A SURVEY OF NURSING AND CUSTODIAL HOMES IN THE VICINITY OF WACO, TEXAS

A THESIS

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We hereby recommend that the thesis prepared under our supervision by Mary Catherine Smith entitled A SURVEY OF NURSING AND CUSTODIAL HOMES IN THE VICINITY OF WACO, TEXAS

be accepted as fulfilling this part of the requirements for the Degree of Master of Science

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A C K N O W L E D G M E N T S

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CHAPTER I

I N T R O D U C T I O N

The nursing home, a relatively new phenomenon in the American culture, has grown out of social, medical, and economic changes in today's society. This rapid growth in the number of nursing homes in the last 10 years has resulted from the increase of the population of individuals 65 years of age or older, an increase in the incidence of chronic diseases, and an increased demand for patient care facilities.

Good food service can be an asset to a nursing home's total program. The quality of the food service may be more evident to the patient, his family, and visitors than any other aspect of the nursing home service. There is a need for the administration to formulate a concept of the contribution food service can make to total patient care and to see that this concept is translated into a workable, efficient, and productive program (1).

Many nursing homes will want to participate in the Medicare program which was made available January 1, 1967. To be eligible for participation, the nursing home must have a person, designated by the administrator, responsible for

the total food service of the institution. If this individual is not a qualified dietitian, regularly scheduled consultations with a professional dietitian or a graduate with major studies in foods and nutrition must be obtained (24).

In view of the anticipated increased needs for professional dietitians for these nursing home facilities as of January 1, 1967, the present study was undertaken.

STATEMENT OF PROBLEM

The overall purpose of the study was to determine the present status of personnel policies and food practices of nursing homes located in the vicinity of Waco, Texas. Fifteen nursing and custodial homes were included in the study. The survey included 14 homes licensed by the Division of Nursing and Convalescent Homes, Texas Department of Health, and one institution accredited by the Joint Commission on Accreditation of Hospitals.

The specific purposes of the study were to:

1) Present a review of the opinions of individuals recognized in the field of nursing home care as to the effect of food service on the lives of patients in nursing homes.

2) Determine the present status and needs of the food service departments of 15 nursing homes located in the vicinity of Waco, Texas.

The terms nursing home, custodial home, and food service are defined for clarification.

Nursing Home.--An institutional facility established primarily, but not exclusively, to provide nursing care or service; housed in a structure which must meet certain standards or which is adapted to provide the care labeled as nursing. This facility provides 24-hour service, must supply all of the human needs for its occupants, and must include a food service.

Custodial Home.--A home or institution keeping four or more persons unrelated to the proprietor which gives to its residents custodial care, hygienic care and/or any other personal services meeting some need beyond room, board, and laundry.

Food Service.--The routine service of food to meet the daily food needs of individuals in the home and the more exacting service which must meet the nutritional prescription of those who require special or therapeutic diets.

REVIEW OF LITERATURE

National, state, and local public agencies have focused attention on the care of the aged and chronically ill patients during the last decade. The Medicare program available to nursing homes January 1, 1967 has intensified this attention on nursing homes.

The nursing home became an American institution following the Social Security Act of 1935. This act revolutionized the economic status of the aged by providing a steady income for employees and their dependents on retirement and old age assistance for those 65 years of age and over who were needy.

The status of the nursing home has been changed by federal legislation which has given support to construction and equipping of new nursing home facilities. The Hill-Burton program makes grants available on a matching basis to public and other non-profit sponsors. The Small Business Administration provides small commercial loans to privately owned nursing homes for construction or rehabilitation of proprietary nursing homes by the Federal Housing Administration (21).

The "Vendor Payment" program which provides added funds for medical services for old age assistance recipients in nursing homes imposes certain standards for eligibility of payment (18). The Medicare program will require higher standards for participating homes than has been previously required. Moreover, the standards set for food service will be considerably higher (24).

According to a report by the United States Department of Health, Education and Welfare (20), in 1900 there were 3,080,000 persons 65 years of age or older in the United

States; an estimated 18,156,000 in 1965, and a projected 28,199,000 for the year 2000. Figure 1 illustrates the growth of the older population in the twentieth century. One in 11 persons in the United States is 65 years of age or older. The percentage of the population aged 65 and over more than doubled from 1950 to 1965. This group increased from 4.1 per cent in 1900 to 9.4 per cent in 1965. The percentage of increase for this century will be approximately 1005 for women and 630 for men, with the ratio of older women to older men being 148 to 100 by the year 2000. One out of 25 people 65 years of age or over is in an institution.

From surveys made in 13 states, the United States Department of Health, Education and Welfare (23) predicted there were 450,000 beds in 25,000 nursing homes in the United States in 1954. In a recent article, Secretary John W. Gardner of the United States Department of Health, Education and Welfare forecasted 50,000 new nursing home beds in 1966 in addition to 40,000 built in 1965 (17). In Texas there is a new nursing home built every five days and 11 new beds added per day. Licensed nursing and custodial home beds in Texas have increased from 8,000 to over 40,000 in the past 12 years, according to figures quoted in the Texas Counselor (12).

