of fringe benefits, for example, may be both direct and indirect. A hospital offering no fringe benefits to part-time nurses may have to offer a higher salary in order to compensate. If the higher salary is not given, the part-time participation by nurses might be discouraged. The absence of fringe benefits may also have indirect effects. If no benefits are offered, the hospital may be emphasizing the temporary nature of the employer-employee relationship and thus be facilitating a loose bond between nurses and hospital. Where benefits are given, the emphasis on the working relationship as a permanent one could conceivably have some influence on how the part-time nurse views her relationship with the hospital.

The above comments point out that the influence of fringe benefits upon the supply of nurses is relative; varying as the group of nurses and the topic under consideration varies. Therefore, the absolute level of fringe benefits offered by employers to their nurse employees will not be treated in detail. Instead, where the absolute level of benefits may influence the activity status of trained nurses, where increasing the level of fringe

benefits may raise the economic stature or professional attractiveness of the nursing profession, or where fringe benefits are related to the use of collective bargaining, the role of fringe benefits will be discussed within the context of the topic to which it relates.

CHAPTER III. CHARACTERISTICS OF PRESENT SUPPLY OF NURSES

A. Sex

Table 8. Employed registered nurses^a by sex and field of employment, 1956-1958^b

Field of employment	Male percent	Female percent
Hospital or other institution	71.7	59.2
School of nursing	2.1	2.4
Hospital and school of nursing	.7	.5
Public health	1.5	7.2
Private duty	10.0	15.0
Industrial nurse	7.3	3.8
Office nurse (dentist, physician)	1.5	8.0
Other specified field	2.0	1.0
Not reported	3.2	2.9

^aExcludes nurses who did not report sex.

^bSource: American Nurses' Association Research and Statistics Unit, "Nurses--Numbers and Characteristics," Vol. LXIII American Journal of Nursing (January, 1963), Figure 3, p. 102.

In 1962 there were 462,604 employed nurses. Of this total only 3,630 or .008% were men.¹ Table 8 categorizes male and female nurses according to their fields of employment. Males were predominantly found in hospitals or other institutions although private duty and industrial nursing positions were also favored. More than half of the women were employed by hospitals or other institutions with large numbers also found in public health, indus-

¹American Nurses' Association Research and Statistics Unit, "Nurses--Numbers and Characteristics," Vol. LXIII American Journal of Nursing (January, 1963), p. 102.

trial, and office nursing positions.

When categorized according to type of position, 19.6% of the men were administrators or administrative assistants, supervisors or supervisory assistants. Only 11.1% of the women held such positions. More women were general duty or staff nurses, 45.9%, as compared with 29.1% for men. A higher proportion of the men were also found occupying the position of head nurse or assistant, instructor, or consultant.² It would appear, therefore, that although only a very small number of nurses are men, men nurses have a greater chance of occupying relatively high administrative positions than do women nurses.

B. Educational Status

Table 9 estimates the percentage of professional nurses holding various degrees in 1962 by fields and positions of employment. The vast majority, 90%, of nurses in all fields held diploma or associate degrees. Only 7.9% had a baccalaureate degree while 2.1% had a master's or above. Most of the nurses employed by hospitals and related institutions held associate or diploma degrees, 93.4%. Holders of baccalaureate degrees and master's or above were 5.7% and .9% respectively.

When categorized according to position held within the hospital or related institution, also shown in Table 9, higher educational attainment appears to be related to occupying higher administrative positions. Only 3.3% of the staff nurses, anesthetists, and other held baccalaureate degrees while 23.3% of directors, assistant directors, and inservice nurses

²Idem

Table 9. Estimated percentage of professional nurses employed in various fields,^a by academic degree,^b 1962^c

Field of service	Total	Masters or above	Academic degree	
			Baccalaureate	Diploma or associate degree
All fields	100.0	2.1	7.9	90.0
1. Hospitals and related institutions	100.0	.9	5.7	93.4
a. Directors, assistant directors, and inservice	100.0	11.1	23.3	65.6
b. Supervisors and assistants	100.0	2.3	13.5	84.2
c. Head nurses and assistants	100.0	.3	6.4	93.3
d. Staff nurses, anesthetists, and others	100.0	.1	3.3	96.6

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^aTotal number of nurses by field estimated by Interagency Conference on Nursing Statistics: American Hospital Association, American Nurses Association, National League for Nursing and Public Health Service, January 10, 1963.

^bNumber with degrees estimated by Statistics and Analysis Branch, Division of Nursing, Public Health Service.

^cSource: Adapted from U.S. Government, Public Health Service, Toward Quality in Nursing: Needs and Goals, Washington, D.C.: U.S. Government Printing Office, 1963, Appendix, Table 3, p. 61.

Table 9 (Continued)

Field of service	Total	Masters or above	Academic degree	
			Baccalaureate	Diploma or associate degree
2. Public health (including school)	100.0	6.0	30.3	63.7
a. Administrators and supervisors	100.0	31.6	42.1	26.3
b. Staff nurses	100.0	2.9	28.8	68.3
3. Nursing education	100.0	31.0	45.0	24.0
4. Occupational Health	100.0	.3	4.1	95.6
5. Doctor's office, private practice, and other	100.0	.1	2.2	97.7

did. The relationship is even stronger for a nurse with a master's degree or above. Only .1% of the staff nurses, anesthetists, and others had such a degree while 11.1% of the directors, assistant directors, and inservice nurses did.

Two points should be emphasized in connection with the educational status of nurses. First, the field of nursing is overwhelmingly composed of practitioners who do not hold college degrees. Second, this majority can be expected to continue for a long period of time. The only field in which nurses holding college degrees occupy the majority of positions is in nursing education. The only one position which is not occupied predominantly by diploma or associate degree nurses is the administrative or supervisory in public health.

The percentage of potential nurses entering college degree programs has been increasing. Table 10 shows the admissions and graduations of nursing students for the academic years of 1955-1956 to 1960-1961. The percentage of students entering baccalaureate programs has increased from 15.1% to 17.6% while the percentage entering diploma programs has decreased from 83.6% to 78.2%. Associate degree programs increased rapidly during this period and contributed 4.2% of the admissions by 1960-1961.

Even with the increasing proportion of students entering baccalaureate programs, doubt exists concerning the possibility of college graduates ever dominating the nursing profession.³ Doubts are due not only to the tre-

³Fred Davis, Virginia L. Olesen, and Elvi Waih Whittaker, "Problems and Issues in Collegiate Education," in Fred Davis, ed., The Nursing Profession: Five Sociological Essays, New York, New York: John Wiley and Sons, Inc., 1966, p. 150.

Table 10. Admissions and graduations of students in basic professional programs, academic years 1955-1956 through 1960-1961^a

Years	Percent of Admissions	Percent of Graduations
1955-1956		
Baccalaureate	15.1	10.3
Diploma	83.6	88.7
Associate degree	1.2	.8
1956-1957		
Baccalaureate	15.7	11.6
Diploma	83.0	87.4
Associate degree	1.3	.9
1957-1958		
Baccalaureate	15.5	12.0
Diploma	82.3	86.5
Associate degree	2.2	1.4
1958-1959		
Baccalaureate	15.7	13.0
Diploma	81.6	85.5
Associate degree	2.7	1.5
1959-1960		
Baccalaureate	15.4	13.7
Diploma	81.4	83.7
Associate degree	3.2	2.6
1960-1961		
Baccalaureate	17.6	13.4
Diploma	78.2	83.6
Associate degree	4.2	3.0

^aSource: National League for Nursing, 1962, as adapted from American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1962-1963, New York, New York: The Association, 1963, Chart 7, p. 97.

mendous majority diploma and associate degree nurses now enjoy, but also to the rapid growth of the associate degree program.⁴ A related consideration is that degree programs have experienced no recent marked increase which would indicate that potential nurses have accepted the need for a college education. Table 10 shows that of the 5.4% decline in admissions to diploma programs, 3% is accounted for by the rise in associate programs while only 2.5% is accounted for by the increase in college admissions.*

C. Geographic Distribution

Table 11 shows that in 1962 the United States had 829,850 nurses with a nurse-population ratio of 449.8. Of this total, only 553,510 were active for a ratio of 300 active nurses per 100,000 population. However, the geographic dispersion of nurses exhibits wide variation. New England has by far the highest nurse-population ratio, 753. Her closest rival is the Pacific region with a ratio of 545.8. New England also leads in the number of active nurses per 100,000 population but the Pacific region is replaced by the Middle Atlantic for second place.

For purposes of analysis, the nurse-population ratio would seem to apply most to describing the quantity of nursing care which could conceivably be available. The active nurse-population ratio, however, is a better indicator of the quantity of nursing care now being received. The inactive nursing data is useful as an estimate of the magnitude of an untapped

⁴American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1962-1963, New York, New York: The Association, 1963, Chart 7, p. 97.

*Does not add to 5.4% due to rounding.

Table 11. Numbers^a and population ratios of trained and active nurses per 100,000 population according to region, 1962^b

Region ^c	Total Nurses		Total	Active Nurses Per 100,000 pop.
	Total Number of Nurses	Number of Nurses per 100,000 pop.		
United States	829,850	449.8	553,510	300.0
New England	81,004	753.0	52,961	492.3
Middle Atlantic	214,563	614.1	135,547	387.9
Border States	48,757	362.4	33,695	250.5
Southeast	76,677	300.0	57,015	223.0
Great Lakes	157,564	386.4	89,671	219.9
Middle West	51,532	424.1	34,026	280.0
Mountain	32,050	467.4	22,020	321.1
Pacific	122,352	545.8	77,847	347.3
Southwest	45,351	260.7	30,474	175.2

^aNumber of nurses based on state totals of licensed nurses as calculated by American Nurses' Association in 1962 Inventory of Professional Registered Nurses.

^bSource: Calculated from Maryland Y. Pennell and Kathryn I. Baker, Location of Manpower in Eight Occupations, 1962, Health Manpower Source Book 19, Public Health Service, Washington, D.C.: U.S.

^cFor listing of states in each region see Table 3, p. 17, herein.

Table 12. Numbers^a and population ratios of inactive nurses per 100,000 population according to region, b 1962^c

Region	Total Number Nurses	Total Inactive	Inactive per 100,000 pop.
United States	829,850	276,340	149.8
New England	81,004	28,043	260.7
Middle Atlantic	214,563	79,016	226.2
Border States	48,757	15,062	112.0
Southeast	76,677	19,662	76.9
Great Lakes	157,564	67,893	166.5
Middlewest	51,532	17,506	144.1
Mountain	32,050	10,030	146.3
Pacific	122,352	44,505	198.5
Southwest	45,351	14,877	85.5

^aBased on state where licensed.

^bFor listing of states in each region, see Table 3, p. 17, herein.

^cSource: Calculated from Maryland Y. Pennell and Kathryn I. Baker, Location of Manpower in Eight Occupations, 1962, Health Manpower Source Book 19, Public Health Service, Washington, D.C.: U.S. Government Printing Office, 1965, Table 1, p. 26, and Table 2, p. 27.

supply of nurses.

Table 12 categorizes the inactive nursing data according to geographic regions. Of a total number of 829,859 nurses in 1962, 276,340 were inactive. The inactive nurse per 100,000 population ratio was, therefore, 149.8. Although the regional variation in the absolute numbers of inactive nurses is great, the variation is even greater for the inactive-population ratios. Significantly, the Southeast and Southwest show the lowest ratios, 76.9 and 85.5 respectively. These regions, therefore, are characterized by comparatively low reservoirs from which nursing personnel can be obtained.

The data in Table 12 should be used only for rough estimation. The need for this cautiousness is found in the manner in which the data was obtained.

This variation (in distribution of inactive nurses) is to be expected because, by definition, the inventories are limited to a count of registered professional nurses; i.e., those who maintain a current license to practice in some state in the United States. Little is known about the location of inactive professional nurses who are not currently licensed unless individual States maintain such information."⁵

This constraint does not prevent the data from being used as a broad indication of regional variation in the size of inactive nurse reservoirs. The limitation does, however, mean that the insights gained should not be overly emphasized or given validity as to the absolute numerical magnitudes involved.

⁵U.S. Government, Public Health Service, Nursing Personnel, Health Manpower Source Book, Section 2, Washington, D.C.: U.S. Government Printing Office, Rev. 1966, p. 6.

D. Activity, Age, and Marital Status

In 1956-1958 there were 734,402 nurses of which 464,138 or 63.2% were inactive while 231,834 or 31.6% were active. Actively employed was defined to include part-time nursing personnel.⁶ For 38,430 nurses or 5.2% of the total, the activity status was not reported. As an approximation, therefore, only two out of every three trained nurses were active.

Both age and marital status appear to influence the active-total ratio. Table 13 shows the age and activity status of professional nurses for 1956-1958. The proportion of nurses employed appears to consistently decrease with age. This decrease was mirrored in the proportion of inactive nurses increasing with age.

Table 14 gives the relationship between marital status and activity. Logically enough, single nurses exhibited the highest employment percentage, 90.8%, while married women had the lowest, 55.8%.

The contribution of the three marital categories of single, married, and widowed or divorced to total employment are shown by Table 15. Although a lower proportion of married women worked, they contributed the most to total employment, 55.2%. This category contributed even more to the percentage not employed or inactive nurses, 86.2%.

The data from Tables 14 and 15 point out the tremendous reservoir of inactive nurses; a reservoir in which married women are dominant. The need to tap this reservoir at least partially by inducing more women to become part-time workers will be discussed in the next chapter.

⁶The Association, "Nurses--Numbers and Characteristics," p. 102.

Table 13. Registered nurses by activity status^a and age group, 1956-1958^b

	Employed		Activity Status		Not employed	
	Number	Percent	Number	Percent	Number	Percent
Totals	464,138	100.0	231,834		231,834	100.0
20-29	137,239	29.6	49,169		49,169	21.2
30-39	114,311	24.6	86,482		86,482	37.3
40-49	97,542	21.0	47,981		47,981	20.7
50-59	62,062	13.4	22,685		22,685	9.8
60 and over	30,548	6.6	15,199		15,199	6.6
Not reported	22,436	4.8	10,318		10,318	4.4

^aExcludes nurses who did not report activity status.

^bSource: American Nurses' Association Research and Statistics Unit, "Nurses--Numbers and Characteristics," Vol. LXIII American Journal of Nursing (January, 1963), Figure 2, p. 101.

Table 14. Activity status of registered nurses according to marital status, 1956-1958^a

	Total		Activity Status			
	#	%	Employed #	%	Unemployed #	Unknown #
Single	160,812	100.0	145,966	90.8	13,756	1,090
Married	459,258	100.0	256,100	55.8	199,810	3,348
Widowed, divorced, or separated	56,679	100.0	45,419	80.1	10,595	665

^aSource: Adapted from American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1962-1963, New York, New York: The Association, 1963, Table 16, p. 26.

Table 15. Contribution of nurses by marital status to total employment and unemployment, 1956-1958^a

	Activity Status			
	Employed Number	Employed Percent	Not Employed Number	Not Employed Percent
Totals	464,138	100.0	231,834	100.0
Single	145,966	31.4	13,756	5.9
Married	256,100	55.2	199,810	86.2
Widowed, divorced, or separated	45,419	9.8	10,595	4.6
Unknown	16,653	3.6	7,673	3.3

^aSource: Adapted from American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1962-1963, New York, New York: The Association, 1963, Table 16, p. 26.

Table 16. Registered nurses, by age group, marital status, and activity status, 1956-1958^a

Marital status	Total number of nurses	Total percent of nurses	Percent of nurses by age group						Unknown
			20-29	30-39	40-44	45-49	50-59	60 and over	
Totals	734,402		188,290	202,381	74,779	72,099	85,890	46,691	64,272
Single	160,812	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Employed	145,966	90.8	94.5	93.5	92.3	91.9	90.2	74.1	83.2
Not employed	13,756	8.5	5.1	6.2	7.4	7.8	9.2	25.0	11.2
Unknown	1,090	.7	.4	.3	.3	.3	.6	.9	5.6
Married	459,258	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Employed	256,100	55.8	61.2	48.8	57.5	60.2	61.7	51.3	53.0
Not employed	199,810	43.5	38.3	50.8	41.9	39.3	37.5	47.6	41.0
Unknown	3,348	.7	.5	.4	.6	.5	.8	1.1	6.0
Widowed, divorced, or separated	56,679	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Employed	45,419	80.1	75.4	80.0	82.9	87.2	85.3	70.6	78.3
Not employed	10,595	18.7	22.2	18.8	15.5	12.5	13.9	28.3	18.6
Unknown	665	1.2	2.4	1.2	1.6	.3	.8	1.1	3.1
Unknown	57,653	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Employed	16,653	28.9	48.9	46.2	57.2	63.4	64.3	55.0	15.2
Not employed	7,673	13.3	20.9	36.6	30.8	25.4	22.9	29.5	5.9
Unknown	33,327	57.8	30.2	17.2	12.0	11.2	12.8	15.5	78.9

^a Source: Adapted from American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1962-1963, New York, New York: The Association, 1963, Table 16, p. 26.

Table 16 combines the three variables of age, marital, and activity status to give a more composite picture. The percentages for nurses 60 years of age and over will be disregarded in the analysis due to the high incidence of voluntary retirement in this age bracket. Single women tend to have a consistently high employment rate throughout their working years. Married women, on the other hand, tend to experience more variation. They exhibit a 60.9% employment rate for the ages 20-29; a rate not again achieved until the ages of 50-59. The trough of this employment rate is found in the years of 30-39. These years are presumably the age bracket in which children might be a causal factor.

Widowed, divorced, or separated women also tend to have a consistently high employment rate. However, this category does exhibit a trough in the earlier age bracket of 20-29. Again, this low might be due to the presence of small children. The influence of this factor might be partially mitigated as compared with married women due to the absence of a male breadwinner.

CHAPTER IV. THE NURSING SHORTAGE

A. Projections of Shortage

The Surgeon General's Report of 1962 (Consultant Group on Nursing) states that:

"To meet the needs of the Nation in 1970 for safe, therapeutically effective, and efficient nursing service, the Consultant group sees need for some 850,000 professional nurses, including 300,000 with an academic degree."¹

The Consultant Group on Nursing does not anticipate that their projection can actually be realized. Table 17 shows how closely the United States can come to this goal under varying assumptions as to entrance rates.

Common assumptions for all supply projections shown in Table 17 are that the present rate of return of inactive nurses to the labor force is continued and that there is a continued utilization of nurses educated in other countries. The assumption allowed to vary is the entrance rate of 17-year-old girls into nursing.

Projection A assumes that the present entrance rate of 3.4% will continue. The resulting number of 1969 graduates would then be 41,000 with the total number of professional nurses as of January 1970 standing at 650,000. With this entrance rate, a shortage of 200,000 nurses is predicted for 1970.

Projections B and C represent two differing responses to the projected shortage of 200,000 nurses based upon the present trend. Projection B is

¹U.S. Government, Public Health Service, Toward Quality in Nursing: Needs and Goals, Washington, D.C.: U.S. Government Printing Office, 1963, p. 15.

Table 17. Projected number of professional nurses in practice as of January, 1970 and the resulting shortages at three levels of entrance rates^a

Assumptions	1969 Graduates	Total January 1970	Response	Projected Need	Shortage
A: Present trend: nursing entrant comprising 3.4% of 17 year old girls	41,000	650,000	--	850,000	200,000
B: Feasible goal: nursing entrant comprising 6% of 17 year old girls	53,000	680,000	30,000	850,000	170,000
C: Imputed goal: based on nursing entrant rate necessary to eliminate shortage by 1970	100,000	850,000	200,000	850,000	--

^a Source: Adapted from U.S. Government, Public Health Service, Toward Quality in Nursing: Needs and Goals, Washington, D.C.: U.S. Government Printing Office, 1963, Table 3, p. 21.

based upon an entrance rate of 6%. This rate is termed a feasible goal by the Surgeon General's Report assuming that sufficient assistance is given for recruitment and that schools and students are given adequate aid.² The 6% rate would result in a response of 30,000 more nurses by January 1970. The projected shortage would, therefore, be 170,000. Thus a response of increasing the entrance rate by approximately 2.6% would result in a 30,000 reduction in the nursing shortage anticipated for 1970 on the basis of present trends.

Projection C symbolizes the value of the response necessary to completely eliminate the anticipated shortage for 1970. This projection is not regarded as a feasible goal by the Surgeon General's Report. Table 17 shows that such a response requires an increase of 200,000 over the number of nurses projected by the present trend. This increase is approximately seven times as large as the response generated by a 2.4% increase in the entrance rate.

A report by the Division of Nursing of the Public Health Service in 1966³ results in supply projections very similar to those of the Consultant Group on Nursing. A supply estimate of 655,800 nurses by the academic year of 1969-1970 is achieved by assuming: (1) a 2% annual increase in graduations, and (2) a 4% attrition rate. A somewhat lower estimate of 645,800 is the result of changing the 2% assumption to a constant annual number of

²Ibid., p. 20.

³U.S. Government, Public Health Service, Nursing Personnel, Health Manpower Source Book, Section 2, Washington, D.C.: U.S. Government Printing Office, Rev. 1966, Table 66, p. 113, Table 67, p. 113.

35,000 graduations.⁴ Part of the variation in projected supply between the Surgeon General's Report and the 1966 Division of Nursing data is due to the differing attrition rates, .33 and .4 respectively.

If projection C is not feasible and projection A is not acceptable, then projection B should be scrutinized more closely as to the expected gains from achieving this response. First, the Surgeon General's Report estimated that the active nurse-population ratio could be increased from its level of 297 per 100,000 in 1962⁵ to 317 per 100,000.⁶

Considering hospitals specifically, the larger supply of nurses might make possible an increase in the proportion of direct patient care given by professional nurses. Between 1950-1962 the total amount of patient care per hospital patient increased, yet the proportion of direct patient care administered by nurses dropped from 40% to 30%.⁷ The SGR estimated that the proportion could be increased to 38% if the goal outlined by the B projection is met.⁸

Second, the composition of the response is structured in that stress is placed upon raising the academic preparation of new nurses. This stress is consistent with the Surgeon General's Report emphasis upon increasing the quality of nursing care and also indicates the importance attached to raising the academic preparation and number of nursing instructors. The

⁴Ibid., Table 67, p. 113.

