STATE OF MARYLAND

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MEMORANDUM

To: Commissioners

From: Joel S. Riklin
Health Policy Analyst
Certificate of Need

Date: February 14, 2008

Re: Staff Report and Recommendation:
Sinai Hospital of Baltimore
Docket No. 07-24-2199

Attached is the Staff Report and Recommendation in the review of the application of Sinai Hospital of Baltimore ("the Hospital") for a Certificate of Need to add four mixed use operating rooms increasing the Hospital's total number of operating rooms from 21 to 25, and to renovate 34,725 square feet of existing space at a total project cost of $21,907,540. In addition to the renovation of space for the four operating rooms, this project will also relocate and expand the surgical waiting area, the number of pre-op beds from 10 to 20, and the number of Post Anesthesia Care Unit ("PACU") beds from 20 to 40.

Staff recommends **approval** of Sinai Hospital of Baltimore's application.

IN THE MATTER OF	*	**BEFORE THE**
	*	
SINAI HOSPITAL OF BALTIMORE	*	**MARYLAND**
	*	
	*	**HEALTH CARE**
Docket No. 07-24-2199	*	
	*	**COMMISSION**

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Staff Report and Recommendation

February 21, 2008

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I. INTRODUCTION

Sinai Hospital of Baltimore ("Sinai" or "Hospital") is a general acute care hospital located in Baltimore City at 2401 West Belvedere Avenue. The Hospital has a total licensed acute care capacity of 398 beds and provides medical-surgical-gynecology-addictions (MSGA), pediatrics, obstetric, and psychiatric services.[1] Sinai Hospital is part of LifeBridge Health, a merged asset health system formed in 1998, which also includes Northwest Hospital Center, Levindale Hebrew Geriatric Center and Hospital, and the Jewish Convalescent and Nursing Home.

1. Project Overview

Sinai is seeking Certificate of Need approval to renovate 34,725 square feet of space on the fourth floor at a total project cost of $21,907,540 and expand its surgery operating room capacity from 21 to 25. The renovations will also relocate and expand the surgical waiting area, the number of pre-op beds from 10 to 20, and the number of Post Anesthesia Care Unit ("PACU") beds from 20 to 40. Table 1 summarizes the capacity of the operating/procedure rooms at Sinai Hospital before and after the project.

Table 1
Existing and Proposed Operating Room/Procedure Room Capacity at Sinai Hospital of Baltimore

Operating/Procedure Room	Before Project		After Project	
	Inside Sterile Area	Outside Sterile Area	Inside Sterile Area	Outside Sterile Area
General Purpose Operating Room				
• Inpatient	1		1	
• Outpatient	4		4	
• Mixed Use	9		13	
Special Purpose Operating Room				
• Inpatient (open heart)	2		2	
• Outpatient	0		0	
• Mixed Use (orthopedic)	5		5	
Total Operating Rooms	**21**		**25**	
Total Procedure Rooms	5		5	1
Dedicated C-Section ORs	2		2	

Source: September 12, 2007 Completeness Response (DI #10, Attached Ambulatory Surgery Provider Directory Information form)

. On October 19, 2005 the Commission approved a similar proposal to add four operating rooms (Docket No. 05-24-2160). This proposal also included additional PACU beds, expanded and renovated Pathology Laboratory, a family waiting area, and relocation of the dialysis unit. Sinai abandoned the earlier project when bids indicated that it would cost over $27 million compared to the CON approval for approximately $15 million.

[1] Maryland Health Care Commission, *Annual Report on Licensed Acute Care Hospital Bed Capacity: Fiscal Year 2008*, Effective July 1, 2007, p. 2.

The current proposal also originally included the relocation of the dialysis unit from the fourth floor to the ground floor. The current proposal as originally designed included only 15 pre-op beds and the 40 PACU beds were to be located in two locations.

On November 2, 2007, Sinai modified the application to remove the relocation of the dialysis unit because the relocation of this unit will proceed whether or not the proposed CON application is approved and the relocation will commence more than 14 months before the renovation of the space for the Surgery Department. This modification reduced the space to be renovated from 33,873 sq. ft. to 30,736 sq. ft. and reduced the total project cost from $21,633,251 to $21,018,448. On December 12, 2007, Sinai further modified the application to reflect changes in the project design since the application was first submitted increasing the number of pre-op beds proposed from 15 to 20, rearranging the PACU so that all 40 beds will be combined in one location instead of the two locations previously proposed, and proposing to relocate the Cystoscopy Room to space currently occupied by 8 PACU beds, which were originally proposed to remain a PACU. This modification increased the space to be renovated from 30,736 sq. ft. to 34,725 sq. ft. but did not request any change in project cost.

Under the design proposed in the December 12, 2007 modification, the waiting area will be relocated primarily into space currently occupied by the dialysis unit. The pre-op and the PACU areas will be relocated into space that is currently the Hospital's intensive care unit. The intensive care unit is being relocated to new space being constructed as part of a project for which Sinai received a Determination of Non-Coverage from the Commission on June 26, 2007. The additional operating rooms ("ORs") will be located in renovated space currently occupied by the PACU and the Cysto procedure room. The Cysto room will be relocated into space currently occupied by the PACU for 5 ORs in the Rubin Institute for Advanced Orthopedics ("RIAO"), which will be consolidated with other PACU beds in the space to be vacated by the intensive care unit. The space vacated by the existing surgical waiting area and the pre-op area will be renovated for support functions. The proposed changes are summarized in the following table. The General Operating Room ("GOR") surgical suite currently includes nine (9) mixed use ORs, one inpatient OR, the two ORs dedicated to open heart surgery, and the cysto room. The four additional ORs will be added to the GOR surgical suite. Sinai also has 5 ORs in the Rubin Institute for Advanced Orthopedics ("RIAO") and 4 ORs in its Ambulatory Surgery Center ("ASC"). Sinai has four Endoscopy special procedure rooms in another area of the Hospital. A summary of Sinai's existing surgical capacity and square footage and proposed changes is presented in the following table.

Table 2
Proposed Changes to Sinai Hospital of Baltimore Surgical Capacity and Space

Area	Existing Capacity	Existing Space (GSF)	Post Project Capacity	Post Project Space (GSF)
GOR Surgical Suite	12	21,794	16	30,544
Surgical Waiting Area		1,897		2,590
Pre-operative Services	10	1,663	20	7,240
Post Anesthesia Care Services	20	3,843	40	10,211
RIAO	5	12,041	5	10,420
Ambulatory Surgery Center	4	9,620	4	9,620
Endoscopy	4	9,974	4	9,974
Total		**60,832**		**80,599**

Sources: DI# 29, page 2
Note: The 12 ORs in the GOR surgical suite include 2 ORs dedicated to open heart surgery.

Commission staff questioned the nearly 4,000 square foot increase in the space to be renovated from the first modification to the second modification without a corresponding increase in cost. Sinai chose to wait for a revised estimate by an outside estimator based on the latest design changes. Based on the work of the outside estimator, Sinai submitted a third modification request on January 31, 2008 increasing the total project cost by $889,092 from $21,018,448 to $21,907,540.

The project is now estimated to have a current capital cost of $19,214,436. Future inflation is estimated to add an additional $2,515,704. Financing cost and other cash requirements of $177,400 bring the total estimated project cost to the $21,907,540. Sinai proposes to finance the cost through the sale of $17,964,183 in bonds (82%) and $3,943,357 in cash (18%). (DI #30)

2. Summary and Staff Recommendation

MHCC Staff recommends approval of the proposed project. A summary of the key findings of the Staff analysis of the proposed project is as follows:

- **Need**

Sinai Hospital has demonstrated a need for the proposed addition of four operating rooms and for expansion of the pre-op area and the post anesthesia care unit.

- **Cost-Effectiveness**

Sinai has justified the proposed project as a cost-effective alternative approach to expanding and modernizing the surgery department.

- **Construction Cost**

The estimated renovation cost is consistent with the Marshall Valuation Service benchmark cost.

- **Financial Feasibility**

Sinai has documented sufficient cash resources to make the proposed equity contribution, and, based on the financial data reviewed, the proposed project is financially feasible.

- **Impact**

The project does not involve any new services. The project will expand surgical service capacity, but the service capacity expansion is not substantial enough to warrant concern about shifts in market share that would have the potential for a serious negative impact on other hospitals in the region, and the Hospital has made a case for this expansion based on its institutional needs.

II. PROCEDURAL HISTORY

A. Review Record

On June 1, 2007, Sinai Hospital of Baltimore submitted a Letter of Intent to apply for a Certificate of Need for the renovation of space and the increase in the number of mixed use operating rooms by four at the Hospital. This letter was acknowledged by Commission staff on June 4, 2007 [Docket Item ("DI") #1].

The Hospital filed its application for Certificate of Need on August 3, 2007 (DI #2).

Commission staff acknowledged receipt of the application for the project (DI #3) and requested publication of receipt of the application in the next issue of the *The Baltimore Sun* (DI #4) and the *Maryland Register* (DI #5) on August 3, 2007.

On August 6, 2007, the Greater Baltimore Urban League filed a letter in support of the proposal (DI #6).

On August 22, 2007, Commission staff sent completeness questions and minutes of Application Review Conference regarding the proposed project to the Hospital (DI #7).

On August 24, 2007 the Commission received a request from the Hospital for a determination as to whether relocation of the dialysis unit, which was part of the application, could be undertaken months before the rest of the project (DI #8).

On September 4, 2007 the Hospital requested a six day extension in the filing date for the completeness response (DI #9).

On September 12, 2007, the Hospital submitted its responses to the completeness letter (DI #10).

On September 28, 2007, Commission staff requested publication of the Notice of the application's docketing in the next issue of the *The Baltimore Sun* and the *Maryland Register.* (DI's #11 and #12) On that same date, the Commission requested comment on the application from Baltimore City (DI #13).

On October 4, 2007, Commission staff notified Sinai Hospital of Baltimore that its application would be docketed for review as of October 12, 2007 and that notice of the application's docketing would be published in the *Maryland Register* on that date. Commission staff also requested additional information from the Hospital regarding the proposed project. (DI #14).