Nursing homes are classified according to ownership. The three main classifications are proprietary owned, voluntary

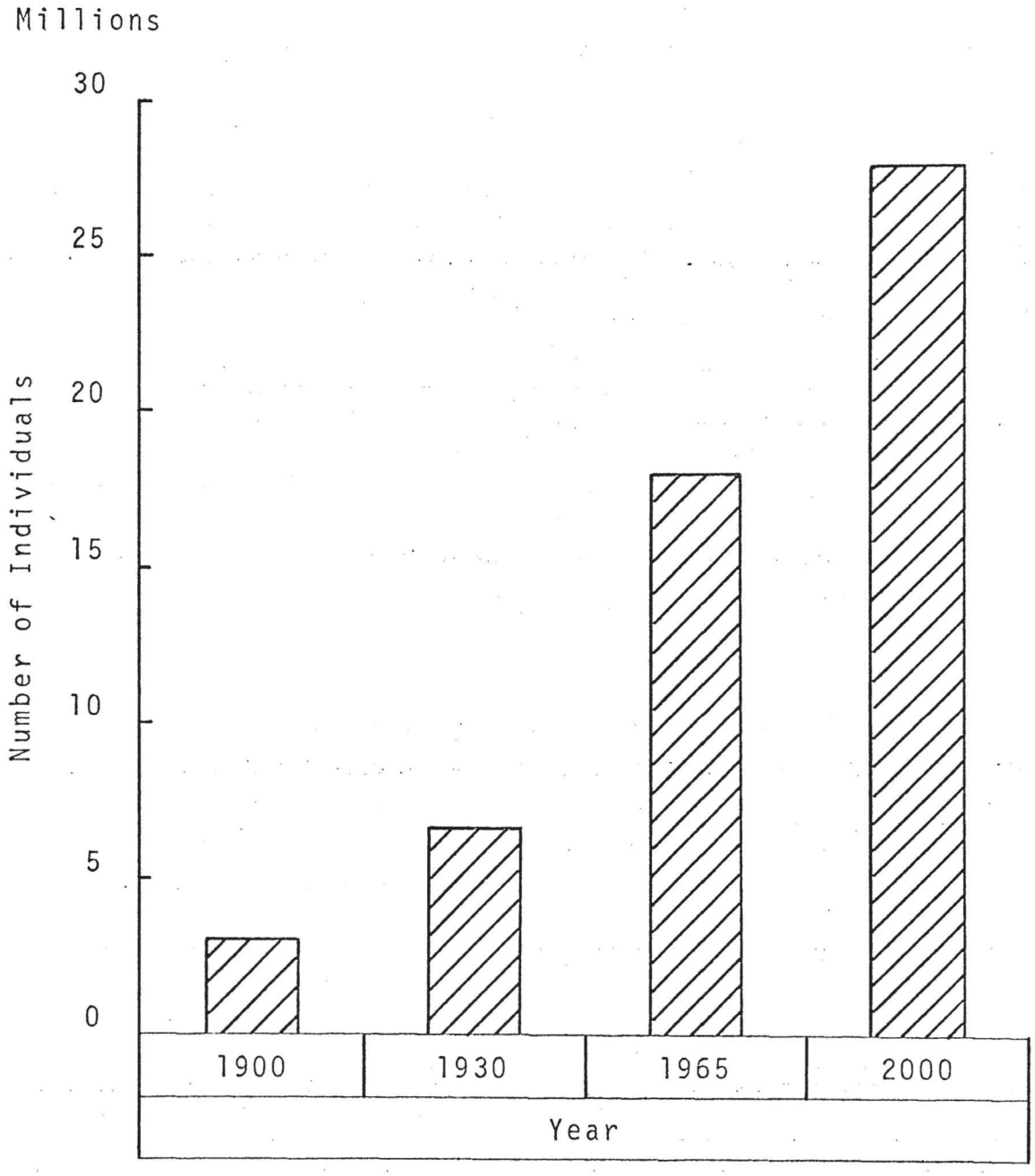

Figure 1

Growth of the Older Population in the United States in the Twentieth Century

nonprofit, and publicly owned. The proprietary home is owned and operated for profit by individuals or corporations. The largest percentage of nursing homes fall into this classification. A high percentage of their residents receive public assistance. The public homes are owned and operated by state or local governments. These homes are often direct descendents of the poorhouses or county farms. Voluntary nonprofit homes are owned and operated by religious groups or fraternal organizations. Some of these homes can offer more services per dollar than the proprietary home because of volunteer help, donations, and tax exemptions. A small percentage of homes are in this classification.

The nursing home is characteristically a home for the aged. A report compiled by the United States Department of Health, Education and Welfare (23) from surveys in 13 states showed the average patient in the nursing home to be 80 years old with one-fourth or more of the patients 85 years of age or older. Two-thirds of the patients were women. Less than half the patients could walk alone and 20 per cent were completely bedfast. Over half the patients were disoriented, at least part of the time, and one out of five in a state of confusion most of the time. The chronically ill patient was predominate with cardiovascular diseases being the most common diagnosis. Approximately one-tenth of the patients were receiving care for fractures, mostly hip fractures.

Arthritis and rheumatism, various forms of paralytic conditions, mental disorders, cancer and other neoplasms were reported. One out of 30 patients was blind. Senility was reported often, undoubtedly reflecting the need for more definite diagnostic information.

In a 1965 study of 40 nursing homes (21), 20 constructed with Hill-Burton assistance were compared with 20 constructed with private financing. The median length of stay for patients in nursing homes was 12 months. The median age was 79 years with twice as many women as men patients. Over 80 per cent of the residents were mobile to some degree with one-fourth of all patients confined to wheel chairs. Data revealed approximately 41 per cent of the patients as mentally confused.

