**APPENDIX 2**

# NARRATIVE

# 2. Project Description

Cape Cod Healthcare, Inc (“Holder”), on behalf of Cape Cod Hospital (“Hospital”), located at 27 Park Street, Hyannis, MA 02601, requests approval for a Significant Change to the previously issued Determination of Need (“DoN”) Application # CCHC-22021416-HE to build out approved shell space to accommodate 32 medical/surgical beds (“Proposed Change”). The capital expenditure associated with the Proposed Change is $14,666,613.

**10. Amendment**

**10.5.a Describe the proposed change.**

The previously issued DoN approved the construction of a new facility on the Hospital’s main campus to contain the following: (1) relocated and expanded medical oncology department; (2) a relocated radiation oncology department; (3) a relocated inpatient cardiac unit consisting of 32 beds; and (4) shell space for future projects (“Approved Project”). Based on current and projected demand for inpatient services, the Hospital has determined additional medical/surgical beds are needed to provide its Patient Panel with timely access to care in the community. The Hospital is currently using 28 inpatient beds pursuant to the Department of Public Health’s Alternate Inpatient Care Space memorandum in order to meet current demand. Building beds in existing shell space offers a permanent, cost-effective solution that will address patient demand and alleviate capacity constraints. To that end, the Hospital seeks to build out approximately 24,783 gross square feet of approved shell space to accommodate an adult medical/surgical inpatient unit consisting of 32 private rooms.

**10.5.b Describe the associated cost implications to the Holder.**

The Holder projects that the Proposed Change will increase the Hospital’s annual operating expense by approximately $8,900,000.

The Proposed Change will increase the Approved Project’s Maximum Capital Expenditure by $14,666,613 for a total MCE of $151,715,245.

**10.5.c Describe the associated cost implications to the Holder’s existing Patient Panel**

The Holder does not anticipate any cost implications to its Patient Panel as a result of the Proposed Change. The Hospital currently provides inpatient medical/surgical services, and the additional beds will not result in any change to price for the Holder’s existing patient panel.

**10.5.d Provide a detailed narrative, comparing the approved project to the proposed Significant Change, and the rationale for such change.**

Cape Cod Healthcare is the largest provider of healthcare services for residents and visitors of Cape Cod.

With nearly 600 physicians and 5,000 employees, Cape Cod Healthcare includes the physician practice, Medical Affiliates of Cape Cod, homecare and hospice services (VNA), a skilled nursing and rehabilitation facility, an assisted living facility, six urgent care centers and two acute hospitals – Cape Cod Hospital and Falmouth Hospital. Cape Cod Hospital is the largest provider of inpatient services on Cape Cod and provides a complement of specialized care including interventional cardiology. The nearest hospitals to Cape Cod Hospital are Falmouth Hospital (22 miles; 45-minute drive) and Beth Israel Deaconess Plymouth Hospital (35 miles; 40-minute drive). Accordingly, additional beds at the Hospital will alleviate ED boarding, improving access and patient experience for geographically isolated patients who rely on the Hospital for emergent and inpatient care.

In 2022, the Hospital received DoN approval to construct a four-story building on its main campus for a relocated and expanded cardiac department, a relocated and expanded outpatient oncology service, a relocated medical/surgical unit, and shell space to accommodate future projects as dictated by demand. Based on historical utilization, the Hospital has determined additional inpatient medical/surgical bed capacity is needed to address existing capacity challenges and meet future demand for inpatient care. Building out approved shell space to add 32 private medical/surgical beds at the Hospital offers a high-quality, cost-efficient option that will meet the current and future needs of the Hospital’s patient panel.

*Historical and Projected Utilization*

In FY2023, the Hospital’s medical/surgical occupancy rate was 97%, with an average of 188 of the Hospital’s 197 medical/surgical beds occupied. Moreover, the Hospital had more admitted patients than licensed beds for almost one-third of the year (31%). During the summer when the population of Cape Cod doubles in size, the Hospital’s occupancy rate was 101%. While sufficient capacity is needed to meet summer demand, winter spikes present similar demands for patient care. The industry standard for inpatient utilization is widely accepted to be 85% occupancy. At this level, hospitals have enough unoccupied beds to admit patients to a bed in a timely manner and maintain operational efficiencies across the hospital. Once occupancy exceeds 90%, its much more likely the hospital will not have enough beds or staff to place new patients. Therefore, the Hospital needs additional inpatient capacity to provide timely access to inpatient care for year-round residents and summer visitors alike.