Notice of the application's docketing was published in *The Baltimore Sun* on October 10, 2007 (DI #15).

On October 23, 2007, Commission staff requested review and comment from the Health Services Cost Review Commission ("HSCRC") (DI #16).

On November 2, 2007, Commission staff received a request from the Hospital, dated November 1, 2007, to modify the application to delete the dialysis unit relocation from this project and reduce the project cost (DI #17).

On November 5, 2007, the Commission posted notice of receipt of the modified application on its website at the link entitled, "Latebreaking" and gave notice that persons desiring to provide comment on the modifications should submit written comments to the Commission no later than November 20, 2007. (DI #18) Also on November 5, 2007, Commission staff requested publication of notice of receipt of the Hospital's modified application in *The Baltimore Sun* (DI #19).

On November 7, 2007 Commission staff received the Hospital's responses, dated November 5, to the additional questions contained in the Commission's docketing letter (DI #20).

On November 21, 2007 the Hospital submitted two letters supporting the project (DI #21).

Notice of the modification of the application was published in *The Baltimore Sun* on November 13, 2007 (DI #22).

On December 12, 2007, Commission staff received a request from the Hospital to further modify the application by increasing the amount of space to be renovated in the pre-op and PACU areas (DI #23).

On December 21, 2007, the Commission posted notice of receipt of the modified application on its website at the link entitled, "Latebreaking" and gave notice that persons desiring to provide comment on the modifications should submit written comments to the Commission no later than January 8, 2008. (DI #24) Also on December 21, 2007, Commission staff requested publication of notice of receipt of the Hospital's modified application in *The Baltimore Sun* (DI #25).

Notice of the modification of the application was published in *The Baltimore Sun* on December 29, 2007 (DI #26).

On January 4, 2008, Commission staff requested additional information regarding the proposed project from Sinai (DI #27).

On January 8, 2008, the Hospital requested a delay in completion of the Staff Report and Recommendation until the Commission's February meeting so that the Hospital could consider updated cost estimates from an outside estimator (DI #28).

On February 1, 2008 the Commission received the Hospital's responses (dated January 31, 2008) to the additional information requested on January 4, 2008 (DI #29).

On January 31, 2008 the Hospital requested a third modification request increasing the project cost (DI #30). On February 1, 2008, the Commission posted notice of receipt of the modified application on its website at the link entitled, "Latebreaking" and gave notice that

persons desiring to provide comment on the modifications should submit written comments to the Commission no later than February 15, 2008. (DI #31) Also on February 1, 2008, Commission staff requested publication of notice of receipt of the Hospital's modified application in *The Baltimore Sun* (DI #32).

On February 7, 2008, Sinai emailed a correction to the additional information submitted February 1, 2008 (DI #33).

Interested Parties

There are no interested parties in this review.

C. Local Government Review

As noted below, letters of support for the proposed project were received from three members of the Baltimore City Council. No comments were received from the Baltimore City Commissioner of Health.

D. Community Support

A letter of support for the proposed project was received from the Greater Baltimore Urban League. A number of other letters of support for the proposed project were provided by the applicant, including letters from 1199 SEIU United Healthcare Workers East, the Reistertown Park Heights Southern Team, three members of the Baltimore City Council, and four physicians associated with the Hospital including its Surgeon-in-Chief, its Chief of Neurosurgery, its Chief of Obstetrics and Gynecology, and the Director of its Cancer Institute.

III. STAFF REVIEW AND ANALYSIS

The Commission is required to make its decision in accordance with the general Certificate of Need review criteria at COMAR 10.24.01.08G(3)(a) through (f).

A. The State Health Plan

COMAR 10.24.01.08G(3)(a)states, "An application for a CON shall be evaluated according to all relevant State Health Plan standards, policies, and criteria."

The relevant State Health Plan chapter is COMAR 10.24.10, *State Health Plan for Facilities and Services: Acute Inpatient Services.*

COMAR 10.24.10 State Health Plan for Facilities and Services: Acute Inpatient Services

COMAR 10.24.10.06A — System Standards.

(1) Identification of Bed Need and Addition of Beds.

(a) Minimum and maximum need for acute inpatient medical/surgical/gynecological/addictions and pediatric beds are identified using the need projection methodologies in Regulation .07 of this Chapter.

(b) Projected need for trauma, critical care, and progressive care beds, and care for AIDS patients, is included in the calculated medical/surgical/ gynecological/addictions need projection.

(c) Additional MSGA or pediatric beds shall be constructed or put into operation such that the total bed capacity increases only if:

(i) The total number of beds added does not cause the total bed capacity of the hospital to exceed the most recent annual calculation of licensed bed capacity for the hospital pursuant to §19-307-2 of Health-General Article; or

(ii) Such addition is consistent with the jurisdictional bed need projection adopted by the Commission and calculated using the bed need projection methodology in Regulation .07 of this Chapter; or

(iii) The total number of MSGA and pediatric beds proposed for addition can be derived through application of the projection methodology, assumptions and targets contained in the most recent iteration of the applicable bed need projection methodology in Regulation .07 of this Chapter, as applied to the service area of the hospital.

Sinai Hospital is not proposing any change in its MSGA beds and pediatric beds as part of this project. Therefore, this standard is not applicable to this CON review.

(2) Travel Time. ***Medical/surgical/gynecological/addictions, critical and progressive care, obstetrical, and pediatric services shall be available within 30 minutes' one-way average automobile travel time under normal driving conditions for at least 90 percent of each health service area's population.***

The 30-minute travel time standard for MSGA, critical and progressive care, obstetrical, and pediatric services is currently met in Baltimore City and the Central Maryland region. Sinai is not proposing any service changes affecting geographic access to these services.

(3) Information Regarding Charges. ***Each hospital shall provide to the public, upon inquiry, information concerning charges for and the range and types of services provided.***

Sinai states that it provides information to the public regarding its charges and services upon request (DI #2, p. 19). The right of patients to obtain this information is specified in Sinai's Guide to Guest Services (DI #2, Ex. 2). Based on the information provided, Sinai is consistent with this standard.

(4) Charity Care Policy.

(a) Each hospital shall develop a written policy for the provision of complete and partial charity care for indigent and Medicaid patients to promote access to all services regardless of an individual's ability to pay.

(b) Public notice and information regarding a hospital's charity care policy shall include, at a minimum, the following:

(i) Annual notice by a method of dissemination appropriate to the hospital's patient population (for example, radio, television, newspaper);

(ii) Posted notices in the admission, business office, and, if existing, emergency room areas within the hospital; and

(iii) Individual notice provided to each person who seeks services in the hospital at the time of preadmission or admission.

(c) Within two business days following a patient's request for charity care services, application for medical assistance, or both, the facility must make a determination of probable eligibility.

To promote financial access to hospital services, the State Health Plan requires hospitals to develop and disseminate a written policy for charity care. In response to this standard, Sinai states that the hospital's charity care policy meets the requirements of this standard. The CON application submitted by Sinai includes a copy of its Charity Care Policy (DI #2, Exhibit 3), which provides for determinations of probable eligibility within two business days. Sinai stated that it publishes notice of the availability of charitable care annually in the Baltimore Sun and submitted a copy of the most recent notice (DI #2, Exhibit 4). Sinai states that it posts notice of the availability of charity care in the Business Office, Admitting Office, and Emergency Room, and the Hospital submitted a copy of such notice (DI #2, Exhibit 5). Sinai's Guide to Guest Services (DI #2, Ex. 2) which is provided to every patient includes information regarding the availability of charity care offered by the Hospital.

Data on the amount of charity care, as a distinct component of uncompensated care, was not reported in public domain sources prior to FY 2004. Staff reviewed data from HSCRC on the amount of uncompensated care (including both charity care and bad debt) provided by Sinai. Sinai reported uncompensated care of approximately $36,936,300 in FY 2005 and $43,838,300 in FY 2006 equivalent to 8.0% of gross patient revenue in FY 2005 and 8.5% in FY 2006. Statewide, Maryland hospitals reported an average uncompensated care level, expressed as a percentage of gross revenue, of 7.6% in FY 2005 and 8.0% in FY2006

In FY 2005, Sinai reported charity care valued at $14,528,841 equivalent to 3.21% of reported total operating expenses. In FY 2006, Sinai reported charity care valued at $12,122,003 equivalent to 2.37% of total operating expenses. Statewide, Maryland hospitals reported an average charity care level, expressed as a percentage of total operating expenses, of 2.1% in FY 2005 and 2.3% in FY 2006.

In summary, Staff finds the Sinai is consistent with the requirements of this standard.

(5) Compliance with Quality Standards. ***Each hospital shall be able to demonstrate, upon request by the Commission, compliance with all mandated federal, state, and local health and safety regulations, applicable Joint Commission on Accreditation of Healthcare Organizations and other appropriate national accrediting organization standards, applicable state certification standards, unless otherwise exempted by an appropriate waiver.***

Sinai is fully accredited by the Joint Commission and CARF. The Hospital submitted documentation of its most recent accreditation from the Joint Commission for the 39 month period commencing January 21, 2006 and its most recent accreditations from CARF, which is valid through April 2010 (DI #2, Exhibit 6).

Sinai is in compliance with this standard.

The MHCC Maryland Hospital Performance Evaluation Guide Quality Measures provide performance ratings of hospitals in comparison to the State average. Sinai's performance ratings are profiled in the following table.

