

STAFF SUMMARY FOR DETERMINATION OF NEED
BY THE PUBLIC HEALTH COUNCIL
October 21, 2015

APPLICANT: South Shore Hospital, Inc.

PROGRAM ANALYST: Jere Page

LOCATION: 55 Fogg Road
Weymouth, MA 02190

REGION: HSA IV

DATE OF APPLICATION: May 20, 2015

PROJECT NUMBER: 4-3C42

PROJECT DESCRIPTION: New construction of a 42,287 gross square foot (“GSF”) two-story addition to the existing Messina Building to house a new 24-bed Critical Care Unit, as well as add shell space. The project also involves substantial renovation to convert 18,002 GSF on the top floor of the existing Pratt Building to accommodate 24 new private medical/surgical beds. Total GSF requested is 60,289 GSF, which will include 42,287 GSF of new construction, including 8,121 GSF of shell space, and 18,002 GSF of renovation.

ESTIMATED MAXIMUM CAPITAL EXPENDITURE:

Requested: \$46,336,000 (May 2015 dollars)
Recommended: \$46,336,000 (May 2015 dollars)

ESTIMATED FIRST YEAR INCREMENTAL OPERATING COST:

Requested: \$17,597,000 (May 2015 dollars)
Recommended: \$17,597,000 (May 2015 dollars)

LEGAL STATUS: A regular application for a substantial capital expenditure and substantial change in service pursuant to M.G.L. c.111, s.25C and the regulations adopted thereunder.

ENVIRONMENTAL STATUS: No environmental notification form or environmental impact report is required to be submitted for this project since it is exempt under 301 Code of Massachusetts Regulations 10.32 (3), promulgated by the Executive Office of Environmental Affairs pursuant to Massachusetts General Laws, Chapter 30, Section 61-62H. As a result of this exemption, the project has, therefore, been determined to cause no significant damage to the environment.

OTHER PENDING APPLICATIONS: None

COMMENTS BY THE CENTER FOR HEALTH INFORMATION AND ANALYSIS: None submitted

COMMENTS BY THE DIVISION OF MEDICAL ASSISTANCE: None submitted

TEN TAXPAYER GROUP(S): None formed

RECOMMENDATION: Approval with conditions

I. BACKGROUND AND PROJECT DESCRIPTION

South Shore Hospital (“South Shore,” “Hospital” or “Applicant”) has filed a Determination of Need (“DoN”) application to relocate the existing 24-bed Critical Care Unit and expand medical/surgical bed capacity by 24 new medical/surgical beds.

South Shore is a 378-bed acute care hospital located in Weymouth that serves patients residing predominately in southeastern Massachusetts. The Hospital’s primary service area (“PSA”) includes Weymouth, Braintree, Hingham, Rockland, Scituate, Marshfield, Norwell, Hull, Pembroke, Hanover, Abington, Cohasset, Holbrook, Whitman, Duxbury, and Hanson. The Hospital was founded in 1922, and has developed into a regional health care system that includes six ambulatory service satellites located in South Weymouth, Cohasset and Hingham.

Specifically, the initial phase of the project involves new construction of a 42,287 GSF two-story addition to the existing three-story Messina Building on the Hospital’s campus to house 24 new critical care beds: 16 intensive care unit (“ICU”) beds and 8 coronary care unit (“CCU”) beds, as well as added shell space. The existing 24-bed ICU unit on the level of the Pratt Building will be relocated to the new Messina Building addition. The Applicant is currently licensed for 24 ICU beds.- Eight of these ICU beds have been out of service and are in the process of being delicensed. The Hospital is not seeking additional ICU beds.

The second project phase involves substantial renovation to convert 18,002 GSF of the top floor of the existing Pratt Building to contemporary medical surgical space by adding 24 new private medical/surgical beds. Included within the 24 new medical/ surgical bed count are a yet to be determined number of intermediate care beds. The entire project is expected to be completed by December 2018.

The Hospital is a Level II trauma center and its acute care beds are currently allocated as follows:

	<u>Existing Bed Capacity</u>	<u>New Capacity</u>
Adult Medical/Surgical	265	288
Intensive Care Unit	24	16
Coronary Care Unit	8	8
NICU	10	10
Obstetrics	53	53
Pediatrics	<u>18</u>	<u>18</u>
Total	378	393

II. STAFF ANALYSIS

A. Health Planning Process

Prior to filing this application, South Shore consulted with the Department of Public Health’s (“DPH”) DoN Program, the Division of Prevention and Wellness, and the Office of Community Health Planning, as well as physicians, nurses, and other ICU clinical staff at Baystate Medical Center, Mercy Hospital, Massachusetts General Hospital, St. Elizabeth’s Hospital, and North Shore Medical Center. Also, letters of support for the project were received from State Representative James Murphy, the South Shore Chamber of Commerce, and the Weymouth Chamber of Commerce.

South Shore reports that the proposed project has involved an extensive strategic planning process over several years, which included detailed internal assessments as well as substantial feedback from a broad array of South Shore physicians and other clinical staff, community members, and payers.

Based on the above information, Staff finds that South Shore has engaged in a satisfactory health planning process.

B. Health Care Requirements

The proposed project will encompass new construction and renovation to relocate 24 of the existing 32 ICU and CCU beds, to include 16 ICU beds and 8 CCU beds, and increase inpatient medical/surgical capacity by 24 new beds.