⁵Public Health Service, Toward Quality in Nursing: Needs and Goals, p. 6.

⁶Ibid., p. 23.

⁷Ibid., p. 15.

⁸Ibid., p. 23.

Table 18. Number of professional nurses in practice by educational level, 1962 and 1970 goal^a

Educational level	1962 actual		1970 goal	
	Number	Percent	Number	Percent
Total	550,000	100.0	680,000	100.0
Master's or higher degree	11,500	2.1	25,000	3.7
Baccalaureate degree	43,500	7.9	95,000	14.0
Diploma or associate degree	495,000	90.0	560,000	82.3

^aSource: U.S. Government, Public Health Service, Toward Quality in Nursing: Needs and Goals, Washington, D.C., U.S. Government Printing Office, 1963, Table 4, p. 22.

specific educational goals outlined by the Surgeon General's Report are shown in Table 18. The most dramatic increase is desired in the percentage of nurses having baccalaureate degrees, from 7.9% to 14%.

The Surgeon General's Report is widely cited as a predictor of future nursing shortages and is used for this purpose in the present study. Yet it is important to note that the projections are influenced by the need, as well as the demand, for nurses. Need is a subjective variable with an infinite number of interpretations possible. In contrast demand might be defined as an explicit request for nursing services, a request supported by the necessary financial resources. With respect to the relationship between the two concepts,

"Where health services or similar 'positive values' are concerned, we may assume that while need is indeter-

minate, it will always exceed explicit demand."⁹

Although there is danger in over-emphasizing the conceptual differences, the following contrasts might be beneficial: (1) a nebulous feeling that more nurses are "needed" for patient care will probably have little effect on the employment of more hospital nurses unless this feeling is translated into an expressed demand supported by the necessary financial resources, (2) demand may increase in the long run in response to an increased supply, thus closing the gap between need and demand,^{*} (3) present demand can be calculated with more precision through the use of budgeted job vacancy data than can present need,¹⁰ and (4) when projected into the future demand may be subject to a variety of empirical assumptions. Therefore, although demand is still conceptually more precise than need, its comparative advantages as to preciseness of measurement are at least partially nullified in the long run. For these reasons, demand will be used to analyze the nurse-employer relationship and present nursing shortages. Yet projections of future shortages where need has been an implicit assumption will be accepted as support for the future continuance of the present nursing shortage. The use of such a projection may also help to indicate the range within which future excess demand will exist.

⁹Cameron Fincher, Nursing and Paramedical Personnel in Georgia, Atlanta, Georgia: Georgia State College, 1962, p. 25.

¹⁰John G. Myers, "Conceptual and Measurement Problems in Job Vacancies: A Progress Report on the NICB Study," in The Measurement and Interpretation of Job Vacancies, New York, New York: National Bureau of Economic Research, 1966, p. 405.

*Based upon an assumption that need does not also increase with supply.

B. Present Excess Demand

Since projections of future aggregate shortages have already been presented, it might be beneficial to examine present indicators of excess demand. One indication is the available data on the percentage of budgeted hospital positions remaining vacant. The ANA has conducted two surveys in which this vacancy data have been obtained. The most recent survey, conducted in March 1967, compiled data on the distribution of vacancy rates in budgeted staff-nurse positions in 103 large nonfederal short-term general hospitals. Only those hospitals with at least 300 beds were included in the survey.¹¹ The median percent of budgeted vacancies was 14.2% with the middle range being from 9.6% to 22.7%.¹² However, due to the small size of the sample, the composition of the sample, and the lack of detailed information resulting from the survey, the 1967 ANA survey will not be used to analyze the excess demand for nurses that presently exists.

The ANA conducted a more comprehensive survey of hospitals in 1962.¹³ Table 19 shows the resulting data for the percent of budgeted vacancies in full-time professional nursing positions in nonfederal general hospitals. The data are categorized according to nursing positions and geographic regions.

¹¹American Nurses' Association Research and Statistics Unit, Survey of Salary and Other Employment Conditions for Staff-Level Nurses in Non-federal Short-Term General Hospitals, New York, New York: The Association, 1967 (mimeographed), p. 1.

¹²Ibid., Appendix B

¹³American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, New York, New York: The Association, 1962 (mimeographed), Table 2, p. 8.

Table 19. Percent of budgeted vacancies in full-time registered nurse positions in nonfederal general hospitals, by type of position and region,^a November 1962^b

Type of Position	Region									
	United States	New England	Middle Atlantic	Border States	South east	Great Lakes West	South- west Moun- tain Pacific			
All full time profes- sional nurse positions	20.7	24.2	24.3	22.9	14.0	19.2	22.9	25.2	19.8	14.5
Director or assistant director of nursing service	13.4	11.9	12.2	17.3	9.0	15.6	15.9	13.2	15.9	10.5
Supervisor or assistant	15.3	13.6	18.5	18.6	13.1	13.9	16.6	21.0	14.1	6.5
Head nurse or assistant	17.0	12.8	19.8	18.2	11.1	15.1	18.9	20.2	15.8	18.1
General duty	23.0	29.2	26.7	25.4	15.2	21.5	25.6	30.1	22.4	14.5

^aFor states included in each region, see Table 3, p. 17, herein.

^bSource: American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, New York, New York: The Association, 1962 (mimeographed), Table 2, p. 8.

Nationally, a high proportion of excess demand is generated towards the general duty position. This trait also holds true regionally, with one exception. In the Pacific region the excess demand for head nurses or assistants slightly exceeds that for general duty personnel. Therefore, a general observation could be that the national shortage of nurses is exhibited in the hospital sector as an excess of demand over supply. This observation is in line with the National Manpower Council which stated that one sign of a manpower shortage is the existence of a large number of unfilled jobs.¹⁴

One interesting point should be noted. When comparing Table 3 with Table 19* a consistent negative correlation between salaries and percentage of positions vacant does not seem to hold. The Pacific region does exhibit a negative relationship with comparatively high salaries and a relatively low job vacancy percentage. However, both the New England and Middle Atlantic regions are characterized by comparatively high salaries and relatively high rates of job vacancy. This phenomenon is in contrast with the Southeast and Southwest, both of which have low salary scales and low rates of job vacancies.

Hypothesis 8 states that a negative correlation might be expected between salaries and intensity of nursing shortage as exhibited through job vacancies. This expectation might be reconciled in several ways to the relationships just noted. At the same time, some of the factors influencing

¹⁴National Manpower Council, A Policy for Scientific and Professional Manpower, New York, New York: Columbia University Press, 1953, p. 144.

*Refer to p. 17 and p. 57, herein.

the demand for nurses can be examined.

First, continuing inability to fill vacant positions may eventually lead administrators to lower their expectations and thus their budget requests for additional personnel. A recent survey in Georgia found that hospital administrators may not budget funds for positions which they feel cannot be filled.¹⁵ To the extent that the Southeast and Southwest exhibit relatively low nurse-population ratios, low salaries, and smaller reservoirs of inactive nurses,^{*} the downward revision in expectations might occur more frequently or with stronger impact in these regions. Conversely, regions with high nurse-population ratios, larger reservoirs of inactive nurses, and higher salary schedules such as New England and the Middle Atlantic^{**} might have expectations of a higher and more permanent nature. To the degree that such an explanation is valid the divergent findings are partially explained. Such an explanation is also relevant to the earlier view that demand may be influenced by supply.

A second explanatory factor might be the distinction between need and demand previously mentioned. The two terms are not synonymous, and "Need is a more comprehensive concept than demand, and far more difficult to determine."¹⁶ If demand is again represented by employer wishes exhibited through job vacancies, need could conceivably be thought of as the level of nursing care ideal for the health needs of every individual. Combining the

¹⁵Fincher, op. cit., p. 25.

¹⁶Idem

^{*}Refer to Table 11, p. 41 and Table 3, p. 17, herein.

^{**}Refer to Table 11, p. 41 and Table 3, p. 17, herein.

two concepts, the Southeast and Southwest regions may have a relatively greater need for nursing services than other regions, a need evidenced by their low active nurse-population ratios. The need is not being met due to a lower nurse availability and lower incentives for nurses to remain active. These two factors could be thought of as having long-run effects which have served to decrease employer expectations so that demand is balanced with local supply, rather than with need. If demand were to be balanced with need, an unrealistically high demand and a much higher rate of job vacancies might result.

The above phenomenon might be counteracted by increasing the supply of trained nurses in an attempt to increase nurse availability. Demand could thus be raised to balance more evenly with need. The gap between projections of future demand and of future need could then be narrowed.

Another relevant factor may be the comment offered by the ANA.

"Large urban areas have high concentrations of health care facilities which are utilized by persons from far beyond the state borders. Therefore, states where the nurse-population ratios are most favorable may have the gravest nurse manpower shortages as well."¹⁷

Part of this effect, however, would be absorbed within regions and thus would not affect inter-regional comparisons.

The supply of doctors may also be significant in explaining the demand for nurses and the apparent inconsistency in the correlation between salaries and vacancies. Table 20 gives the ratios of active nurses and physicians per 100,000 population.

¹⁷American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1966, New York, New York: The Association, 1966, p. 8.

Table 20. Ratios of active nurses and active physicians per 100,000 population according to region,^a 1962^b

Regions	Nurses per 100,000 population	Physicians per 100,000 population
U.S.	300.0	142.9
New England	492.3	174.0
Middle Atlantic	387.9	177.1
Border States	250.5	149.7
Southeast	223.0	109.2
Southwest	175.2	85.5
Great Lakes	219.9	125.1
Middle West	280.0	112.7
Mountain	321.1	131.5
Pacific	347.3	183.2

^aFor the states in each region, refer to Table 3, p. 17, herein.

^bSource: Calculated from Maryland Y. Pennell and Kathryn I. Baker, Location of Manpower in Eight Occupations, 1962, Health Manpower Source Book 19, Public Health Service, Washington, D.C.: U.S. Government Printing Office, 1965, Table 1, p. 26, and Table 2, p. 27.

Regions with high ratios of physicians to population also tend to fare relatively well in nurses per 100,000 population. For example, in 1962 New England had nurse and physician ratios of 492.3 and 174.0 respectively. The Pacific region also had relatively high ratios for both professions, 347.3 for nurses and 183.2 for physicians.

Similarly, regions with relatively low ratios of physicians to population also tend to have low nurse-population ratios. For example, in 1962

the Southwest had ratios for nurses and physicians of 175.2 and 85.5 respectively while the Southeast had ratios of 223.0 for nurses and 109.2 for physicians. A tentative conclusion might be that nurses belong to a complementary profession with the demand for their services depending at least partially upon the supply of physicians.

C. Seriousness of Shortage

1. Relationship between quality and quantity

The nursing shortage affects both the quantity and quality of nursing care available. The preceding section has established that the excess demand for nurses the U.S. is now experiencing can be expected to continue into future years. However, the effect of the shortage upon the quality of nursing care or patient care has not been established.

There are varying opinions as to the relationship between the quantity of nurses and the quality of patient care. If the seriousness of the nursing shortage is defined as the degree to which the quality of patient care could be raised by increasing the quantity of nurses, a discussion of views as to the quality-quantity relationship is quite pertinent.

Safford and Schotfeldt found that decreasing the nursing hours available per patient would lower the quality of nursing care.¹⁸ Similarly, the Consultant Group on Nursing felt that an increase in the active nurse-

¹⁸Beverly J. Safford and Rozella M. Schlotfeldt, "Nursing Service Staffing and Quality of Nursing Care," IX Nursing Research (Summer, 1960), pp. 149-154.

population ratio is a desirable goal.¹⁹ This feeling seems to imply that the quality of nursing care is dependent upon the quantity available. Although not disputing this dependent relationship, the remarks of Abdellah and Levine imply the existence of an upper ceiling to the relationship.

"In its statewide nursing surveys the Division of Nursing Resources of the U.S. Public Health Service found hospitals, for example, where the average number of hours of nursing care available per patient was one and one-half times as much as recommended practice and more than twice as much as comparable hospitals in the area provided to patients."²⁰

It would appear that the national shortage may have led to over-emphasizing on the local level that quality depends upon quantity. The application of this emphasis may have then led to specific hospitals ignoring the existence of an upper ceiling beyond which higher nurse-patient ratios will not add to the quality of nursing care.

A study by the School of Nursing of the University of Iowa supports the existence of a ceiling and also sheds light on the causal factors. The study entailed leaving a ward patient load constant while increasing the size of the ward nursing staff. The hypothesis was that staff nurses would redistribute their time to increase nursing activities of benefit to the patients.²¹ However, the results of the experiment did not support the

¹⁹Public Health Service, Toward Quality in Nursing: Needs and Goals, p. 23.

²⁰Faye G. Abdellah and Eugene Levine, Effect of Nursing Staffing on Satisfaction with Nursing Care, AHA Monograph No. 4, Chicago, Illinois: American Hospital Association, 1958, p. 1.

²¹Nurse Utilization Project Staff, An Investigation of the Relation Between Nursing Activity and Patient Welfare, Iowa City, Iowa: State University of Iowa, 1960, p. 2.

hypothesis. A larger proportion of the increase in time was spent in personal activities rather than in direct patient care. Significantly, ". . . the addition of nurses produced no appreciable increases in the average level of patient welfare."²²

The most important point to be gleaned from the Iowa study is that an increase in the quality of patient care does not necessarily follow an increase in the quantity of nurses available. This conclusion follows from two considerations. First, there must be a distinction between whether the quality-quantity relationship is discussed in a local or national framework. Exceptions to quality depending upon quantity would probably be found most often in the local context of a specific hospital. Thus the Iowa study found that the point beyond which increases in nurse staffing are impractical may be much closer to existing levels than formally thought to be true.

The types of hospitals which are most likely to be categorized as exceptions are teaching hospitals associated with medical schools and surgical hospitals operated by the Veteran's Administration.²³ However, even these hospitals may suffer from the problem described by Esther Lucille Brown.

"For many hospitals, moreover, the basic problem is not the recruitment of sufficient nurses numerically. It is the rapid turnover of staff nurses that keeps recruiting a continuous process, and the difficulty of finding persons with the desired qualifications of professional education, experience, and personality to fill important

²²Ibid., p. 3.

²³Esther Lucille Brown, Improving Staff Motivation and Competence in the General Hospital, Newer Dimensions of Patient Care, Part 2, New York, New York: Russell Sage Foundation, 1962, p. 7.

supervisory, administrative, and teaching positions."²⁴

The above statement is supported by 1962 data which show that the percent of terminations in nonfederal general hospitals was 52.8% of the average number of general duty nurses employed in the 428 hospitals surveyed.²⁵

Within the national context or in the aggregate sense it is more likely to be true that increasing the quantity of nurses will increase the quality of patient care. The relationship does not result from inherent and consistent cause-result forces. Nor can the relationship be expected to hold indefinitely. Rather, the correlation appears to be positive due to the special and presently existing circumstances in which the nation has a deficiency of nurses. This deficiency has caused aggregate nurse staffing to still be within its range of increasing returns.

2. Utilization of nurses

Evaluation of the relationship between the quantity of nurses and the quality of nursing care must also consider the way in which nurses are utilized. Utilization is applicable on two levels; the individual nurse's use of her time, and the hospital's use of its nursing staff. The Iowa study indicates that there may be a need for a reorientation of the purpose and job structure of nursing as perceived by the nurses themselves. If such a reorientation could achieve a patient-oriented rather than task-oriented job perception, the ceiling beyond which increases in nurse staffing are not beneficial might be raised. However, there would still be no

²⁴Ibid., p. 6.

²⁵American Nurses' Association Research and Statistics Unit, Spot Check of Current Hospital Nursing Employment Conditions, Table 6, p. 10.

support for viewing the ceiling as extending upwards indefinitely.

With respect to hospital utilization of nursing staffs it is important to note that the manner in which a hospital uses its personnel can influence the seriousness and even the existence of a shortage of nursing personnel. If nurses perform many tasks which could be done by less skilled personnel, a hospital might create its own shortage. At the other extreme, if no shortage exists because an extremely high proportion of patient care is administered by sub-professional personnel, a shortage might exist in actuality. Yet the employment of a high number of subsidiary personnel does not in itself mean that the nursing standards, and therefore patient welfare is lowered.²⁶

A study by Levine is especially pertinent at this point. He noted the existence of divergent findings as to the effect of nursing hours per patient upon the quality of patient care: (1) the State University of Iowa study which found that increasing nursing hours would not increase patient welfare,²⁷ (2) a study by Safford and Schlotfeldt which found that decreasing nursing hours lowered the quality of nursing care,²⁸ and (3) a study by Abdellah and Levine which found that the conclusions of both (1) and (2) may be correct.²⁹

Levine's general finding was that,

"Thus while it is true that hospitals are understaffed, some of the shortage probably lies in failure to make the

²⁶Nurse Utilization Project Staff, op. cit., p. 283.

²⁷Ibid., pp. 2-3.

²⁸Safford and Schlotfeldt, op. cit.

²⁹Abdellah and Levine, op. cit.

most productive use of presently employed personnel."³⁰

A specific example of how the administration of nursing services may help create a nursing shortage is provided in a study by DeMarco and Snavely. According to their findings, a professional nurse spends about 40% of her time in activities other than direct patient care, usually paperwork duties.³² Also, as many as fifteen forms could be generated by a physician giving one order.³³ Yet as noted by the Iowa study, the performance of a certain amount of paperwork is required by the duties of nursing. Specifically, ". . . charting is a long established practice and is considered a part of patient care. . ." and the ". . . passing of written information about patients between staff members is also considered a part of patient care."³⁴ If these two activities are excluded from a definition of paperwork, then only .8 hours per eight hour shift was spent in clerical paperwork by the nurse of the Iowa study.³⁵

Advancing technology in the health field holds out the promise of rising productivity in the health occupations. For nurses specifically, improvements such as the use of disposables should increase productivity and

³⁰Eugene Levine, "Nurse Staffing in Hospitals," Vol. LXI American Journal of Nursing (September, 1961), p. 68.

³¹Idem

³²James P. DeMarco and Shirley A. Snavely, "Nurse Staffing with a Data Processing System," Vol. LXIII American Journal of Nursing (October, 1963), p. 123.

³³Ibid., p. 122.

³⁴Nurse Utilization Project Staff, op. cit., p. 283.

³⁵Idem

allow professional nurses to spend a higher proportion of their time in bedside care.³⁶

Although technology offers hope of increasing the quality of health care and the productivity of health workers, there is little hope of decreasing the total demand for labor in the health occupations. The innovations wrought by technology ". . . tend on the whole to increase the demand for manpower trained in new skills rather than reduce the demand for labor."³⁷

Even though technology may increase the productivity of nurses, there is no guarantee that hospitals will make more effective use of their nursing personnel or that all nurses will devote the additional time to patient care. Yet to the extent that the quantity of nurses available could be stretched by better administration of nursing services, the seriousness of the shortage could be lessened by local measures.

Several points previously discussed should now be isolated and emphasized. The seriousness of the nursing shortage is inextricably tied to the relationship between the quantity of nurses and the quality of nursing care received by the public. If seriousness is defined as the ability to increase the quality of nursing care by increasing the quantity of nurses, the national shortage could be termed serious. However, such a conclusion does not hold in every specific and local situation. These exceptions are due to and influenced by factors such as the nurses' perceptions of their

³⁶U.S. Government, Manpower Administration, Technology and Manpower in the Health Service Industry, 1965-1975, Manpower Research Bulletin No. 14, Washington, D.C.: U.S. Government Printing Office, 1967, p. 72.

³⁷Ibid., p. 75.

job purpose, the existence of an adequate local supply of nurses, and the utilization of nursing time by the hospital and the individual nurse.

D. The Role of Education

The manner in which nurses are educated influences the quality and quantity of nurses. These influences may have favorable or unfavorable effects upon the supply of nurses. Therefore, it is quite pertinent to inquire into the types of education nurses receive and what specific effects nursing education may have upon alleviating, or maintaining, the nursing shortage.

Nursing is characterized by a variety of training programs.

"Among them are two-year, three-year, and five-year schools. There are hospital schools and collegiate schools. There are university schools that some nurses consider genuine 'university schools' and others they do not. There are a variety of collegiate programs, as well as an odd type termed 'post-masters' programs. There will soon be doctoral programs. For many years there also has been a variety of certificates awarded for special study."³⁸

This diversity does not mean that all programs are given equal emphasis or that no attempts at standardization are made.

In the 1920's the first collegiate schools of nursing were opened. Since that time increasing emphasis has been given by the nursing organizations to the baccalaureate program as the proper training for a professional nurse. The responsibility for national accreditation was delegated to the

³⁸ Ansum Strauss, "The Structure and Ideology of American Nursing," in Fred Davis, ed., The Nursing Profession: Five Sociological Essays, New York, New York: John Wiley and Sons, Inc., 1966, p. 73.

National League for Nursing in 1953;³⁹ a function the organization still possesses.

The growth of collegiate programs has caused some dispute concerning the most desirable type of nursing education. A primary issue in the dispute is whether or not student nurses can receive professional training in the hospital program. Doland represents the view of nursing organizations when she states,

"Education of professional nurses should be placed on a true professional basis. This will be accomplished when schools are placed under the jurisdiction of universities and colleges and when both cultural and professional instruction are provided. Students of nursing should have the opportunity for contact with persons whose primary interest is education. They must learn how to engage in the intellectual process, and the best means available is through participation with students and teachers from many areas of learning who are developing ideals and skills in communicating their ideals."⁴⁰

Esther Lucille Brown expressed the same view in the 1940's.

"Increasingly it is being realized everywhere that no technical training, however good, is sufficient as preparation for professional personnel. A broad understanding of the physical and social sciences on which professional practice is built and of the society in which the professions serve is essential."⁴¹

The stress upon university training has been accompanied, almost necessarily, by a reduction in the emphasis upon learning by doing or the appren-

³⁹Thomas Hale, Jr., "Why the Nursing Supply is Failing to Meet the Demand," Vol. VC Modern Hospital (September, 1960), p. 102.

