
CHAPTER 10

NURSING CARE FACILITIES

Introduction

G.S. 131E-176(17b) defines a “nursing home facility” as “a health service facility whose bed complement of health service facility beds is composed principally of nursing home facility beds.”

Definitions

A nursing care bed’s service area is the county in which the bed is located. Each of the 100 counties in the state is a separate service area.

The “reporting year” is October 1 through September 30. The current reporting year is October 1, ~~2017~~ 2018 through September 30, ~~2018~~ 2019.

The methodology projects bed need ~~determination three~~ 5 years beyond the ~~publication year of the current reporting year SMFP~~. The current “projection year” is ~~2023~~ 2024.

The “planning inventory” is the number of beds used in need determination calculations. It is the number of licensed beds plus any new beds approved by CON that are under development, minus any exclusions (see below) and beds to be relocated out of the county.

Changes from the Previous Plan

This chapter contains no substantive changes from the previous State Medical Facilities Plan. However, the chapter includes substantial technical edits.

Basic Principles

1. The methodology should project need ~~determination three~~ 5 years beyond the current ~~SMFP reporting~~ year because that is the **least** amount of time required to bring a new or expanded facility into service.
2. Any advantages to patients that may arise from competition will be fostered by policies which lead to the establishment of new provider institutions. Consequently, whenever feasible, need determinations should be for at least 90 beds. However, such allocations do not always result in new entities.
3. Counties whose deficits represent at least 10% of their total needs (deficit index) and who report an occupancy rate of licensed beds in the county of at least 90%, excluding continuing care retirement communities (CCRC), should receive need determinations even though such increments may be too small to encourage establishment of new facilities.
4. A goal of the planning process is a reasonable level of parity among people in their geographic access to nursing home facilities.

Data Sources

The North Carolina Office of State Budget and Management provides ~~estimates projected numbers~~ of North Carolina residents for the ~~current reporting year and~~ projection year by county.

Estimates of active duty military personnel come from the category of “Employment Status – Armed Forces” from the most recent American Community Survey 5-Year Estimates.

Utilization data comes from the current and four immediately previous reporting years’ License Renewal Applications to Operate a Nursing Home and the Nursing Care Facility/Unit Beds: Annual Data Supplement to Hospital License Applications, as submitted to the North Carolina Department of Health and Human Services, Division of Health Service Regulation.

Assumptions of the Methodology

1. Planning inventory and need determination calculations exclude all beds and days of care for:
 - a. nursing care beds converted to care for head injury or ventilator-dependent patients;
 - b. nursing care beds developed pursuant to Policy NH-2; and
 - c. nursing care beds transferred from state psychiatric hospitals to the community pursuant to Policy NH-5.
2. The inventory excludes beds and the occupancy rate calculation excludes days of care for ~~out-of-county~~ patients **out of the contiguous county area** served by facilities operated by religious or fraternal organizations.
3. The methodology excludes the estimated active duty military population from the county’s population for any county with more than 500 active duty military personnel.
4. The methodology uses the county bed use rate as the utilization measure in determining needs. Bed use rates are calculated per 1,000 population per county. Each county bed rate is calculated using a ~~five~~ 5-year average annual change **to project** ~~projected~~ forward ~~three~~ 5 years beyond the current ~~SMFP publication~~ **reporting** year. For any county with an average annual change rate that is **at least** one-half of one standard deviation above or below the statewide average annual change rate, the bed use rate calculations substitute the statewide rate.
5. **The projected utilization is multiplied by 3 to account for future increases in utilization.**
6. The methodology uses the higher of two different occupancy rate calculations to obtain the need determination with the greatest advantage. The adjusted occupancy rate for each county is calculated using the higher of: **(1) the median of all facilities’ occupancy rates in a county; or (2) a countywide occupancy, whichever is higher.** The calculations remove the equivalent days of care for the initial occupancy from calculations for beds that have been excluded from the inventory.

Application of the Methodology

Table 10A shows the inventory data and Table 10B shows the patient, population and bed use data that form the basis for the calculations discussed in the following steps. Table 10C shows projected bed utilization, bed surpluses/deficits and occupancy rates that are used to determine bed need **determination**.

Step 1: Calculate the planning inventory for each facility and county (Table 10A)

- a. Add the number of licensed beds in each nursing home (*Column C*) and hospital (*Column D*).
- b. Adjust this result by adding or subtracting, as appropriate, CON-approved beds and beds to be transferred (*Columns F-H*). Then adjust this result by the number of beds available from need determinations in the SMFP but for which CONs have not yet been issued (*Column I*).