South Shore submitted an analysis it conducted to determine need for these services. The Hospital does not propose to increase capacity of any services regulated by DoN. As a result, Staff did not undertake a thorough analysis of need in the context of its review of the proposed project's compliance with the Health Care Requirements Factor of the DoN regulations. Consistent with its practice in previous acute hospital construction projects, Staff limited its analysis to an evaluation of the reasonableness of South Shore's justification for expansion of the capacity of particular services. In the case of this project, Staff analyzed only the proposed expansion of medical/surgical capacity and replacement of the existing ICU unit.

1. South Shore Primary Service Area

To justify its proposed expansion, South Shore has presented utilization statistics documenting steady growth in the demand for its services as well as population projections, as indicated below in Tables 1-3.

South Shore defines its PSA as encompassing much of southeastern Massachusetts. This is reflected by Fiscal Year ("FY") 2013 patient origin statistics indicating that the area representing 82.4% of South Shore's annual discharges is made up of 16 cities and towns in southeastern Massachusetts, as shown below:

Table 1
South Shore Primary Service Area
FY 2013 Annual Discharges*

<u>Town</u>	<u>Total Number of FY13 Adult Medical/Surgical Discharges</u>	<u>Percentage of Adult Medical/Surgical Discharges From Each Town</u>
<u>Weymouth</u>	3,401	20.72%
<u>Braintree</u>	1,630	9.93%
<u>Hingham</u>	1,206	7.35%
<u>Rockland</u>	1,046	6.37%
<u>Marshfield</u>	1,033	6.29%
<u>Scituate</u>	898	5.47%
<u>Hull</u>	610	3.72%
<u>Pembroke</u>	604	3.68%
<u>Abington</u>	569	3.47%
<u>Hanover</u>	544	3.31%
<u>Norwell</u>	454	2.77%
<u>Cohasset</u>	386	2.35%
<u>Holbrook</u>	378	2.30%
<u>Whitman</u>	298	1.82%
<u>Duxbury</u>	246	1.50%
<u>Hanson</u>	233	1.42%

<u>FY13 Service Area Total</u>	<u>13,536</u>	<u>82.47%</u>
<u>Secondary Service Area*</u>	<u>1,922</u>	<u>11.7%</u>
<u>Extended & Out of Market Areas**</u>	<u>956</u>	<u>5.8%</u>
<u>Total FY13 Discharges</u>	<u>16,414</u>	<u>100% (rounded)</u>

*"Secondary Service Area" is defined as the communities in which Hospital discharges represent a minimum of 5% of the total annual discharges attributable to that community from all inpatient facilities.

**"Extended and Out of Market Areas" is defined as those towns/municipalities that the Hospital administration deems as areas of potential growth.

Source: Massachusetts Health Data Consortium; Medical/Surgical; Age 15+

2. PSA Population Projections

South Shore PSA population projections provided by the University of Massachusetts Donohue Institute for 2015 – 2020 are shown in Table 2 below. The data indicate substantial increases in the age 60+ population through the period, particularly in the age 60-64 and age 70-74 cohorts. Overall, the South Shore PSA population through all age groups is predicted to increase by 5% by 2020.

Table 2
South Shore PSA Population Projections 2015-2020

<u>Age Group</u>	<u>Census 2010</u>	<u>Projection 2015</u>	<u>Projection 2020</u>	<u>Growth 2015-2020</u>	<u>Compound Annual Growth Rate (CAGR) 2015-2020</u>
<u>15-54</u>	<u>199,344</u>	<u>204,376</u>	<u>208,179</u>	<u>2%</u>	<u>0.37%</u>
<u>55-59</u>	<u>21,639</u>	<u>25,153</u>	<u>25,845</u>	<u>3%</u>	<u>0.54%</u>
<u>60-64</u>	<u>18,597</u>	<u>20,187</u>	<u>23,090</u>	<u>14%</u>	<u>2.72%</u>
<u>65-69</u>	<u>13,832</u>	<u>17,435</u>	<u>18,760</u>	<u>8%</u>	<u>1.48%</u>
<u>70-74</u>	<u>9,480</u>	<u>12,175</u>	<u>15,228</u>	<u>25%</u>	<u>4.58%</u>
<u>75+</u>	<u>21,146</u>	<u>23,294</u>	<u>26,726</u>	<u>15%</u>	<u>3.00%</u>
<u>Total</u>	<u>284,038</u>	<u>302,620</u>	<u>317,828</u>	<u>5%</u>	<u>0.99%</u>

Source: University of Massachusetts Donohue Institute

3. PSA Medical/Surgical Market Share

South Shore reports that its adult medical/surgical market share in its PSA has held steady over the past five years. Although true inpatient market data is unavailable for periods more current than FY 2013, the projected inpatient volume increases at the Hospital in FY 2014 and FY 2015 YTD indicate likely market share gains.

Table 3
South Shore PSA Medical/Surgical Market Share
FY 2011 – FY 2015

	<u>FY11</u>	<u>FY12</u>	<u>FY13</u>	<u>FY14 Estimated</u>	<u>FY15 Estimated</u>
South Shore Adult Medical/Surgical Inpatient Market Share in its PSA	50.1%	50%	51%	53%	54%

Source: FY11-FY13 from Massachusetts Health Data Consortium

4. Emergency Department

South Shore reports that medical-surgical volume increase is widespread across all of the Hospital’s PSA, and its Emergency Department (“ED”) volumes have continued upward. There has been a marked increase in the number of individuals remaining in the ED and the Post-Anesthesia Care Unit (“PACU”) for extended periods of time.