⁴⁰Margaret S. Dolan, "Public Funds for Nursing Education," in Social Legislation and Nursing Practice, American Nurses' Association 42nd Annual Convention Proc., New York, New York: The Association, 1960, p. 25.

⁴¹Esther Lucille Brown, Nursing for the Future, New York, New York: Russell Sage Foundation, 1948, p. 131.

ticeship program which characterizes the hospital approach. Hale deplors both the emphasis upon university training and its accompanying reduction in practical experience.

"The driving motivations of the nurse educators seem to be: (1) to get nursing education out of the hospital and into the stream of general education at any and all costs; (2) to 'raise standards' far beyond what hospitals and physicians consider basically necessary, and (3) to abandon once and for all the 'apprenticeship' philosophy of nursing education, regardless of the fact that doctors, hospital administrators, and most nursing school directors still feel that the 'learn by doing' method of educating nurses produces the best nurses."⁴²

Hale's contention that the baccalaureate program de-emphasizes the necessary practical training of nurses is supported by Bradley who states that baccalaureate students do need practice in the duties they will be expected to perform after graduation.⁴³

Hale also states that the accreditation standards of the National League for Nursing strip the hospitals of any effective control over their nursing programs and contain a bias against hospital schools.⁴⁴

The dispute is seen in clearer perspective when the reasons behind the shifts in the emphasis of nursing education are examined. One explanation is based upon the shortage of doctors. This shortage has forced a rise in the status and responsibilities of the professional nurse. The subsequent loss of nursing personnel in direct bedside capacity has necessitated

⁴²Hale, op. cit., p. 102.

⁴³Marcia L. Bradley, "Practicing the Practical," Vol. LXVI American Journal of Nursing (May, 1966), p. 1025.

⁴⁴Hale, op. cit., p. 102.

greater utilization of personnel such as practical nurses and nursing aids.⁴⁵ The decrease in the proportion of nursing care administered by professional nurses lends itself to this explanation.⁴⁶

The end result is that the administrative and personnel functions of nurses have increased. Yet the diploma nurses are trained in a course stressing direct patient care. Little has been taught concerning hospital administration, personnel management, or the techniques of teaching and supervision. In addition, the diploma nurse may be confused as to her relationship with other ward personnel.⁴⁷ The recognition of these defects in the training of diploma nurses coupled with the increasing emphasis upon the "professionalism" of nurses has resulted in stronger and stronger emphasis being placed upon university programs. The shortage of nurses, caused by the general rise in the use of medical services as well as the shortage of doctors specifically, has accelerated the rise in the status and responsibilities of nurses.

The accreditation program of the National League for Nursing has experienced recent increases in its influence. In 1965 the Nurse Training Act of 1964, as amended by P.L. 89-290, was passed. This legislation stipulated that a criterion for receiving federal aid was the status of nursing schools with respect to national accreditation. The National League for Nursing was then designated as the official accrediting agency

⁴⁶Public Health Service, Toward Quality in Nursing: Needs and Goals, p. 15.

⁴⁷Aynes, op. cit., p. 58.

for the purpose of the Act by the Commissioner of Education.⁴⁸

The increasing influence of accreditation and the shift to university education has strong implications for the supply of nurses. An attempt should be made to strike a balance between diploma and baccalaureate programs. The view of professional nursing organizations that all professional nurses should attend baccalaureate programs⁴⁹ appears extreme to the researcher. This evaluation is the result of recognizing the following factors.

The higher is the proportion of baccalaureate students to all nursing students, the smaller will be the supply of nurses due to the longer training time of baccalaureate programs. This consideration would be negated if higher quality completely compensated for a smaller supply. Yet this complete compensation does not seem plausible. The baccalaureate program is more theoretical in the sense of attempting to give a broader overview of nursing and in attempting to develop leaders.⁵⁰ To the extent that much of the nursing shortage is in the areas of administrative and instructive personnel the stress on the broader approach is justifiable. Yet much of the shortage is manifested in the general duty position. The specialized hospital program is designed for the specific purpose of filling the staff

⁴⁸ American Nurses Association, No. 111 Capital Commentary (March, 1966), New York, New York: The Association, p. 3.

⁴⁹ "Position of Organized Nursing" in "What's Wrong with America's Hospitals," Saturday Review (February 4, 1967), p. 61.

⁵⁰ Fred Davis, Virginia L. Olesen, and Elvi Waih Whittaker, "Problems and Issues in Collegiate Education," in Fred Davis, ed., The Nursing Profession: Five Sociological Essays, New York, New York: John Wiley and Sons, Inc., 1966, p. 150.

positions.

Another factor which must be considered is that a nurse receiving a baccalaureate degree may be under pressure to accept an administrative position rather than remain in bedside nursing. The nurse who prefers bedside nursing may, therefore, be better off with a hospital program which prepares her in shorter time, for less cost,⁵¹ to perform the specific duties of a hospital nurse. The proposal that those professional entrants who desire ultimate hospital employment be trained in hospitals may thus have some merit. After graduation from hospital programs, the diploma nurses who exhibit the necessary interest and aptitude for administrative or specialized positions within the hospital could then be encouraged to obtain advanced collegiate education.⁵²

Because diploma programs utilize more practical experience does not necessarily mean that they are inferior. Rather, diploma programs are focused more upon the necessary traits of a competent hospital nurse. The perspectives of the two programs differ due to dissimilar goals. Baccalaureate programs must emphasize general training for the field of nursing the students will ultimately enter is not known. Hospital programs can be relatively sure that many of their students will enter hospital nursing.⁵³

The criticisms directed at the quality of hospital graduates by nursing

⁵¹Public Health Service, Toward Quality in Nursing: Needs and Goals, p. 29.

⁵²Thomas Hale, Jr., "Campus Fever Compounds Nursing Crisis," Vol. CVI Modern Hospital (February, 1966), p. 89.

⁵³Hale, "Why the Nursing Supply is Failing to Meet the Demand," p. 103.

leaders appear to call for reforms, not the complete elimination of the hospital program. Also, the "professional approach" of baccalaureate programs may represent an extreme in some aspects rather than an ideal. If so, the actual job duties of nurses may be neglected. That both of these views receive support from other studies is illustrated by the comments of Davis, Olesen, and Whittaker.

"1. The curriculum of many collegiate schools emphasizes preparing 'well-rounded nurse generalists' as against 'highly skilled clinical specialists,' a policy which further dulls the hospital's appreciation of meaningful distinction between baccalaureate and diploma graduates.

2. Closely related is the preoccupation of collegiate nursing education with the elusive mystique of 'professional leadership' per se, and a concomitant failure to attend to the functional occupational bases upon which leadership can rest and sustain itself.

3. There is also the sometimes self-congratulatory, predilection of collegiate nursing faculty to attribute nearly all of the deficiencies and abominations of contemporary hospital nursing to the 'backwardness,' 'rigidity,' and 'task compulsiveness' ostensibly instilled by hospital schools in the diploma R.N.'s who populate the floors of American hospitals. The invidious appeal of the partial truth contained in this characterization, unfortunately, obscures for faculty, and secondarily for students, the important role played by purely organizational and structural constraints in the poor quality of much of the nursing care dispensed in hospitals."⁵⁴

What nursing education appears to need, therefore, is a recognition of the contributions which could be made by both types of education. At the present time, this recognition by the leaders of nurses appears to be lacking. The ANA seems to have recognized the uniqueness of each type only in a "superior-inferior" context. Within this context organized nursing has

⁵⁴ Davis, Olesen, and Whittaker, op. cit., p. 168.

attempted to differentiate between hospital "training" and university "education."⁵⁵

The attitude of organized nursing results in the statement that the

". . . minimum preparation for beginning professional nursing practice at the present time should be baccalaureate degree education in nursing."⁵⁶

The diploma school program would be gradually phased out.* The education of technical assistants, who would aid professional nurses, would consist of a minimum of a two-year associate degree in nursing.⁵⁷

It is doubtful if the official position of organized nursing will ever incorporate a recognition of the complementary and equal nature of the diploma and baccalaureate programs. However, the emphasis upon university education may have to adapt itself to an uneasy truce with other forms of nursing education. This view is supported by Davis, et al.

"It would seem evident, then, that the guarded hope of many earlier nursing reformers, that professional nursing will one day become a wholly university-based profession is, at minimum, doomed to protracted delay, if not outright repudiation."⁵⁸

Factors contributing to this evaluation are several. First, in 1956 the proportion of nursing students graduating from baccalaureate schools

⁵⁵ Ibid., p. 149.

⁵⁶ "Position of Organized Nursing," op cit., p. 61.

⁵⁷ Idem

⁵⁸ Davis, Olesen, and Whittaker, op. cit., p. 150.

* Information obtained from interview with Mrs. Virginia Galbreath, past president of Iowa Nurses' Association in February, 1967, at Des Moines, Iowa.

stood at 10.3% and by 1960 the rate had not exceeded 13.7%.^{*} Therefore, the growth rate of university programs has not been particularly phenomenal and it is doubtful if collegiate programs will contribute more than 25% of all nursing graduates by 1970.⁵⁹

Second, nursing education may soon be feeling the influence of associate-degree programs in junior colleges which are experiencing rapid growth.

"Although still quite small numerically (sixty-six schools located mainly in the West accounted for 3.7% of all professional nurse graduates in 1961), some informed observers believe that within a generation these programs will constitute the dominant form of nursing education in the United States, since they prepare R.N.'s in less time than hospital or collegiate schools do, and still afford nurse recruits some semblance of a higher education."⁶⁰

The entire area of nursing education is highly pertinent to a discussion of the supply and shortage of nursing personnel. For nursing requirements to be met, the need for highly qualified nurses should be balanced with the need for a larger quantity of nurses. The quality of education is too often viewed as an end in itself. Instead quality should be defined in more functional terms as the quality or preparation necessary to fulfill job duties. For example, the baccalaureate program is undoubtedly necessary for teaching and administrative positions. Yet the necessity of a college education for these positions does not necessarily mean that all nursing positions must be filled by degree nurses for quality to be maintained. If

⁵⁹Davis, Olesen, and Whittaker, op. cit., p. 150.

⁶⁰Ibid., pp. 150-151.

* See Table 10, p. 39, herein.

quality is not defined functionally and becomes a goal in itself,

"It not only increases the salary requirements of the professional when she, or he, is finally ready to enter the field but also increases the time lag between demand and the preparation of the supply."⁶¹

⁶¹Ray E. Brown, "The Nature of Hospital Costs," Vol. XXX Hospitals (April, 1956), p. 40.

CHAPTER V. SUGGESTED SOLUTIONS TO THE NURSING SHORTAGE

A. Introduction

The discussion of the economic status of nurses, the characteristics of the nursing supply, and the shortage of nursing personnel has suggested many steps which could be taken to help alleviate the nursing shortage. There are varying opinions as to the best approach or solution due to differing emphasis upon causal factors. Due to the number of opinions and the time required to do justice to each, only those suggestions which the researcher feels are both feasible and exhibit some chance of success will be discussed. However, the discussion will be far from exhaustive and the interested reader should consult the cited references for more detailed information.

B. Increasing the Use of Part-Time Nurses

The contribution of part-time nurses to hospital staffing has been great. According to Testoff, Levine, and Siegel such personnel accounted for approximately 20% of the total nursing care available in short-term general and allied special hospitals in 1962. This contribution will be greater in the future if the ratio of part-time nurses to full-time nurses continues its rise. In 1948 the ratio was 189 part-time nurses for every 1,000 full-time nurses. By 1962 the ratio had risen to 591 per 1,000¹ and continued to rise through 1964 according to the ANA. The organization's

¹Arthur Testoff, Eugene Levine, and Stanley E. Siegel, "The Part-Time Nurse," Vol. LXIV American Journal of Nursing (January, 1964), p. 88.

research and statistics department gives much of the credit for the increase in hospital registered nurses from 1962-1964 to the usage of part-time personnel.² In addition, Testoff et al. found that the number of general duty nurses working part time in hospitals is increasing at a faster pace than the number working full time.³

A higher proportion of part-time nurses employed by hospitals or related institutions, 90%,⁴ are married than of the full and part time combined, 56.9%.⁵ Of the married part-time nurses, 40% had three or more children. The majority had children under ten years of age.⁶

The average number of days worked by part-time nurses was 115.3 during the 12-month study conducted by Testoff et al. However, married women tended to work less, 111.9 days. Divorced women worked the most, 170.2, while single and widowed women followed with 147.4 days and 135.4 days respectively.⁷

The study by Testoff et al. also inquired into the reasons why the nurses preferred to work part time. A large proportion, 71%, stated they were prevented from working full time by family obligations. Another 12%

²American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1966, New York, New York: The Association, 1966, p. 16.

³Testoff, Levine, and Siegel, op. cit., p. 88.

⁴Idem

⁵American Nurses' Association Research and Statistics Unit, Facts About Nursing, 1962-1963, New York, New York: The Association, 1963, Table 10, p. 20.

⁶Testoff, Levine, and Siegel, op. cit., p. 89.

⁷Idem

preferred part-time work to full-time employment even though family responsibilities did not hinder working a normal schedule.⁸

Only 4.7% of the nurses studied were the sole support of their family while working to supplement family income guided a majority of the nurses, 51.6%.⁹ The importance of this last statistic was recognized by the National Manpower Council.

"Nearly half the women now working are married to men who are the chief breadwinners in their families. However, in many instances, it is the additional income provided by the wife which safeguards the family against hardship and deprivation. In others, where the family could live in modest comfort upon the husband's earnings, the wife's willingness to take a job, even when it imposes heavy demands upon her time and energy, is nourished by a desire to assure a better life for herself and her family. This motive for working outside the home is a distinguishing feature of women's employment."¹⁰

Many of the characteristics just outlined and the statement by the National Manpower Council serve as reminders that most nurses are secondary workers. These reminders are reinforced by again stating that only 4.7% of the nurses in the study by Testoff et al. were the sole support of their family. A majority, 51.7%, only worked to supplement family income. When the nurses who worked to maintain nursing skills or ease the nursing shortage are added, a combined total of 39.7%,¹¹ the secondary worker concept is even more apparent. The fact that many nurses are secondary workers has

⁸ Idem

⁹ Idem

¹⁰ National Manpower Council, Womanpower, New York, New York: Columbia University Press, 1960, p. 22.

¹¹ Testoff, Levine, and Siegel, op. cit., p. 89.

important implications for the retention and training of nursing personnel.

"In fields such as teaching or nursing, in which women are a large part of the total labor force, great difficulty is encountered in maintaining the supply as a result of early retirement for marriage and motherhood. It is estimated that about 30% of all professionals working in 1950 will die, retire, or leave their profession for other reasons by 1960, but that over half the nurses and nearly 70% of the teachers will no longer be employed in their fields."¹²

Secondary workers normally exhibit less attachment to the work force and can afford to be more selective in their job seeking than primary workers. This selectivity might be illustrated by a married nurse who will work only if working hours are adaptable to her home responsibilities, if transportation is available, and if she enjoys her work. It could even be expected that financial incentives, while still influential, would no longer be the primary determinant of activity status.

Perhaps a special characteristic of secondary workers who are married women is the influence of a husband's mobility. Normally a wife moves when her husband moves. A move might be contemplated by a couple if the husband's career opportunities would be improved. However, it seems unlikely that a move would be contemplated for the reason of improving a wife's working possibilities. Table 12 shows that 276,340 nurses were inactive in 1962 out of a total of 829,850 trained nurses.* If fuller utilization of this reservoir is to be achieved, a determination of factors which influence the activity status of trained nurses becomes of paramount importance.

¹²National Manpower Council, A Policy for Scientific and Professional Manpower, New York, New York: Columbia University Press, 1953, p. 60.

* See p. 42, herein.

Hypothesis 1 states that,

Hypothesis 1: The activity status of trained nurses is determined by salary considerations.

The previous discussion has pointed out the influence that a husband's mobility, a family's financial needs, and other secondary worker considerations might have upon a nurse's activity status. A study by Reese, Siegel, and Testoff¹³ is perhaps even more pertinent to Hypothesis 1.

The results of the study by Reese et al. are summarized in Table 21, Column 1. In 1962 they conducted a twelve-state survey to determine what inactive nurses feel is the most important reason for their inactivity. Of a return total of 10,019, 39.0% or 3,905 feel that the necessity for mothers to stay home with children is the most important factor. A surprisingly large percentage, 10.4%, state that inability to work due to poor health is the main determinant.

When inactive nurses are divided into those who are and those who are not planning to return to nursing, the reasons for inactivity can be categorized with interesting results. These results are shown in Table 21, Columns 2 and 3, as the percentage of the total number of nurses in each division. For brevity, the divisions will be referred to as Return (s) and Not Return (s).

The Personal and Family category concerns factors related to home, husband, children, and the special constraints which they impose upon a nurse's time and mobility. The bulk of the Return category, 72.4%, state that

¹³Dorothy E. Reese, Stanley E. Siegel, and Arthur Testoff, "The Inactive Nurse," Vol. LXIV American Journal of Nursing (November, 1964), pp. 124-127.

Table 21. Differences in reasons for inactivity among nurses planning to return and nurses not planning to return^a

Reason	Percentage Planning to Return (2)	Percentage Not Planning to Return (3)	Percentage of Total (1)
<u>Personal and Family</u>			
I believe a mother should be in the home while her children are young.	48.8	31.0	39.0
I cannot make suitable arrangements for the care of my child or children.	10.7	2.9	6.4
My husband prefers I do not work.	6.5	11.7	9.3
Employers cannot utilize the working hours I could be available.	4.2	1.0	2.4
The lack of domestic help for household tasks prevents me from being active in nursing.	1.2	.9	1.0
I have transportation difficulties.	1.0	.8	1.0
Sub total	72.4	48.3	59.1
<u>Employment Centered</u>			
The salary I would get would not make it worthwhile.	5.9	4.3	5.0
I am reluctant to return because I have not engaged in nursing practice for awhile.	4.3	4.6	4.5
Employment opportunities in my field of practice are not available.	2.2	1.2	1.6
Sub total	12.4	10.1	11.1

^a Source: Adapted from Dorothy E. Reese, Stanley E. Siegel, and Arthur Testoff, "The Inactive Nurse," Vol. LXIV American Journal of Nursing (November, 1964), Table 1, p. 125.

Table 21 (Continued)

Reason	Percentage Planning to Return (2)	Percentage Not Planning to Return (3)	Percentage of Total (1)
<u>Individual Centered</u>			
I prefer to be a homemaker.	3.4	13.6	9.0
I am not able to engage in active nursing practice due to my health.	3.3	16.1	10.4
I prefer to give my available time as a volunteer worker in community activities.	.2	1.3	.8
I am not at present interested in nursing as a profession.	.1	1.8	1.0
I am enrolled as a full-time student obtaining further preparation in nursing	1.1	.1	.5
Sub total	<u>8.1</u>	<u>32.9</u>	<u>21.7</u>
<u>Miscellaneous</u>			
Other	5.6	6.4	6.0
No reason	<u>1.7</u>	<u>2.4</u>	<u>2.1</u>
Sub total	<u>7.3</u>	<u>8.8</u>	<u>8.1</u>

Personal and Family factors are the most important, while only 48.3% of the Not Returns feel similarly. Differing emphasis upon children and the objections of husbands appears to be the main contributory causes. Consideration of children's welfare is the most important factor for 59.5% of the Returns as compared with 33.9% of the Not Returns. However, Not Returns respond more to husbands' objections, 11.7%, as contrasted with a response of 6.5% for Returns.

Both the Returns and Not Returns give relatively little emphasis to employment-centered reasons, 12.4% and 10.1% respectively. In the individual-centered group, however, a large divergence between the two nursing groups is again seen. This divergence is largely the result of two factors, inactivity due to preferring the homemaker function and inactivity due to poor health.

Although the conclusion reached here concerning Hypothesis 1 can only be tentative, the study by Reese et al. tends to refute the hypothesis. Only 5% of the responding nurses felt that the main reason for their inactivity was the low level of salaries. Personal reasons appear to be far more influential in determining activity status. Yet if reasons such as salaries, transportation difficulties, need for child care, deterioration of skills, and problems with working hours are added together, they describe 19.3% of all responding nurses. These five reasons for inactivity would appear to be receptive to changing practices or inducements offered by employers.

It must be noted that if financial is substituted for salary in Hypothesis 1, a different tentative conclusion would be reached. As previously noted, Testoff et al. found that a majority of nurses working

part-time do so to supplement family income. Therefore, financial considerations exert a strong influence. Yet of most importance to this study is whether more nurses will be pulled into the labor force by higher salaries, not the motivations of nurses presently employed. Thus Hypothesis 1 in its original form is the hypothesis of most interest to this study and on the basis of available secondary sources Hypothesis 1 must be tentatively rejected.

The responses given by the two groups suggest measures which may induce more of the inactive to return to nursing, at least on a part-time basis. Such measures will probably have a stronger impact on the Return group than on the Not Returns due to two factors. First, the Return group does express the desire to return to nursing. Second, many of the reasons cited by the Returns are of a more temporary nature, such as those caused by family pressures. In contrast, the Not Return reasons tended to show a more permanent change in the preferences of the nurses.

Corrective measures outlined by Reese et al. are the following: more flexible work schedules, day care centers for children, and refresher courses.¹⁴ Additional Measures suggested to the researcher are aid in arranging transportation and increases in salary.

Increasing the flexibility of work schedules appears to be self-explanatory. Day care centers for children could be sponsored by the community to aid working mothers. Or, the child care centers could be initiated and supported by the local hospital for its staff. This latter

¹⁴Ibid., pp. 125-126.

proposal has been used with some success both in the United States¹⁵ and in England.¹⁶

The providing of transportation has never received much attention in the United States. Some English hospitals, however, have used this approach where working hours did not correspond with public transportation schedules.¹⁷ Flexibility as to work hours may also help to partially alleviate the transportation problem.

Although personal reasons and the constraints of a family appear to dominate the thinking of inactive nurses, financial measures might achieve some success. As the financial attractiveness of working is increased, the objections of husbands might decrease. Also, if a nurse felt only weak allegiance towards her answer in the study by Reese *et al.*, higher salaries might draw her into the labor force. The possibility of this effect was implicitly considered by the Consultant Group on Nursing.