Table 3
Maryland Hospital Performance Evaluation Guide
Hospital Report by Measure
Sinai Hospital of Baltimore

Measure	Hospital Performance	State Average
Heart Attack – Giving you aspirin when you arrive	100%	95 %
Heart Attack – Giving you aspirin at discharge	99%	95 %
Ace inhibitor for LVSD	98%	83 %
Heart Attack – Providing advice or counseling on how to stop smoking	96%	95 %
Heart Attack – Giving you beta blockers when you leave	99%	93 %
Heart Attack – Giving you beta blockers when you arrive	97%	93 %
Pneumonia – Measuring the oxygen levels in your blood	100 %	100 %
Pneumonia – giving you a vaccination against pneumonia	90 %	73 %
Pneumonia - Performing the recommended blood cultures	77 %	87 %
Pneumonia – Providing advice or counseling on how to stop smoking	84 %	92 %
Pneumonia – Giving antibiotics within 4 hours	74 %	79 %
Heart Failure – Giving full instructions when you leave the hospital	84 %	93 %
Heart Failure – Performing LVF assessment	93 %	93 %
ACEI for LVSD	97 %	86 %
Heart Failure – Providing advice or counseling on how to stop smoking	89 %	94 %
Surgical Infection Prevention-Hip, Knee, and Colon – antibiotic given within one hour of surgical incision	88 %	87%
Surgical Infection Prevention-Hip, Knee, and Colon – antibiotic discontinued within 24 hours of surgery	61 %	73 %

Source: Sinai Maryland Hospital Performance Evaluation Guide, Quality Measures, Last Update 9/25/2007, Reporting Period 07/01/2006-12/31/2006

On 6 of the 17 performance measures Sinai's performance fell below the state average. Sinai's performance exceeded the state average on 9 of the measures and was equivalent to the state average on 2 measures.

(6) Minimum Size for Pediatric Unit. ***There shall be a minimum of ten designated pediatric beds in a unit unless:***

(a) Travel time from the unit to another pediatric unit exceeds 30 minutes; or

(b) The hospital is the sole provider of pediatric services in its jurisdiction.

Sinai Hospital operates a 22 bed pediatric unit. Therefore, the Hospital is consistent with this standard.

(7) Admission to Non-Pediatric Beds. Stable non-emergency pediatric patients may be admitted to licensed medical/surgical beds, which are separated from other adult beds, only when the quality and the level of care is equal to that of a designated pediatric unit.

Sinai Hospital states that it admits pediatric patients to its Pediatric Unit. Therefore, this standard does not apply.

COMAR 10.24.10.06B — New Construction or Expansion of Beds or Services.

The Commission will review proposals involving new construction or expansion of beds or services, including replacement of existing beds or services if new outside walls are proposed.

(1) Compliance with Systems Standards. Each Certificate of Need applicant shall submit, as part of its application, written documentation of compliance with all applicable standards in Regulation .06A of this Chapter.

The application complies with all applicable standards in Regulation .06A of this chapter.

(2) Duplication of Services and Adverse Impact. The Commission will only grant a Certificate of Need if a hospital seeking to establish or expand a service, or to construct a new facility, documents that none of the following will occur as a result of the project:

(a) Duplication of existing services beyond that allowed by this Chapter;

(b) If the hospital's costs are above the mean, any necessary rate increase will not change the hospital's cost ranking on adjusted Screen A, prepared by the Health Services Cost Review Commission;

(c) If the hospital's costs are below the mean, any necessary rate increase will not raise the hospital's cost ranking above the mean of adjusted Screen A, prepared by the Health Services Cost Review Commission; or

(d) Inappropriately diminishing the quality of care, access to care, or the provision of uncompensated care.

This standard requires that an applicant proposing to expand a service demonstrate that the expansion will not unnecessarily duplicate existing services, inappropriately increase hospital costs, or inappropriately diminish quality of care or access to care.

Regarding duplication of services beyond that allowed by the State Health Plan, the project involves the modernization and expansion of the Hospital's capacity to perform surgeries. The SHP does not have specific standards for assessing the need for operating room capacity or other components of surgery department operations in hospitals. However, for the purposes of analyzing the need for operating room capacity, the Ambulatory Surgical Services chapter of the SHP is used, which is covered in detail in the discussion of the Need Criterion, COMAR 10.24.01.08G(3)(b). This chapter of the SHP includes assumptions concerning

achievable hours of operating room use that are applicable to general purpose, mixed use operating rooms.

Sinai projected the need for more than the four (4) additional ORs being requested based on historic trend in surgical cases. Based on slower rates of growth and significantly reduced time per surgical case, Commission staff conservatively projected the need for the proposed 23 non-open heart surgery ORs by 2013. Therefore, the proposed expansion of surgical services will not unnecessarily duplicate existing services.

With respect to Parts (b) and (c) of this standard, the HSCRC no longer utilizes Screen A. HSCRC now uses a "Reasonableness of Charges" (ROC) screen to analyze charges of similar hospitals and identify whether such charges are unacceptably high. If a hospital is 3% or more above the average charge of its peer group of similar hospitals, the HSCRC will identify the hospital as being high-charge. When the ROC identifies a hospital as high-charge, the HSCRC may conduct a full rate review, and require the hospital to enter into a "spend-down" agreement to lower the hospital's rates. The HSCRC's most recent ROC analysis, released in April 2005, identifies Sinai as 0.41% above the average of its peer group. HSCRC is currently transitioning to a new patient classification system, which is why a more recent ROC calculation is not available.

The HSCRC has amended the ROC calculation by adopting a new case mix index, the APR ("All Patient Related") DRG ("Diagnostic Related Group") index. As of November 1, 2005, the ROC is subject to a moratorium. As part of the transition to APR-DRGs, the ROC will not be used. During the transition, hospitals will be improving coding, and a number of methodologies within the ROC must be recalibrated to recognize the new case mix measurement tool. The next ROC will be produced after the end of a moratorium on rate increase requests, currently scheduled to end in November, 2008.

Sinai stated that it does not anticipate seeking a rate increase at this time (DI #2, page 22). Therefore, subsections (b) and (c) of this standard do not apply. However, consistent with the Commission policy reflected in this standard, any future rate increase must not be allowed to change the hospital's cost ranking in the ROC analysis in the event that a rate increase is subsequently required for this project.

With respect to Part (d) of this standard, Staff has found no basis for finding that the proposed project is likely to have any adverse impact on the quality of care, access to care, or the provision of uncompensated care. The Hospital highlights the positive impact that the proposed project is expected to have on access to care by increasing the speed with which it will be able schedule surgeries. The Hospital also pointed out the positive impact the proposed project will have on patient safety by building the proposed project to the latest AIA Design Guidelines and the Maryland Building Code, by providing lighting that will minimize surgeon and staff fatigue, by standardizing headwalls and stretcher parking locations and by improving visibility of patients in the pre-op and PACU areas, by extending the Hospital's electronic charting and physician ordering system into the renovated areas, by providing decentralized nurse work areas and multiple charting locations to reduce travel distance and allow more time for patient care, and by designing circulations to minimize interactions between inpatients and outpatients.

Staff concludes that the proposed project will not inappropriately raise hospital costs, or inappropriately diminish quality of care or access to care. Staff also finds that the project will not duplicate existing services beyond that allowed by this Chapter. The project is consistent with this standard.

> **(3) Optimal Alternative.** ***An applicant proposing new construction or expansion of beds or services, including ancillary services, shall demonstrate that it has considered the costs and effectiveness of the following alternatives: not carrying out the project, renovation, merger, consolidation, closure of the service, and delivery of the service in another setting, and that the proposed project is the optimal alternative.***

This standard requires the applicant to demonstrate that the proposed project is the optimal alternative for meeting project objectives based on a consideration of the costs and effectiveness of alternatives. Two of the alternatives specified in the standard for consideration, "not carrying out the project" and "closure of the service" do not lend themselves to a conventional cost-effectiveness analysis in that, by definition, they would have no measurable level of effectiveness in meeting project objectives being addressed by an actual construction project or a project expanding beds or services. This standard mirrors the third general review criterion in CON regulation, which requires the Commission to consider the cost-effectiveness of providing the proposed service through the proposed project with the cost-effectiveness of providing the service at alternative existing facilities, or alternative facilities which have submitted a competitive application as part of a comparative review.

Sinai did address the alternatives of not carrying out the project, merger and consolidation, closure of the service, and delivery of the service in another setting. According to Sinai, its need analysis shows that the Hospital needs three additional operating rooms today to meet optimal utilization levels established by the Commission for mixed use ambulatory surgery services. Not carrying out the project would not resolve the overcrowded conditions in the operating rooms nor address the need for more pre-op and PACU beds. Regarding merger, consolidation, or closure of the service, Sinai is a full service hospital, which requires a surgical service. Sinai discussed the alternative of expanding capacity by establishing a freestanding surgery center. Sinai chose to expand the existing mixed use surgical operations because such an expansion will be able to accommodate growth in both inpatient and outpatient volumes without duplicating staff and other resources and requiring physicians to divide their time between multiple locations to accommodate inpatient and outpatient cases. The current and proposed arrangement permits physicians to schedule multiple, consecutive surgeries, both inpatient and outpatient, without having to leave the surgical suite.

Sinai considered a number of construction alternatives but rejected them for qualitative reasons and did cost them out. Sinai considered expansions in all directions from the existing general operating room surgical suite, to the north, east, south, and west. Construction to the north was rejected because it would require closing the Cancer Center and the loss of the loading dock and ramp. Construction to the east was rejected for a number of reasons including the resultant loss of hundreds of parking spaces, which are in short supply. Expansion to the west was the alternative selected for the previous CON application (Docket # 05-24-2160) which has since been abandoned due to cost ($27.5 million compared to the $21.9 million for the proposed project). In addition, the west expansion only created enough space for the expansion of the

PACU from 20 beds to 28 beds, which would have been much further below the industry average than the 40 PACU beds proposed for the current project. Expansion of the surgical functions to the south was rejected because of the distance from the current ORs, which would necessitate too much duplication of management and support services. In addition, Sinai decided to relocate its intensive care unit to this space to be constructed as part of a project for which Sinai received a Determination of Non-Coverage from the Commission on June 26, 2007.

The decision to construct an addition to the south to house the relocated intensive care unit will free up the space that will permit the proposed expansions of the surgery department operations to be accomplished entirely in renovated space at less cost that the previously proposed and approved project that involved a mix of new construction and renovations. In addition, the current proposal will better meet the project objectives because it will provide more pre-op beds and more PACU beds.

MHCC staff finds that the applicant has demonstrated that it has considered the costs and effectiveness of the alternatives outlined in the standard and that the proposed project is the optimal alternative.