Specific to the ED, according to South Shore, the median Average Length of Stay (“ALOS”) of a patient in the ED awaiting placement for a bed increased by 10% in March 2015 compared to the previous 12 months. Currently, patients wait 9.5 hours from arrival to admit and 3.5 hours for a decision to admit to bed placement. Additionally, the median ALOS for patients in the ED from arrival to departure also increased 10% in March 2015 compared to the last 12 months, which is now 3.57 hours.

This trend has been impactful at South Shore as patients awaiting placement (i.e. in a medical-surgical bed) in these areas (whether they be inpatients or in observation status) consume staff and space resources.

5. Intensive Care Unit

The project involves construction of a new addition to the existing three-story Messina Building to house a new 24-bed ICU to be transferred from the level of the Pratt Building. All of the new ICU beds will be private beds.

South Shore reports that overall occupancy of its 32 critical care beds, which includes 16 ICU beds, 8 ICU beds that have been out of service, and 8 CCU beds, has remained steady over the past several years. Average daily census for these beds, both ICU and CCU, in FY 2014 was 21 of 24 in-service beds.

South Shore believes some of the current ICU patients could be more appropriately cared for in an “intermediate” or “palliative care” setting. The Applicant is establishing protocols to more aggressively transfer patients who do not need intensive care out of the ICU. Because of this, the Applicant is not seeking additional ICU beds.

South Shore notes that the proposed relocation of 24 of its 32 ICU- and CCU-licensed beds would replace beds originally constructed in 1978, long before the adoption of patient and family centered values and the technology supported care that are the hallmarks of contemporary intensive care delivery. The Hospital reports that the existing ICU and CCU located on Level 6 has a number of space limitations and operating constraints that cannot be overcome, as described below.

- There is inadequate patient care space in the current ICU, as none of existing rooms meet the current space guidelines of 300 square feet or the 5’0” minimum clearance at the foot of bed requirement as outlined in DPH regulation. As a result, the care space becomes overcrowded, and when the family

members of the patient are invited to participate or to even just sit by the bedside, the space then becomes extremely overcrowded.

- There are significant infection control concerns as only two ICU rooms have negative pressure capability necessary to adhere to infection control guidelines.
- The existing family waiting space is approximately 200 square feet and does not allow the frequently needed privacy or separation for families.
- There is inadequate storage space and equipment resulting in the need for specialized beds and ventilators to be stored in the hallway.
- The current configuration of three, eight bed units does not provide an efficient platform for staffing efficiency, especially in light of the recently mandated ICU nurse staffing ratios.

South Shore reports that the new Critical Care Unit will have 24 new critical care beds, both ICU and CCU, configured into private rooms to accommodate the necessary family, staff and equipment storage space. The design of the planned ICU space would support regionalized staffing and enhance the team-based nature of this ICU work. Additionally, each room would have the infrastructure designed into it to optimize infection control practices. Given the rising need for bed-side hemodialysis, each room would be equipped with a dedicated reverse osmosis hookup, and it is expected clinical staff would also acquire the competency of Continuous Veno-Veno Hemodialysis (“CVVHD”)

South Shore further reports that for the Hospital to continue to meet its mission of providing excellent care locally, it is important to have contemporary ICU space to attract and retain the physician, nursing and ancillary team members that comprise the contemporary ICU team.

6. Demand for Medical/Surgical Beds

The second aspect of the South Shore project is the current and growing need for additional adult medical/surgical inpatient bed capacity. As noted previously, South Shore has recently experienced substantial growth in adult inpatient medical/surgical volume, creating capacity constraints. Additionally, the population in South Shore's service area is projected to both grow larger and older over the next five years which has created the need for more medical surgical inpatient beds.

South Shore reports that over the last few fiscal years, inpatient adult medical/surgical discharge volume has increased at South Shore. The current adult inpatient medical/surgical discharge volume was 3 percent higher in FY 2014 than in FY 2013, and when comparing FY 2014 to the first six months of FY 2015 (October 2014 through March 2015), it appears that the growth will continue.

Table 4
Adult Inpatient Medical-Surgical Discharge Volume at South Shore Hospital
FY 2012 – FY 2015

	<u>FY12</u>	<u>FY13</u>	<u>FY14</u>	<u>FY 15 Annualized</u>
Total Number of Adult Discharges	15,502	15,574	15,974	19,156
<i>Increase over prior year</i>		+72	+400	+3,182
<i>% Increase over prior year</i>		.0%	3%	19.9%

Source: South Shore Hospital

In addition, actual medical/surgical inpatient days, average daily census (“ADC”), and average occupancy have increased significantly from FY 2012 to FY 2014, while the projected annualized increase for FY 2015 is substantial for all three components.

Table 5
Adult Inpatient Medical Surgical Inpatient Days, Average Daily Census (ADC),
Average Occupancy FY 2012-FY 2015

	FY2012	FY2013	FY2014	FY2015 (Annualized)
Total Inpatient Days (Excluding Observation)	69,241	72,170	76,044	87,257
Total Routine Med/Surg Unit ADC* (Including Observation)	190.2	202	212.4	239.1
Average Occupancy (based on licensed beds)	71.8%	76.2%	80.2%	90.2%

*“Routine” adult medical/surgical inpatient beds exclude Pediatric, Obstetric, Newborn, and Critical Care Beds.

Source: South Shore Hospital

7. Conclusion on Need

South Shore has documented a trend of significant growth in the demand for its medical/surgical services, as well the operating constraints and space deficiencies associated with its current ICU services. Consistent with Factor 2 of the DoN regulations, Staff finds that the project, as proposed, will provide sufficient capacity to adequately address South Shore’s identified rising demand as well as the health care requirements of its service area without unnecessary duplication.