"Economic incentives are very important, not only in recruiting inactive nurses, but also in retaining them in their jobs. Many nurses, especially those with small children, are able to work only if their earnings are enough to pay for domestic help, as well as to give them some personal return."¹⁸

Refresher courses could be beneficial for several reasons. First, the

¹⁵Patricia Adler and Others, "Day Care Services Help Recruit Nurses," Vol. LXIII American Journal of Nursing (September, 1963), pp. 97-100.

¹⁶B. A. Bennett, "Part-Time Nursing Employment in Great Britain," Vol. LXXXV International Labour Review (April, 1962), pp. 347-356.

¹⁷Ibid., p. 348.

¹⁸U.S. Government, Public Health Service, Toward Quality in Nursing: Needs and Goals, Washington, D.C.: U.S. Government Printing Office, 1963, p. 31.

inactive nurses themselves have expressed interest in such a program. Of the 4,503 Return nurses, 65% indicated that they would like to have a refresher course available.¹⁹ Second, the course may increase the self-confidence of nurses who feel that they have been away from nursing too long.²⁰ Since data indicate that the longer a nurse is inactive the more inclined she is to remain so,²¹ the urgency of immediate and continuous programs should be stressed. Third, a study of Chicago nurses who enrolled in refresher courses from 1957-1961 showed that a substantial proportion returned to work. More than half, 57.5%, were employed at the time of the study, while 77.0% had worked since the completion of their course.²² A general conclusion of the Chicago experience was that refresher courses had contributed significantly to easing the local nursing shortage.²³

All of the corrective measures suggested will take planning, time, and money. Yet if the number and percentage of nurses working at least part time is to be increased, these or similar measures must be considered. The numbers of the inactive nurses indicate highly trained skills which are deteriorating. The numbers also indicate that the nursing shortage may be a shortage of active, rather than of trained, nurses. This last viewpoint has been expressed by Hale.

¹⁹ Reese, Siegel, and Testoff, op. cit., p. 125.

²⁰ Dorothy E. Reese, D. Ann Aparmacher, and Arthur Testoff, "How Many Caps Went on Again?," Vol. X Nursing Outlook (August, 1962), p. 519.

²¹ Reese, Siegel, and Testoff, op. cit., p. 125.

²² Reese, Aparmacher, and Testoff, op. cit., p. 517.

²³ Ibid., p. 519.

"The significant figure is not the number of high school graduates admitted to schools of nursing, or the number of girls being graduated from schools of nursing, but the number of nurses available and willing to go into nursing after they have been graduated."²⁴

C. Increasing the Attractiveness of the Nursing Profession

The attractiveness of a profession is a function of many factors; monetary rewards, social status, professional recognition, personal interest in job duties, and the opportunity to contribute needed skills to society. Any analysis which tried to explain a profession's attractiveness to possible entrants in purely monetary terms would be lacking. However, if economic reward is not sufficient to cover training and opportunity costs, deterrents to entrance may exist.

Estimating the "right" salary for a profession would be difficult, if not impossible. Yet an "adequate" salary might be estimated; adequate in the sense of giving a return on training costs and earnings comparable to that which could be earned in similar professions. One possible approach in calculating adequate salary is that associated with Gary S. Becker. Becker develops a return on investment approach using discounted net earnings streams.²⁵

If the returns among an array of professions facing an entrant are not comparable, deterrents towards entering the lower-return profession may exist. Yet because an adequate return is achieved does not mean that all

²⁴Thomas Hale, Jr., "Why the Nursing Supply is Failing to Meet the Demand," Vol. VC Modern Hospital (September, 1960), p. 101.

²⁵Gary S. Becker, "Investment in Human Capital: A Theoretical Analysis," Vol. LXX Journal of Political Economy (October, 1962), pp. 9-49.

applicants will necessarily choose nursing. Comparability would only signify that the choice would be based upon other, non-monetary factors. In essence, then, an adequate return is a necessary but not sufficient condition for increasing the supply of a profession.

Once an adequate return could be achieved, factors affecting the attractiveness of a profession might be its opportunity for individual fulfillment, service to society, and community status.

1. Individual fulfillment

Individual fulfillment is a highly subjective term with a multitude of connotations. The phrase could include the right to participate in decisions which affect individual and group goals, the opportunity to achieve recognition on the job, and the nature of working conditions. Nurses have traditionally been given little influence on a peer basis in the hospital decision-making process. The nurse-employer relationship has been classified as paternalistic by the Sheppards.

"Paternalism certainly characterizes a major portion of the relationship between the nurse and her employer, although nurses may be reluctant to recognize or admit this fact."²⁶

Kleingartner, however, feels that the Sheppards' statement is no longer completely valid and that progress is being made towards a rejection of the paternalistic relationship.²⁷

The causes for the existence of paternalism are numerous. Esther

²⁶Harold and Audrey Sheppard, "Paternalism in Employer-Employee Relationships," Vol. LI American Journal of Nursing (January, 1951), p. 16.

²⁷Archie Kleingartner, "Nurses, Collective Bargaining and Labor Legislation," reprint from Labor Law Journal (April, 1967), p. 239.

Lucille Brown, however, gives strong emphasis to the nursing training of hospital schools.

"The educational model of such schools has been one of conditioning students to work within and to identify themselves with the institution, rather than to identify themselves with the several groups of 'therapists'."²⁸

The nurse-hospital paternalistic relationship also exhibits a certain amount of reciprocity.

"The completely paternalistic relationship, furthermore, is reciprocal, that is, it includes a tendency on the part of the employee to accept a subordinate role, and to show relatively little incentive about improving his or her economic status."²⁹

The characteristic of reciprocity as well as the relationship between hospital schools and paternalism has received some verification in studies. In her study of senior nursing students in 12 hospital schools Nahm found that a high proportion of the potential nurses were already prepared to accept a paternalistic relationship with their employer.³⁰ Kurtz and Flaming found that nurses exhibit attitudes common to an occupation in a supporting role, rather than being indicative of members of an independent profession. Specifically, two-thirds of the nurses interviewed felt that they should not have more authority in making decisions about patient care. When asked who they felt was best qualified to judge the quality of nursing

²⁸ Esther Lucille Brown, Improving Staff Motivation and Competence in the General Hospital, Newer Dimensions of Patient Care, Part 2, New York, New York: Russell Sage Foundation, 1962, p. 139.

²⁹ Sheppards, op. cit., p. 17.

³⁰ Helen Nahm, "Autocratic versus Democratic Beliefs and Practices of Senior Students in Schools of Nursing," Vol. XXVII Journal of Social Psychology (June, 1948), pp. 229-240.

care, the nurses mentioned doctors most frequently.³¹

The paternalistic approach is not accepted so readily by baccalaureate nursing graduates as it is by diploma nurses. Degree nurses are more likely to hold high-professional low-bureaucratic conceptions of their role in contrast to the reverse conceptions of diploma nurses.³² This divergence has been attributed to the freer environment of the college program which stresses professional concepts and obligations towards patient welfare.³³

The result is that degree nurses are relatively more attracted to positions outside the hospital, particularly public health and psychiatric care. Davis et al. found that disenchantment with the prospect of hospital employment increases as the potential degree nurse progresses through her training. At the same time, the attractiveness of public health and psychiatric positions increases strongly.³⁴

The movement of degree nurses toward non-hospital employment and the reasons for it have received some attention.

"Unmistakable as the drift from hospital nursing may be, the reasons for it, however, are complex. Concerning the preference for public health nursing, for example, there is the growing recognition by students as they matriculate through the school of the many practical advantages

³¹Richard A. Kurtz and Karl H. Flaming, "Professionalism: The Case of Nurses," LXIII American Journal of Nursing (January, 1963), p. 77.

³²R. G. Corwin, "The Professional Employee: A Study of Conflict in Nursing," Vol. LXVI American Journal of Sociology (May, 1961), p. 612.

³³Brown, Improving Staff Motivation and Competence in the General Hospital, p. 72.

³⁴Fred Davis, Virginia L. Olesen, and Elvi Waih Whittaker, "Problems and Issues in Collegiate Education," in Fred Davis, ed., The Nursing Profession: Five Sociological Essays, New York, New York: John Wiley and Sons, Inc., 1966, Table 2, p. 166.

offered by work in this field in comparison to hospital nursing: the standard nine to five, five-day week, the slightly higher salary scales, and, of less utilitarian significance, the relatively greater autonomy and independence enjoyed by the public health practitioners. All of these, it should be noted, better accord with the adult life styles which these students project for themselves than do conditions in hospital employment. This is especially true for students who seriously contemplate combining work with raising a family."³⁵

Hale attributes some of the trend away from hospital employment to the lack of practical experience a degree nurse receives as compared with a diploma nurse.³⁶ According to Hale this deficiency results in a lack of self-confidence on the part of the degree nurse towards her ability to perform adequately in the hospital environment. The deficiency also results in hospital dissatisfaction with the degree nurse.

"They (hospitals) have not been satisfied with the graduates of these schools because of their inability to assume responsibility on the wards without many months of supervised training."³⁷

Esther Lucille Brown might question Hale's cause-effect relationship and states that changes in the hospital social system could increase the attractiveness of hospital positions to degree nurses.³⁸ Another source gives support to Brown's view and in addition feels that the hospital's indifference to the baccalaureate nurse and her indifference to hospital

³⁵ Ibid., p. 164.

³⁶ Hale, op. cit., p. 103.

³⁷ Ibid., p. 104.

³⁸ Brown, Improving Staff Motivation and Competence in the General Hospital, p. 108.

employment results in a self-perpetuating spiral.³⁹

The shortage of professional nurses hospitals are now experiencing has pointed out the necessity for breaking this spiral. Hospitals can no longer afford to exhibit indifference to the degree nurse. The methods by which the attractiveness of hospital employment may be increased are not clear. In the short run the achievement of this increase in appeal might conceivably have only distributional effects upon the available supply of nurses. In the long run, however, the attractiveness of the entire nursing profession might be increased. The long-run effect might also reinforce the appeal which the image of bedside nursing presently has for young girls considering nursing as a career.⁴⁰

The discussion of paternalism suggests one method of increasing the attractiveness of hospital employment. The degree nurse's stress upon identification with her profession, rather than with the hospital, would have to be recognized. Communication and cooperation would have to be increased since "At present, there is woefully inadequate communication between the attending physician and the nursing staff."⁴¹

The degree nurse is more likely to view herself as a member of a health team in which her primary responsibility is to patient welfare. She is not likely to react favorably to complete subordination to doctors or to a rigid hierarchical structure where,

³⁹Davis, Olesen, and Whittaker, op. cit., p. 164.

⁴⁰Ibid., p. 163.

⁴¹Hans O. Mauksch, "The Organizational Context of Nursing Practice," in Fred Davis, ed., The Nursing Profession: Five Sociological Essays, New York, New York: John Wiley and Sons, Inc., 1966, p. 136.

"The implicit threat of the physician's use of his free-flowing communication prerogatives places the nurse in the position of being forced to use tact, flattery, or even subterfuge in her role of coordinator between a bureaucratic system and a free-wheeling artist."⁴²

The greater monetary attractiveness of non-hospital positions could be overcome. The attractiveness of more stable working hours, however, is not subject to a complete solution. A hospital needs to be staffed on an hour-round basis. Yet this factor should not serve to deter nurses seeking part-time work from considering hospital employment if the appeal of other elements of hospital working conditions can be increased. This possibility is strengthened by the relatively low demand which employers other than hospitals have for part-time nurses.

A previously mentioned relationship should be emphasized. To the extent that hospitals increase their attractiveness for full-time personnel at the expense of non-hospital positions, the effects in the short run will be primarily distributional. Long-run positive effects on the supply of nurses might result, however, if increasing the attractiveness of hospital employment adds to the appeal of the entire nursing profession. In addition, if hospitals can increase their attractiveness to part-time nurses, there is the distinct possibility that nurses who would otherwise remain inactive might return to nursing.

2. Service to society

Service to society is not monopolized by professions, yet such service is the keynote of professions. According to Merton, many people seem to get

⁴²Ibid., p. 131.

" . . . a real sense of reward from the idea that they are engaged in doing something significant for others, and doing more than is strictly required for economic reasons. Professional practice helps people to gain this kind of reward. It requires them to do more for others than others at first expect. It doesn't require the individual practitioner to feel altruistic; it only requires him to act that way. It is in this practical sense, and not in the sense of sentimentality, that the profession institutionalizes altruistic behavior."⁴³

Since the time of Florence Nightingale, nursing has traditionally emphasized the service ideal.⁴⁴ Hale feels that this traditional emphasis has experienced recent decline.⁴⁵ Whether or not this decline is actually occurring, the service ideal could be more extensively utilized as an asset. Service is not unique to nursing, but it is relatively uncommon in the many occupations now competing for young female entrants.⁴⁶

3. Community status

The status of a profession in the community is also influential in determining an entrant's professional decision.

"We cannot deny the fact that the enthusiasm of young, impressionable high-school students for any occupation is influenced by the prestige of that occupation in the community and the professional pride of those engaged in it."⁴⁷

Although the above remarks were made by the National Education Association,

⁴³R. K. Merton, "The Search for Professional Status," Vol. LX American Journal of Nursing (May, 1960), p. 662.

⁴⁴William A. Glaser, "Nursing Leadership and Policy," in Fred Davis, ed., The Nursing Profession: Five Sociological Essays, New York, New York: John Wiley and Sons, Inc., 1966, p. 6.

⁴⁵Hale, op. cit., 102.

⁴⁶Idem

⁴⁷National Education Association, Teacher Supply and Demand, Research Report R-6, Washington, D.C.: National Education Association, 1959, p. 6.

their relevance to the nursing profession should be evident.

Briefly summarizing, increasing the attractiveness of the nursing profession is an essential step in seeking to: (1) keep trained nurses active, and (2) increase the number of young persons entering nursing. Increasing the availability of education is a direct attempt to increase the supply of nurses. Increasing the attractiveness of nursing is a less direct method in that it attempts to close the gap between the supply of nurses and active nurses, and tries to insure the full utilization of educational opportunities by entrants. The relationship between these two methods is stated quite well by the National Manpower Council.

"A persistent shortage cannot generally be relieved without efforts to increase the supply. Nevertheless, it is also impossible to remedy some persistent shortages solely or even primarily through increases in the supply. The number of college graduates who meet most if not all of the requirements for teaching is much greater than the number of teachers. As long as teaching remains a relatively unattractive career, especially for men, there is no reason to expect that the training of more teachers will overcome the persistent shortages which have characterized the profession since early in World War II."⁴⁸

D. Collective Bargaining

Since collective bargaining is usually considered a restrictive measure which controls the supply of workers in order to raise wages, it may seem strange to include collective action as a possible solution to the nursing shortage. Yet collective bargaining may serve to enlarge rather than constrict the supply of labor when it is applied to the nursing profession.

⁴⁸National Manpower Council, A Policy for Scientific and Professional Manpower, p. 158.

Economic theory states that if employers experience a shortage of manpower they will raise wages to attract more workers. Thus one sign of a manpower shortage would be

" . . . a sharp and disproportionate increase in salaries or earnings. But the earnings of teachers and nurses, for instance, have barely kept pace with or have lagged behind the general increase in wages, salaries, and prices in recent years, although shortages of these professionals is regarded as serious."⁴⁹

The reasons for this lag in salaries with respect to nurses are numerous. The service ideal of nursing may be influential. The fact that a majority of hospitals are nonprofit employers may also be a causal factor. Whatever the reasons, the lag in nursing salaries must be eliminated if the nursing shortage is to be eased since "How many students actually enter nurse training will be much influenced . . . by the extent of improvement in salaries and working conditions in the profession."⁵⁰

Collective bargaining may help to erase the lag between the nursing profession and other career opportunities. The use of collective action may help to overcome a malfunctioning market by raising the strength of nurses in relation to their hospital employers. Collective bargaining may also help to correct the paternalism of nurse-employer relationships and aid the achievement of better working conditions. If collective bargaining could achieve these results on a national level, the financial and professional attractiveness of nursing would be increased. With the increase in

⁴⁹ Ibid., p. 145.

⁵⁰ U.S. Government, Manpower Administration, Technology and Manpower in the Health Service Industry, 1965-1975, Manpower Research Bulletin No. 14, Washington, D.C.: U.S. Government Printing Office, 1967, p. 189.

attractiveness more trained nurses might be induced to remain active and more girls might enter nursing.

The above remarks serve as an introduction to the potential of collective bargaining as a solution to the nursing shortage. The history of collective bargaining, and the possible effects of collective bargaining upon the supply of nurses will be discussed in Chapter VII.

CHAPTER VI. SURVEY OF IOWA HOSPITALS

A. Scope of Survey

The survey was conducted through the use of a one-page questionnaire which is shown in the Appendix. The length of the questionnaire was deliberately limited to one page since it was felt that a long complex questionnaire would reduce the rate of return. The questionnaire was designed to obtain data for three nursing personnel positions. Two positions are occupied by registered professional nurses; the head nurse and general duty positions. The third position selected was that of the licensed practical nurse (LPN).

General duty nurses were chosen since this study attempts to focus a large part of its attention on this position. The head nurse was chosen since a large number of registered nurses are employed in this capacity and since it is the first promotion up the nursing hierarchy. As such, the head nurse data could give insights as to the salary incentives offered for the assumption of additional duties and responsibilities and also provide raw data for regression analysis. While the licensed practical nurse is not a registered professional nurse, this position also employs a large number of personnel. The licensed practical nurse has a definite position in the hospital structure with relation to registered nurses. Therefore, the salaries for LPN's could be compared with the salaries given to general duty nurses in order to gain a clearer picture of the general duty nurse's economic position.

The questionnaire was mailed on March 3, 1967, to 122 hospital administrators in Iowa. These administrators represented all of the short-term,

nonfederal, general hospitals in Iowa as listed in the August 1966 issue of Hospitals.¹ A self-addressed envelope was included with the questionnaire to encourage prompt responses.

On March 24 a reminder letter with a second questionnaire enclosed was mailed to administrators from whom replies had not been received. The last day for accepting replies was set for April 7, 1967, two weeks after the reminder notices had been mailed.

A total of 86 administrators returned the questionnaire. However, six blank forms were returned and, therefore, only 80 useable responses were received. This response of 80 questionnaires represents a return rate of 65.6%. Table 22 compares the composition of the survey population and the 80 responses according to bed size and type of control. Small hospitals of less than 50 beds and hospitals with 100-199 beds were relatively over-represented in the responses. Large hospitals with 200 or more beds and smaller hospitals of 50-99 beds were under-represented.

None of these deviations from the composition of the entire hospital population appears to be large enough to distort the findings, with perhaps the exception of the first category. However, the bed size of 7.4% of the population was not given in the master list. From the size of the cities in which these non-reporting hospitals are located, it is highly likely that the bed size of the hospitals concerned would be less than 100.² Therefore, some of the apparent distortion in the composition of the returns

¹"Listings of Health Care Institutions," Vol. XL, Part 2 Hospitals (August, 1966), pp. 82-86.

²Idem

Table 22. Comparison of composition of questionnaires mailed^a and questionnaires returned according to bed size and type of control

Category	Questionnaires mailed		Questionnaires returned	
	Number	Percent	Number	Percent ^b
Bed size:				
1. Less than 50	44	36.1	35	43.8
2. 50-99	30	24.6	19	23.8
3. 100-199	21	17.2	16	20.0
4. 200 and over	18	14.7	10	12.5
5. Information not given	9	7.4	-	-
Totals	122	100.0	80	100.1
Control:				
	Number	Percent	Number	Percent ^b
1. State or local government	45	36.9	37	46.2
2. Proprietary	4	3.3	4	5.0
3. Voluntary non-profit	32	26.2	23	28.9
4. Religious	41	33.6	16	20.0
Totals	122	100.0	80	100.1

^aComposition of questionnaires mailed obtained from Hospitals, August 1, 1966, Part 2. American Hospital Association, pp. 82-86.

^bDoes not add to 100 due to rounding.

may be accounted for by more of the small hospitals reporting in the present survey than in the one conducted by the American Hospital Association.

When the composition of the responses and population are compared as to type of control, the two major differences appear in the religious and state and local government categories. Government hospitals comprise 36.9% of the population while accounting for 46.2% of the returns. Religious hospitals are under-represented by the return percentage of 20.0% since they account for 36.9% of the population. Since the religious hospitals in the survey have a tendency to be large hospitals while government hospitals

Table 23. Composition of survey returns according to city size

City size	Number returns	Percentage of returns ^a
Less than 10,000	57	71.3
10,000 up to 25,000	7	8.8
25,000 up to 50,000	6	7.5
50,000 up to 100,000	6	7.5
100,000 and over	4	5.0

^aDoes not add to 100.0 due to rounding.

are more moderate in size,* the influence of this distortion upon survey findings must be kept in mind.

Table 23 gives the size of the cities in which the responding hospitals are located. Of the responding hospitals 57 or 71.3% were in cities of less than 10,000 population. Only 5% of the respondents were located in large cities with 100,000 or more population.

B. Regression Analysis

1. Methods

In order to use a hospital's reponse for regression analysis to test Hypotheses 2 through 9, it was necessary that the response contain all of the following information:

1. Number of head nurses, general duty nurses, and licensed practical

*Refer to Table 28, p. 1 , herein.

nurses employed.

2. Vacancies for head nurses, general duty nurses, and licensed practical nurses.

3. Average salaries for head nurses, general duty nurses, and licensed practical nurses.

4. Bed size of hospital and size of city in which hospital is located. Only 41 of the 80 responses contained all of the necessary information. Table 24 categorizes these 41 hospitals according to bed size and type of control.