A recent survey of nursing and custodial homes in the city of Houston, reported in Caring (13), showed 2,666 residents with 2,110 patients ambulatory and 556 bedfast. The percentage of ambulatory patients was 79.1 and 20.9 per cent bedfast.

As stated by Baumgarten (1), the administration's philosophy for the food service of a nursing home should be built around the needs of the patient for nutrition, stimulation, and recreation as well as for identity as individuals. A good food service can meet most of these needs and can be

a valuable asset to the home's total program, not just a service.

The nutritional needs for the elderly individual are little different from those of a young adult. These nutritional needs should be met in accordance with the Recommended Dietary Allowances of the Food and Nutrition Board, National Research Council (15). These allowances give adjustments for age, sex, and activity. For the aged, there should be an adjustment in calories because of the progressive decrease in the basal metabolic rate and the reduced activity. The recommendation is that the calorie allowance be reduced by 8.0 per cent per decade from 55 to 75 years of age and 10 per cent for age 75 and over. With this reduction in calories the percentage of protein to meet the nutritional need increases. The amounts of fruits and vegetables should not be decreased because of the vitamin and mineral contributions. Adjustments in nutrient intake may be needed for the individuals depleted by disease or stress.

Berryman (2) reported that all geriatric patients bear the nutritional scars of life long eating habits. Therefore, each patient should be evaluated as to his food habits, prejudices, fixations and diet over the previous 10 years. To change these habits too quickly can be physically upsetting and emotionally disturbing. Periodic surveys of patients'

food preferences have been found to be helpful in getting the patient to eat more food (22).

Berryman (2), Savitsky (16), and Nyhus (14) indicated that the basic menu should provide some choice in the selection of food. If a selective menu is not practicable, simple choices, such as a choice of bread or beverage will help satisfy the individual's desire for selecting his own food. The patient is more likely to eat food if he has had an opportunity for selection even though the same foods may be offered.

The basic menu must be attuned to the group to be fed, taking into consideration the food habits, cultural and economic background, and religious beliefs of the individuals. At the same time the menu must provide all the necessary nutrients for an adequate diet.

The sense of taste diminishes with age with older people liking sharp, definite flavors. The flavor should be brought out by spices and flavoring. This enables the patient to enjoy the food more (1, 14).

According to Nyhus (14), salt should be used in moderation for all elderly patients except those whose medical orders call for more severe restrictions. Many older persons do not tolerate fat well; therefore, fat should be used with

moderation and a part of the fat used should contain a high percentage of unsaturated fatty acids.

Patients with poor teeth, no teeth, or poorly fitting dentures may need food which is softer in consistency or in smaller pieces than the regular diet. Food should be changed only enough to fit the individual patient's needs. Elderly patients should be encouraged to chew foods (14, 22).

Special diets for patients in a nursing home should be prescribed by the physician. The person in charge of the food service is responsible for carrying out the instructions of the physician. To fulfill the prescription of the special diet, full information from the doctor is needed. An approved diet manual is a good source of information. To avoid monotony and extra expense, advance planning is important for special diets (22).

Nyhus (14) expressed a need for the meal hours and meal patterns in nursing homes to be comparable to those observed by people living at home; serving at least three meals of approximately equal size over a minimum time of 10 hours. The author suggests the dinner meal be served at night. Most people, especially those in urban areas, customarily have dinner at night. A heavy meal at night is thought to cause wakefulness but hunger has also been related to insomnia.

Hospital Food Notes (6) reported a study by Krippene of the feeding of the aged in Detroit. A preference for a moderately heavy breakfast, the main meal at noon, and a lighter meal in the evening was revealed. The lighter meal at night included a cream soup or broth soup with meat, a casserole or sandwich, salad, dessert, and a beverage.

In a study conducted by Dell (5), the patients preferred noon and night meals of equal size. At the time the survey was made, a light meal was served at night. The patients showed a preference for a medium to heavy breakfast.

Larson (8) reviewed a revolutionary approach, a Five-Meal-A-Day Plan, for feeding the elderly in nursing homes. The Five-Meal-A-Day approach requires all essential nutrients to be incorporated into two large meals plus three snacks. This plan calls for a continental breakfast at 7:00 a.m., a heavy breakfast at 10:30 a.m., a snack at 1:00 p.m., dinner at 3:30 p.m., and a snack at 7:00 p.m. The rescheduling of meals gives personnel more time for "plus" services. Because of the relaxed atmosphere, the patients had fewer digestive disturbances, fewer fecal impactions, and seemed less confused. Skin breakdowns were reduced, possibly as a result of increased food intake and better nutrition.

Lane (7) reported that patients generally are pleased with lighter more frequent meals. The complaints about

hunger are fewer and the plate waste at mealtime is reduced. A five-meal plan tends to de-emphasize mealtime regimentation, thus making the nursing home atmosphere more sociable. With a substantial bedtime snack the need for nighttime medication and tranquilizers is reduced. However, the snacks must be planned carefully to avoid an increase in the carbohydrates and a decrease in proteins. It is more difficult to incorporate needed vegetables and fruits in a snack than in regular meals.

Various agencies which set standards for dietary departments of nursing homes specify that the breakfast meal should not be more than 14 hours after the evening meal. These agencies require that dietary personnel be scheduled for duty at least 12 hours a day (18, 22, 24).