C. Operational Objectives

South Shore reports that its Patient Care Assessment Committee (“PCAC”) oversees a strategic system process to continuously improve quality, safety, and service to patients and families seeking care at the Hospital. This is accomplished within the framework of the Performance Improvement Plan (“PI”) that determines and aligns organizational and programmatic quality and safety priorities. As a result, the Hospital’s Quality Council is able to readably identify deficiencies in its patient care and to implement changes as needed to assure quality care.

South Shore has also stated that it will continue to offer services to patients who are poor, medically indigent, and/or Medicaid eligible and to care for all patients in a non-discriminatory manner.

Staff notes that DPH’s Office of Health Equity (“OHE”) recently conducted a review of the policies and operations of the existing language access services at South Shore and its satellite locations. OHE believes that it is critical that culturally appropriate language access services are available for new and expanded clinical services. Therefore, in order to ensure an appropriate level of service for limited English proficient patients in need of treatment at the Hospital, OHE recommended a number of enhancements to existing language access services which are set forth as a condition of approval in Attachment 1.

Based on the above analysis, Staff finds that the proposed project, with adherence to a certain condition, meets the operational objectives requirements of the DoN regulation.

D. Standards Compliance

The total recommended GSF for this project is 60,289 GSF, which will include 42,287 GSF of new construction, including 8,121 GSF of shell space, and 18,002 GSF of renovation.

The proposed project involves new construction of a 42,287 GSF two-story addition to the existing three-story Messina Building on the Hospital's campus to house a new 24-bed ICU unit configured into private rooms, as well as add 8,121 GSF of shell space. The project also involves substantial renovation to convert 18,002 GSF of the top floor of the existing Pratt Building to contemporary medical surgical space by adding 24 new, private medical/surgical beds. Included within the 24 new medical/ surgical bed count are a yet to be determined number of intermediate care beds.

The proposed project includes new construction to add two new levels on top of the three-story Messina Building, and renovation of the level of the six-story Pratt Building as follows:

Messina Building

Level 4 – shell space (8,121 GSF) and support/mechanical services – 22,736 GSF new constructions

Level 5 – 24 Relocated ICU and CCU Beds – 22,736 GSF new constructions

South Shore reports that future utilization of the proposed 8,121 GSF shell space on Level 4 is currently undecided.

The new 24-bed Critical Care Unit on Level 5 will include:

- Direct access from the Emergency Department and Operating Rooms
- Larger patient rooms with windows
- Larger family waiting areas and consult rooms
- Storage space for expanding equipment needs

Pratt Building

Level 6 – 24 New Medical/Surgical Beds – 17,142 GSF substantial renovations

Given the equipment, information technology and ADA requirements associated with the new and renovated space, as well as the fact that the private patient room has replaced the semi-private room as the standard for new hospital facilities; Staff finds the proposed functional space to be reasonable.

South Shore has confirmed that the new construction and renovated space will meet all regulatory requirements for licensure including staffing requirements and any plan review requirements of the DPH's Division of Health Care Facility Licensure and Certification.

Based on the above analysis, Staff finds that the proposed project meets the standards compliance factor of the DoN regulations.

E. Reasonableness of Expenditures and Cost1. Maximum Capital Expenditure

The requested and recommended maximum capital expenditure (“MCE”) is \$46,336,000 (May 2015 dollars) itemized as follows:

	<u>New Construction</u>	<u>Renovation</u>
Construction Costs:		
Construction Contract	\$28,768,000	\$8,037,000
Architectural and Engineering Costs	3,512,000	988,000
Pre-filing Planning and Development	130,000	
Other: Permits, Wastewater Mitigation	443,000	
Other*	1,017,000	
Net Interest Expense During Construction	<u>2,045,000</u>	<u>611,000</u>
Total Construction Costs	\$35,915,000	\$9,636,000
Financing Costs		
Costs of Securing Financing	<u>600,000</u>	<u>185,000</u>
Total Financing Costs	\$ <u>600,000</u>	\$ <u>185,000</u>
Estimated Capital Expenditure	\$ 36,515,000	\$9,821,000
Total Estimated Capital Expenditure		\$46,336,000

*South Shore reports that the requested other includes: moving, storage, security during construction, cabling labor, an independent audit, and project logistics. Staff finds these cost reasonable based on comparison with similar, previously approved DoN projects and necessary to ensure an effective continuity during the construction process.

In determining the reasonableness of the requested capital expenditure, Staff reviewed the requested cost/GSF for new construction. Based on the recommended 42,287 GSF for new construction, which includes 8,121 GSF of shell space, the requested cost/GSF is \$763.35/GSF (May 2015 dollars) as calculated below.

	<u>New Construction</u>
Construction Contract	\$28,768,000
Architectural and Engineering Costs	<u>3,512,000</u>
Total	\$32,280,000
Total GSF Requested	42,287
Cost/GSF	\$763.35

Staff has compared the requested new construction cost of \$763.35/GSF to the most recent Marshall & Swift Valuation Service (“Marshall”) class A “Excellent” base cost/GSF under its General Hospital designation. Staff found the requested cost/GSF to be \$118.29 more than the comparable Marshall cost estimate of \$645.06/GSF for the Weymouth (Boston) area.