The following variables were isolated for consideration through regression analysis:

Independent variables

x_1 = average monthly salaries of head nurses

x_2 = average monthly salaries of general duty nurses

x_3 = average monthly salaries of licensed practical nurses

x_4 = city size

x_5 = bed size

x_6 = hospital's average salary for nursing personnel

$$= \frac{\sum_{i=1}^3 N_i x_i}{\sum_{i=1}^3 N_i} \text{ where } N_i = \text{number of nurses according to position occupied}$$

Dependent variables

y_1 = average monthly salaries of head nurses

y_2 = average monthly salaries of general duty nurses

y_3 = average monthly salaries of licensed practical nurses

Table 24. Comparison of composition of questionnaires mailed^a and questionnaires used for regression analysis according to bed size and type of control^b

Bed size:	Number	Percent	Number	Percent
1. Less than 50	44	36.1	15	36.6
2. 50-99	30	24.6	9	22.0
3. 100-199	21	17.2	8	19.5
4. 200 and over	18	14.7	9	22.0
	Number	Percent	Number	Percent
Control:				
1. State or local government	45	36.9	20	48.8
2. Proprietary	4	3.3	3	7.3
3. Voluntary non-profit	32	26.2	11	26.8
4. Religious	41	33.6	7	17.1

^aComposition of questionnaires mailed obtained from Hospitals, August 1, 1966, Part 2, American Hospital Association, pp. 82-86.

^bDoes not add to 100.0 due to rounding.

y_4 = hospital's average salary for nursing personnel as illustrated in x_6

y_5 = hospital's average percentage of budgeted vacancies for nursing personnel

$$= \frac{\sum_{i=1}^3 V_i}{\left(\sum_{i=1}^3 N_i + \sum_{i=1}^3 V_i \right)} \quad \text{where } V_i = \text{number of vacancies for nurses according to position occupied}$$

y_6 = percentage of budgeted vacancies for head nurses

$$= \frac{V_1}{\left(N_2 + V_2 \right)} \quad \text{where } V_1 = \text{vacancies for head nurses}$$

y_7 = percentage of budgeted vacancies for general duty nurses

$$= \frac{V_2}{(N_2 + V_2)} \quad \text{where } V_2 = \text{vacancies for general duty nurses}$$

y_8 = percentage of budgeted vacancies for licensed practical nurses

$$= \frac{V_3}{(N_3 + V_3)} \quad \text{where } V_3 = \text{vacancies for licensed practical nurses}$$

2. Findings and discussion

Table 25 lists the regression equations, t values, F ratios, and correlations relevant for the testing of Hypotheses 2 through 9.

Hypothesis 2: The size of the cities in which hospitals are located has a significant positive effect upon the salaries the hospitals pay their nursing employees.

Equation 1.1 tests this hypothesis for the head nurse position by regressing head nurse salaries on city size. The t values are significant at the .01 level for both the intercept and the slope. The F ratio, 19.3814, and the R^2 , .5762, are also significant at the .01 level.

Equation 1.2 tests the effects of city size upon general duty nursing salaries. Again, both the F ratio and the R^2 are significant at .01. However, city size appears to exert a stronger effect upon general duty salaries than upon head nursing salaries as supported by R^2 's of .6120 and .5762 respectively.

The effect of city size upon the salaries of licensed practical nurses is tested by equation 1.3. Both the intercept and the slope are significant at the .01 level as is the F ratio and R^2 values of 8.6303 and .4257 respectively. Yet the effect of city size upon the salaries of licensed practical nurses appears to be somewhat less than its effect upon the general duty or head nursing salaries.

Table 25. Regression analysis findings for 41 hospitals based on survey conducted in the spring of 1967

Equation	b values	standard error of b	t values	F ratios	correlations
(1.1) $y_1 = b_0 + b_1 x_4$	$b_0 = 590.4656$ $b_1 = 23.3652$	23.1193 5.3073	23.5399** 4.4024**	19.3814**	.5762**
(1.2) $y_2 = b_0 + b_1 x_4$	$b_0 = 515.1387$ $b_1 = 17.8452$	16.0871 3.6930	32.0218** 4.8322**	23.3497**	.6120**
(1.3) $y_3 = b_0 + b_1 x_4$	$b_0 = 360.1934$ $b_1 = 11.3996$	16.9034 3.8804	21.3089** 2.9377**	8.6303**	.4257**
(1.4) $y_4 = b_0 + b_1 x_4$	$b_0 = 478.0247$ $b_1 = 12.1648$	16.5290 3.7945	28.9203 3.2059**	10.2780**	.4567**
(2.1) $y_1 = b_0 + b_1 x_5$	$b_0 = 469.7078$ $b_1 = .0165$	8.2510 .3280	56.9276** 5.0342**	25.3431**	.6276**
(2.2) $y_2 = b_0 + b_1 x_5$	$b_0 = 423.8416$ $b_1 = .0120$	5.9028 .0235	71.8039** 5.0998**	26.0080**	.6325**
(2.3) $y_3 = b_0 + b_1 x_5$	$b_0 = 299.8203$ $b_1 = .0906$	5.9712 .0237	50.2110** 3.8182**	14.5790**	.5216**
(2.4) $y_4 = b_0 + b_1 x_5$	$b_0 = 414.6853$ $b_1 = .0892$	5.9620 .0237	69.5542** 3.7639**	14.1671**	.5162**
(3.1) $y_1 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = 526.3293$ $b_1 = 11.9191$ $b_2 = .1153$	31.4796 6.4089 .0416	16.7197** 1.8598 2.7735**	15.1998**	.6667**
(3.2) $y_2 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = 72.2766$ $b_1 = 10.1958$ $b_2 = .0771$	22.0758 4.4944 .0292	21.3935** 2.2686* 2.6431*	16.9598**	.6868**

* Significant at .05.

** Significant at .01.

Table 25 (Continued)

Equation	b values	standard error of b	t values	F ratios	correlations
(3.3) $y_3 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = 319.3306$ $b_1 = 4.1070$ $b_2 = .0735$	23.5698 4.7986 .0311	13.5483** .8559 2.3601*	7.6058**	.5347**
(3.4) $y_4 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = 441.5547$ $b_1 = 5.6561$ $b_2 = .0656$	23.3280 4.7493 .0308	18.9281** 1.1909 2.1282*	7.8687	.5417**
(4.1) $y_6 = b_0 + b_1 x_4$	$b_0 = .1253$ $b_1 = -.0186$	.1047 .0240	1.1965 -.7721	.5961	.1227
(4.2) $y_7 = b_0 + b_1 x_4$	$b_0 = .0819$ $b_1 = -.0095$	.1025 .2352	.7997 -.4027	.1622	.0644
(4.3) $y_8 = b_0 + b_1 x_4$	$b_0 = .1034$ $b_1 = -.0021$	1.1414 .2620	.9061 -.8060	.6496	.1280
(4.4) $y_5 = b_0 + b_1 x_4$	$b_0 = .1507$ $b_1 = -.0285$	.1652 .0379	.9126 -.7523	.5659	.1196
(5.1) $y_6 = b_0 + b_1 x_5$	$b_0 = .1296$ $b_1 = -.0001$	.3840 .0002	3.3794** -.3868	.1496	.0618
(5.2) $y_7 = b_0 + b_1 x_5$	$b_0 = .2052$ $b_1 = -.0001$	.4294 .0002	4.7790** -.5758	.3315	.0918
(5.3) $y_8 = b_0 + b_1 x_5$	$b_0 = .2963$ $b_1 = -.0002$	.6187 .0002	4.7895** -.7674	.5889	.1220
(5.4) $y_5 = b_0 + b_1 x_5$	$b_0 = .2175$ $b_1 = -.0001$	.0393 .0001	5.5361** -.6785	.4603	.1080
(6.1) $y_6 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = .1004$ $b_1 = -.0062$ $b_2 = -.00003$	.1529 .0311 .0002	.6567 -.1982 -.1646	.0926	.0696

Table 25 (Continued)

Equation	b values	standard errors of b	t values	F ratios	correlations
(6.2) $y_7 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = .1130$ $b_1 = -.0194$ $b_2 = -.00002$	.1704 .0347 .0002	.6629 -.5596 -.0763	.3194	.1286
(6.3) $y_8 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = .2168$ $b_1 = -.0167$ $b_2 = -.0001$	.2462 .0512 .0003	.8807 -.3339 -.3654	.3434	.1332
(6.4) $y_9 = b_0 + b_1 x_4 + b_2 x_5$	$b_0 = .1523$ $b_1 = -.0137$ $b_2 = -.00005$	.562 .0318 .0002	.9750 -.4318 -.2356	.3186	.1284
(7.1) $y_6 = b_0 + b_1 x_1$	$b_0 = .5864$ $b_1 = -.0009$	.2787 .0006	2.1040* -1.6790	2.8191	-.2596
(7.2) $y_7 = b_0 + b_1 x_2$	$b_0 = .3871$ $b_1 = -.0004$	.4000 .0009	.9678 -.4923	.2423	.0786
(7.3) $y_8 = b_0 + b_1 x_3$	$b_0 = .3137$ $b_1 = -.0001$	.4491 .0014	.6984 -.1001	.0100	.0160
(7.4) $y_5 = b_0 + b_1 x_6$	$b_0 = .2155$ $b_1 = -.00003$	.3901 .0009	.5524 -.0342	.0017	.0055

Equation 1.4 tests the effect of city size on y_4 , the average salary which a hospital pays its nursing personnel. The resulting R^2 , although significant at the .01 level, is relatively low when compared with the R^2 's resulting from the individual testing of y_1 , y_2 , and y_3 .

Equations 1.1 through 1.4 appear to support the existence of a significant positive correlation between city size and nursing salaries. Therefore, Hypothesis 2 will be accepted.

The effect of hospital size upon salaries is explored by Hypothesis 3 which states that,

Hypothesis 3: The bed size of hospitals has a significant positive effect upon the salaries the hospitals pay their nursing personnel.

Equations 2.1 through 2.4 of Table 25 are used to test this hypothesis.

Equation 2.1 tests the relationship for the head nursing position with both t values being significant at the .01 level. R^2 , .6276, is also significant at the .01 level. Comparable results are given for the general duty and LPN positions as tested by equations 2.2 and 2.3. The effect of bed size upon the average salary offered by a hospital is also quite significant with an R^2 of .5162 resulting. Therefore, it would appear that bed size does have a strong influence upon the salaries of nursing personnel and that Hypothesis 3 should be accepted.

Hypotheses 2 and 3 are related since larger hospitals tend to be found in larger cities. This relationship is supported by the fact that of the 80 responding hospitals, ten had 200 beds or more. Half of these ten large hospitals were located in cities with 100,000 or more population while 90% were in cities of 50,000 or more. Therefore, Hypotheses 2 and 3 may essentially be testing the same factors.

Hypothesis 4 was designed to test whether city size and bed size have separate and equal influences upon salaries.

Hypothesis 4: Bed size and city size are of equal influence in determining the salaries hospitals pay their nursing personnel.

Equations 3.1 through 3.4 test this hypothesis by individually regressing the salaries of head nurses, general duty nurses, and licensed practical nurses against city size and bed size, and then regressing average nursing salary against bed size and city size. In all four equations the F ratios and R^2 's are significant at the .01 level.

Yet Hypothesis 4 must be rejected for the t values of the four equations show that city size and bed size do not have equal and separate influences. In equation 3.1 the slope coefficient of x_5 is significant at the .01 level while the effect of city size is not significant. In equation 3.2 both city size and bed size are significant at .05 while only bed size is significant in equation 3.3. Also, in equation 3.4 only bed size is significant. It appears, therefore, that bed size has a stronger influence on salaries than does city size. Or, some of the effect of city size upon salaries obtained in equations 1.1 through 1.4 is due to the tendency for larger hospitals to be situated in larger cities.

Yet city size does have some separate influence upon salaries. This statement is documented by noting that in all four equations, 3.1 through 3.4, the R^2 's are noticeably higher than those which resulted from separating the analyses of city size and bed size. The multiple regression approach thus explains more of the salaries than does the linear regression approach.

Hypotheses 5, 6, and 7 attempt to discover if the factors which

influence salaries also influence vacancies. Hypothesis 5 states that,

Hypothesis 5: The size of the cities in which hospitals are located has a significant effect upon the hospitals' vacancies for nursing personnel.

Hypothesis 5 must be rejected due to the results of equations 4.1 through 4.4. City size does not appear to have a significant effect upon the percentage of budgeted vacancies for head nurses, general duty nurses, or licensed practical nurses. Nor does city size exert any strong influence upon the average percentage of vacancies for nursing personnel. Both of these evaluations are supported by the very low R^2 's of .1227, .0644, .1280, and .1196 for equations 4.1 through 4.4 respectively.

The effect of bed size upon vacancies is examined by Hypothesis 6.

Hypothesis 6: The bed size of hospitals has a significant effect upon the hospitals' vacancies for nursing personnel.

From equations 5.1 through 5.4 bed size appears to have an insignificant effect upon the individual vacancies for the three nursing positions. Nor is the effect of bed size upon average percentage of budgeted vacancies significant. Only the intercept t values are significant for equations 5.1 through 5.4 with none of the F ratios or R^2 's being significant. Therefore, Hypothesis 6 must be rejected.

The effects of bed size and city size upon vacancies are analyzed through Hypothesis 7.

Hypothesis 7: Bed size and city size are of equal influence in determining hospitals' vacancies for nursing personnel.

There are no significant results evident in equations 6.1 through 6.4 which test Hypothesis 7. The highest R^2 achieved is that of .1332 for licensed practical nurse vacancies while the lowest is .0696 which expresses the

relationship between head nurse vacancies and bed and city size. Therefore, Hypothesis 7 must be rejected.

From the findings discussed thus far, it would appear that the factors which are significant in explaining salaries are not significant in explaining vacancies. Or, alternatively, no variables have yet been found which exert a significant influence upon vacancies. However, the possible relationship between salaries and vacancies has not yet been discussed.

Hypothesis 8 attempts to examine the possibility of a link between salaries and vacancies by stating that,

Hypothesis 8: The salaries which hospitals pay their nursing personnel have a significant negative effect upon the hospitals' vacancies for nursing personnel.

Equation 7.1 regresses head nursing vacancies on salaries for head nurses. The F ratio is not significant which means that Hypothesis 8 must be rejected in the case of head nurses. The coefficient of salaries is negative as hypothesized, but the relationship is not strong enough to be significant.

Equations 7.2 and 7.3 test Hypothesis 8 for the general duty and licensed practical nurse positions. In neither case are the t values or F ratios significant. Also, neither of the salary coefficients is negative, being .0786 and .0160 for general duty and licensed practical nurses respectively.

Equation 7.4 regresses the average percentage of vacancies for nursing personnel on the average salary paid to nursing personnel. Neither the intercept nor the slope coefficient is significant. An almost perfect non-correlation results with R^2 being .0055.

The rejection of Hypothesis 8 has strong implications for the mobility of nurses. From the findings it appears that nurses have only a limited degree of mobility; they do not actively seek out or take advantage of salary differentials within the state. Therefore, the findings would appear to support the importance of the local supply in determining the shortage of nursing personnel. This conclusion means that solutions to the nursing shortage must emphasize better utilization of the local supply and must attempt to increase the local supply of nurses.

B. Hypotheses Not Tested by Regression Analysis

1. Hypothesis 9

As indicated in Chapter IV, nursing educators place a great deal of stress upon the need for potential nurses to obtain a college degree. However, no data was presented at that time to indicate whether employer hospitals financially recognize the value of a college education. Evidence of this recognition could be found by the maintenance of differentials between the starting salaries of baccalaureate and diploma nurses.

Hypothesis 9 states that,

Hypothesis 9: General duty nurses with a baccalaureate degree are given starting salary incentives.

Therefore, Hypothesis 9 is attempting to indicate whether Iowa hospitals recognize the value of a college education by granting salary differentials to baccalaureate nurses.

Of the 80 survey respondents, 77 replied to the question, "Does your hospital grant starting salary incentives to general duty nurses with bachelor's degrees?" A total of 66 or 85.7% administrators stated that

they do not distinguish between baccalaureate and diploma nurses for starting salary purposes. Of the remaining 11 or 14.3% who do grant starting salary incentives, only 7 gave the amount of the differential. The smallest and largest differentials given are \$10 and \$25 a month. The average differential for the 7 hospitals is \$18.43 a month.

On the basis of the above data, it appears that the value of a college education is not recognized in Iowa through the granting of starting salary differentials. Thus Hypothesis 9 must be rejected.

The value of a college education may also be recognized by the giving of additional duties and responsibilities to baccalaureate nurses. The acceptance of additional duties and responsibilities by a nurse is usually denoted by an upward movement in the nursing hierarchy. As was illustrated in Chapter II, salary increases as a nurse moves upward administratively. Therefore, if a baccalaureate nurse is given additional duties and responsibilities, as indicated by one respondent, her salary may also be increased. Yet it must be noted that the financial reward is given for the attainment of a higher position, and not for the value derived from a college education irrespective of the position held.

One item on the questionnaire was designed to obtain information on whether or not hospitals give newly graduated baccalaureate nurses the opportunity to assume additional duties and responsibilities. Specifically, are newly graduated baccalaureate nurses hired as head nurses? If a large number of hospitals do hire new baccalaureate graduates as head nurses, then the rejection of Hypothesis 9 might be explained. For if large numbers of baccalaureate nurses are hired as head nurses, there would be little need for them offering salary incentives for the general duty

position since education would be rewarded by more responsibilities and income.

Of the 77 hospital administrators replying to the relevant question, 68 or 88.3% stated that they do not hire new baccalaureate nurses as head nurses. Eight or 10.7% replied that they do hire new degree nurses as head nurses. One administrator stated that his hospital will employ a new degree nurse as a head nurse after a hospital training period.

Over a third of the hospitals responding to the question commented upon their answers. Twenty administrators stated that baccalaureate nurses have never applied, that baccalaureate nurses would be hired as head nurses if it seemed necessary, or that their hospital would hire new baccalaureate nurses as head nurses if the opportunity presented itself. Nine respondents stated that the baccalaureate nurse does not have enough experience for the head nurse position or that the diploma nurse best meets their hospital's needs.

Summarizing, the data indicate that only a few hospitals grant starting salary incentives to baccalaureate nurses. Also, the majority of responding hospitals do not employ newly graduated baccalaureate nurses as head nurses.

Before the discussion of the value placed upon education by hospitals is completed, one more aspect should be examined. This last topic is concerned with the encouragement given to employed nurses to continue their education. One survey question was directed towards this topic by asking, "Does your hospital give any financial incentives for a general duty nurse to increase her education while employed?"

Of the 76 administrators which replied to the question, 57 or 75%

stated that their hospitals do not grant any such incentives. The remaining 25% or 19 administrators replied that incentives are given. Tuition and/or expenses are paid by 14 of the hospitals replying affirmatively while one hospital grants salary increases. Thus the majority of Iowa hospitals do not give incentives for nurses to increase their education. The incentives which are given tend to stress the financial arrangements of the education itself and not the increasing of a nurse's salary for having raised her level of preparation. Yet as described here the findings are only tentative. More detailed data have to be obtained before any conclusive statements can be made.

2. Hypothesis 10

Hypothesis 10 states that:

Hypothesis 10: Part-time general duty nurses receive on a prorated basis the same fringe benefits as do full-time general duty nurses.

Chapter V noted that in order to ease the nursing shortage an attempt must be made to increase the use of part-time nurses. Although personal factors have been found to be highly influential in determining a nurse's activity status, the salary and working conditions of employment may also serve to attract or deter nurses from working part time.

Hypothesis 10 attempts to discover whether nurses are encouraged to work part time through the granting of fringe benefits by hospitals. If few benefits are granted, it is conceivable that the working atmosphere emphasizes the temporary nature of the employer-employee relationship.

The relevant question asked of administrators was, "What type of fringe benefits are given to your part-time nursing help as compared with your full-time nurses?" Of the 73 respondents, 34.2% give no benefits to

part-time help. Another 30 administrators or 41.1% offer some of the benefits to part-time nurses that were given to full-time nurses. Eighteen of the 30 stated that the benefits are prorated according to the amount of part-time work, while 12 responses did not give the method by which benefits are distributed.

Only 18 hospitals stated that they give the same benefits to the full-time and part-time nurses. Of this 18, 12 stated that the benefits were prorated while the remainder did not specify the methods used for determining the amount of benefits.

Thus a large number of the hospitals in Iowa give no fringe benefits to the part-time nurses with salary being the only compensation. Another large segment of the hospitals offer only partial benefits, with vacation time commonly mentioned. Therefore, Hypothesis 10 must be tentatively rejected.

3. Hypotheses 11 and 12

Hypotheses 11 and 12 are concerned with the opinions of Iowa hospital administrators concerning the effects of higher nursing salaries upon the supply of registered nurses and the demand for general duty nurses.

Hypothesis 11 states that,

Hypothesis 11: Hospital administrators in Iowa believe that raising the salaries of general duty nurses will decrease their demand for general duty nurses.

To test this hypothesis, administrators were asked, "Would increasing the salaries for general duty nurses have any effect upon your demand for, or use of, their services?"

Of the 75 administrators responding to this question, 52 or 61.9%

believe that higher salaries will have no effect upon their demand for general duty nurses. Another 19 administrators or 25.3% stated that their demand for nurses will be affected by higher salaries while 5.3% are uncertain as to the effect higher salaries will have.

Sixty-five of the 75 hospitals responding to the question commented upon their answers. Fifty of these hospitals stated that their demand for nurses will stay the same while 7 believe that their demand will decrease. Three administrators stated they would better utilize a nurse's services while two would substitute other personnel for general duty nurses. Three administrators stated they would use both tactics of better utilization and substitution of other personnel.

The above data necessitates the tentative rejection of Hypothesis 11. The administrators tend to feel that their demand for general duty nurses will not be substantially altered by higher salaries.

Hypothesis 12 states that,

Hypothesis 12: Hospital administrators in Iowa believe that raising the salaries of registered nurses will increase the supply of registered nurses.

A surprisingly large percentage, 58.2%, of the 79 responding administrators believe that increasing salaries will not increase the supply of nurses. Another 24 administrators or 30.4% stated that higher salaries will increase the supply while 11.4% of the administrators are uncertain as to the effect higher salaries would have.