(4) Burden of Proof Regarding Need. ***The burden of demonstrating need for services not covered by Regulation .07 of this Chapter or by other parts of the State Health Plan, including sub-services for which need is not separately projected, rests on applicants.***

Sinai submitted an analysis of the need for the project. This need analysis is discussed under COMAR 10.24.01.08G(3)(b).

(5) Cost Per Square Foot of Hospital Space.

(a) The cost per square foot of hospital construction projects shall be no greater than the cost of good quality Class A hospital construction given in the Marshall Valuation Service guide updated using Marshall Valuation Service updated multipliers, and adjusted as shown in Marshall Valuation Service guide as necessary for terrain of the site, number of levels, geographic locality, and other listed factors.

(b) Each Certificate of Need applicant proposing costs per square foot above the limitations set forth in the Marshall Valuation Service guide must demonstrate that the higher costs are reasonable.

This standard does not apply because the proposed project does not involve any new construction.

(6) Cost Per Square Foot of Non-Hospital Space.

(a) For construction of non-hospital projects sponsored by hospitals, cost per square foot of construction must be within the limitations of the appropriate good quality class A construction costs given in the Marshall and Swift guide for the appropriate structure.

(b) Each Certificate of Need applicant proposing costs per square foot above the limitations set forth in the Marshall and Swift guide must demonstrate that the higher costs are reasonable.

The project does not involve construction of non-hospital space. Therefore, this standard is not applicable.

(7) Maximum Square Footage.

(a) For all new construction projects, the following maximum standards for departmental gross square feet per bed apply:

(i) Medical/surgical nursing units--325;
(ii) Intensive care and coronary care--365;
(iii) Pediatric--300; and
(iv) Psychiatric--405.

(b) Square footage needed for compliance with the federal Americans with Disabilities Act may be added to the maximums in (a).

(c) When the following areas are necessary, the square footage allotted must be shown to be needed when their inclusion results in exceeding the standard: solariums, patient and visitor lounges, social spaces for patients (day rooms), teaching or conference space, nurses' lounges, special purpose treatment rooms (ear, nose and throat rooms; cast rooms; psychiatric group therapy and occupational therapy rooms; and others), and unit manager's office.

(d) Each Certificate of Need applicant proposing to construct a nursing unit larger than that allowed in (a) shall provide evidence that the service cannot be provided safely and effectively within the limits of (a).

The proposed project does not involve the construction of acute care general hospital bed space so this standard does not apply.

(8) Approval of Project Beyond Construction Cost and Square Footage. ***A Certificate of Need applicant proposing construction costs or square footage above those allowed in Standards .06B(5)(a), (6)(a), or (7)(a), as adjusted by findings under Standards .06B(5)(b), (6)(b), or (7)(b)-(d), must demonstrate that all additional costs will be financed by the applicant without increases in rates.***

This standard does not apply because the proposed project does not involve any new construction.

(9) Rate Reduction Agreement. ***A high cost hospital will not be approved for Certificate of Need for the establishment of a new acute care service, or for the construction, renovation, upgrading, expansion, or modernization of acute care services, including support and ancillary services, unless it has first agreed to enter into a rate reduction agreement with the Health Services Cost Review Commission, or the Health Services Cost Review Commission has determined that rate reduction agreement is not necessary.***

This standard is not applicable because Sinai has not been identified as a high cost hospital.

(10) Efficiency. ***For Certificate of Need applications that involve improved facility or service efficiency, applicants must identify the specific portion of the project for which efficiency claims are made and demonstrate that efficiencies will be realized as a result of the project.***

Sinai states that this standard is not applicable because the project is designed to address space inadequacies in the existing building not efficiencies (DI #2, page 35).

Given that statement, this standard, as written, is not applicable to the project.

Staff questioned Sinai with respect to the staffing impact it identified in the application for surgical services. The Hospital is projecting a 34% increase in surgical staff FTEs, which compares with a projected 26.7% increase in case volume. To some extent this disproportionate increase in staffing is explained by the staffing needs of the pre-op and PACU beds, which will each increase by 100%.

Note: Review Standards B(11) - B(14) address conversion of excess acute care capacity to other uses and emergency certificate of need. They are not applicable to this project.

COMAR 10.24.10.06C — Renovation of Existing Beds or Services

Except in cases of new construction of outside walls reviewable under Regulation .06B of this Chapter, the Commission will review proposals to renovate or replace existing beds or services.

(1) Types of Projects. ***The Commission will consider proposals for renovation of hospital beds or services, including ancillary services, if the applicant demonstrates that the project is needed, and addresses one or more of the following:***

(a)The service needs additional space, as documented by written recommendations from appropriate accreditation and licensing agencies regarding comparisons to the departmental square footage of comparable services, or square footage standards contained in this Chapter;

(b) There are operating problems which can be corrected by the proposed renovation, as documented to the satisfaction of the Commission by specific data regarding cost savings which would occur if the project is completed, and for which the Commission is satisfied that the proposed level of investment is appropriate in relation to the operating efficiencies to be generated;

(c) The renovation project is being proposed to correct deficiencies that place the facility at risk of health and safety citations from licensing and accrediting organizations; or

(d) The hospital can demonstrate to the Commissions satisfaction that the renovation is necessary to maintain a modern facility in a good state of repair, and acceptable to its community.

This project involves the renovation of substantial portions of Sinai's surgical services. The renovations are being proposed to meet the community need for expanded services as

discussed under the need criterion, COMAR 10.24.01.08G(3)(b) by adding four ORs, and increasing the capacity of the pre-op and post anesthesia care unit ("PACU") areas. Sinai's analysis of its operations indicates that there is a current need for three additional non-open heart surgery ORs and Sinai projected a need for as many as eight additional ORs by 2012. Commission staff conservatively projected a need for four additional ORs, as proposed, by 2013 assuming slower rates of growth than the Hospital and reductions in the average time per surgical case for both inpatient and outpatient cases. Sinai also demonstrated a current and future need for additional PACU beds based on industry averages. Therefore, staff finds that the proposed renovations are necessary to maintain a modern facility in a good state of repair, acceptable to its community. The proposed project is consistent with this standard.

(2) Compliance with System Standards. ***Each Certificate of Need applicant shall submit, as part of its application, written documentation of compliance with all applicable standards in Regulation .06A of this Chapter.***

Staff has found this project is consistent with review standards in Regulation .06A of this chapter.

(3) Conditions for Approval. ***The Commission will grant a Certificate of Need to a hospital proposing to renovate existing hospital beds or services, including ancillary services, only if the applicant demonstrates that the project;***

(a) Will be financially feasible, after evaluating projected revenues based on historical patient utilization data from the most recent period available, as well as Commission predictions of future changes in utilization of the service in the jurisdiction;

(b) Will not have an adverse impact on the health care system, after evaluating that none of the following will occur:

(i) There will be a diminution in quality of care, access to care, or the provision of charity care as a result of the project;

(ii) Any other impact results which the Commission determines, based on substantial evidence, is detrimental to health care consumers; or

(c) Costs.

(i) If the hospital's costs are above the mean, any necessary rate increase will not change the hospital's cost ranking in adjusted Screen A, prepared by the Health Services Cost Review Commission;

(ii) If the hospital's cost are below the mean, any necessary rate increase will not raise the hospital's cost ranking above the mean of adjusted Screen A, prepared by the Health Services Cost Review Commission; and

(d) Is the optimal alternative, after considering the costs and effectiveness of the following alternatives: not carrying out the project, new construction, other renovations, merger, consolidation, closure of the service, and delivery of the service in another setting.

Concerning part (a) of this standard, Sinai's project is financially feasible, as discussed in the response to Review Criterion (3)(d), Viability.

Concerning part (b) Staff does not believe there is a basis for finding that the project is likely to have an adverse impact on quality, access, or the provision of uncompensated care, as discussed in COMAR 10.24.10.06B(2).

Regarding part (c), the HSCRC no longer uses "Screen A" to determine the reasonableness of a hospital's charges. Rather, the HSCRC uses the Reasonableness of Charges ("ROC") analysis to identify hospitals in Maryland that it considers to be high cost hospitals. If a hospital is 3% or more above the average in charges when compared to a peer group of similar hospitals, the HSCRC will identify the hospital as being high-charge. When the ROC identifies a hospital as high-charge, the HSCRC may conduct a full rate review, and require the hospital to enter into a "spend-down" agreement to lower the hospital's rates. The HSCRC's most recent ROC analysis, released in April 2005, identifies Sinai as 0.41 % above the average of its peer group.

Regarding part (d), staff found that that the applicant reasonably demonstrated that the proposed renovation is the optimal alternative for meeting Sinai's objectives. (See discussion at COMAR 10.24.10.06B(3), Optimal Alternative, and COMAR 10.24.01.08G(3)(c), Availability of More Cost-Effective Alternatives.

Based on these findings, the proposed renovations are consistent with this standard.

(4) Relationship to New Construction Costs. *The Commission will not approve renovation costs in excess of costs for good quality Class A new construction listed in* Marshall and Swift's Valuation Quarterly.

This standard requires a comparison of the project's estimated renovation cost with an index cost derived from MVS for new construction. A comparison is made between the estimated costs of the renovation to the cost for construction of comparable new space as derived from MVS. The comparison is made to new construction as opposed to renovations because the MVS cost per square foot benchmarks are based on the replacement of the entire space rather than renovations of specific components, such as interior walls.

Staff evaluated the project costs, as they would be appropriately adjusted for comparison with an MVS benchmark cost. The components of the projected renovation costs comparable to the costs included in the MVS index are detailed in the following table.