As noted above, the Hospital’s high occupancy rate creates operational challenges that impact care delivery. In FY2023, the Hospital’s medical/surgical patients spent a total of 46,336 hours in the ED waiting for an inpatient bed after the decision to admit had been made. 1,818 medical/surgical patients boarded in the ED for more than 12 hours waiting for an inpatient bed to become available. It is well-documented that ED boarding negatively impacts health outcomes. Emergency care departments are staffed and designed to provide episodic care, as opposed to the type of care and setting necessary for inpatients.[[1]](#footnote-1) This results in poor patient experiences and added stress for staff who must care for a mix of patients. At the Hospital, ED boarding increases wait times for new ED patients because patients boarding must wait in an ED room until an inpatient bed become available, preventing patients from being moved from the waiting room to a treatment room. As a result, the presence of ED boarders negatively impacts all ED patients as a result of increased ED lengths of stays for all patients.[[2]](#footnote-2)

In order to be able to move patients out of the ED, the Hospital requires additional inpatient beds. The table below illustrates how the Proposed Change would reduce the Hospital’s occupancy rate to manageable levels while also allowing for minimal organic volume growth.

| **Table 1: Projected Utilization** | **Current** | **Year 1** | **Year 2** | **Year 3** | **Year 4** | **Year 5** |
| --- | --- | --- | --- | --- | --- | --- |
| **Discharges** | 16,960 | 16,960 | 17,033 | 17,107 | 17,181 | 17,255 |
| **Days** | 70,078 | 70,778 | 71,121 | 71,467 | 71,814 | 72,163 |
| **Average Length of Stay** | 4.1 | 4.2 | 4.2 | 4.2 | 4.2 | 4.2 |
| **Average Daily Census** | 192.00 | 193.9 | 194.9 | 195.8 | 196.8 | 197.7 |
| **Occupancy** | 97.46% | 84.68% | 85.09% | 85.50% | 85.92% | 86.33% |

*Expanded Access and Improved Health Outcomes*

In order to provide its Patient Panel with timely access to inpatient care, the Hospital is currently using an alternate care space to make 28 additional medical/surgical beds available when the Hospital exceeds its licensed bed capacity. With the waiver the Hospital has been able to avoid calling Code Help in FY2022 and FY2023. However, using beds under the waiver presents its own challenges that the Proposed Change seeks to address. First, the waiver will end and the Hospital needs a permanent solution. In addition, most of the alternative space beds are not in private rooms or are not walled off, and do not have access to a private bathroom. The use of these beds presents a greater risk for infection to patients because of the shared spaces during their inpatient stay. These beds are used only when the Hospital exceeds its licensed capacity and therefore are not permanently staffed. In order to staff the beds, the Hospital frequently must rely on traveler staff at a much higher cost than employed staff. The Proposed Change will add consistency and stability for bed availability, staffing, and patient care.

As with the Approved Project, the Proposed Change will further address care delivery constraints resulting from the Hospital’s aged infrastructure and the aging population on the Cape. The Proposed Change will add inpatient capacity within a brand-new building designed to provide high-quality, patient-centered care. The proposed medical/surgical unit is designed to meet and exceed the current FGI standards for inpatient care including required bed clearance, non-slip flooring, space for family visitation, including sleeping accommodations, handwashing sinks in addition to the toilet area sink, and in-room showers. Additionally, each room will conform to acoustic requirements to mitigate exterior noise, isolate sound within each room, and use materials that will provide sound absorption. These features have been shown to improve sleep, and in turn promote recovery and emotional well-being. Furthermore, patients will be able control their lighting, entertainment, and nurse call system from an easy to-use, centralized panel. Lastly, the new unit will have dedicated clinical workstations built outside of adjoining rooms to limit cross-contamination. These design considerations will enable staff to provide more efficient, patient-centered care.

In addition to designing the unit to promote enhanced care delivery, the Proposed Change is needed to address future demand for inpatient care on Cape Cod. Given a majority of the Hospital’s patients were aged 65 and over (60%) in FY2023 and comprised nearly 75% of all inpatient discharges, age is closely tied to utilization and serves as a valuable indicator of future need. As of 2010, the percentage of Cape Cod residents aged 45-69 years old was 39%, compared to 32% of Massachusetts residents, and 30% of U.S residents.[[3]](#footnote-3) Furthermore, the percentage of Cape Cod residents aged 70 years and older was 17%, compared to 10% of Massachusetts residents and only 9% of U.S. residents.[[4]](#footnote-4) This older age cohort is anticipated to increase in size by 2035, when 35% of the population is projected to be aged 65-years or older, compared to 24% in 2010.[[5]](#footnote-5) Accordingly, the Hospital’s Patient Panel will require access to inpatient services in facilities that can meet demand and facilitate the provision of high-quality care within the community.