The social aspects of dining can stimulate the appetite and aid digestion. Consensus is that all patients who are able, even those in wheel chairs, should dress and take their meals in the dining room with others. To eat in the company of friendly people can add much enjoyment to the meal.

Savitsky and Zetterstrom (16) recommended that patients be grouped around tables on the basis of their congeniality. When residents on special diets are separated from those on regular diets, jealousy is diminished among those who do not receive special foods. Patients suffering from severe

regression in mental health are generally untidy; therefore, Ludwig (9) suggested these patients be grouped in one area at small tables with someone to supervise the meal.

The dining room should provide pleasant surroundings with an atmosphere of tranquility (16). The lighting should be adequate for those with impaired vision. The color used in the dining room should contribute to its warmth and the color contrast should help patients distinguish between objects (1).

According to Baumgarten (1), the patient who must eat at his bedside also benefits from companionship. To serve this purpose therapeutically, the companionship should be provided by a well-liked relative, friend, or member of the staff.

The primary purpose of eating is to satisfy appetite and nourish the body; however, food has emotional and social significance which does not diminish with age. Larson (8) has emphasized that to the elderly, who can no longer participate in many of the pleasures once enjoyed, mealtime is especially important. Dell (5) stated that the best way to make lonely, elderly patients feel wanted is to provide good food and serve the food attractively in clean, pleasant surroundings.

According to a United States Department of Health, Education and Welfare (23) study of nursing homes, their patients, and their care, the overall ratio of the number of personnel employed in nursing homes to the patients is one staff member to two patients. A United States Department of Health, Education and Welfare (21) study of 40 nursing homes revealed one dietary employee for every 13.3 patients. In the study of 40 nursing homes, these institutions had from 26 to 141 beds. "A Guide to Nutrition and Food Service for Nursing Homes and Homes for the Aged" (22) recommended the number of employees be determined by the physical layout, type and amount of equipment, total number of persons to be served, and the number of hours employees work.

A high turnover in food service personnel has been reported for nursing homes. Berryman (2) listed some of the reasons for a high turnover in dietary personnel. These reasons were poor working conditions, broken hours, poor equipment, heavy work load, low wages, and ineffective supervision.

CHAPTER II

PLAN OF PROCEDURE

This study was undertaken to determine the present status of personnel policies and food practices of nursing homes located in the vicinity of Waco, Texas. Findings of the study should reveal the strengths and weaknesses of the dietary departments in the nursing homes located in the area. Nursing homes selected to participate in this study were 14 homes located in the city limits of Waco and one in Bellmead, a suburb of Waco. All the nursing and custodial homes in the city of Waco and its suburbs were included.

Data were collected by means of a personal interview with the administrator or the assistant administrator of the institutions studied. The survey was conducted by the author using an interview schedule designed to reveal personnel policies and food service practices of the nursing home.

The personal interview schedule covered general information concerning the nursing home and patients and specific information in the area of food service. The areas concerning food service included: personnel--number employed, education, experience, and salary range; menus; diets--general

and special; snacks; common problems encountered; purchasing of food; sanitation; training, and intentions in regard to participating in the Medicare program. Previous to the initiation of the study, the interview schedule was evaluated by two hospital dietitians of the Dallas-Fort Worth area; the manager of a nursing home in the Waco area, one of a nationally known chain of nursing homes; and graduate students at Texas Woman's University, who were home economics teachers. The author visited the Texas Department of Health, Division of Nursing and Convalescent Homes; The Department of Public Welfare; Texas Department of Health, Medical Care Administration Services; and the Texas Nursing Home Association Headquarters in Austin, Texas, and solicited suggestions for conducting the survey of nursing homes in the Waco area. The suggestions were helpful in developing and revising the interview schedule.

A copy of the instrument follows:

INTERVIEW SCHEDULE

I. General Information

Name of home_____

Financial control_____

Bed capacity_____ Bed occupancy (range)_____

II. Patients

Age range of patients

Under 60_____ 80 - 89 _____

60 - 69 _____ Over 90 _____

70 - 79 _____

How many are ambulatory?___ How many are bedfast?___

How many wear dentures? ___ How many have other handicaps? ___

Are ambulatory patients usually served in the dining room? Yes____ No____

Do some patients desire to eat in their rooms?

Yes____ No____

Is a list made of food likes and dislikes when the patient enters the home? Yes____ No____

III. Food Service

A. Personnel

	Supervisor		Cook		General Kitchen Personnel
	Food Service	Assistant Food Service	Full Time	Assistant	
Number employed					
Education required					
College					
High school diploma					
Attended high school					
Elementary school					
Experience required					
Years in previous position					
Years in present position					
Salary range					
Hourly					
Weekly					
Semi-monthly					
Monthly					

B. Food Service Practices

Menus

What aids are used for planning menus?_____

_____

Who plans the menus?_____

How far in advance are menus planned?_____

Are cycle menus used? Yes____ No____

If yes, are the menus different for the days of the week? Yes____ No____

Are standardized recipes used? Yes____ No____

If yes, what sources are used?_____

_____

Diets

General

How many general diets are served?_____

Are choices given? Yes____ No____

If yes, on what items?

Meat_____ Dessert_____

Vegetables____ Bread_____

Salad_____ Beverage_____

If patient refuses food, is other food offered?