Table 4
MVS Analysis
Sinai Hospital of Baltimore

	Renovation
Building	$ 9,493,617
Fixed Equipment	$ 1,579,000
Normal Site Preparation	$0
Architect/Engineering Fees	$ 1,348,847
Permits	$ 104,118
Capitalized Construction Interest	$0
Total Project Costs	$12,525,582.00
Demolition	$ 420,480
Total Adjustments	$ 420,480
Net Project Costs	$ 12,105,102
Square Footage	34,725
Cost Per Square Foot	$348.60
Adjusted MVS Cost Per Square Foot	$504.22
Over(Under)	($155.62)

Source: January 31, 2008 modification (DI #30), Revised Project Budget and Marshall Valuation Service

This project was compared with the MVS benchmarks for General Acute Hospitals, Class A construction. Project costs include hard building costs; as this project consists of renovation of existing space only, there is no capitalized construction interest. An adjustment was made to deduct the cost of demolition, which was included in the project costs but is not included in the MVS benchmark cost. In computing the MVS benchmark to be used, staff also made an adjustment for the department differential for operating suites (1.59). This substantially increased the MVS base cost. As the table above indicates, the applicant is substantially under the MVS guidelines. Thus, the project is consistent with this standard.

(5) Maximum Square Footage. ***A renovation project must adhere to the maximum square footage requirements contained in Regulation .06B(7) of this Chapter.***

The proposed project does not involve the construction of acute care general hospital bed space so this standard does not apply.

(6) Approval of Project Beyond Square Footage Standards. ***A Certificate of Need applicant proposing square footage above those allowed in Regulation .06B(7) of this Chapter must demonstrate that all additional costs will be financed by the applicant without increases in rates.***

This standard does not apply because Sinai is not proposing the renovation of medical-surgical nursing units, intensive care/coronary care, pediatric or psychiatric inpatient services.

Note: Review Standards C (7) refers to excess acute care capacity, and is not applicable to this project. Review Standard C(8) refers to emergency certificate of need, and is not applicable to this project.

B. Need

COMAR 10.24.01.08G(3)(b) requires the Commission to consider, for purposes of evaluating an application under this subsection, the applicable need analysis in the State Health Plan. If no State Health Plan need analysis is applicable, the Commission shall consider whether the applicant has demonstrated unmet needs of the population to be served, and established that the proposed project meets those needs.

The need criterion requires the Commission to consider the applicable need analysis in the State Health Plan ("SHP"). Where there is no need analysis, the Commission is required to consider whether the applicant has demonstrated unmet needs of the population to be served, and established that the proposed project meets those needs. The key component of the project that must be evaluated with respect the need criterion is the proposed increase in non open heart surgery ("OHS") operating rooms from 19 to 23. Sinai is also proposing to relocate and expand its pre-op area and its post-anesthesia care unit ("PACU"). The surgical waiting area will also be relocated. The pre-op area will increase from 10 beds to 20 beds and the PACU will increase from 20 to 40 beds. The existing and proposed surgical capacity and space affected by the proposed project is summarized in the following table and Table 1 on page 1.

Table 5
Existing and Proposed Surgical Capacity and Space

Area	Existing Capacity	Existing Space (GSF)	Post Project Capacity	Post Project Space (GSF)
GOR Surgical Suite	12	21,794	16	30,544
RIAO Surgical Suite	5	12,041	5	10,211
Surgical Waiting Area		1,897		2,590
Pre-operative Services	10	1,663	20	7,240
Post Anesthesia Care Services	20	3,843	40	10,211
Total		**41,238**		**60,796**

Sources: January 31, 2008 additional information (DI#29), page 2
Note: The 12 ORs include the 2 dedicated to OHS. Sinai also has 4 ORs in its Ambulatory Surgery Center ("ASC") and an endoscopy suite with 4 special procedure rooms that are not affected by the project, both of which are included in Table 2.

The SHP does not have specific standards for assessing the need for operating room capacity in hospitals. However, for the purposes of analyzing the need for operating room capacity, the Ambulatory Surgical Services chapter of the SHP is used. This chapter of the SHP includes assumptions concerning achievable hours of operating room use that are applicable to general purpose, mixed use operating rooms. Full operating room capacity for such rooms is assumed to be 2,040 hours per room per year, based on room availability 51 weeks per year, 5 days per week, eight hours per day. Optimal operating room capacity is assumed to be 80% of full capacity, or 1,632 hours per room per year (97,920 minutes).

At the time this application was prepared, Sinai had a total of 20 ORs, including two (2) ORs dedicated to open heart surgery ("OHS"). Since the initial submission of this CON application, Sinai has opened an additional OR dedicated to inpatients, which is exempt from

CON review. The proposed changes to the surgery department that are the subject of this CON review include the addition of four (4) ORs that will be used for both inpatients and outpatients.

To examine the need for additional operating room capacity Sinai analyzed projected population growth in its service area and trends in surgical cases. According to Sinai, its primary service area for surgical cases includes 20 zip code areas and the secondary service area includes 39 zip code areas. The combined primary and secondary service areas account for 80% of Sinai's inpatient and outpatient surgical volume. The area includes Baltimore City and Baltimore County and parts of Anne Arundel, Carroll, Harford, and Howard counties. Between 2004 and 2010, the total population of the primary service area is projected to grow by 1.3 percent (or 0.2 percent annually); the population of the combined primary and secondary service area is projected to grow by 3.4 percent (or 0.6 percent annually). Over this six-year period (2004-2010), the 65 and over population is projected to increase by 3.4 percent in the primary service area and 8.8 percent in the combined primary and secondary service area. The following table provides population projections for the primary and secondary service areas for surgical discharges from Sinai Hospital.

Table 6
Surgical Services Primary and Secondary Service Area
Total and 65 Years and Over Population:
Sinai Hospital of Baltimore, 2004 and 2010

Sinai Service Area	2004	2010	% Change
Primary Service Area, All Ages	785,264	795,522	1.3%
Primary Service Area, 65 Years +	109,049	112,805	3.4%
Primary and Secondary Service Area, All Ages	1,937,046	2,002,123	3.4%
Primary and Secondary Service Area, 65 Years +	247,338	269,221	8.8%

Source: DI #2, p. 46-51

Sinai states that at 19 non-OHS operating rooms, which includes the dedicated inpatient OR that is currently being added, the ORs would have operated at 91% of capacity for FY 2007, which exceeds the 80% optimal utilization assumed in the Ambulatory Surgical Services chapter of the SHP. Sinai states that to lower utilization to 80% utilization would currently require 22 ORs, which is three more than the number that will be available without this project. Sinai's historical utilization of non-OHS OR capacity is detailed in following table.

Table 7
Operating Rooms, Surgical Cases, Surgical Minutes, Percent Utilization at Full Capacity and Operating Rooms Needed at Optimal Capacity:
Sinai Hospital of Baltimore, Fiscal Years 2000-2007

Fiscal Year	ORs	Surgical Cases	Surgical Minutes			Full Utilization (122,400 Min. per OR)		Optimal Capacity	
			Case Min.	Cleanup Min.	Total Min.	Available Minutes	Percent Utilized	Min. per OR	# of ORs Needed
2000	14	10,587	1,188,894	317,610	1,506,504	1,713,600	87.9%	97,920	15.4
2001	14	10.683	1,180,070	320,490	1,500,560	1,713,600	87.6%	97,920	15.3
2002	18	13,020	1,461,431	390,600	1,852,031	2,203,200	84.1%	97,920	18.9
2003	18	13,340	1,485,613	400,200	1,885,813	2,203,200	85.6%	97.920	19.3
2004	18	14,261	1,590,282	427,830	2,018,112	2,203,200	91.6%	97,920	20.6
2005	18	14,621	1,640,591	438,630	2,079,221	2,203,200	94.4%	97,920	21.2
2006	18	14,514	1,625,993	435,420	2,061,413	2,203,200	93.6%	97,920	21.1
2007	18	14,744	1,664,300	442,320	2,106,620	2,203,200	95.6%	97,920	21.5

Source: DI #2, page 53
Note: FY 2007 data is annualized based on actual data for July 2006 through December 2006

Sinai then projected volume (the number of surgical cases) to grow from 2007 to 2012 based on the trend from 2000 to 2007. Sinai assumed that the average length of time (minutes per case) would equal the average for FY 2006 because that was the most recent complete year of data. The number of cases, the number of minutes, and the number of ORs needed as projected by Sinai are detailed in the following table.

Table 8
Projected surgical Cases, Minutes, and Operating Rooms Needed:
Sinai Hospital of Baltimore, Fiscal Years 2008 – 2012

Fiscal Year	Inpatient		Outpatient		Total			ORs Needed at Optimal Capacity
	Cases	Minutes	Cases	Minutes	Cases	Cleanup Minutes	Total Minutes	
2008	7,814	1,203,362	7,718	545,930	15,532	465,960	2,215,248	22.6
2009	8,044	1,238,799	8,275	585,384	16,320	489,592	2,313,774	23.6
2010	8,274	1,274,236	8,833	624,837	17,108	513,228	2,412,301	24.6
2011	8,504	1,309,673	9,391	664,291	17,895	536,863	2,510,814	25.6
2012	8,735	1,345,111	9,949	703,744	18,683	560,499	2,609,354	26.6

Source: DI #2, page 55

While Sinai projected the need for 27 non-OHS operating rooms by 2012, the Hospital is only requesting an increase to 23 non-OHS operating rooms at this time due to space constraints.

Sinai is proposing to increase the number of PACU beds from 20 to 40 to serve the proposed total of 19 ORs including the 14 general operating rooms and the 5 ORs in the Rubin Institute for Advanced Orthopedics, but not the 2 dedicated open heart surgery ORs, because the current number is inadequate to serve the 15 existing ORs let alone the 4 additional ORs. The typical ratio of PACU beds to ORs is 2 to 2.5. Therefore, ideally there should be at least 30 to 38 PACU beds to serve the existing ORs and 38 to 48 PACU beds to serve the proposed complement of ORs.

Staff Analysis

In reviewing the number of rooms required to meet future surgical caseloads at Sinai, Staff analyzed projected trends in inpatient and outpatient surgery and the impact of alternate assumptions on the total number of cases and minutes per case. Over the eight-year period, 2000-2007, total non-OHS surgical case volume at Sinai increased by 35.5 percent – from 10,587 to 14,744. As shown on Table 9, most of the growth in the surgical caseload occurred between 2001 and 2002. Data reported by Sinai shows that growth in outpatient surgery cases has been stronger than the inpatient surgery experience. There was a 49 percent increase in outpatient surgery cases as compared to a 25.1 percent increase in inpatient surgery cases over the period 2000 to 2007. As a consequence, outpatient surgery as a proportion of total surgery increased from about 43 to 49 percent.