Table 26 categorizes the comments given by administrators in support of their answers. Administrators stating that higher salaries will have no effect on the supply of nurses tend to cite the influence of personal reasons on a nurse's activity status. Those administrators who believe that

Table 26. Comments of hospital administrators concerning the effect of higher salaries upon the supply of registered nurses

Comment	Number
Comments to support no effect	
Nurses won't work due to personal reasons	11
Experience has shown that salary increases won't increase supply	9
Inactive nurses not particularly responsive to salary increases	10
Salary not too influential in determining entrance into nursing	1
Supply will always be inadequate	2
Already have adequate supply	9
Have to consider competition between various users of nurses	5
Comments to support positive effect	
Experience has shown that salary increases will increase supply	1
Would increase participation of inactive nurses	18
Increase attractiveness of nursing to potential entrants	10

the supply would be increased tend to rely upon the influence higher salaries would have upon increasing the attractiveness of nursing as a career. The influence of higher salaries on the labor force participation of trained nurses was also stressed as support for the positive effect higher salaries would have on the supply of nurses.

Although the conclusion must be tentative, hospitals do not generally

feel that the primary solution to the nursing shortage lies in increasing salaries. Hypothesis 12 must, therefore, be rejected. Yet it must be emphasized that this conclusion is based upon the answers of employers, not employees, and thus the influence of the personal interests of the respondents must be acknowledged.

C. Descriptive Findings

1. Full-time nurses

a. Numbers In April, 1967, the 80 responding hospitals reported 383 head nurses, 1,462 general duty nurses, and 583 licensed practical nurses as being employed full time. Based on a 40-hour work week, the head nurses contributed 15,320 hours to hospital staffing, while the general duty nurses and licensed practical nurses contributed 58,480 and 23,320 hours respectively.

b. Salaries The responding hospitals were asked to give the maximum, average, and minimum salaries earned by their head nurses, general duty nurses, and licensed practical nurses. Table 27 shows the results of the answers. The different categories of salaries given in Table 27 were tabulated individually and, therefore, the number of hospitals involved in each average varies.

The monthly salaries for head nurses range from a maximum of \$700 to a minimum of \$332 with the average maximum and average minimum given by the hospitals being \$510.83 and \$447.05 respectively.

The maximum monthly salary earned by general duty nurses was \$610 with the minimum paid being \$300. The average maximum salary is \$455.84 with the average minimum salary being \$404.54. The average monthly salary for a

Table 27. Salaries of head nurses, general duty nurses, and licensed practical nurses employed by short-term general nonfederal Iowa hospitals, Spring 1967

Nursing position	Average maximum salary	Average average salary	Average minimum salary
Head nurses	\$510.83 n=65	\$477.60 n=65	\$447.05 n=59
General duty nurses	\$455.84 n=67	\$429.07 n=72	\$404.54 n=68
Licensed practical nurses	\$336.26 n=58	\$308.73 n=63	\$286.35 n=57

general duty nurse is \$429.07, approximately \$50 a month less than the head nurse's average average salary.

The licensed practical nurse's monthly salary also exhibits a wide range with the maximum salary paid being \$460 and the minimum \$220. The average maximum salary was \$308.73 and the average minimum \$286.35.

c. Vacancies For head nurses, 61 vacant positions were reported from which a budgeted vacancy percentage of 13.7% was calculated. The hospitals stated that they had 279 general duty positions vacant for a budgeted vacancy percentage of 16.0%. Relatively less excess demand is apparent in the case of licensed practical nurses. A total of 56 vacancies were reported for a 8.8% budgeted vacancy figure.

2. Hospitals

As pointed out in the second chapter, city size and type of hospital control appear to have some impact on the size of hospitals. The analysis

of the survey findings concerning hospital bed sizes is given in Table 28 and appears to support the impact of city size and type of control on the size of hospitals.

When analyzed according to type of control, the religious hospitals appear to be the largest with 190.38 being the average number of beds. The state or local government hospitals are second largest with an average of 96.08 beds. The proprietary hospitals are the smallest with an average of 32.75 beds while an average bed size of 75.44 was obtained for the voluntary nonprofit hospitals.

When categorized according to city size, the size of hospitals tends to increase as the size of the city increases. There is one apparent exception, however. For hospitals in cities of 25,000 up to 50,000 the average bed size was 339.33, an average size exceeded only by hospitals in cities of 100,000 or over. This exception is due to the presence of one extremely large hospital among the size hospitals reported to be located in cities of 25,000 up to 50,000. When the average is computed without the extremely large hospital, the average size of the remaining five hospitals is 167.60 beds.

Just as city size and type of control affect hospital size, so does the size of a hospital appear to affect the utilization of nursing personnel. Table 29 contains the number of head nurses, general duty nurses, and licensed practical nurses per 100 beds used by hospitals of varying sizes. A reporting hospital was used to calculate a category's average only if the number of personnel used for each of the three nursing positions was reported, even if the answer was none. To have done otherwise would have hindered the comparability of the findings.

Table 28. Hospital bed size according to city size and type of hospital control

Category	Average number of beds	n
<u>Control:</u>		
State or local government	96.08	37
Proprietary	32.75	4
Voluntary non-profit	75.44	23
Religious	190.38	16
<u>City size:</u>		
Less than 10,000	52.21	57
10,000 up to 25,000	75.14	7
25,000 up to 50,000	339.33	6
50,000 up to 100,000	210.33	6
100,000 and over	395.25	4

According to Table 29 hospitals with 50-99 beds tend to use the most head nurses while large hospitals of 200 or more beds tend to use the least, 4.12 head nurses per 100 beds. For the general duty position, hospitals with less than 100 beds may be grouped together as using the least while the larger hospitals with 100 or more beds tend to require a substantially larger number of general duty nurses. The number of licensed practical nurses employed consistently increased with size. The very small hospitals with less than 50 beds used only 4.16 LPN's per 100 beds while the large hospitals with 200 or more beds used over twice as many, 8.62 per 100 beds.

Table 29. Head nurses, general duty nurses, and licensed practical nurses per 100 beds categorized according to bed size and nursing position

Bed size category	Head nurse	General duty	Licensed practical nurse
Less than 50 beds ^a	5.72	11.86	4.16
50-99 beds ^b	5.82	13.21	5.91
100-199 beds ^c	4.57	22.57	6.72
200 and over ^d	4.12	19.50	8.62
All hospitals ^e	4.66	18.20	7.29

^aBased on replies from 27 hospitals.

^bBased on replies from 17 hospitals.

^cBased on replies from 12 hospitals.

^dBased on replies from 10 hospitals.

^eBased on replies from 66 hospitals.

Looking at all three categories of nursing personnel, the smaller hospitals tend to use more supervisory personnel or head nurses and less general duty and licensed practical nurses than do larger hospitals. Although this comment is only speculation, the proportionately larger numbers of head nurses in smaller hospitals may indicate that a ward is manned by less nursing personnel with many general duty nurses occupying head nurse positions. In contrast, the data for larger hospitals indicate the use of less supervisory personnel and quite a large increase in the number of general duty and licensed practical nurses. Therefore, in the larger hospitals more of the head nurse's time might be concerned with actual supervisory and

administrative duties than is true of the smaller hospitals where less general duty and licensed practical nurses are present.

3. Part-time nurses

Hospitals were asked a series of questions concerning the part-time nurses they employ. The questions pertained to the number of part-time nurses employed, the average number of hours worked in a week, salaries, and the existence of differentials for evening and night shifts.

The results of these questions are shown in Table 30. The results are categorized according to hospital size with an average for all responding hospitals also being given.

The average number of part-time nurses employed by a hospital increases sharply as the size of the hospital increases. Hospitals with less than 50 beds employed an average of 7.18 general duty nurses while hospitals with 200 or more beds had an average of 64.4 part-time nurses employed. The small number of large hospitals in the sample helps to explain the relatively low aggregate average of 19.86 part-time nurses.

Both the maximum and minimum hourly salaries tend to increase as hospital size increases. The one exception to this relationship is found in the category of 50-99 beds. The sample maximum salary of \$2.88 an hour is found within this category. Also, the minimum salary offered by hospitals with 50-99 beds is \$2.00 and is greater than the survey minimum of \$1.54 found in larger hospitals with 100-199 beds. However, these two exceptions are apparently only extremes of their category since the average hourly salary consistently increases as hospital size increases.

The proportion of hospitals in each bed size category giving differentials for night or evening shifts increases as hospital size increases. For

Table 30. Survey findings concerning the employment of part-time hospital general duty nurses

	Bed size				All hospitals
	Less than 50	50-99	100-199	200 and over	
Average number of ^a part-time nurses	7.18 n=33	13.73 n=15	24.20 n=15	64.4 n=10	19.86 n=73
Maximum hourly rate	\$2.62	\$2.88	\$2.65	\$2.80	\$2.88
Average hourly rate	\$2.23 n=30	\$2.34 n=15	\$2.39 n=15	\$2.58 n=10	\$2.34 n=70
Minimum hourly rate	\$1.15	\$2.00	\$1.54	\$2.31	\$1.15
Average amount of ^b differential for evening shift	10.08¢ n=13	10.91¢ n=11	14.15¢ n=13	18.78¢ n=9	13.13¢ n=46
Average amount of ^c differential for night shift	17.63 n=19	11.42 n=12	14.15 n=13	19.62 n=8	15.40 n=52
Average number of hours worked	19.07 n=27	21.47 n=15	20.31 n=13	15.44 n=9	19.37 n=64

^aIncluded only those hospitals in each category which gave number of part-time nurses used or specifically stated that no part-time nurses were used.

^bMaximum and minimum amount of evening differential for all responding hospitals were .40¢ and .03¢ respectively. Calculations included only those hospitals in each category which gave amount of differential offered.

^cMaximum and minimum amount of night differential for all responding hospitals were .50¢ and .06¢ respectively. Calculations based upon only those hospitals in each category which gave amount of differential offered.

example, differentials for evening shifts are given by 90% of the hospitals with 200 or more beds who use part-time nurses while only 39.4% of the hospitals with less than 50 beds give evening shift differentials to their part-time nurses.

In the average number of hours worked, no clear relationship between hospital size and number of hours worked appears. The sample average is 19.37 hours worked per week, approximately one-half the normal work week.

In the 73 hospitals which use part-time general duty nurses, approximately 1,450 part-time nurses are used. Since the nurses work approximately 19.37 hours per week, part-time general duty nurses contribute 28,084 hours a week to the staffing requirements of the hospitals. In previous findings the weekly number of hours worked by full-time general duty nurses is estimated to be 58,480. Therefore, the contribution of part-time nurses to hospital staffing is quite large; approximately 32% of the total hours worked by general duty nurses in a week.

CHAPTER VII. COLLECTIVE BARGAINING BY NURSES

The final hypothesis to be evaluated, Hypothesis 13, states that the use of collective bargaining by nurses will have a positive effect upon the supply of nurses in both the short run and long run. This hypothesis must be evaluated on the basis of secondary sources and the relationships discovered through the survey.

Before proceeding to the evaluation of Hypothesis 13, it would be beneficial to discuss the history of collective bargaining by nurses and the barriers to the use of collective bargaining by nurses. This sequence of presentation will allow the evaluation of Hypothesis 13 to be placed in clearer perspective.

A. History of Collective Bargaining by Nurses

When the ANA was founded in 1896, one of its original objectives was to ". . . promote the usefulness and honor, the financial and other interests of the nursing profession."¹ Yet in the early years of the organization's history little collective action was taken to promote the financial interests of nursing practitioners. Instead, nurses relied primarily upon individual requests and recommendations to employers.²

The drive for collective action by nurses was strengthened in the 1930's due to the worsening of the financial situation of nurses.

¹American Nurses' Association Economic Security Unit, Manual for an Economic Security Program, 2nd ed., New York, New York: The Association, 1956, p. 1.

²Daniel H. Kruger, "Bargaining and the Nursing Profession," Vol. LXXXII Monthly Labor Review (July, 1961), p. 699.

Employment reference lists were established by the ANA to aid the job search of their members. This action in itself aided the drive for collective action by pointing out to members the potential usefulness of the ANA.³

The increasing recognition of the need for collective action was also evidenced in the 1930's by the attraction which unionism presented to nurses. In 1937 the ANA attempted to ward off any inroads on membership by the unions by recommending that nurses not become union members at that time.⁴

For this recommendation to be both responsible and effective, the nursing organization had to compensate nurses for their potential loss by offering an alternative. An attempt to provide this alternative was made in 1938 when the ANA urged state affiliates to assume the responsibility for both the standards of nursing care and the employment conditions of nurses in their areas.⁵ The state affiliates were to aid their districts in the study and action undertaken in the study and action undertaken in these two areas. The role of the ANA was to formulate and distribute policy recommendations.⁶

Yet it was not until World War II was in progress that collective

³Herbert Northrup, "Collective Bargaining by Professional Societies," in Richard Lester and Joseph Shister, ed., Insights into Labor Issues, New York, New York: The MacMillan Company, 1948, pp. 142-143.

⁴Editorial, "Nurse Membership in Unions," Vol. XXXVII American Journal of Nursing (July, 1937), pp. 766-767.

⁵"Digest of Minutes, Board of Directors, American Nurses' Association," Vol. XXXVIII American Journal of Nursing (March, 1938), pp. 329-330. 2

⁶Kruger, op. cit., p. 699.

action by nurses became a reality. The first significant step was taken by the nurses in California.

"Faced with rising living costs, shortages of personnel, and long hours, they found hospitals unwilling to raise salaries in conformance with their scales. As a result, some nurses turned to unionization for relief. Meanwhile, the freezing of wages in Oct., 1942, added to the difficulty of obtaining salary adjustments. After fruitlessly inviting the state hospital association to join with it, the CSNA (Calif. State Nurses' Association) went before the National War Labor Bd. and secured the full 15% Little Steel increase."⁷

In January of 1943 an election was held to determine whether the membership wished the CSNA to function as their collective bargaining agent. Authorization was given and the CSNA proceeded to the negotiation and signing of contracts with hospitals and a few industrial employers.⁸ The first agreement was negotiated in 1946.⁹

The successes of the CSNA prompted the national nursing organization into recommending to other state affiliates the use of collective bargaining.¹⁰

These recommendations were transformed into an active national policy by the 1946 ANA Convention.

"The American Nurses' Association believes that the several state and district nurses' associations are qualified to act and should act as the exclusive agents of their respective memberships in the important fields of economic security and collective bargaining. The Association commends the excellent progress already made and

⁷Northrup, op. cit., p. 151.³

⁸Ibid., p. 152.

⁹The Association, Manual for an Economic Security Program, p. 2.⁴

¹⁰Northrup, op. cit., p. 152.

urges all state and district nurses' associations to push such a program vigorously and expeditiously."¹¹

Continuing, the Convention outlined its policy on dual membership.

"Since it is the established policy of other groups, including unions, to permit membership in only one collective bargaining group, the Association believes such policy to be sound for the state and district nurses' associations."¹²

The Convention also outlined what they hoped would be accomplished through the use of collective bargaining. The major economic purpose was to improve the working conditions and living standards of nurses. More specifically,

". . . action towards (a) wider acceptance of the 40-hour week with no decrease in salary, thus applying to our postwar conditions the principles of the 8-hour day adopted by the American Nurses' Association in 1934; (b) minimum salaries adequate to attract and hold nurses of quality, and to enable them to maintain standards of living comparable with other professions. . ."¹³

There were three other main goals the Convention desired to achieve through collective bargaining. First, it was hoped that the participation of nursing personnel in the planning and administration of nursing services could be increased. Second, collective bargaining might help to accomplish the ". . . development of nurses' professional associations as exclusive spokesmen for nurses in all questions affecting their employment and economic security."¹⁴ The third goal was to achieve the elimination of

¹¹American Nurses' Association Economic Security Unit, Major Official Policies Relating to the Economic Security Program, New York, New York: The Association, Rev. 1965, p. 1.

¹²Idem

¹³Idem

¹⁴Idem

barriers to the full employment and professional development of nurses who were members of minority racial groups.¹⁵

How far the ANA has come in actively leading the drive for collective action since 1946 can be seen by the Resolution on a National Salary Goal for Entrance into Nursing. This Resolution, and the supporting statement, were adopted by the 1966 ANA Convention. The purpose of the Resolution is to proclaim that a registered nurse entering the profession in 1966 should receive a yearly salary of not less than \$6,500.¹⁶ Although few nurses entering nursing, or even experienced nurses, receive this salary, the establishment of the goal and the accompanying publicity express the determination of the national nursing organization.

The present policies of the ANA concerning the use and purposes of collective bargaining encompass much more than the enactment and publication of salary goals. Collective bargaining is viewed not only as a means of raising the economic status of nurses but also as a means of upgrading the standards of the nursing profession and the quality of nursing care. These goals tend to illustrate an approach more representative of a professional organization than of a union.

The ANA has also become active as a lobbyist in order to represent the interests of the nursing profession. Views are presented on such problems as on the standards of nursing care and the state of health facilities, the

¹⁵
Idem

¹⁶ American Nurses' Association Economic Security Unit, Statement in Support of the Resolution on a National Salary Goal for Entrance into Nursing, New York, New York: The Association, 1966 (mimeographed). 6

status of nurses under federal legislation,^{*} and the need for federal aid to nursing education.

The years since 1946 have also been ones of progress for some of the state affiliates of the ANA.^{**} As of 1961, 48 of the 54 ANA state affiliates had officially adopted the Economic Security Program. By June of 1960, 75 collective bargaining agreements were in effect covering approximately 8,000 registered nurses in 115 institutions, the majority of which were hospitals.¹⁷

Yet as Kruger has pointed out,

"The number of agreements in effect and their coverages do not truly reflect the extent or effectiveness of the economic security program. There are state nurses' associations that are improving the economic status of their members without having any success in negotiating agreements."¹⁸

B. Barriers to Collective Bargaining by Nurses

1. Legal barriers

Nurses are in an uncertain and unsatisfactory position in most jurisdictions with respect to their legal right to organize for purposes of collective bargaining. Although no federal law bars nurses from bargaining

¹⁷Kruger, op. cit., p. 702.

¹⁸Ibid., pp. 702-703.

^{*} See series, Laws Affecting Nurses' Economic Security, New York, New York: The Association, 1965-1967. Covers such topics as nurses' coverage under federal wage and hour laws, unemployment insurance, fair employment practices.

^{**} For information on the district unit see, The Role of the District Nurses' Association in the State Economic Security Program, New York, New York: The Association, Rev. 1966 (mimeographed).

collectively with hospitals,¹⁹ nurses are generally denied the protection of the law in their attempts to organize. Specifically, Section 2 (2) of the Taft-Hartley Act exempts nonprofit and publicly owned hospitals, whether federal or nonfederal, from the provisions of the Act.²⁰

The exemption granted in Section 2 (2) of the Taft-Hartley Act was initiated by the late Senator Tydings of Maryland.²¹ The Act contained no such exemption in its original form. The purpose of this exemption and its impact on the economic status of nurses was explained by the late Senator Tydings.

"I do not think the amendment will affect them (nurses) in the slightest way as to salaries. I will say to the Senator (that) they (nurses) can still protest, they can still walk out. The only thing it does is to lift them out of commercial channels of labor-management where a profit is involved."²²

The events since the passage of the Taft-Hartley Act have proved that the impact of the exemption has been broader and more serious than that envisaged by Senator Tydings. The implications are more serious because the Act implicitly places nurses in the position of having to use economic force to obtain concessions from reluctant hospitals. The scope of possible conflict between nurses and hospitals is also wider since the Act may encourage hospitals to hide behind the exemption rather than establish

¹⁹ Ibid., p. 705.

²⁰ Labor Management Relations Act, 1947, 80th Congress, 1st Session, 61 Stat. 136 (1947).

²¹ William C. Scott, Elizabeth K. Porter, and Donald W. Smith, "The Long Shadow," Vol. LXVI American Journal of Nursing (March, 1966), p. 540.

²² ⁹³ Daily Congressional Record, May 12, 1947, p. 4997.

precedents by bargaining with employees. Thus conflicts may arise over the recognition of a collective bargaining agent for the nurses and the nurses' right to organize as well as on salaries and working conditions.

Compared with the earlier Wagner Act, the Taft-Hartley Act has both an advantage and a disadvantage. The Wagner Act did not specifically exempt hospitals from its provisions.²³ In NLRB v. Central Dispensary and Emergency Hospital the U.S. Court of Appeals for the District of Columbia held that the hospital was subject to the provisions of the Wagner Act.²⁴ By refusing to review this decision, the Supreme Court left the feeling that nonprofit hospitals were within the scope of the Wagner Act.²⁵ Therefore, the Taft-Hartley Act contains the disadvantage of specifically exempting nonprofit and public hospitals.

The Taft-Hartley Act does have one advantage over the provisions of the Wagner Act. Section 9 (b) provides that professionals shall not be included in a bargaining unit of nonprofessionals unless a majority of the professionals desire to be included. Section 9 (b) thus recognizes that professionals have the right to select their professional organization to serve as their agent in collective bargaining negotiations.

This recognition, however, seems to be devoid of any real potential for action.

"But to what avail the right to be in a separate unit,

²³Scott, Porter, and Smith, op. cit., p. 540.

²⁴National Labor Relations Board v. Central Dispensary and Emergency Hospital, 145 Fed. (2nd) 852.

²⁵Archie Kleingartner, "Nurses, Collective Bargaining and Labor Legislation," reprint from Labor Law Journal (April, 1967), p. 239.

to choose one's professional association as one's bargaining agent, if one is denied the right to bargain."²⁶

The ANA has recognized the difficulty of the position in which it is placed by federal law.* "As soon as the exemption of nonprofit hospitals was placed on the statute books, the ANA began its efforts to secure its repeal."²⁷ Partial success was achieved in 1949 when a bill revoking this exemption passed the Senate of the Eighty-first Congress. However, the bill died as a result of inaction on the part of the House of Representatives.²⁸

President Kennedy's Executive Order 10988 of January, 1962, concerning the use of collective bargaining by federal employees does not exclude hospitals or their employees from its coverage.²⁹ This action may be indicative of a changing attitude towards the status of nonprofit institutions. "The present trend is to treat them more like businesses or industries as far as the laws are concerned."³⁰

The argument advanced by the American Hospital Association in favor of

²⁶Scott, Porter, and Smith, op. cit., p. 540. 7

²⁷Ibid., p. 9.