Yes____ No____

Special

How many special diets are served?_____

Who plans the special diets?_____

Is a diet manual used? Yes____ No____

If yes, which one?_____

What special diet is ordered most frequently?

Bland_____ Fat free_____

Mechanically soft_____ High protein_____

Liquid_____ Low calorie_____

Diabetic_____ Low cholesterol____

Ulcer_____ Low residue_____

Salt free_____ Other_____

_____

Snacks

Are snacks served? Yes____ No____

If yes, what is served?_____

If served, to whom?_____

If served, are choices given? Yes____ No_____

When are snacks served?_____

C. Problems

What are the main problems encountered in feeding geriatric patients?_____

_____

_____

D. Purchasing of Food

Who purchases the food?_____

Are written specifications used? Yes____ No_____

How are purchases made?

Bid____ Direct sale____ Grocery store____

E. Sanitation

Is the food service department inspected?

Yes____ No____

If yes, by whom?_____

If yes, how frequently?_____

Are health cards required? Yes____ No____

Is a physical required? Yes____ No____

If yes, how frequently?_____

Is a mechanical dishwasher used? Yes____ No____

If not, how are dishes sterilized?_____

_____

F. Training

Is there a regular inservice training program?

Yes____ No____

Are there special inservice training programs?

Yes____ No____

IV. Medicare (ECF)

Do you plan to participate in the Medicare (ECF) program? Yes____ No____

If yes, do you need the services of a qualified dietitian? Yes____ No____

If yes, would you need a full time dietitian or a part time dietitian?_____

CHAPTER III

ANALYSIS OF DATA

Fifteen nursing and custodial homes in the vicinity of Waco, Texas, were surveyed. Information regarding food service practices was obtained by means of a personal interview conducted by the author with the administrator or assistant administrator of the nursing and custodial homes.

Data obtained were analyzed to determine likenesses and differences among participating nursing homes. An attempt was made to determine the practices common to all nursing homes surveyed.

The nursing homes surveyed included 12 proprietary, privately owned; three nonprofit organizations, two publicly owned, and one church owned. The bed capacity of the homes ranged from 14 to 104 with six of the homes having a capacity of 50 beds or more and nine with less than 50 beds each. Two homes had a capacity of 100 beds or more. Seven of the homes with less than 50 beds were proprietary owned, one was publicly owned, and one was church owned. Of the three nonprofit institutions, two were in the group of less

than 50 beds. Five of the homes with 50 or more beds were proprietary owned and one was a publicly owned institution.

Number of Homes	Number of Beds	Type of Home		
		Proprietary	Nonprofit	
			Public	Church
9	Less than 50	7	1	1
6	50 or more	5	1	0

According to Baumgarten (1), the publicly owned homes usually have a larger bed capacity than do the proprietary owned. In the present study one of the publicly owned homes had a capacity of 100 while the other had a bed capacity of 33.

The occupancy of the 15 homes surveyed ranged from 27 to 100 per cent occupancy. The 27 per cent occupancy was a result of a remodeling program in progress in one home. The mean occupancy for the 15 homes was 86 per cent. (See Table I.) The mean occupancy would have been higher if the home in the process of remodeling had not been included. This occupancy is slightly higher than the 81.7 per cent occupancy reported in a survey of nursing homes in Houston, Texas (13).

General information about the patients in 15 nursing and custodial homes was obtained. The largest percentage of patients was between the ages of 60 and 90 years; this group

TABLE I

BED CAPACITY AND PERCENTAGE OCCUPANCY FOR 15 NURSING AND CUSTODIAL HOMES

Home Number	Bed Capacity	Patients	
		Number	Per cent
1	60	59	98
2	104	90	87
3	80	78	97
4	14	13	93
5	16	16	100
6	32	32	100
7	18	17	94
8	30	8	27
9	90	72	80
10	100	76	76
11	33	30	91
12	24	23	96
13	50	29	58
14	16	16	100
15	22	20	91

included 549 patients or 95 per cent of all the patients. The smallest percentage of patients was in the group under age 60 with four patients or 1.0 per cent in this category. The youngest patient reported was 26 years of age. The group over 90 years of age consisted of 23 patients or 4.0 per cent of all patients. The oldest patient reported was believed to be between 103 and 116 years of age.

Age in Years	Patients	
	Number	Per cent
Under 60	4	1.0
60 - 90	549	95.0
Over 90	23	4.0

Almost twice as many residents were ambulatory as bedfast. There were 379 or 66 per cent ambulatory and 197 or 34 per cent bedfast patients. The range of ambulatory patients was from four to 72 patients per home. The range of bedfast residents was from none to 54 per home. The average was 25.3 ambulatory patients per home and 13.4 bedfast patients per home.

Eight homes reported 50 per cent or more patients wore dentures; two homes reported 80 per cent or more, and one home reported 100 per cent of the patients either wore dentures or partial plates. Other handicaps were reported as causes for difficulty in eating. Seven homes reported

strokes, four homes reported senility, four homes reported blindness, and one home reported arthritis as conditions which required special help with eating.

Of the 15 homes surveyed, 12 reported at least part of the patients were served in the dining room, three homes served trays to all patients in their rooms. Nine homes reported allowing patients to have trays in the room if requested.

Eleven homes reported a list was made of the patients' food likes and dislikes. The extensiveness of the listing used was not investigated. Several administrators referred to likes and dislikes as the method of preparation for eggs or the strength of coffee preferred.