- c. Subtract: (1) beds that have been converted to care for head injury or ventilator-dependent patients; (2) beds have been developed pursuant to Policy NH-2; beds that have been transferred from state psychiatric hospitals to the community pursuant to Policy NH-5; and the calculated number of beds operated by religious or fraternal organizations that have been used to serve patients from non-contiguous counties for that facility (*Column K*).
- d. Sum each of these calculations across all facilities in a county to obtain county totals (*Column K*).

Step 2: Calculate the projected county bed use rates (*Table 10B*).

- a. For each of the 5 most recent reporting years and for each county, divide the number of patients (*Column B*) by the population (*Column C*).
- b. Multiply the result by 1,000 to calculate the bed use rate per 1,000 population (*Column D*).
- c. Calculate the average annual change rate (AACR) in bed use for the 5 most recent reporting years for each county (*Column E*).
- d. If the result of Step 2-c is at least 0.5 standard deviations above or below the statewide AACR, then enter the statewide AACR; otherwise, enter the result of Step 2-c into Column F, the Selected Change Rate.
- e. Multiply the result of Step 2-d by the bed use rate for the reporting year (*Column D*, last sub-column) and then multiply by 3; add the product to the bed use rate for the reporting year to get the Bed Rate per 1,000 (*Column G*).

Step 13: ~~Multiply the county bed use rates~~ **Bed Rate per 1,000** (*Table 10B, Column G and Table 10C, Column B*) by each county's corresponding projected civilian population in thousands for the projection year (*Table 10C, Column C*) to calculate the projected bed utilization (*Table 10C, Column D*).

Step 23: ~~For each county, d~~ Divide the projected bed utilization for each county (*Table 10C, Column D*) by a 95% vacancy factor and enter the result in ~~Table 10C, Column E of Table 10C.~~

Step 34: Calculate the county's bed surplus or deficit (*Table 10C*).

- a. Obtain the planning inventory for each county (*Column H*). Transfer the county totals from Columns J-L in Table 10A into Columns F-H of Table 10C, respectively.
- b. Subtract the projected bed utilization with vacancy factor (*Column E*) from the total inventory (*Column H*) to obtain the county's projected surplus or deficit of beds (*Column I*). Positive numbers are surpluses and negative numbers are deficits.

~~For each county, calculate the planning inventory (*Table 10C, Column H*) by adjusting the licensed beds by the number of: CON Approved/License Pending beds, by beds available in prior Plans that have not been CON approved (*Table 10C, Column F*), and by exclusions from the county's inventory, if any (*Table 10C, Column G*). For each county, subtract the projected bed utilization with applied vacancy factor derived in Step 2 (*Table 10C, Column E*), from the planning inventory (*Table 10C, Column H*). The result is the county's surplus or deficit (*Table 10C, Column I*).~~

Step 5: Calculate the deficit index and occupancy rate (*Table 10C*)

- a. For all counties with a deficit, divide Column I by Column E to calculate the deficit index (Column J). The resulting deficit index is rounded for display purposes; internal calculations are not rounded.
- b. For all counties, calculate the occupancy rate by dividing the total days of care for all facilities in the county by the possible days of care (the number of beds in the planning inventory times 365.25). In the same manner, calculate the occupancy rate for each facility in the county. Then calculate the median facility occupancy rate for the county. Select the higher of the two occupancy rates and enter it into Column K.

Step 46: Determine need **determination** for each county (Table 10C).

- a. For a county with a deficit of 71 to 90 beds, if the adjusted occupancy of licensed beds in the county is 90% or greater based on utilization data reported for the current reporting year (Table 10C, Column K), the need determination is 90 beds (Table 10C, Column L).
- b. For a county with a deficit of 91 or more beds, if the adjusted occupancy of licensed beds in the county is 90% or greater based on utilization data reported for the current reporting year (Table 10C, Column K), the need determination is the amount of the deficit rounded to 10. The maximum need determination for each county is 150 beds (Table 10C, Column L).
- c. ~~For any other county with a deficit, calculate the county's deficit index by dividing the amount of the deficit by the result of Step 2 (Table 10C, Column E). If any other the county's deficit index (Column J) (deficit index) is 10% or more of its projected utilization (Table 10C, Column J), and the adjusted occupancy of licensed beds in the county is 90% or greater for the current reporting year (Table 10C, Column K), the need determination is the amount of the deficit rounded to 10. The maximum need determination for each county is 150 beds.~~
- d. For purposes of rounding need determinations, numbers greater than 10 and ending in one to four round to the next lower number divisible by 10. Numbers ending in ~~5 five to 9 nine~~ round to the next higher number divisible by 10.