²⁸Idem

²⁹U.S. Government, Bureau of Labor Statistics, Collective Bargaining Agreements in the Federal Service, Late Summer 1964, Washington, D.C.: U.S. Government Printing Office, 1965, Appendix A, pp. 71-75.

³⁰Walter L. Daykin, "How Labor Legislation May Affect Hospitals," Vol. VC Modern Hospital (July, 1960), p. 65.

* Although nurses are not given legal protection in their attempts to bargain collectively with nonprofit hospitals, the national organization is required to comply with the Reporting and Disclosure Act of 1959. See Statement of ANA Relative to the Taft-Hartley Act, New York, New York: The Association, 1965 (mimeographed), p. 8.

exempting hospitals from collective bargaining provisions is that collective bargaining is basically a process of dividing the profits between management and labor. Therefore, collective bargaining has no place in a non-profit institution.³¹ The trend in current literature, however, appears to favor the view that "Workers through their unions bargain for economic and other benefits not as a share of profits, but because such benefits are fair and equitable."³²

Until the federal laws are actually changed, nurses must utilize other methods of achieving the right to bargain collectively with their employers. One such method emphasizes the achievement of state legislation protecting the right to organize.³³ Only 13 states in 1965 had a comprehensive labor relations act and the coverage of hospitals in these acts varies. In general, hospitals are not specifically excluded from coverage.³⁴ However, a statutory survey shows that only four states, Oregon, Massachusetts, Minnesota, and New York, specifically provide for the process of collective bargaining between nonprofit hospitals and nurses.

The need for protective legislation to insure peaceful solution of nurse-employer disagreements is perhaps best expressed by the introduction to the Oregon law.

³¹The Association, Statement of the ANA Relative to the Taft-Hartley Act, p. 2.

³²Idem

³³Alice Y. Conlon, "Bargaining Rights for Nurses: Convincing the Legislature," Vol. LXVI American Journal of Nursing (March, 1966), pp. 545-548.

³⁴Kleingartner, op. cit., p. 240.

"Sufficient competent and dependable care of the ill and infirm is of paramount importance to the general welfare of this state. The legislative Assembly recognizes that the public interest requires that effective measures be taken to assure uninterrupted continuation of this care. This State encourages the practice of collective bargaining between employers and employees of health care facilities in both publicly and privately operated health care facilities."³⁵

2. Other barriers to the use of collective bargaining

Lack of federal and state legislation to protect the right of nurses to organize is not the only barrier which the nursing profession faces in its attempts to utilize collective bargaining. Archie Kleingartner lists five negative factors: (1) opposition of hospital employers to any form of collective bargaining with nurses, (2) apathy among the nurses themselves concerning the Economic Security Program and nurses' lack of economic sophistication, (3) lack of effective economic sanctions against employers, (4) organizational weaknesses of the ANA and its state affiliates, and (5) the ANA policy of spreading itself too thin with the consequence of inadequate attention and resources to the problem of collective bargaining.³⁶ Each of Kleingartner's items deserves discussion.

a. Opposition of hospital employers The main argument used by hospital administrators in support of their opposition has been that the service nature of nonprofit and public hospitals imposes budget constraints on wages. Wage increases would have to be passed on to the consumers who are in no position to fight the rising costs of a necessary service. In effect, this argument has led to the subsidization of the hospital industry

³⁵Oregon Laws 1961, Chapter 720, Section 53.

³⁶Kleingartner, op. cit., p. 244.

by its employees.

By encouraging the maintenance of low salaries for nurses, hospitals are harming their own interests. As Kelly points out,

"The ANA economic security program is designed to convince hospital authorities and nurses themselves that service is more important in a hospital than any other type of material equipment, that the amount and quality of the service will be no better than the public is willing to pay for, and that the number of nurses available for hospitals even now, to say nothing of the future, depends on their recognition as a group of practitioners worthy of their hire."³⁷

Since about two-thirds of the hospital's annual expenditures consist of salaries and wages,³⁸ a rise in labor costs could have a substantial impact upon the hospital's financial situation. With the average cost pricing commonly imposed by hospitals³⁹ a rise in labor costs will ordinarily mean a rise in the prices of a hospital's services. This result may be at least partially due to the resignation of hospital administrators to the inevitability of rising costs.⁴⁰

Hospitals have generally questioned the usefulness of prices, or costs, as a mechanism for imposing budget constraints or as a signal of the need for change.

³⁷ Dorothy Kelly, "The Situation in Nursing," Vol. LXV American Journal of Nursing (January, 1965), p. 78.

³⁸ Leroy E. Burney, "Hospital Planning in 1959," in Principles for Planning the Future Hospital System, U.S. Dept. of Health, Education and Welfare, Washington, D.C.: U.S. Government Printing Office, 1960, p. 10.

³⁹ J. T. Dunlop, "Capacity of U.S. to Provide and Finance Expanding Health Services," Vol. XXXXI Buffalo New York Academy of Medicine (1965), p. 1328.

⁴⁰ H. M. Somers and A. R. Somers, Doctors, Patients, and Health Insurance, Washington, D.C.: The Brookings Institute, 1961, pp. 198-199.

"But the purpose of price, the purpose of financial restraints, in our society is to force efficiency, to force reorganization, to force changes in technology and changes in method. When we institutionalize the cost-pass-through, we tend to take away from this sector much of the stimulus that is essential to structural changes, and we are in trouble. Medical care should not be insulated from the beneficial effects and reorganization that develop from severe cost pressures."⁴¹

The hospitals' argument that their status as service institutions does not economically permit them to bargain collectively with nurses is thus open to dispute on at least three points. First, an industry should not expect to be subsidized by its employees. Second, if labor costs do rise, the reaction of hospital administrators should be to experiment and enact changes in methods, technology, and the "mix" of nursing care personnel. The reaction of administrators should not be to passively accept the cost increases. Although changes in technology, methods, and "mix", would probably be unable to offset all increases in labor costs, the deficit should not be borne by employees but by the consumers or the government.

The third debatable point contained in the service argument is perhaps the most important. Hospitals state that because they are service institutions they cannot meet the salaries nurses would request through collective bargaining. Yet in the three years of 1963-1966 the average monthly salary earned by a general duty nurse increased from \$374.83 to \$448.50. This increase represents a dramatic rise of 19.7% in the average monthly salaries of general duty nurses. The salaries of directors, supervisors, and head nurses also experienced large increases of 10.9%, 19.9%, and 17.8%

⁴¹Dunlop, op. cit., p. 1328.

respectively.*

This evidence of the large and rapid increases now occurring in nursing salaries logically poses the question of how hospitals can afford to raise salaries unilaterally without collective bargaining but be unable to afford salary increases negotiated through collective bargaining? The answer may be that hospitals do not want to relinquish the benefactor's role in favor of shared decision-making. Thus, hospitals may be instituting salary increases in an attempt to ward off the demands of nurses for the right to bargain collectively with employers. This attempt will probably be futile in the long run since nursing's drive for the right to use collective bargaining is more than just an attempt to raise salaries. The goal sought is a more comprehensive one. Nurses want to participate in the joint formulation of decisions which affect the working relationship and environment and the quality of nursing care rendered.⁹

It has just been pointed out that hospital administrators may feel that their participation in the process of collective bargaining might endanger the rights of management. Yet the unique function of management is the power to coordinate the organization's activities and not to assume the sole responsibility for decision-making.⁴² Kuhn points out that the demand for a wage increase does not make the administrator less of an administrator, although the demand may make the administrator's job more difficult. Kuhn also holds that "Unions challenge the ingenuity of managers rather than

⁴² James W. Kuhn, "Does Collective Bargaining Usurp the Manager's Right to Manage?", Vol. VC Modern Hospital (July, 1960), p. 72.

* See Table 5, p. 21, herein.

managers' prerogatives."⁴³

A more general view of the opposition of voluntary hospitals to being covered by labor relations legislation is stated by Vladeck.

"The nub of their reluctance to accept the requirement of bargaining with their workers is a sense that they occupy a special place in society. Generally, voluntary institutions are governed by boards of trustees who are, or who see themselves as, philanthropists. They cannot easily see why the employees don't share their philanthropic views."⁴⁴

b. Apathy and lack of economic sophistication of nurses The fact that the vast majority of nurses are women presents a problem in the drive for collective bargaining since "Women, generally, have not made good collective bargaining material."⁴⁵ Of more importance, however, is that many nurses still view collective bargaining as being incompatible with nursing's professional ethics.

These nurses fail to realize that,

"There is a close relationship between professionalism and the solution of economic problems, in that higher salaries, improved working conditions, and greater job security make the field more attractive, and bring and hold better people."⁴⁶

Thus professionalism and the use of collective bargaining may be complementary rather than competitive.

⁴³ Idem

⁴⁴ Judith Vladeck, "Collective Bargaining in Voluntary Hospitals and Other Nonprofit Operations," in Thomas G. S. Christensen, ed., Proc. of New York University 19th Annual Conference on Labor, Washington, D.C.: The Bureau of National Affairs, Inc., 1967, p. 233.

⁴⁵ Kleingartner, op. cit., p. 244. ¹⁰

⁴⁶ Joel Seidman, "The Trend Among Professional Groups Today," Vol. LXV American Journal of Nursing (January, 1965), p. 75. ¹¹

The complementary nature of collective bargaining and professional ethics has been noted by many writers. Davey states that "There is nothing unprofessional about seeking in systematic fashion to improve one's economic position."⁴⁷ Merton points out that a requirement of professionalism is that a substantial amount of autonomy be granted.⁴⁸ Although the nursing profession does have a great deal of influence concerning the licensing and education of nurses, nurses do not usually enjoy any great degree of autonomy within the hospital working environment. The use of collective bargaining might be able to increase the participation of nurses in their work situation.

The view that collective bargaining and professional ethics conflict has hindered nursing's drive for collective bargaining. Professionalism tends to stress the individualism of a worker, thus leading many nurses to feel that collective action is unprofessional. Yet where large numbers of salaried professionals are employed by a large number of organizations individual action is likely to be ineffective.⁴⁹

If the economic status of the nursing profession is allowed to remain static due to the ineffectiveness of individual action and an unwillingness to unite behind collective action, the results will be highly unprofessional. Such a conclusion is supported by Gillingham who states that nurses

⁴⁷Harold W. Davey, "Professional Security is Your Professional Right," 12
reprint from Issue 1, Iowa Nurses' Bulletin (1965), p. 3.

⁴⁸R. K. Merton, "The Search for Professional Status," Vol. LX American Journal of Nursing (May, 1960), p. 663.

⁴⁹Seidman, op. cit., p. 74.

fail to see the broad implications of professional ethics for the working environment.⁵⁰ A violation of professional ethics exists whenever a nurse is assigned too heavy a patient load, or whenever subprofessional personnel are allowed to perform tasks requiring professional skill, or when professionals are required consistently to perform functions that do not utilize their skills. A transgression against professional ethics also occurs whenever a nursing shortage is allowed to exist without an attempt to raise the quality and quantity of practitioners through the elevation of the profession's economic status.⁵¹ The use of collective action may be described as an attempt to breathe life into professional ethics by bringing all of the above factors under the partial control of professional nursing employees.

Nursing leaders have recognized the necessity for educating both nurses and the public as to the need for collective bargaining. Public education and good public relations would be beneficial to nursing's cause. Thompson, however, points out the fallacy of over-emphasizing the gains to be achieved from public education. *Recommend.*

"How many of us, if we feel that teachers in our city are not being paid adequate salaries, would be willing to go to the school board, ask that they increase the teacher's pay, and state that we would be glad to pay higher taxes to meet the additional cost? Yet this seems to be what we expect of the public. No expectation could be more ridiculous. Patients, including nurses when we are ill and reverse our roles, want to pay the smallest possible price for good health care. Whom, then, shall we educate and in what? I believe the answer is nurses, all nurses, in the economics of nursing, in seeing a realistic relationship between

⁵⁰J. B. Gillingham, "Collective Bargaining and Professional Ethics," Vol. L American Journal of Nursing (April, 1950), p. 214.

⁵¹Ibid., p. 215.

ourselves and our economic world."⁵²

Recom

Thus the primary need appears to be the education of nurses themselves concerning the professionalism of collective bargaining.

Nursing practitioners need to be better informed as to the economic status of their own profession and the methods of collective bargaining. The ANA has attempted to facilitate the transmission of this information.* State affiliates also organize workshops on their Economic Security Programs for the purpose of informing nurses as to current state and national developments and the methods through which an Economic Security Program must operate.

c. Lack of economic sanctions In August, 1949, the Board of Directors of the ANA adopted a no-strike policy to be used in connection with the Economic Security Program. The ANA House of Delegates approved the no-strike policy in 1950.⁵³ The rationale for the adoption of this policy is summarized by Schutt.

"The relinquishment by nurses of the right to strike has two forces behind it. The foremost one, of course, is the actual conviction of nurses themselves, who, motivated primarily by service, consider strike action inconsistent with their responsibility to their patients. The secondary force against striking is the negative effect it would have on the public. But a public which can be so strongly

⁵² Shirley M. Thompson, "Economically Speaking: The Views of a Director of Nursing," Vol. LXV American Journal of Nursing (January, 1966), p. 85.

⁵³ The Association, Major Official Policies Relating to the Economic Security Program, p. 3.

* See series, What Every Nurse Should Know About Economics, New York, New York: The Association, Rev. 1963. Contains four separate parts with information on grievance procedures, professionalism and collective bargaining, types of employment relationships, and the need for economic security.

affected by negative action can be equally affected by positive action."⁵⁴

Professional ethics would be the primary cause of the first force cited by Schutt. The second force expresses confidence in the public's sense of equity and fair play. The ANA feels that the relinquishment of the right to strike imposes an obligation upon the public to cooperate with the nurses in seeking solutions to problems of professional and economic concern to the nursing profession.⁵⁵

As previously noted by Thompson, this confidence in the public as an active and potent force may be over-emphasized. When crises over salaries and working conditions have arisen between nurses and their employers, the public has probably formed opinions. However, these opinions have generally not resulted in conflict-free solutions nor have they actively shaped the final results.

The right to strike has been relinquished,^{*} yet registered nurses have used economic force in the form of mass resignations, calling in sick, or refusing to report to duty. In the summer of 1966 a dispute arose between the staff nurses and the hospital administrators of two San Francisco Bay area hospitals with the level of salaries being the main issue. "Failure to agree led the nurses at one hospital to refuse to report for duty during

⁵⁴Barbara G. Schutt, "The ANA Economic Security Program--What It Is and Why," Vol. LVIII American Journal of Nursing (April, 1958), p. 523. 124

⁵⁵The Association, Statement of the ANA Relative to the Taft-Hartley Act, p. 9. 13

* In 1966 the California Nurses' Association broke away from the national organization's policy on striking by dropping the no-strike clause from its Economic Security Program.

a four-day period."⁵⁶ In May of 1966 mass resignations were threatened, and some occurred, among the nurses of New York City's municipal hospitals.⁵⁷ In May of 1967 the ANA Economic Security Department implicitly recognized the occurrence of economic force by nurses by issuing a communication concerning the filling out of forms entitled Work Stoppage Reports.⁵⁸

Although the use of economic force by nurses is not widespread, the incidence of occurrence appears to be increasing. Where nurses cannot achieve recognition of their right to organize or have reached a stalemate with their employers concerning salaries or working conditions, the use of economic force is always a possibility.

The success of threatened mass resignations in the New York City dispute⁵⁹ and the high salaries achieved by Bay area nurses* are testimonials

⁵⁶ Report of the Fact-Finding Panel in the Matter of the California Nurses' Association and the Bay Area Hospitals' Negotiating Committee, New York, New York: The Association, 1966 (mimeographed), p. 1.

⁵⁷ Edith P. Lewis, "The New York City Hospital Story," reprint from Vol. LXVI American Journal of Nursing (July, 1966), p. 1.

⁵⁸ Henrietta Dabney, Communication Concerning Work Stoppage Reports, New York, New York: The Association, May 1967 (mimeographed).

⁵⁹ Fact-Finding Report in the Collective Bargaining Dispute Between the City of New York and the New York State Nurses' Association, New York, New York: The Association, May 1966 (mimeographed), p. 1.

* In October of 1966 a fact-finding panel held public hearings on the dispute between Bay Area hospitals and their nurse employees. Some of the recommendations which resulted from these hearings were: (1) substantial salary increases with the recommended monthly pay for first year nurses to reach \$600 by April, 1967, (2) the classification system should be referred back to the two parties for negotiation, (3) 8 paid holidays with time and a half for working on a holiday in addition to a compensatory day off at regular pay, (4) increases in shift differentials. For the full text of the procedures and panel recommendations see Report of the Fact-Finding Panel in the Matter of the California Nurses' Association and the Bay Area Hospitals' Negotiating Committee, op. cit.

to the effectiveness of threatened economic force. If the no-strike and non-use of economic force policies of nurses are to be retained into the future, the labor rights of nurses must be recognized and protected by law. The law must also specify procedures to be followed if stalemates occur in the negotiations between hospitals and their nurses or if conflict arises concerning the interpretation or administration of existing contracts. If such laws could be achieved on the behalf of nurses, the necessity for the threat or use of economic force might be reduced.

d. Organizational weaknesses of nursing association Among these weaknesses are inadequate communication and deficient financial resources.⁶⁰ This lack of financial resources is at least partially due to the fact that only a third of the professional nurses in the United States belong to their professional association.⁶¹ Another source of weakness is that until local units of nurses express willingness to support a bargaining program for the area, most state affiliates are reluctant to enter as participants. Thus the role the state affiliate could play as an organizer is not developed to its full potential.

e. The ANA may suffer from a policy of spreading itself too thin The use of collective bargaining is only one part of the Economic Security Program, and the Economic Security Program is only one of the many activities sponsored by the ANA. Although this diffusion of effort does result in difficulties, it also results in a well-rounded approach to the needs of

⁶⁰ Kleingartner, op. cit., p. 244.

⁶¹ Dorothy Kelly, Why Economic Security for Nurses?, New York, New York: The Association, 1966 (mimeographed), p. 5.

the nursing profession.

C. Evaluation of Hypothesis 13

The preceding discussion of collective bargaining and the barriers, legal or otherwise, to such bargaining can now serve as a background for evaluation of Hypothesis 13 which states that,

Hypothesis 13: Collective bargaining by registered nurses will have a significant positive effect upon the supply of nurses in both the short run and long run.

For purposes of evaluating this hypothesis, the effects of collective bargaining upon the supply of nurses need to be separated into several categories, namely, allocative, aggregative, short-run, and long-run effects. The following example should serve to point out the characteristics of each category and to illustrate how the categories may overlap and combine to increase the supply of nurses.

First, assume that there are four hospitals in one commuting area; hospitals A, B, C, and D. The commuting area is such that one-half hour is the maximum amount of time required to reach any of the four hospitals. The working conditions and salaries are the same for all four hospitals. Therefore, all have an equal amount of attractiveness for professional nurse employees. A nurse from within the commuting area will thus choose her employer on the basis of which hospital is closest to her home. Initially, all hospitals pay head nurses \$500 a month and general duty nurses \$400 a month.

The potential supply of registered nurse employees is limited by the local supply of nurses residing within the commuting area and the supply of

trained nurses is fixed in the short run. If all trained registered nurses worked, the local supply could meet the local demand. However, many nurses have responsibilities which prevent them from working and/or the rewards from working do not compensate for the added burden of being employed. Therefore, a nursing shortage exists. The nursing shortage is evenly distributed among the four hospitals with each hospital willing to employ additional nurses whenever possible.

This equilibrium in shortage is disturbed when the registered nurses of hospital A decide to organize. After several months a contract is negotiated with the management of hospital A. The contract deals with only one issue, salaries. The provisions of the contract call for the salaries of head nurses to be raised to \$600 a month and the salaries for general duty nurses to be increased to \$500 a month.

When the contract is put into effect commuting distance is no longer the sole determinant of nurses' choice of employers. Salary also becomes a variable and, therefore, affects a nurse's choice of employment. Whether or not a nurse employed by hospitals B, C, or D decides to seek employment with hospital A which will pay her \$100 a month more will be determined by the relative values she places upon time and money. Some of the nurses will switch to employment with A, although not all. Some registered nurses employed by the three hospitals will be influenced by personal factors such as loyalty to the present employer and the social relationships that have been developed.

Nurses will move in only one direction, toward hospital A. For a nurse to do otherwise would mean a decrease in salary with no compensating factors since the working conditions of all four hospitals are assumed to

be equal. Therefore, hospital A will gain nurses and hospitals B, C, and D will lose registered nurses. Thus the short-run effects will be allocative; to redistribute nurses from one hospital to another. The amount of dislocation which takes place depends in part upon the amount of the salary increase. A very small increase in salary would probably have negligible effects since professionals are not highly responsive to small increases in monetary rewards.

The effect which hospital A's raising of salaries will have on total, or aggregate, supply of active nurses will be slight. The only increase in the number of active nurses will be due to some part-time or inactive nurses becoming full-time workers. Yet this effect should not be strong since nurses are influenced by many factors besides salaries.

An alternative assumption concerning contract provisions would change the results of the above analysis. Assume that the contract called not only for increases in the salaries of full-time head nurses and general duty nurses, but that the salaries of part-time nurses were also increased. In addition, the contract between the nurses of hospital A and the hospital management also dealt with working conditions. For example, the hospital initially paid its part-time head nurses \$2.50 an hour and its general duty nurses \$2.00 an hour. Salaries of part-time nurses are raised by the contract to \$3.50 an hour for head nurses and \$3.00 an hour for general duty nurses. The contract also provides for increased flexibility in the scheduling of work hours for both part-time and full-time registered nurses, for day-care centers for the children of nurses, makes transportation available to nurses unable to provide their own, increases vacation time and professional leave, and provides for over-time pay.

The effects of this second set of assumptions concerning contract provisions would be stronger and broader in scope than the effects of just raising salaries. The attraction for nurses employed at hospitals B, C, and D to seek employment with hospital A would become stronger; i.e., the allocation effect should be more intense. In addition, and more importantly, the supply of active nurses for the total commuting area should be increased. Nurses who remain inactive due to personal reasons might be induced to return to work, at least on a part-time basis. Nurses already working part time when the contract was negotiated as well as some of the inactive nurses might be encouraged to work full time. Therefore, the effects would be allocative and the short-run supply of active nurses would be increased.