This study revealed 7.5 patients to each dietary employee for the 10 nursing homes with 50 beds or less. This figure included one large home for the aged with 300 residents. The infirmary of this institution had 16 beds which qualified this department to be classified as a nursing home. The dietary department of this home prepared the meals for all residents; therefore, the number of dietary employees to patients does not reveal a true picture. The above figure also included the home which was in the process of remodeling and shared dietary employees with another home. For the homes with 51 beds or more, there were approximately 14

patients to each dietary employee. One home with 60 beds had 15 patients to one dietary employee, two homes with 71 to 90 beds had 13.0 patients to one dietary employee, and two homes with 91 to 104 beds had 15.6 patients to each dietary employee (Table II). A study of 40 nursing homes conducted by the Public Health Service (21) revealed 13.3 patients to each dietary employee which is comparable to the 13.0 patients to each dietary employee in the 71 to 90 bed capacity homes and the 15.6 patients to each dietary employee in the 91 to 110 bed capacity homes in the present study. Less patients per dietary employee were reported by Boenker (3) in a study of small hospitals of 200 bed capacity or less with one exception. In two hospitals with from 176 to 200 bed capacity, 15.8 hospital beds per dietary employee were reported. The number of beds to each dietary employee in the present study is higher than the 5.7 beds to each dietary employee in hospitals of less than 300 bed capacity reported by McDonald (10).

The number of dietary employees in each of four categories was investigated. There were five dietary supervisors with one supervisor serving two homes; 27 cooks, 10 assistant cooks, and 22 general kitchen helpers, or a total of 64 dietary employees in the 15 nursing and custodial homes surveyed.

TABLE II

NUMBER OF DIETARY DEPARTMENT EMPLOYEES ACCORDING TO BED CAPACITY OF 15 NURSING AND CUSTODIAL HOMES

Bed Capacity	Number of Institutions	Number of Dietary Employees	Bed Capacity Per Employee	
		Range	Range	Mean
50 or less	10	2 - 12	1.3 - 25	7.5
51 - 70	1	4	15	15
71 - 90	2	6 - 7	12.8 - 13.3	13.0
91 - 110	2	6 - 7	14.8 - 16.6	15.6

Information concerning the education of the dietary employees was obtained. Of the five supervisors, one was a home economics graduate with a minor in foods and nutrition; one had two years of college; two supervisors had a high school diploma; and one had attended high school but had not graduated. Twenty five cooks had attended high school but only 14 graduated. The other two cooks had an eighth grade education or less. Six assistant cooks had high school diplomas; four had attended high school but did not graduate. Fourteen general kitchen helpers had attended high school but only 11 had graduated, eight had less than an eighth grade education (Table III). Of the 64 dietary employees, 54.6 per cent had a high school education or more.

The extent of previous experience of dietary employees reported in this survey ranged from none to two years for supervisors; none to 12 years for cooks; none to one year for assistant cooks and general kitchen helpers. The experience in the present position ranged from less than a year to three years for supervisors; from one to 10 years for cooks; less than one week to five years for assistant cooks, and up to 11 years for general kitchen helpers. In a study of small hospitals of 200 bed capacity or less, Boenker (3) reported the experience of general kitchen personnel varied from less than one year to 15 years or more in the present position. The experience of cooks varied from less than two years to

TABLE III

EDUCATIONAL BACKGROUND OF DIETARY EMPLOYEES IN 15 NURSING AND CUSTODIAL HOMES

Title	Number of Employees	Education		
		Eighth Grade or Less	Less Than Four Years of High School	High School Graduate or More
Supervisor	5		1	4
Cook	27	2	11	14
Assistant cook	10		4	6
General kitchen helper	22	8	3	11

15 years or more in the present position. These figures appear to indicate the turnover of dietary personnel in nursing homes is greater than that in hospitals.

The 15 nursing and custodial homes surveyed reported salaries were based on hourly, weekly, semi-monthly, or monthly wage scales. For supervisors the salaries ranged from $1.00 hourly to $300.00 monthly. For the cooks the salary ranged from approximately $25.00 to $50.00 per week. Figures reported for assistant cooks revealed the salaries ranged from $26.20 to $40.00 per week. The general kitchen helper's salary ranged from $23.75 to $40.00 per week. Seven homes reported salaries based on a monthly wage scale, five weekly, one semi-monthly, and six on an hourly wage scale.

Practices relating to the planning of the menus for the nursing and custodial homes were investigated. Some type of menu aid was reported as used by all homes except four institutions. Nine homes reported using magazines, six reported using books, and three reported using commercial materials as planning aids. In a survey of 65 nursing homes reported by Mynick (11), two homes used monthly menus published in the Journal of the American Nursing Home Association as a planning base. This finding was similar to the present study in that only two administrators referred to menus in

professional journals. The majority of administrators referred to popular magazines, non-institutional cookbooks, or daily newspapers as aids to planning menus and as a source of recipes.

The menu was planned by the food service supervisor in six homes, by the cook in four, by a nurse in two, and by the administrator in three homes. In at least two homes there was some joint planning, by a nurse and the supervisor in one home, and by the cook and the manager in the other.