Staff considered the surgical volumes projected by Sinai in its 2005 application for the additional four ORs. At that time Sinai projected a total of 14,725 cases for FY 2006 compared to the 14,514 cases that were actually performed. The lower actual experience compared to the earlier projections is reflected in the future projections in the current CON application. Specifically, Sinai now projects 17,107 total cases in FY 2010 compared to the earlier projection

of 18,246. However, the current methodology used by Sinai builds in the large increases in both inpatient and outpatient case volume from 2001 to 2002 as detailed in the following table.

Table 9
Trends in Inpatient and Outpatient Surgical Cases
Sinai Hospital of Baltimore, Fiscal years 2000 - 2007

Fiscal Year	Inpatient Cases			Outpatient Cases			Total Cases	
	Number	Percent of Total	Percent Annual Change	Number	Percent of Total	Percent Annual Change	Number	Percent Annual Change
2000	6,021	56.9%		4,566	43.1%		10,587	
2001	6,226	58.3%	3.4%	4,457	41.7%	-2.4%	10,683	0.9%
2002	7,422	57.0%	19.2%	5,598	43.0%	25.6%	13,020	21.9%
2003	7,303	54.7%	-1.6%	6,037	45.3%	7.8%	13,340	2.5%
2004	7,549	52.9%	3.4%	6,712	47.1%	11.2%	14,261	6.9%
2005	7,469	51.1%	-1.1%	7,152	48.9%	6.6%	14,621	2.5%
2006	7,198	49.6%	-3.6%	7,316	50.4%	2.3%	14,514	-0.7%
2007	7,584	51.4%	5.4%	7,160	48.6%	-2.1%	14,744	1.6%
Percent Average Annual Change								
2001-2002			19.2%			25.6%		21.9%
2000-2007			3.6%			7.0%		5.7%
2002-2007			0.5%			5.1%		2.5%

Source: DI #2, Page 55
Note: FY 2007 data is annualized based on actual data for July 2006 through December 2006

Staff considered the volume trend without the large increases from 2001 to 2002. If the 19.2% increase in inpatient cases from 2001 to 2002 is removed from the calculation, the average annual rate of increase for inpatient cases decreases from 3.3% for the period from to 2000 to 2007 to 0.5% for the period from 2002 to 2007. If the 25.62% increase in outpatient cases from 2001 to 2002 is removed from the calculation, the average annual rate of increase for outpatient cases decreases from 7.0% for the period from to 2000 to 2007 to 5.1% for the period from 2002 to 2007. Projecting future surgical cases based on these lower rates of increase would result in a 7,776 inpatient cases in FY 2012 instead of the 8,735 cases projected by Sinai (approximately 11% less inpatient cases) and 9,182 outpatient cases instead of the 9,949 projected by Sinai (approximately 8% less outpatient cases). At these slower rates of growth total cases in 2012 would be approximately 9% less than the number projected by Sinai and total minutes of OR time required would be approximately 10% less based on Sinai assumption that case times would continue at the average time that it took in FY 2006 and cleanup time would be 30 minutes per case. Even if the inpatient and outpatient surgical volumes were to increase at these slower rates, Sinai would need the 23 non-OHS operating rooms proposed by 2010 and would need approximately 24 ORs by 2012. However, this need projection is based on Sinai's assumed average case time, which is the average case time experienced by the Hospital in 2006.

MHCC staff compared Sinai's time per case to that reported by other Maryland hospitals to HSCRC to determine whether the surgery department functioned efficiently. HSCRC data is not comparable to the data reported in the tables above because the HSCRC data includes more cases and minutes. In FY 2006, Sinai's average case time of 159 minutes for inpatient cases was 39% above the statewide average of 114 minutes. In the case of outpatient surgery, the average

minutes per case at Sinai of 55 minutes per case was approximately 15% above the statewide average of 48 minutes.

In order to compare Sinai's case time to a more comparable group of hospitals than all the hospitals in the State, Commission staff compared Sinai's case time to the case times of the other hospitals in Sinai's peer group, HSCRC Reasonableness of Charge ("ROC") Peer Group 3[2]. For FY 2006, Sinai's average case time for inpatient surgery including open heart surgery, exclusive of clean up time, (159 min. per case) was 14% above the peer group average of 139 minutes per case. The average case time for outpatient surgery at Sinai in FY2006, exclusive of clean up time, (55 min. per case) was 12% above the peer group average of 49 minutes per case.

Sinai states that the longer time per surgical case is a result of more complex cases. Sinai points to the wide variety of services offered that are more typical of a university-based medical center. Sinai also points to the fact that the percent of the patients at Sinai that have severity of Major/Extreme is 38.5% compared to a statewide average for all Maryland hospitals of 34.7 %. While these two characteristics of Sinai may contribute to longer average case times, they do not directly explain why Sinai's average case times are longer than the other hospital's in peer group C. The Hospital also claims to be the largest provider of inpatient orthopedic surgery in the State of Maryland and that such cases have averaged between 150 and 155 minutes. While such cases may contribute to the higher average inpatient case time, they do not explain why the average is as high as it is because the 150 to 155 minutes is less than the average for all inpatient cases at Sinai.

While none of these arguments definitively explains the difference in case time between Sinai and other hospitals in the State and its peer group, the Commission has recognized differences in case mix as an explanation for longer case time (Johns Hopkins Bayview, Docket #05-24-2165). One contributor to a higher case mix at Sinai is the open heart surgeries performed at the hospital. While these cases have been excluded from Sinai's projections, they are included in the statewide and peer group data. The 429 open heart surgery procedures performed at Sinai in FY 2006 took an average of 274 minutes, which is significantly above the 159 minute average for all the inpatient cases reported to HSCRC by Sinai. As one of 10 hospitals in the State and one of three in its peer group that perform OHS, such cases contribute to a longer than average case time. Eliminating the OHS cases from the calculation of average case time reduces the average from 159 minutes to 152 minutes for FY 2006.

While case mix may explain all or much of the difference between Sinai's average case time and the average case time for all the hospitals in its peer group, Commission staff analyzed OR need assuming that Sinai's case times could be reduced by the percent difference between Sinai's average case times and the averages for inpatient and outpatient cases for all the hospitals in its peer group as presented in the following table. Staff made this adjustment instead of using the average case time for the peer group because of the differences in the number of cases included in the HSCRC data and the number of cases performed in the ORs as reported by Sinai in the CON application. At the slower rate of case growth previously described and at the reduced average case time detailed in the following table, Sinai would need 22 non-OHS

[2] The HSCRC ROC Peer Group 3 includes: Bon Secours Hospital; Harbor Hospital; Johns Hopkins Bayview Medical Center; Maryland General Hospital; Mercy Medical Center; Prince George's Hospital Center; Sinai Hospital; and Union Memorial Hospital.

operating rooms in 2012. However, if the number of surgical cases was to continue growing at the slower rate for one more year, Sinai would need the 23 ORs proposed by 2013 even at the reduced average case time detailed in the following table. Therefore, the proposed increase from 19 to 23 non-OHS operating rooms is reasonable.

Table 10
Comparison of Sinai Hospital of Baltimore Surgical Case Time
To Hospitals in Hospital Services Cost Review Commission
Peer Group C for FY 2006

		Inpatient	Outpatient
As Reported to HSCRC			
Peer Group	Avg. Min. Per Case	138.5	49.0
Sinai Hospital of Baltimore	Cases	7,835	10,338
	Avg. Min. Per Case	159	54.7
Difference	Percent	14.8%	11.6%
As Reported in Sinai CON Application			
	Cases	7,198	7,316
	Avg. Min. Per Case	154.0	70.7
Sinai Avg. Case Time as Reported in the CON Adjusted for Difference with Peer Group			
	Avg. Min. Per Case	131.2	62.5

Sources: HSCRC Ambulatory Surgery Data Set, FY 2006; Sinai Con Application (DI #2, page 53); MHCC staff Analysis

In summary, it is reasonable to project the need for at least four additional ORs at Sinai. The need for the proposed expansion of the pre-op area and PACU has also been demonstrated. The application is consistent with this review criterion.

C. Availability of More Cost-Effective Alternatives

COMAR 10.24.01.08G(3)(c) states, "The Commission shall compare the cost-effectiveness of the proposed project with the cost-effectiveness of providing the service through alternative existing facilities, or through an alternative facility which has submitted a competitive application as part of a comparative review."

As previously discussed in the review of Project Review Standard B(3), Optimal Alternative, Sinai considered a number of construction alternatives but rejected them for qualitative reasons and did cost them out. However, the proposed alternative to expand the surgery department operations entirely in renovated space will cost less than the previously proposed and approved project that involved a mix of new construction and renovations. In addition, the current proposal will better meet the project objectives because it will provide more pre-op beds and more PACU beds.

MHCC staff finds that Sinai has reasonably justified the proposed project as a cost-effective alternative for meeting the Hospital's goal of expanding the capacity of its surgical services

D. Viability of the Proposal

COMAR 10.24.01.08G(3)(d) requires the Commission to consider the availability of financial and nonfinancial resources, including community support, necessary to implement the project within the time frame set forth in the Commission's performance requirements, as well as the availability of resources necessary to sustain the project.