For these reasons, the Proposed Change is necessary to ensure the Hospital’s existing and future patient population has access to high-quality inpatient care in the community. Given current utilization as well as the advanced age of the Applicant’s current Patient Panel coupled with population projections for Cape Cod, the Proposed Change will ensure continued access to inpatient care close to home for the Hospital’s Patient Panel. As a result of current demand for inpatient care, the Hospital is frequently over capacity and must rely on beds only available through an alternate care space waiver that will expire. The Proposed Change will provide much needed inpatient capacity to address current and future demand for inpatient care by the patient panel.

**Factor 6. Community Health Initiative**

Following the approval of Cape Cod Hospital’s original DoN, the Cape Cod Healthcare Foundation began hosting a series of meetings for the community as well as convening its Community Health Committee to review requirements and next steps for a Community Health Initiative (“CHI”). Meetings were also held with members of the Department of Public Health’s CHI team to discuss options and ideas for the CHI given the significant size of funding being made available. Following those conversations, Cape Cod Healthcare hosted two Open Community Forums to discuss the process and solicit ideas for proposals from community organizations that would provide significant and lasting impact around housing security as well as other social issues. To date, several organizations have expressed interest and the Hospital, through its Community Health Committee, will continue reviewing proposals that meet criteria for CHI funding.

With respect to the additional funding created through this amendment, the Hospital is proposing to add the funds to the original CHI, resulting in a combined total CHI of $7,585,762.25.

The breakdown of the CHI monies for the Proposed Change is detailed in the table below.

**Table 3. CHI Money Breakdown**

|  | **Total** | **Description** |
| --- | --- | --- |
| **MCE** | $14,666,613 |  |
| **CHI Monies** | $733,330.65 | (5% of Maximum Capital Expenditure) |
| **Administrative Fee** | $21,999.92 | (3% of the CHI Monies, retained by Applicant) |
| **Remaining Monies** | $711,330.73 | (CHI Monies minus the Administrative fee) |
| **Statewide Initiative** | $177,832.68 | (25% of remaining monies, paid to State-wide fund) |
| **Local Initiative** | $533,498.05 | (75% of remaining monies) |
| **Evaluation Monies** | $53,349.80 | (10% of Local Initiative Monies, retained by Applicant) |
| **CHI Monies for Local Disbursement** | $480,148.25 |  |

Cape Cod Hospital is requesting approval to use up to three percent (3%) of local CHI funding ($21,999.92) in administrative funding. These monies will support promotion of meetings, interpretation/translation, community engagement, stipends for community resident participation, additional staff time for these efforts.

Additionally, the Hospital is seeking to use 10% of local CHI funding ($53,349.80) for evaluation efforts. These monies will allow Cape Cod Hospital to engage experienced internal and/or external resources to manage evaluation activities of the CHI-funded projects.

1. Laam LA, Wary et al. “[Quantifying the impact of patient boarding on emergency department length of stay: All admitted patients](https://pubmed.ncbi.nlm.nih.gov/33718931/)

   [are negatively affected by boarding](https://pubmed.ncbi.nlm.nih.gov/33718931/).” Journal of the American College of Emergency Physicians (2021). Available at:

   https://pubmed.ncbi.nlm.nih.gov/33718931/ [↑](#footnote-ref-1)
2. Laam LA, Wary et al. “[Quantifying the impact of patient boarding on emergency department length of stay: All admitted patients](https://pubmed.ncbi.nlm.nih.gov/33718931/)

   [are negatively affected by boarding](https://pubmed.ncbi.nlm.nih.gov/33718931/).” Journal of the American College of Emergency Physicians (2021). Available at:

   https://pubmed.ncbi.nlm.nih.gov/33718931/ [↑](#footnote-ref-2)
3. UMASS DONAHUE INSTITUTE. Long-term Population Projections for Massachusetts Regions and Municipalities. March 2015. [↑](#footnote-ref-3)
4. *Id.*  [↑](#footnote-ref-4)
5. *Supra note 3.*  [↑](#footnote-ref-5)