All homes reported planning menus in advance. Various agencies which set standards for nursing homes require that menus be planned at least one week in advance. Two homes had no set interval, five planned one week in advance, four planned two weeks in advance, two planned four weeks in advance, and one home planned four to eight weeks in advance. Six homes reported using cycle menus. In a study of nursing homes and small hospitals, Mynick (11) found that the majority of the institutions planned menus every four weeks and the next greatest number planned menus weekly. In the present study the greatest number of institutions used cycle menus and the second greatest number planned the menu one week in advance. Five institutions reported making a special effort not to repeat the same menus for a given day of the week.

The use of standardized recipes was determined. Only four homes reported the use of standardized recipes. As a source of these recipes, two homes reported using magazines, books, and commercial materials. Two homes reported developing their own recipes. These homes had the same owners and shared a home economics graduate as food service supervisor.

Information was obtained concerning the diets of the patients of the nursing and custodial homes. There were 383 residents or 83 per cent served the general diet and 79 residents or 17 per cent served special diets. Residents served the general diet ranged from 25 to 100 per cent in a given home; whereas, from none to 75 per cent of the residents in a given home were served special diets. This range does not include a figure for the nursing home which was a part of a 300 bed residence for the aged. In this institution there were residents on special diets who were not in the nursing home department.

The special diet most often served was the mechanically soft, with the diabetic and low sodium diets being second in frequency of use. Other special diets served were liquid, low calorie, high protein, low fat, ulcer, low

cholesterol, and allergy diets. The reported number of special diets served is shown below:

Special Diets	Number
Mechanically soft	50
Diabetic	23
Low sodium	23
Low calorie	8
High protein	6
Liquid	3
Low fat	2
Low cholesterol	1
Ulcer	1
Allergy	1

Only one home gave a choice of meat, vegetables, salad, dessert, and bread. Nine homes reported giving a choice of beverages. All homes reported menu substitutions if the food served was refused by the patient.

Three homes reported having a diet manual. One home used a diet manual prepared by a dietitian employed in another home of the same ownership. One home used the Mayo Clinic Diet Manual and one home used commercial diet plans. The majority of homes received diet regimens from the patient's physician if a special diet was needed.

Of the 15 nursing and custodial homes, nine served snacks routinely. Four homes reported serving snacks if requested. The other homes reported serving snacks

occasionally or infrequently. The number of homes serving snacks routinely according to bed capacity is as follows:

Bed Capacity	Number of Homes
Less than 50 (N=9)	4
50 or more (N=6)	5

Juice and milk were reported to be the most frequently served snack items. Other foods served were crackers, graham crackers, bread and jelly, fruit, ice cream, toast, cookies, Sustagen, and lemonade.

Two homes reported serving snacks at 10:00 a.m. and 2:00 p.m. One home served snacks at mid-morning, mid-afternoon, and at bedtime. Two homes served snacks only in the afternoon, five served snacks most frequently after the evening meal. The other homes had no special time for offering snacks if served at all.

The homes that served snacks routinely served all patients; the homes that served snacks on request served only the patients requesting food. One home reported serving snacks mainly to bedfast patients and the other homes served snacks occasionally to all patients.

The problems encountered in feeding geriatric patients were investigated. The most common problem reported was

getting the elderly patient to eat. Two homes reported poorly fitting dentures and other handicaps as creating problems in the preparation of food. One home encountered difficulty in keeping meats moist enough for the patient. Two homes reported the patients tired of institutional food. Two institutions reported that many patients liked and often requested difficult to digest foods such as dry beans or turnips and greens.

The food was purchased by the food service supervisor for four of the homes. The administrator purchased the food for 11 of the institutions. The supervisor requested the food for two of the homes but the administrator made the actual purchase. Four homes purchased food by direct sale only; whereas, seven homes purchased food by both direct sale and from a local grocery store. Three homes reported purchasing all food from a local grocery store.

Information concerning the sanitation inspections was investigated. All homes reported inspections by both the city-county health department and the state licensing board. Seven homes were inspected by the State Welfare Department and one home was federally inspected. All homes reported inspections at least every six months and some reported inspections more frequently.

The dietary departments of all 15 homes required employees to have a health card. None of the homes surveyed required their employees to have a physical examination before employment. One home reported that a release from the doctor must be obtained before returning to work after being absent because of illness.

The methods used for sterilizing dishes was determined. Nine homes reported using a mechanical dishwasher and six homes used three vats with a gas burner under the third vat as the method of sterilization.

The response to the questions relating to inservice training was negative. None of the 15 homes had a regularly scheduled inservice training program or special inservice training programs for dietary employees.

The survey of the 15 nursing and custodial homes revealed that seven homes planned to participate in the Medicare program. According to a recent article in the Waco Times-Herald (19), four nursing homes in Waco are eligible for Medicare payments. Of the seven planning to participate, two needed a dietitian or an individual trained in foods and nutrition in order to qualify. Only two homes had a college graduate with training in foods and nutrition and these two homes shared this individual. Three homes indicated a qualified person had been hired for January 1, 1967, on a

consultant basis. According to an article in the Journal of the American Dietetic Association (4), there were less than 1.0 per cent of the nursing homes and related long-term care facilities that employed professional dietitians in 1965. Mynick (11) reported three dietitians as supervisors of nursing home dietary departments in a survey of nursing homes and small hospitals in Philadelphia and Montgomery County, Pennsylvania.