Sinai's proposed budget for this project is as follows:

Table 11
Project Budget: Sinai Hospital of Baltimore

USE OF FUNDS	
Renovations	
Building	$9,493,617
Fixed Equipment(not included in construction	1,579,000
Architect/Engineering Fees	1,348,847
Permits	104,118
Renovation Subtotal	**$12,525,582.**
Other Capital Costs	
Major Movable Equipment	4,358,217
Minor Movable Equipment	416,000
Contingencies	1,557,485
Other (Supervision, Infection Control, Signs, Moving, Furniture Consultant)	357,152
Other Capital Cost Subtotal	**$6,688,854**
Total Current Capital Costs	**$19,214,436**
Inflation	2,515,704
Capitalized Construction Interest	-
TOTAL PROPOSED CAPITAL COSTS	**$21,730,140**
Financing Cost and Other Cash Requirements	
Loan Placement Fees	103,200
Bond Discount	44,200
Legal Fees, (CON Related).	15,000
CON Application Assistance	15,000
Subtotal Financing Cost and Other Cash Requirements	**$177,400**
TOTAL USES OF FUNDS	**$21,907,540**
SOURCES OF FUNDS FOR PROJECT	
Cash	3,943,357
Authorized Bonds	17,964,183
TOTAL SOURCES OF FUNDS	**21,907,540**

Source: January 31, 2008 Modification (DI #30), Revised Project Budget

The total capital cost of this renovation project is $21,730,140. Additional financing costs and cash requirements of $177,400 bring the total estimated project cost to $21,907,540. Sinai Hospital proposes to finance the project with $3,943,357 in cash and $17,964,183 in proceeds from the sale of bonds. Staff reviewed the consolidated audited financial statements for the years ending June 30, 2006 and June 30, 2005, which include the Hospital, Children's Hospital at Sinai Foundation, Inc. ("CHSF") and Baltimore Jewish Health Foundation (BJHF). CHSF holds the assets that are used to support Sinai's pediatric programs; BJHF was formed to hold and manage investments for the purpose of providing support to the hospital. These financial statements showed that Sinai Hospital has sufficient cash resources to make the equity contribution.

Sinai Hospital's most recent results of operations for those services that are regulated by the Health Services Cost Review Commission are presented in the following table. As reflected in the table below, the operating margin of Sinai Hospital for services regulated by the Health Services Cost Review Commission has ranged from 9.57% to 10.26% of net operating revenue for fiscal years 2004-2006. When unregulated activities were included, the operating margin decreased significantly. However, Sinai still exceeded the performance of its Peer Group for total operations.

Table 12
Recent Financial Performance
Sinai Hospital of Baltimore

	Fiscal Year		
FINANCIAL DATA	**2006**	**2005**	**2004**
REGULATED OPERATIONS			
Net Operating Revenue	447,127,800	402,514,642	367,727,200
Net Operating Profit	45,883,040	38,150,134	35,195,500
Operating Margin	10.26%	9.48%	9.57%
REGULATED AND UNREGULATED OPERATIONS			
Net Operating Revenues	493,768,150	442,620,248	409,845,200
Net Operating Profit	20,111,231	17,990,221	21,404,600
Operating Profit Margin	4.07%	4.06%	5.22%
PEER GROUP COMPARISON			
REGULATED OPERATIONS ONLY:			
Median Operating Profit Margin	5.46%	5.30%	4.73%
Average Operating Profit Margin	5.00%	5.19%	4.83%
REGULATED/UNREGULATED OPERATIONS:			
Median Operating Profit Margin	0.71%	0.92%	0.40%
Average Operating Profit Margin	1.34%	1.07%	0.77%

Source: Health Services Cost Review Commission, Disclosure of Hospital Financial and Statistical Data dated July 18, 2007 which reports regulated and non-regulated activity as reported on the R/E Schedule of the Annual Report.

The following table profiles the financial performance of the hospital as reported on the audited financial statements. Sinai Hospital generated operating and excess margins which exceeded the statewide average and median values as well as the Target Value set by the Health Services Cost Review Commission, for fiscal years 2005 and 2004. The age of plant measures the average age of fixed assets and is an indicator of the need for near-term replacement. This ratio indicates that the average age of the fixed assets of Sinai Hospital is higher than the statewide median and average as well as the target values set by HSCRC, which indicates that the hospital may need to replace some of the fixed assets. The debt to capitalization ratio measures how much of a hospital's net worth is accounted for by long term debt, the relative importance of long-term debt in the hospital's permanent capital structure and the degree to which a hospital relies on debt as opposed to equity in financing assets. The hospital is slightly above the target value and the statewide median for this ratio. Finally, days of cash measures the number of days an entity could meet its average daily expenditures with existing liquid assets. Sinai is below the Statewide median and the target values as set by HSCRC but approximately at the median value for Maryland hospitals. Staff was unable to compute this indicator for Fiscal Year 2006.

Table 13
Selected Financial and Operating Indicators for
Sinai Hospital and All Maryland Hospitals

Maryland Hospitals-Statewide Average					
Year	Operating Margin	Excess Margin	Age of Plant	Debt to Capitalization	Days of Cash
2005	3.20%	4.10%	10.31	0.46	116
2004	2.54%	2.90%	9.97	0.44	109
Maryland Hospitals-Statewide Median					
Year	Operating Margin	Excess Margin	Age of Plant	Debt to Capitalization	Days of Cash
2005	2.98%	3.63%	10.81	0.41	93
2004	1.94%	2.88%	10.94	0.4	91
Sinai Hospital					
Year	Operating Margin	Excess Margin	Age of Plant	Debt to Capitalization	Days of Cash
2006*	3.42%	4.58%	13.74	0.42	n/a**
2005	4.55%	5.11%	13.50	0.46	93
2004	5.41%	5.01%	15.42	0.51	91
HSCRC Target Values	**2.75%**	**4.00%**	**8.5**	**0.4**	**115**

Source: Report on Financial Conditions, Fiscal year 2005, Health Services Cost Review Commission, which reports financial data of a corporate entity as submitted on the audited financial statements. HSCRC has not issued the report for Fiscal Year 2006 as they have convened a workgroup to review the methodology.

*Using the existing indicators in HSCRC methodology, MHCC staff calculated the selected financial indicators based on the Sinai Hospital of Baltimore, Inc.'s audited financial statements for this fiscal year ending June 30, 2006

**Unable to compute based on available financial data

In summary, Sinai Hospital is fairly profitable, has a relatively older physical plant, does not have an excessive reliance on debt financing, and is below the target range for liquidity as compared to other Maryland Hospitals.

Sinai has estimated that this project will be completed in 2011 and the first year of full utilization will be 2012. Sinai has projected the financial performance of the Hospital for fiscal years 2008 through 2012 as shown in the following table:

Table 14
Projected Financial Performance (in 000's): Sinai Hospital of Baltimore

Projected Years/ Revenue/Expense Category	2008	2009	2010	2011- First Use	2012- Full Util.
REVENUE					
Inpatient Revenue	420,328	424,531	428,777	433,064	437,395
Out Patient Revenue	201,033	207,064	210,976	217,305	223,824
Gross Patient Revenue	**$621,361**	**$631,595**	**$639,753**	**$650,370**	**$661,219**
Allowance For Bad Debt	42,834	43,621	44,290	45,111	45,947
Contractual Allowance	102,841	105,377	107,834	110,509	113,250
Charity Care	13,503	13,725	13,903	14,133	14,368
Net Patient Service Revenue	**$462,183**	**$468,872**	**$473,726**	**$480,617**	**$487,655**
Other Operating Revenue	127,225	131,042	134,973	139,022	143,193
Net Operating Revenue	**$589,408**	**$599,914**	**$608,699**	**$619,639**	**$630,848**
EXPENSE					
Salaries, Wages, Etc.	279,521	281,813	284,124	286,454	288,803
Contractual Services	70,051	71,675	71,213	72,847	74,519
Current Depreciation	44,846	49,075	53,847	58,593	62,937
Project Depreciation	-	-	-	942	1,884
Interest on Current Debt	7,804	10,059	10,641	11,169	11,771
Interest on Project Debt	-	-	379	640	628
Supplies	121,409	122,405	123,408	124,420	125,440
Other Expenses	56,930	57,397	57,867	58,342	58,820
Total Operating Expenses	**$580,561**	**$592,423**	**$601,480**	**$613,365**	**$624,717**
Income from Operation	**$8,847**	**$7,491**	**$7,219**	**$6,274**	**$6,131**
Operating Margin	1.91%	1.60%	1.52%	1.31%	1.26%
Admissions	26,266	26,529	26,794	27,062	27,332
Patient Days	121,714	122,920	124,138	125,368	126,610
Outpatient Visits	133,103	137,096	141,209	145,446	149,809
Equivalent In Patient Days (EIPD)	179,927	182,874	185,219	188,276	191,399
Net Revenue/EIPD	$3,276	$3,280	$3,286	$3,291	$3,296
Expense/EIPD	$3,227	$3,240	$3,247	$3,258	$3,264
Equivalent In Patient Admissions(EIPA)	38,828	39,468	39,978	40,641	41,318
Net Revenue/EIPA	$15,180	$15,200	$15,226	$15,247	$15,268
Cost Per EIPA	$14,952	$15,010	$15,045	$15,092	$15,120

Source: January 31, 2008 Modification (DI #30), Exhibit 2 (Revised Table 3)

Commission staff requested a review of the project's financial feasibility from HSCRC staff. That review was not available at the time of issuance of this report.

In conclusion, Sinai Hospital has documented sufficient cash resources to make the proposed equity contribution. Based on an analysis of the selected financial indicators, this Hospital is in sound financial shape. This project, which reflects modest increases in both inpatient and outpatient utilization, will result in a slight decrease in net income from operations, but the Hospital remains financially stable.

Based on the financial data reviewed above, the proposed project is financially feasible. Therefore, this project is consistent with the standard.

E. Compliance with Conditions of Previous Certificates of Need

COMAR 10.24.01.08G(3)(e) requires the Commission to determine that the applicant has complied with all conditions applied to previous Certificates of Need granted to the applicant.

According to MHCC records, since 1990 Sinai Hospital has received approval for one CON, the prior project to expand the surgery services including the addition of four mixed use operating rooms (Docket No. 05-24-2160). This CON was approved by the Commission on October 19, 2005 without conditions and it was relinquished by the Hospital on May 2, 2007.

F. Impact on Existing Providers

COMAR 10.24.01.08G(3)(f) requires the Commission to analyze information and analysis with respect to the impact of the proposed project on existing health care providers in the service area, including the impact on geographic and demographic access to services, on occupancy when there is a risk that this will increase costs to the health care delivery system, and on costs and charges of other providers.