However, a closer analysis comparing the proposed new construction costs to similar, previously approved projects reveals that the higher than average new construction cost appears to be associated with the project scope, which is the construction of new ICU space. In consultation with Marshall, Staff determined that the project will have a substantially higher than average concentration of high intensity clinical and diagnostic space which requires more construction, higher than average mechanical, electrical, HVAC, and plumbing as well as higher quality finishes than other functional areas. Table 6 below compares the proposed project to four previously approved DoN projects with respect to unit construction costs and the proportion of project scope devoted to high cost functional space:

Table 6: Comparison of Projects

	<u>Project #</u>	<u>Filing date</u>	<u>Total GSF</u>	<u>% of Project Devoted to High Cost Space</u>	<u>Cost/GSF</u>
Mass. General	4-3B32	Nov-06	413,165	89%	\$875
South Shore	4-3C42	May-15	42,287	78%	\$763
Children's	4-3B85	Feb-10	117,345	79%	\$612
Lowell General	3-3B62	Jul-08	120,179	38%	\$470
Baystate	1-3B36	Mar-07	277,300	50%	\$360

Staff reviewed the requested cost/GSF for substantial renovation. Based on the recommended 18,002 GSF for renovation, the requested cost/GSF is \$501.33/GSF (May 2015 dollars) as calculated below

	<u>Renovation</u>
Construction Contract	\$8,037,000
Architectural and Engineering Costs	<u>988,000</u>
Total	\$9,025,000
Total GSF Requested	18,002
Cost/GSF	\$501.33

The calculated \$501.33/GSF is above the DoN standard for renovation cost/GSF, which is 60% or \$387.04 of the above Marshall allowable cost/GSF for new construction \$645.06/GSF. However, similar to the costs of the new ICU and CCU unit construction above, the space to accommodate the new 24-bed medical/surgical unit will need extensive renovation as it will require higher than average mechanical, electrical, HVAC, and plumbing.

Staff finds the requested new construction and substantial renovation costs of the project to be reasonable based on the higher than average new construction costs associated with the new ICU and CCU space, as well as the extensive renovation needed to accommodate the expansion of new 24 medical/surgical beds.

2. Reasonableness of Incremental Operating Costs

The requested and recommended incremental operating costs are \$17,442,000 (May 2015 dollars) for the project's first full year (FY 2018).

Salaries, Wages, Fringe Benefits	\$10,112,000
Supplies and Other Expenses	3,984,000
Depreciation	1,827,000
Interest	1,275,000
Pension	<u>243,000</u>
Total Incremental Operating Costs	\$17,442,000

Staff notes that the above operating costs represent an increase in staffing of 94.0 FTEs, which includes 24.0 FTE RN's and 10.0 FTE Nursing Assistants, as well as other associated medical/surgical and other clinical and administrative staff.

Staff finds the recommended incremental operating costs to be reasonable based on the expected equity funding of the project as well as the significant increase in staffing needed to accommodate the expanded medical/surgical beds. All operating costs are subject to review and approval by the Center for Health Information and Analysis and by third party payers according to their policies and procedures.

F. Financial Feasibility and Capability

Staff notes the proposed financing of the project includes Major Movable Equipment (“MME”) costs of \$3,540,000 that were not included in the requested and recommended MCE, but are part of the overall project. In accordance with DoN regulations, Staff notes that an acute care hospital is not required to include the cost of MME (other than those items meeting the definition of new technology or innovative services) in the calculation of its proposed MCE.

Therefore, South Shore proposes to fund the total project cost of \$49,876,000, including the recommended MCE of \$46,336,000 (May 2015 dollars) and the project’s MME of \$3,540,000, with 20% equity (\$9,818,000) currently available from the Hospital’s cash and cash equivalents account. The equity contribution is consistent with the DoN minimum of 20%.

The remaining amount to be borrowed will be \$40,058,000, which will be financed through tax-exempt bonds issued through the Massachusetts Health and Educational Facilities Authority (“MHEFA”). The MHEFA bonds will have a 30-year term and an interest rate of 3.575%.

Staff’s review of the most recent (FY 2014) audited, consolidated financial statements of South Shore Hospital, Inc. determined that the Hospital has sufficient cash and cash equivalents available to provide the proposed \$9,818,000 equity.

In addition, the Hospital’s FY 2014 financial statements show a current ratio of 6.10, which exceeds the DoN minimum standard of 1.50. In addition, the Hospital’s projected debt service coverage ratio is 2.52 in FY 2018, the first full year of operation. Staff also notes that the financial schedules submitted in the application reflect the financial position of only the Hospital, and show that it sustained a gain from operations of \$16,611,000 in FY 2014. Assuming project approval, the Hospital projects a gain from operations of \$10,958,000 in FY 2018. Additionally, the financial schedules show that in FY 2014, South Shore’s reported actual excess of revenues over expenses of \$16,370,000, with projected revenues over expenses of \$13,321,000 in FY 2018.

Based on the above analysis, Staff finds the project to be financially feasible and within the financial capability of South Shore.

G. Relative Merit

South Shore reports that it considered one alternative prior to its decision to propose a new construction and renovation to relocate the 24 of the Hospital’s 32 ICU- and CCU-licensed beds and add 24 new medical/surgical beds.

The alternative involved renovation of the existing sixth-floor Pratt ICU space. However, it was determined that a number of significant limitations with this space could not be adequately addressed. For example, the space was originally constructed in 1978, which would leave an aging infrastructure even if renovation was selected. In addition, the space is the furthest unit from the ED and would continue to inhibit the efficient transfer of patients from the ED to the ICU. The space also has insufficient family waiting areas, insufficient storage, cramped patient rooms, and hallways that do not adequately accommodate state of the art medical care.