CHAPTER IV

SUMMARY AND CONCLUSIONS

The food service practices of 15 nursing and custodial homes in the vicinity of Waco, Texas, were studied by means of a personal interview with the administrator or assistant administrator of the home. The purpose of the interview was to determine the personnel policies and food practices of the nursing and custodial homes.

The institutions surveyed included 12 proprietary homes and three nonprofit homes, two publicly owned and one church owned. The bed capacity of the institutions ranged from 14 to 104 with six of the homes having a capacity of 50 beds or more and nine with less than 50 beds. The occupancy of the 15 homes surveyed ranged from 27 to 100 per cent. The mean occupancy was 86 per cent.

The largest percentage of the residents in the 15 nursing and custodial homes was between 60 and 90 years of age; this group included 95 per cent of all the patients. One per cent of the patients was in the age category under 60 years of age and 4.0 per cent in the age category over 90 years of age.

Almost twice as many residents were ambulatory as were bedfast with a range of ambulatory patients from four to 72 per home and the range of bedfast patients from none to 54 patients per home. The average was 25.3 ambulatory patients per home and 13.4 bedfast patients per home.

More than 50 per cent of all patients wore dentures or partial plates. Other handicaps which caused difficulty in eating were strokes, senility, blindness, and arthritis.

Twelve of the 15 homes served at least part of the patients in a dining room, and three homes served all patients on trays in their rooms. Nine homes reported allowing patients to eat in their rooms if requested. Eleven homes kept some record of food likes and dislikes of the residents but the extensiveness of the records was not determined.

This study revealed 7.5 patients to each dietary employee for 10 nursing homes with less than 50 beds. For the homes with 51 or more beds there were approximately 14 patients to each dietary employee. These findings reveal a higher number of patients per dietary employee than were shown in similar studies conducted in hospitals.

There were 64 dietary personnel employed in the 15 nursing and custodial homes surveyed. The dietary employees included five dietary supervisors, 27 cooks, 10 assistant cooks, and 22 general kitchen helpers.

Of the five supervisors one was a home economics graduate with a minor in foods and nutrition. One had attended college two years, two had graduated from high school, and one had attended high school but did not graduate. Of the 59 individuals employed as cooks, assistant cooks, and kitchen helpers, 52.5 per cent were high school graduates, while only 16.9 per cent had less than an eighth grade education.

This study revealed that the experience of the dietary employees ranged from none to two years for supervisors, none to 12 years for cooks, and from none to one year for assistant cooks and kitchen helpers. The length of time in the present position ranged from less than one week to 11 years. The cooks and general kitchen helpers had been in the present positions for the longest periods of time.

The salaries for dietary employees were based on hourly, weekly, semi-monthly, and monthly wage scales. The supervisors' pay ranged from $1.00 hourly to $300.00 monthly. The salary for cooks, assistant cooks, and kitchen helpers ranged from approximately $23.75 to $50.00 per week.

The menu was planned by the supervisor in six homes, by the cook in four, by a nurse in two, and by the administrator in three homes. Menu aids were used by all homes except four. Aids used were magazines, books, and commercial

materials. The menu was planned in advance in all homes. Two homes reported no set interval for planning menus. However, the other homes ranged from five homes planning menus one week in advance to two planning menus six to eight weeks in advance.

Only four homes reported using standardized recipes. These homes used recipes from magazines, books, or from commercial materials. Two homes reported developing their own recipes.

There were 383 residents or 83 per cent served a general diet and 79 residents or 17 per cent served special diets. The special diet most often served was the mechanically soft diet. The next most frequently served special diets were diabetic and low sodium. Other special diets served were liquid, low calorie, high protein, low fat, ulcer, low cholesterol, and allergy diets. The same individual who planned the basic menu planned the special diets.

Except for a choice of beverages in nine homes, only one home gave choices of food. All homes reported menu substitutions if food served was refused by the patient.

Three homes reported using a diet manual. A different diet manual was used in each of these homes.

Nine homes served snacks to all patients routinely. A variety of patterns for serving snacks was reported. One home served snacks three times a day, two twice a day, six once a day, and the other homes served snacks occasionally if served at all.

The most common problem reported in feeding geriatric patients was that of getting the patient to eat. Other problems encountered were preparing food for patients with poor dentures or other eating handicaps, keeping meats moist, and selecting well liked foods that were easily digested.

The food was purchased by the supervisor for four of the homes and by the administrator for 11 homes. Food was purchased by direct sale, from a local grocery, or a combination of the two.

All of the 15 nursing and custodial homes were inspected by the city-county health department and the state licensing board. Seven homes reported inspections by the state welfare department. All homes were inspected at least once every six months.

The dietary departments of all 15 homes required employees to have a health card. None of the homes required a physical examination.

For sterilization of the dishes nine homes used a mechanical dishwasher. The other homes used a method of hot water sterilization.

None of the homes surveyed had a regular inservice training program for dietary employees. There were no special training programs provided for dietary employees.

The survey revealed that seven institutions planned to participate in the Medicare program. Two of these homes shared a home economics graduate with a minor in foods and nutrition as the individual in charge of the food service department. Three homes indicated a consultant dietitian had been hired for January 1, 1967, and two homes desired a dietitian or a qualified individual.

This study was limited to the 15 nursing and custodial homes in the vicinity of Waco, Texas. Further studies are warranted to determine types of foods being served on both general and special diets, the methods of preparation employed, and nutritive value of the diets.

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