Hospitals B, C, and D are now in very dire straits. The total supply of active nurses in the community has been increased, yet this increase has gravitated toward hospital A where working conditions are more attractive and the salaries are higher. On the other hand, the shortage of nursing personnel has become more serious for hospitals B, C, and D. These three hospitals now have two choices; substitute other health personnel for nurses or try to compete with hospital A for registered nurses by raising salaries and improving working conditions.

If the three hospitals act upon the second alternative and eventually reach equality with hospital A as to working conditions and salaries, commuting distance will again become the only factor determining a nurse's choice of employers. The total supply of active nurses will again be redistributed, this time back to the approximate proportion found in initial equilibrium. All four hospitals will pay higher salaries and have better

working conditions for their personnel. All four hospitals will also have experienced a decline in their nursing shortage by the increase in the proportion of trained nurses who are active. Yet the total supply of active nurses is still inadequate to fulfill total local demand due to the fixed supply of trained nurses in the short run.

The second set of assumptions will also have long-run effects. The raising of salaries and improvements in working conditions will have increased the status of the nursing profession in the community. Since the status of a profession in the community affects the job choices of youths, more young girls will seek to enter nursing school. When these girls graduate from nursing school some will return to their home town. The aggregate or total supply of trained nurses in the community thus will be increased through the long-run effects of collective bargaining. If the proportion of trained nurses who are active remains constant at the new and higher level, the number of active nurses will increase as the total supply of trained nurses increases.

Through this example we have shown the manner in which collective bargaining could operate to increase the supply of nurses in a community and have thus evaluated Hypothesis 13 as probably valid under current labor market conditions. One assumption crucial to the analysis is that hospitals compete for nursing personnel. When one hospital raises its salaries and improves its working conditions via collective bargaining, other hospitals within the commuting area are forced to follow suit. Whether or not the hospitals forced to compete do so through the use of collective bargaining is not decisive. The essential requirement is that competition does take place rather than attempts to substitute other health personnel

for registered nurses. Ray Brown's evidence shows that hospitals do engage in strong competition for the services of professional nurses.⁶² Even if hospitals compelled to compete for nurses do so unilaterally, the generating force is the use of collective bargaining by the first hospital. Evidence that collective bargaining does act as a generating force is seen in the rapid increases in nursing salaries which are now occurring.*

The second essential assumption is that collective bargaining will result in higher salaries. Examination of recent salary gains made by registered nurses where collective bargaining is now in effect should serve to validate this second assumption.

The dispute between the New York State Nurses' Association and New York City Hospitals in 1966 resulted in salary increases ranging from \$350 to \$500 a year.⁶³ A contract negotiated in Highland Park, Michigan, in 1966 called for staff nurses to receive an increase of approximately \$60 a month while head nurses were to receive an increase of approximately \$71 a month. The nurses of Dickinson County Hospitals in Michigan also negotiated a contract in 1966. The contract called for staff nurses to receive a \$70 a month salary increase and for head nurses to receive a salary increase of \$25 a month. In the contract negotiated by the Ohio Nurses' Association for the public health nurses in Cincinnati, the increases ranged from \$660

⁶²Ray E. Brown, "The Nature of Hospital Costs," Vol. XXX Hospitals (April, 1956), p. 40.

⁶³The Association, Fact-Finding Report in the Collective Bargaining Dispute Between the City of New York and the New York State Nurses' Association, p. 1.

*Refer to Table 5, p. 21, herein.

a year to \$1,560.⁶⁴ The largest recent salary increases were won by the California Nurses' Association on behalf of the nurses in the San Francisco area.^{**} As of April 1967 the salaries for ward nurses in the City-County Hospitals range from \$741.75 to \$865.38 a month while head nurses receive from \$845 to \$986 a month.⁶⁵

In addition to these two assumptions, it is also necessary to envision collective bargaining taking place in a considerable number of labor markets throughout the nation. If collective bargaining is utilized only in a few scattered communities, the participating communities may experience a small increase in the number of girls attending nursing school. These communities may also benefit from a small rise in the supply of local nurses as girls return to their home town after training. Yet a large number of girls will not return to their home town. If single, the nursing graduates will choose their own destination. If married, the nursing graduate's place of residence will be determined to a large degree by the region offering her husband the best career potential. Thus, the effects of collective bargaining will be diffused. The initiating towns will realize only partial returns from their investment. Therefore, since the ultimate location of nursing graduates cannot be predetermined, it is necessary for collective bargaining to be utilized on a broad basis so that the national supply

⁶⁴ ANA Economic Security Unit, No. 1 Economic Security News (Rev. February, 1967), p. 5.

⁶⁵ Ibid., p. 3.

^{**} See Report of the Fact-Finding Panel in the Matter of the California Nurses' Association and the Bay Area Hospitals' Negotiating Committee, op. cit.

of trained nurses will be increased and better utilized.

The use of collective bargaining on a limited scale will hinder achieving the full supply potential of collective bargaining for another reason. For more girls to be attracted to nursing as a career it is necessary to raise the professional and economic status of the entire nursing profession. Yet nursing's professional stature will not be elevated by the isolated negotiation of contracts in a few places. A large number of contracts in key areas is necessary if the gains in economic recognition given to nurses by collective bargaining are to be noticed by potential nurses and the community.

The effects which collective bargaining could have upon the supply of nurses are compatible with the Iowa survey findings that a negative correlation does not appear to exist between the salaries a hospital offers and its vacancies. The testing of Hypothesis 8 was on the basis of a statewide survey. The majority of nurses are secondary workers and exhibit limited mobility. The job horizon of nurses may thus be limited to employers within commuting distance, just as the potential number of professional nurses available to a hospital is limited by the local supply. Therefore, it was not surprising that the data indicated the rejection of Hypothesis 8. For Hypothesis 8 to have been accepted, nurses would have had to be a mobile group taking advantage of salary differentials within the state. Therefore, the rejection of Hypothesis 8 merely reaffirms that nurses are not highly mobile workers who relocate to take advantage of salary differentials. The rejection supports the influence of local supply upon the extent of the local nursing shortage and thus the analysis of collective bargaining given by the example.

CHAPTER VIII. SUMMARY AND CONCLUSIONS

A. Methods

The survey of 122 Iowa short-term general nonfederal hospitals conducted in March and April of 1967 comprises the original empirical research of this study. The survey findings were used to test Hypotheses 2 through 8 by regression analysis and evaluate Hypotheses 9 through 12 on the basis of the responses of hospital administrators. The survey was also used to obtain information on the current economic status and working conditions of nursing personnel in Iowa. Secondary sources were used for descriptive and evidentiary purposes and to evaluate Hypotheses 1 and 13.

B. Findings

Hospitals employ a majority of the active nurses in the United States. Over 90% of hospital nurses are employed in the general duty position and hold either diploma or associate degrees in nursing. The pay level of these nurses remains relatively low. According to the BLS, the national average salary for general duty nurses in 1966 was \$448.50 per month. The Iowa hospital survey showed an average salary of \$429.07 per month for general duty nurses in Iowa as of March 1967.

The low salaries earned by nurses and the working conditions found in many hospitals have resulted in reducing the appeal which the nursing profession holds for potential entrants. This reduction in appeal, coupled with the tremendous rise in the use of medical care and the shortage of doctors, has resulted in a nationwide shortage of nurses. Many solutions have been proposed to ease the nursing shortage. However, most proposals

have approached the problems presented by the nursing shortage in a fragmented manner.

An effective solution to the nursing shortage requires an approach which acknowledges and incorporates into its design as many of the variables affecting the activity status of nurses as possible. The researcher believes that collective bargaining can be a vehicle for such an effective solution.

The present analysis of the effects of collective bargaining upon the supply of nurses must acknowledge and be influenced by the evaluations of Hypotheses 1 through 12. These hypotheses relate to four main areas: (1) the secondary work force characteristics of nurses, (2) the determinants of and the relationship between salaries and vacancies for hospital nursing personnel, (3) the influence of preparation requirements upon the supply and quality of nurses, and (4) the reaction of hospital administrators to higher nursing salaries.

1. The secondary work force characteristics of nurses

The majority of nurses are secondary workers. Therefore, their activity status is influenced by many factors other than salary. These secondary worker characteristics led to the rejection of Hypothesis 1 which states that,

Hypothesis 1: The activity status of trained nurses is determined by salary considerations.

The evidence that led to the rejection of Hypothesis 1 also indicates that raising salaries alone will not provide a solution to the nursing shortage. Since secondary considerations exert a strong influence upon a nurse's activity status, it is to these secondary characteristics that an appeal

must be made. For example, the providing of day care centers would help nurses with children to remain, or become, active. More flexible work hours would help solve conflicts in family time schedules. Increasing the participation of nurses on a peer basis in the hospital decision-making process would increase and enhance the self-fulfillment of employed nurses. Through such measures the use of collective bargaining as a possible solution to the nursing shortage could acknowledge and accommodate the secondary worker characteristics of nurses.

The medium through which such measures could be enacted is the fringe benefit program negotiated through collective bargaining. The benefits should apply to both full-time and part-time nurses. The amount of benefits due to part-time nurses could be prorated according to the number of hours worked as a proportion of the full-time schedule.

Hypothesis 10 is directly relevant to the establishment of fringe benefits for part-time nurses to encourage their participation in the labor force. Hypothesis 10 states that,

Hypothesis 10: Part-time general duty nurses receive on a prorated basis the same fringe benefits as do full-time general duty nurses.

The data gathered through the Iowa survey indicate that part-time nurses employed in Iowa receive few, if any, of the benefits given to their full-time peers.

A large reservoir of inactive nurses is present in the United States today. If the nursing shortage is to be eased, this inactive reservoir needs to be tapped by inducing inactive nurses to return to work, at least on a part-time basis. The use of collective bargaining could encourage these inactive nurses to return to work by raising salaries and enlarging

the scope of fringe benefits. The average salary for part-time nurses found by the Iowa survey appears too low to induce many inactive nurses to assume the requirements of work in addition to their personal responsibilities.

2. The determinants of and the relationship between salaries and vacancies for hospital nursing personnel

Hypotheses 2, 3, and 4 are concerned with the determinants of salaries offered by hospitals to nursing personnel. Hypotheses 2 and 3 state that,

Hypothesis 2: The size of the cities in which hospitals are located has a significant positive effect upon the salaries the hospitals pay their nursing personnel.

Hypothesis 3: The bed size of hospitals has a significant positive effect upon the salaries the hospitals pay their nursing personnel.

Both Hypotheses 2 and 3 were accepted at the .01 level through the use of regression analysis.

Hypothesis 4 is attempting to discover if bed size and city size exert equal and separate influences upon the salaries offered to hospital nursing personnel.

Hypothesis 4: Bed size and city size are of equal influence in determining the salaries hospitals pay their nursing personnel.

Hypothesis 4 was rejected since bed size dominates the multiple regression equations with not all of the t values for city size being significant. From the rejection of Hypothesis 4 it appears that some of the effect of city size upon salaries obtained in the testing of Hypothesis 1 is due to the tendency for larger hospitals to be situated in larger cities.

Hypotheses 2, 3, and 4 led to the conclusion that hospital size has a clear impact on the salaries hospitals offer their nursing personnel.

Although the effect of city size was not equal in intensity to that of bed size, city size was judged to exert a limited amount of separate influence upon salaries.

Although bed size and city size influence salaries, the rejection of Hypotheses 5, 6, and 7 led to the conclusion that these two factors do not exert a similar influence upon vacancies. Hypotheses 5, 6, and 7 state that,

Hypothesis 5: The size of the cities in which hospitals are located has a significant effect upon the hospitals' vacancies for nursing personnel.

Hypothesis 6: The bed size of hospitals has a significant effect upon the hospitals' vacancies for nursing personnel.

Hypothesis 7: Bed size and city size are of equal influence in determining hospitals' vacancies for nursing personnel.

Twelve regression equations were used to test the above three hypotheses. In none of the equations were the t values, F ratios, or R^2 's significant.

Hypothesis 8 was formulated to test the effect that salaries might exert upon hospital vacancies. Hypothesis 8 states that,

Hypothesis 8: The salaries which hospitals pay their nursing personnel have a significant negative effect upon the hospitals' vacancies for nursing personnel.

In none of the equations testing Hypothesis 8 were the R^2 's, F ratios, or t values significant. When the average percent of hospital vacancies is regressed on the average hospital salary for nursing personnel, the R^2 is .0055. Thus Hypothesis 8 was rejected.

The rejection of Hypothesis 8 is directly relevant to this study. If nurses were highly mobile, they could be expected to seek out and take

advantage of salary differentials within the state. The rejection of Hypothesis 8, however, indicates that nurses have only limited mobility. Nurses do not actively take advantage of salary differentials. Thus the findings support both the limited mobility of nurses caused by secondary worker considerations and the importance of the local supply of nurses in determining the shortage of nursing personnel. Thus collective bargaining as a solution to the nursing shortage must work through the local supply by attempting to increase the total supply of trained nurses and the proportion of trained nurses working. In doing so collective bargaining would be recognizing and emphasizing the need for better utilization of the local supply while simultaneously attempting to increase the local supply. With contracts being negotiated in local labor markets, the use of collective bargaining can be tailored to meet local conditions.

3. The influence of preparation requirements upon the supply and quality of nurses

The educational requirements of nursing preparation exert an influence on both the quality of nursing care and the quantity of nurses. The ANA advocates a minimum requirement of a bachelor's degree for registered nurses although at present a two-year associate degree program graduate can become a professional nurse.

The proportion of nursing students entering baccalaureate programs has been increasing in recent years, although the growth has not been impressive. The decline in the proportion of nursing students entering diploma programs is due more to the increasing popularity of associate programs than to the greater number of baccalaureate program enrollees. Therefore, the value of a college education does not appear to have been accepted by a

majority of potential nurses.

The value of an education could also be evidenced, however, in the employment practices of hospitals. The Iowa survey included an attempt to discover the value which a hospital places upon a baccalaureate nurse as compared to her diploma nurse counterpart. Specifically,

Hypothesis 9: General duty nurses with a baccalaureate degree are given starting salary incentives.

Hypothesis 9 was evaluated through the responses of 77 hospital administrators. On the basis of their answers Hypothesis 9 was rejected. Over 80% of the responding administrators stated that their hospital did not distinguish between baccalaureate and diploma nurses for the purpose of beginning salary schedules. Nor did a majority of administrators report that their hospital recognizes the value of an education by hiring baccalaureate nurses as head nurses. In addition, only 25% of the responding hospitals granted incentives for nurses to increase their education while employed.

4. The reaction of hospital administrators to higher nursing salaries

The use of collective bargaining should raise the salaries of the nurses covered by a contract. Therefore, the Iowa survey attempted to measure the opinions of Iowa hospital administrators concerning the supply-demand effects of higher salaries for nurses.

The effects of larger salaries upon the demand for general duty nurses was considered by Hypothesis 11.

Hypothesis 11: Hospital administrators in Iowa believe that raising the salaries of general duty nurses will decrease their demand for general duty nurses.

According to the survey findings most administrators do not believe that their demand for general duty nurses will be substantially altered by higher

salaries.

Administrators were also asked for their opinions concerning the effect of higher salaries upon the supply of registered nurses. Hypothesis 12 is concerned with this topic and states,

Hypothesis 12: Hospital administrators in Iowa believe that raising the salaries of registered nurses will increase the supply of registered nurses.

A majority of the responding administrators, 58.2%, believe that higher salaries will not help to increase the supply of nurses and thus Hypothesis 12 was rejected. However, a larger percentage of the administrators, 30.4%, do believe that the supply of nurses will eventually be increased by raising nursing salaries.

The evaluation of Hypothesis 13 contained in Chapter VIII is influenced by the testing of the preceding hypotheses and attempts to accommodate the relationships discovered. Hypothesis 13 states that,

Hypothesis 13: Collective bargaining by registered nurses will have a significant positive effect upon the supply of nurses in both the short run and long run.

Hypothesis 13 was evaluated as probably valid under current labor market conditions. In the short run, the effects would be mainly allocative although some inactive nurses might be encouraged to work at least part time. In the long run, however, the effects of collective bargaining would be much stronger. Hospitals would be forced to compete with each other for the local supply of nurses and the economic position of registered nurses would be raised. If collective bargaining were to become more widespread on a national basis, the status of the entire nursing profession would be uplifted. More girls would be induced to enter nursing and the supply of

trained nurses would increase. With the higher incentives for remaining active, it is possible that more nurses would work and remain working for a longer time.

The analysis presented here allows for the secondary work force characteristics of nurses by recognizing that some nurses can never be induced to trade being a homemaker for working. Therefore, the solution to the nursing shortage lies primarily in increasing the long-run supply of nurses. The key element is the betterment of salaries and working conditions on a broad national basis so that the status of the entire nursing profession will be raised.

D. Conclusion

Because of the positive effects which collective bargaining could have upon the supply of nurses, the researcher proposes greater use of collective bargaining as one possible solution to the nursing shortage. To encourage collective bargaining, the right of nurses to organize and to bargain collectively with their employers must be protected by both federal and state law. To discourage the use of economic force, the law must provide an alternative procedure for cases where collective bargaining breaks down and there is a need for a means of final resolution of disputes over future contract terms.

To deny nurses the necessary legal protection of their right to bargain collectively and at the same time fail to provide a mechanism for the solution of negotiation stalemates could encourage nurses to resort to economic force. Lack of legal protection also hinders the raising of nursing salaries to a level commensurate with the skills and services involved. It thus serves as

a deterrent to young women (or men) who are contemplating entering the nursing profession.

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CHAPTER XI. APPENDIX

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IOWA STATE UNIVERSITY

of Science and Technology



AMES, IOWA 50010

Industrial Relations Center

March 3, 1967

Our Industrial Relations Center is presently conducting studies in the health occupations field. One of these research studies is concerned with the registered professional nurse and deals in part with prevailing employment practices of hospitals and alternative approaches to increasing the supply of high quality nursing care.

We solicit and need your cooperation in obtaining factual data on Iowa hospitals. We hope, therefore, that you will spare the time to fill in the enclosed one-page questionnaire. In collecting and analyzing the returns from this questionnaire we can assure you that individual hospitals will not be identified. In our research report we plan to use the data from the questionnaire on a group basis only and the data will be processed anonymously. Your hospital's name on the return envelope is solely follow-up as needed in determining hospitals that have not returned the questionnaire.

Your cooperation is essential to our study which we hope will be of value to you as a hospital administrator when completed. If you would like a copy of the research report, we will be glad to send you one. We will greatly appreciate your completing the questionnaire and returning it in the envelope enclosed for this purpose.

Sincerely yours,

Edward B. Jakubauskas

Dr. Edward B. Jakubauskas
Director, Industrial Relations Center

QUESTIONNAIRE ON EMPLOYMENT OF REGISTERED PROFESSIONAL NURSES IN IOWA
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1. Is your hospital in a city of: _____
 _____ 100,000 and over in pop.
 _____ 50,000 up to 100,000
 _____ 25,000 up to 50,000
 _____ 10,000 up to 25,000
 _____ Less than 10,000
2. Under what type of control is your hospital?
 _____ State or local government
 _____ Proprietary
 _____ Voluntary non-profit
 _____ Federal government
 _____ Religious
3. How many beds does your hospital have? _____
4. How many persons does your hospital employ? _____

5. Do any of your nurses belong to religious orders? _____ Yes _____ No. If yes, what proportion of your total number of registered nurses are members of religious orders? _____
6. Nursing Vacancies and Salaries: Please fill in the appropriate numbers for each position. For salaries, indicate the gross monthly salary, before tax deductions, and excluding extra pay for shift differentials, overtime, on-call, or special service. If maintenance items are deducted from salary, indicate salary before such deductions. Please circle each employment, vacancy, or salary figure which is an estimate.

Head Nurses	General Duty Nurses	Licensed Practical Nurses	All Other Nursing Positions
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Number of full-time nurses employed as: _____

Number of Budgeted Vacancies now for: _____

Maximum Salary for: _____

Minimum Salary for: _____

Average Salary for: _____

7. Does your hospital grant starting salary incentives to general duty nurses with bachelors' degrees? _____ Yes _____ No. If Yes: What is the average starting salary for a nurse with a bachelor's degree and no experience? _____
 What is the average starting salary for a nurse with a hospital diploma and no experience? _____
- Does your hospital give any financial incentives for a general duty nurse to increase her education while employed? _____ Yes _____ No. If Yes: Please comment on incentives offered: _____

8. Does your hospital employ newly graduated nurses with bachelors' degrees as head nurses? _____ Yes _____ No. If Yes; for what reasons and with what frequency is this done? _____

9. Part-time Professional General Duty Nurses: Please fill in the appropriate answers for your hospital, including only those nurses who are in the employ of the hospital for less than the full-time scheduled work-week.
- Number of regularly employed part-time general duty nurses _____
- Starting Hourly Rate _____
- Average Number of Scheduled Hours per week _____
- If an evening shift differential is paid, how much more is it than the wage for a day shift? _____
- If a night shift differential is paid, how much more is it than the wage for a day shift? _____
- What type of fringe benefits are given to your part-time nursing help as compared with your full-time nurses? _____

Would increasing salaries for general duty nurses have any effect upon your demand for, or use of, their services? _____

Do you feel that increasing salaries would have any effect on the supply of registered nurses? _____ Yes _____ No. What are the reasons for your answer? _____

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IOWA STATE UNIVERSITY
of Science and Technology
AMES, IOWA 50010



Industrial Relations Center

March 24, 1967

Since we have not yet received your reply to our request of March 3rd, we are sending you a reminder with a second questionnaire enclosed.

As we are deeply concerned with collecting information truly representative of all Iowa hospitals, we hope to receive your completed questionnaire.

Sincerely yours,

Edward B. Jakubauskas

Dr. Edward B. Jakubauskas
Director, Industrial Relations Center

EBJ:bh