Based upon the above analysis, Staff finds that the project meets the relative merit factor.

H. Community Health Initiatives

South Shore has agreed to provide a total of \$2,316,800, or \$463,360 annually over five years, to fund the community health service initiatives described in Attachment 2. Staff will recommend the funding of these initiatives as a condition of approval.

Based on the above information, Staff finds that South Shore meets the community initiatives requirements of the DoN regulations.

I. Environmental Impact

Staff notes that South Shore has submitted the LEED 2009 for Healthcare: New Construction and Major Renovations project checklist (“Checklist”) to demonstrate its commitment to green building standards for the proposed project. The Checklist (Attachment 3) shows that the proposed new addition will achieve 55 out of a possible 110 credit points, meeting the minimum 50% compliance standard of the Department’s DoN Guidelines for Environmental and Human Health Impact (“Environmental Guidelines”). South Shore reports that it will continue to explore the possibility of achieving an additional 16 credit points through the design and construction process and leverage the intended environmentally sound design and construction planning.

Based on the above information, Staff finds that South Shore meets the environmental requirements of the DoN regulations.

IV. STAFF FINDINGS

1. South Shore is proposing to undertake new construction of a 42,287 GSF two-story addition to the existing three-story Messina Building on the Hospital’s campus to house a new 24-bed Critical Care Unit, as well as add 8,121 GSF of shell space. The project also involves substantial renovation to convert 18,002 GSF of the top floor of the existing Pratt Building to contemporary medical surgical space by adding 24 new private medical/surgical beds.
2. The health planning process for the project was satisfactory.
3. The proposed new construction and renovation is supported by current and projected service utilization, as discussed under the Health Care Requirements factor of the Staff Summary.
4. The project, with adherence to certain conditions, meets the operational objectives of the DoN regulations.
5. The project, with adherence to a certain condition, meets the standards compliance factor of the DoN regulations.
6. The recommended maximum capital expenditure of \$46,336,000 (May 2015 dollars) is reasonable based on the higher than average new construction costs associated with the new ICU space, as well as the extensive renovation needed to accommodate the expansion of 24 medical beds.
7. The recommended incremental operating costs of \$17,442,000 (May 2015 dollars) are reasonable based on the expected equity funding of the project as well as the significant increase in staffing needed to accommodate the expanded medical/surgical beds.
8. The project is financially feasible and within the financial capability of the Applicant.

9. The project satisfies the requirements for relative merit.
10. The proposed community health service initiatives, with adherence to a certain condition, are consistent with the DoN regulation.
11. South Shore meets the Determination of Need Guidelines for Environmental and Human Health Impact (“Environmental Guidelines”).

IV. STAFF RECOMMENDATION

Based on the above analysis and findings, Staff recommends approval with conditions of Project Number 4-3C42 filed by South Shore Hospital to undertake new construction of a 42,287 GSF two-story addition to the existing three-story Messina Building on the Hospital’s campus to house 24 new ICU and CCU beds configured into private rooms, as well as added shell space. The project also involves substantial renovation to convert 18,002 GSF of the top floor of the existing six-story Pratt Building to contemporary medical surgical space by adding 24 new private medical/surgical beds.

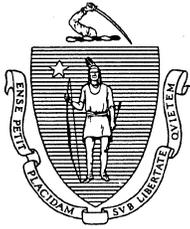
Failure of the applicant to comply with these conditions may result in Departmental sanctions including possible fines and/or revocation of the DoN.

1. The Applicant shall accept the MCE of \$46,336,000 (May 2015 dollars) as the final cost figure except for those increases allowed pursuant to 105 CMR 100.751 and 100.752.
2. The total approved GSF for this project shall be 60,289 GSF, which will include 42,287 GSF of new construction, including 8,121 GSF of shell space, and 18,002 GSF of renovation.
3. The Applicant shall provide culturally appropriate language access services as described in the document prepared by OHE, as amended from time to time by agreement of the Applicant and OHE, which is attached and is incorporated herein by reference (Attachment 1).
4. The Applicant shall contribute a total of \$2,316,800 (May 2015 dollars), or \$463,360 per year for a period of five years, to fund community health services initiatives as described in the document prepared by the Office of Community Health Planning (“OCHP”), as amended from time to time by agreement of the Applicant and OCHP, which is attached as Attachment 2 and incorporated herein by reference.

The Applicant has agreed to these conditions.

List of Attachments

1. Language Access
2. Community Initiatives
3. Leeds Checklist



The Commonwealth of Massachusetts
Executive Office of Health and Human Services
Department of Public Health
250 Washington Street, Boston, MA 02108-4619

Attachment 1

CHARLES D. BAKER
Governor

KARYN E. POLITO
Lieutenant Governor

MARYLOU SUDDERS
Secretary

MONICA BHAREL, MD, MPH
Commissioner

Tel: 617-624-6000
www.mass.gov/dph

September 28, 2015

Richard H. Aubut
President/Chief Executive Officer
South Shore Health and Educational Corporation/South Shore Hospital
55 Fogg Road
South Weymouth, MA 02190

Dear Mr. Aubut:

Pursuant to South Shore Hospital DoN's application for new construction of a 42,287 gross square foot ("GSF") two-story addition to the existing Messina Building to house a new 24-bed intensive care unit ("ICU") and substantial renovation to convert 18,002 GSF on the top floor of the existing Pratt Building to accommodate 24 new medical/surgical beds, the Office of Health Equity has determined that a continuity of the recently imposed conditions with addendum is warranted:

- South Shore Hospital shall maintain its capacity to provide quality and timely interpreter services and continue to satisfactorily implement all previously imposed conditions (March 21, 2013).

Supplemental Conditions:

South Shore Hospital shall:

- Expand its implementation plan of the CLAS standards to include all of its clinics and/or entities operating under its license. A proposed plan is to be developed and include specific goals and objectives, action steps, targeted staff/departments, evaluation, and outcomes;
- Identify and report on the different mechanisms and/or projects the hospital is currently implementing, and how it will continue to use the data collected on race, ethnicity, and language to improve patient care and achieve health equity;
- Provide ongoing training for all staff, new hires, and volunteers on the appropriate use of Interpreter Service and emerging issues; and,
- Continue to provide oversight and support to all of its clinics and/or entities operating under its license.

An implementation plan that addresses the aforementioned conditions and includes anticipated outcomes, evaluation, and **periodic submission of progress reports**, is to be submitted within 30 days of DoN's approval to:

Preferred:

samuel.louis@state.ma.us

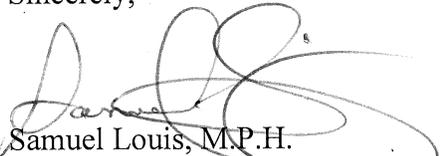
Or

Samuel Louis, M.P.H.
Massachusetts Department of Public Health
Office of Health Equity
250 Washington Street, 5th Floor
Boston, MA 02108

The overall plan shall include anticipated goals, action steps, anticipated outcomes, evaluation, and periodic submission of progress reports.

If you wish to discuss any of the conditions, or other areas covered at the visit, please contact me at (617) 624-5905 or at samuel.louis@state.ma.us.

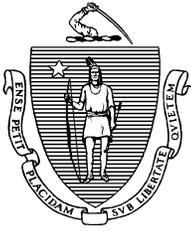
Sincerely,



Samuel Louis, M.P.H.
Health Care Interpreter Services Coordinator

Enclosure

Cc: Lisa Rabideau, MHA, Manager, Patient Relations & Service Excellence
Michele Driscoll, Division Coordinator
Jere Page, Analyst, Determination of Need Program
Georgia Simpson May, Director, Office of Health Equity



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250 Washington Street, Boston, MA 02108-4619

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Secretary

MONICA BHAREL, MD, MPH
Commissioner

Tel: 617-624-6000
www.mass.gov/dph

To: Commissioner Bharel and Members of the Public Health Council

Attachment 2

From: Ben Wood, Bureau of Community Health and Prevention

Date: 10/05/2015

Re: Community Health Initiative (CHI) for Factor 9; South Shore Hospital; Project #4-3C42;
Relocate existing 24-bed ICU unit and expand medical/surgical bed capacity by 24 new medical/surgical
beds; MCE: \$46,336,000; CHI: \$2,316,800

The Applicant, South Shore Hospital, is committed to contributing an amount reasonably related to this Project for programs that provide primary care and preventative health services to underserved populations in its service area. As such, the Applicant will contribute five percent (5%) of the MCE upon project implementation for the Factor 9 requirements. This project is expected to be implemented in 2017.

Consistent with the policies and procedures set forth in the Department of Public Health Bulletin ("Bulletin") of February 11, 2009 and amended August 2014, The Applicant will work with representatives of the Department of Public Health's Bureau of Community Health and Prevention (BCHAP), Office of Community Health Planning and Engagement to identify community planning partners for the development of a specific funding plan for the Initiative(s) which will include at its core a new collaboration of CHNAs 20, 22 and 23 and other planning partners as identified by DPH to ensure that the funds are directed to community health initiatives that will improve health for vulnerable populations, reduce health disparities, and create policy and system change that positively impact the social determinants of health. Specifically, \$2,316,800 will be distributed over five (5) years at \$463,360 per year. The applicant, however, has agreed that this funding cycle may be modified to best support strategies that result from planning. Funding will begin within forty five (45) days of the project implementation however the applicant has agreed to consider an earlier timeframe that may be a result of the planning process.

Planning partners agree to the following:

1. CHNAs 20, 22 and 23, the applicant, and new and other to-be-determined planning partners will work together to develop community health strategies using a joint community health assessment/community health improvement planning process as a foundation. This could mean conducting an assessment of existing assessments to identify overlaps and identifying the best way to work with and leverage South Shore Hospital's community health assessment process due to be completed in 2016. This planning could also mean an assessment of geography of the region to determine what works best for collaborative planning and funding processes.
2. Funds will be directed to implementing community health improvement plan priorities through high impact, collaborative initiatives that can be replicated, expanded, and/or leveraged. High consideration will be given to the social determinants of health and be aimed at creating policy, system and/or environmental change.
3. There will be an assessment of who else needs to be part of the planning process moving forward with a focus on identifying organizations that understand policy, systems and environmental level change, Boards of Health and other's identified by DPH, the hospital and the CHNAs.
4. Planning partners are open to using funds to provide the infrastructure for these activities (e.g. staffing) in a to-be-determined manner.
5. The Plymouth and Norfolk Counties Health Compass (HCI database) is the foundation for how the region can work together and thus should be a starting point for understanding how to develop the shared assessment and health improvement planning process.
6. South Shore hospital will engage collaboratively with the community in these efforts and strive to develop its own strategic plan accordingly.
7. There is a recognition that working together in this way changes the current operating process for the CHNAs and that the planning process should therefore have some flexibility and responsiveness built into it to value current work and priorities.
8. The planning partners are open to alternative funding plans that modify the standard 5 year, equal yearly installment pattern of most DoNs.
9. Existing DoN funds could be re-allocated, with all in agreement, to support planning (e.g. hiring a joint consultant). Likewise a small portion of funds from the new DoN could potentially be released earlier than normal to support planning.
10. Any future funded entity will develop a set of accountability goals and metrics in partnership with the funder and which will be approved by and reported on annually to the funders and to DPH. Accordingly, evaluation and measurement of future efforts will be funded at a level necessary to adequately provide information on the impact of the funds.

The Applicant and other designated planning partners will meet on an annual basis to review the outcomes of funded initiatives and confirm subsequent year investments of the community health initiative budget. Any modifications to the Factor 9 budget must be approved in advance by BCHAP.

Consistent with 105 CMR 100.551(J), the applicant is required to file written reports to the department, annually through the duration of each approved project, including a) reporting period; b) funds expended; c) recipient(s) of funds; d) purpose(s) of expenditures; e) project outcomes to date; f) proposed changes, if any, to the approved CHI; g) balance of funds to be expended over the duration of the project; and h) name of applicant's representative, including complete contact information. Reports may but are not required to include copies of printed

materials, media coverage, DVDs, etc. Reports should be submitted electronically to Ben Wood, Bureau of Community Health and Prevention @ ben.wood@state.ma.us

LEED 2009 for Healthcare: New Construction and Major Renovations

Project Checklist

SSH CCR#6
PROGRESS 12/04/2014

9 0 9 Sustainable Sites		Possible Points: 18		Possible Points: 16	
Y	P	N	Y	N	P
Y	Prereq 1				Storage and Collection of Recyclables
Y	Prereq 2				PBT Source Reduction—Mercury
1	Credit 1				Building Reuse—Maintain Existing Walls, Floors, and Roof
1	Credit 2				Building Reuse—Maintain Interior Non-Structural Elements
1	Credit 3				Construction Waste Management
3	Credit 4.1				Sustainably Sourced Materials and Products
1	Credit 4.2				PBT Source Reduction—Mercury in Lamps
1	Credit 4.3				Furniture and Medical Furnishings
1	Credit 4.4				Resource Use—Design for Flexibility
1	Credit 5.1				
1	Credit 5.2				
1	Credit 6.1				
1	Credit 6.2				
1	Credit 7.1				
1	Credit 7.2				
1	Credit 8				
1	Credit 9.1				
1	Credit 9.2				
1	0	8	12	1	5
		Water Efficiency		Indoor Environmental Quality	
		Possible Points: 9		Possible Points: 18	
Y	Prereq 1		Y	Prereq 1	Minimum Indoor Air Quality Performance
Y	Prereq 2		Y	Prereq 2	Environmental Tobacco Smoke (ETS) Control
1	Credit 1		Y	Prereq 3	Hazardous Material Removal or Encapsulation
1	Credit 2		1	Credit 1	Outdoor Air Delivery Monitoring
3	Credit 3		2	Credit 2	Acoustic Environment
1	Credit 4.1		1	Credit 3.1	Construction IAQ Management Plan—During Construction
1	Credit 4.2		1	Credit 3.2	Construction IAQ Management Plan—Before Occupancy
1	Credit 4.3		4	Credit 4	Low-Emitting Materials
1	Credit 4.4		1	Credit 5	Indoor Chemical and Pollutant Source Control
1	Credit 4.5		1	Credit 6.1	Controllability of Systems—Lighting
1	Credit 4.6		1	Credit 6.2	Controllability of Systems—Thermal Comfort
1	Credit 4.7		1	Credit 7	Thermal Comfort—Design and Verification
1	Credit 4.8		2	Credit 8.1	Daylight and Views—Daylight
1	Credit 4.9		3	Credit 8.2	Daylight and Views—Views
1	Credit 4.3		6	0	0
		Energy and Atmosphere		Innovation in Design	
		Possible Points: 39		Possible Points: 6	
Y	Prereq 1		Y	Prereq 1	Integrated Project Planning and Design
Y	Prereq 2		1	Credit 1.1	Innovation in Design: Specific Title
Y	Prereq 3		1	Credit 1.2	Innovation in Design: Specific Title
14	Credit 1		1	Credit 1.3	Innovation in Design: Specific Title
10	Credit 2		1	Credit 1.4	Innovation in Design: Specific Title
8	Credit 3		1	Credit 2	LEED Accredited Professional
1	Credit 4		1	Credit 3	Integrated Project Planning and Design
1	Credit 5		1	0	3
1	Credit 6		1	0	3
1	Credit 7		1	0	3
		Regional Priority Credits		Regional Priority Credits	
		Possible Points: 4		Possible Points: 4	
1	Credit 1.1		1	Credit 1.1	Regional Priority: Specific Credit-SS7.2 Heat Island Effect-Roof
1	Credit 1.2		1	Credit 1.2	Regional Priority: Specific Credit
1	Credit 1.3		1	Credit 1.3	Regional Priority: Specific Credit
1	Credit 1.4		1	Credit 1.4	Regional Priority: Specific Credit
55	16	39	110	16	39
		Total		Total	
		Possible Points: 110		Possible Points: 110	

Certified 40 to 49 points Silver 50 to 59 points Gold 60 to 79 points Platinum 80 to 110