This project does not involve the introduction of any new services. This project will increase the capacity of the Hospital's surgery services by adding four ORs and pre-op and post acute anesthesia care space. The project is aimed at meeting the needs of the service area population historically served by the Hospital for more modern and expanded surgical facilities.

The scope of the project does not indicate that it is based on expectations of substantially expanding market share in a way likely to affect other hospitals in the area. Therefore, the project is not likely to have a substantive negative impact on other existing general hospitals; it will not alter geographic or financial access to services, and is not likely to have an impact on bed occupancy or other capacity utilization that will increase costs to the health care delivery system or increase costs and charges of other providers.

IV. SUMMARY AND STAFF RECOMMENDATION

In summary, Staff finds that Sinai Hospital of Baltimore has demonstrated:

- Compliance with the applicable standards of the State Health Plan;
- The need for an expanded emergency department;
- The cost effectiveness of the approach chosen to meet the Hospital's modernization priorities;
- The financial feasibility of the project; and
- That the project will not have a negative impact on other existing providers.

Based on the analysis and findings in the Staff Report and Recommendation, Staff recommends that the application of Sinai Hospital of Baltimore for a Certificate of Need to add four mixed use operating rooms for a total of 25 operating rooms, expand the pre-op and post anesthesia care unit areas and relocate the surgical waiting areas all through renovations at a total project cost of $21,907,540, be approved.

IN THE MATTER OF	*	**BEFORE THE**
	*	
SINAI HOSPITAL OF	*	**MARYLAND HEALTH**
	*	
BALTIMORE	*	**CARE COMMISSION**
	*	
Docket No. 07-24-2199	*	

****

FINAL ORDER

Based on the analysis and findings in the Staff Report and Recommendation, it is this 21st day of February, 2008, by the majority of the Maryland Health Care Commission, **ORDERED:**

That the application of Sinai Hospital of Baltimore for a Certificate of Need to add four mixed use operating rooms increasing the Hospital's total number of operating rooms from 21 to 25, expand the pre-op and post anesthesia care unit areas and relocate the surgical waiting areas all through renovations at a total project cost of $21,907,540, is approved.

MARYLAND HEALTH CARE COMMISSION
February 21, 2008

APPENDICES

SINAI HOSPITAL OF BALTIMORE

Appendix A: Architectural Plans

- General Operating Room Suite
- PACU
- Pre-OP

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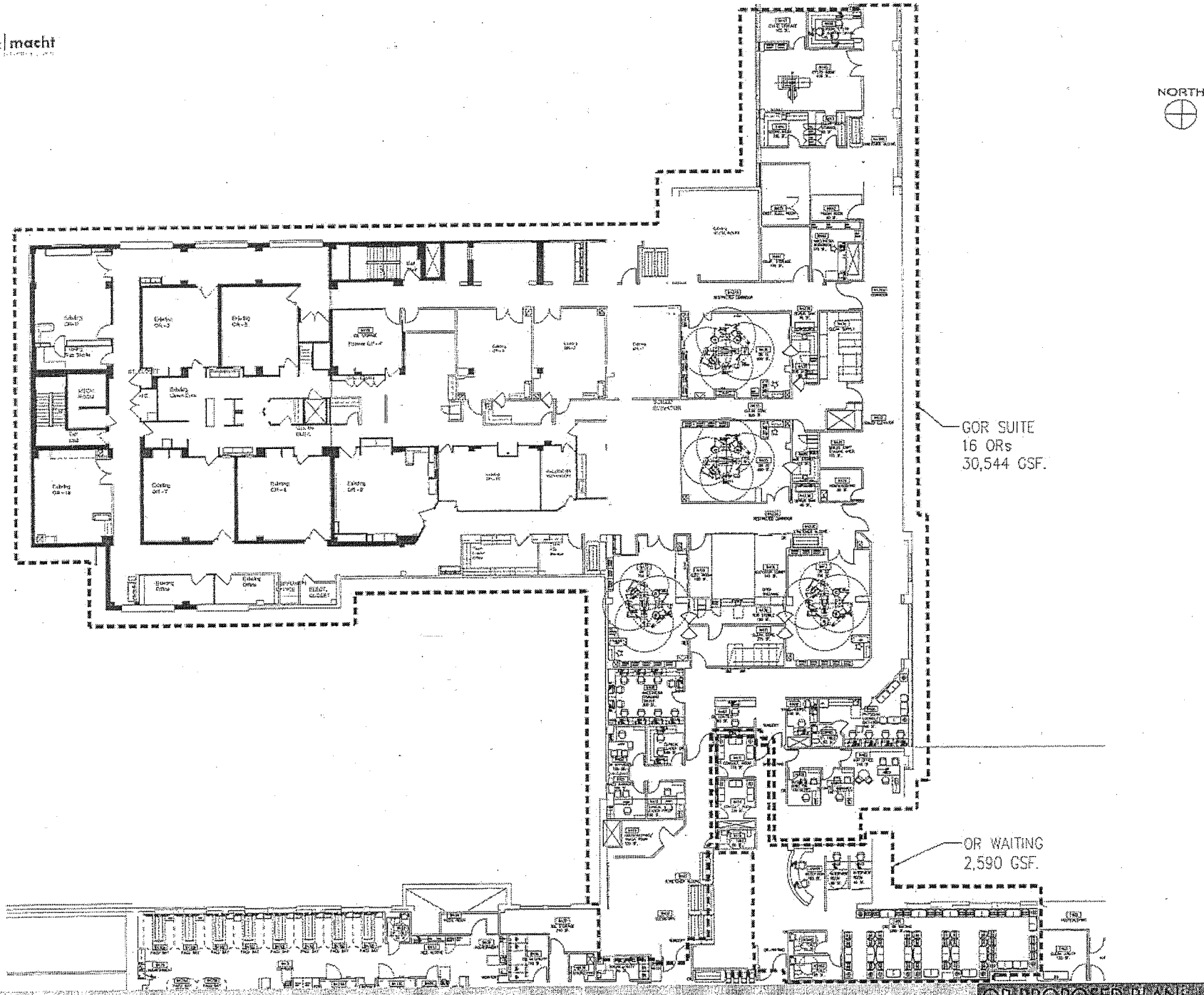


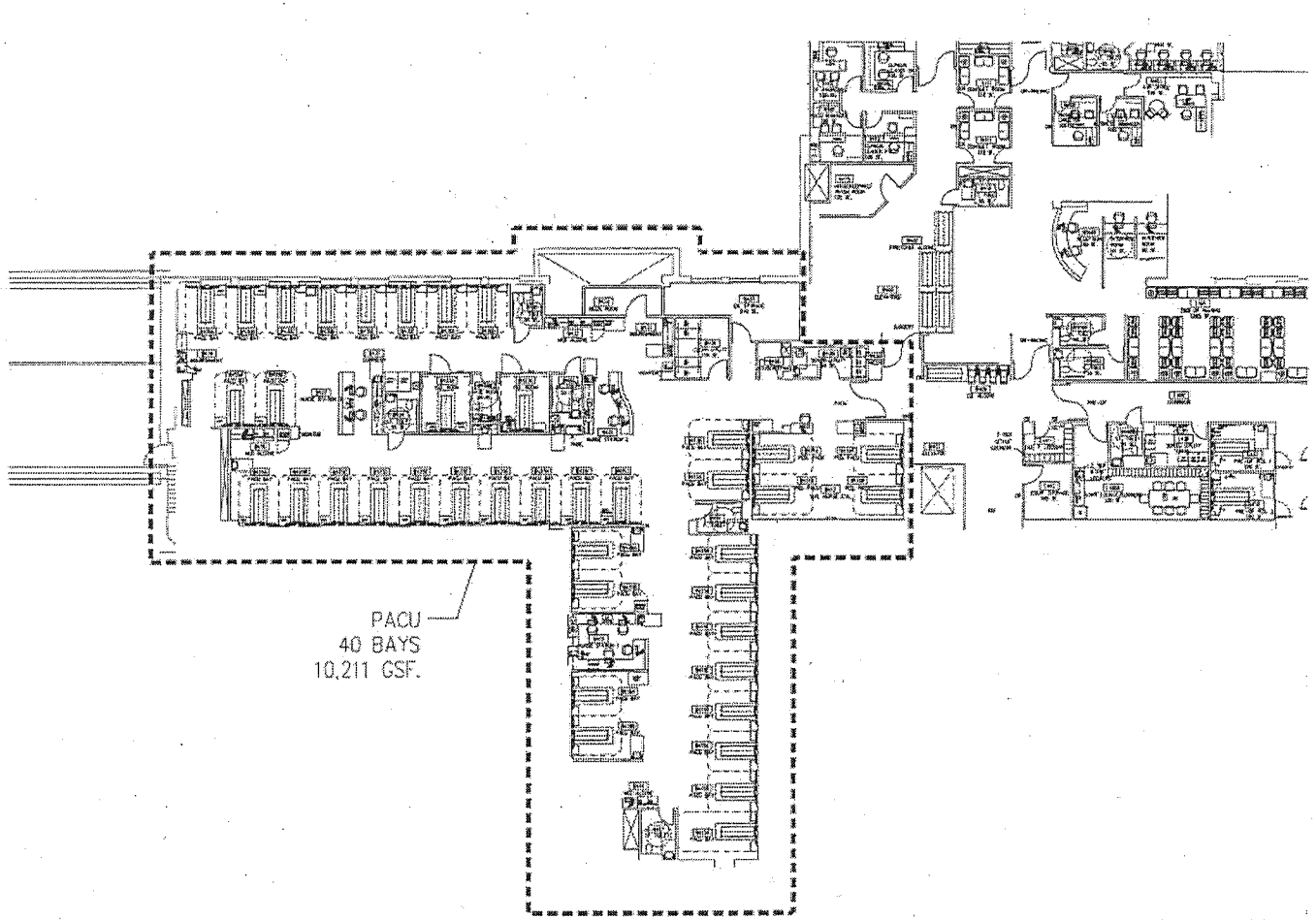
SINAI HOSPITAL
OR RENOVATION

OR PROPOSED PLANS
FOURTH FLOOR

1/8"=1'-0"

04/07

hord | coplan | macht

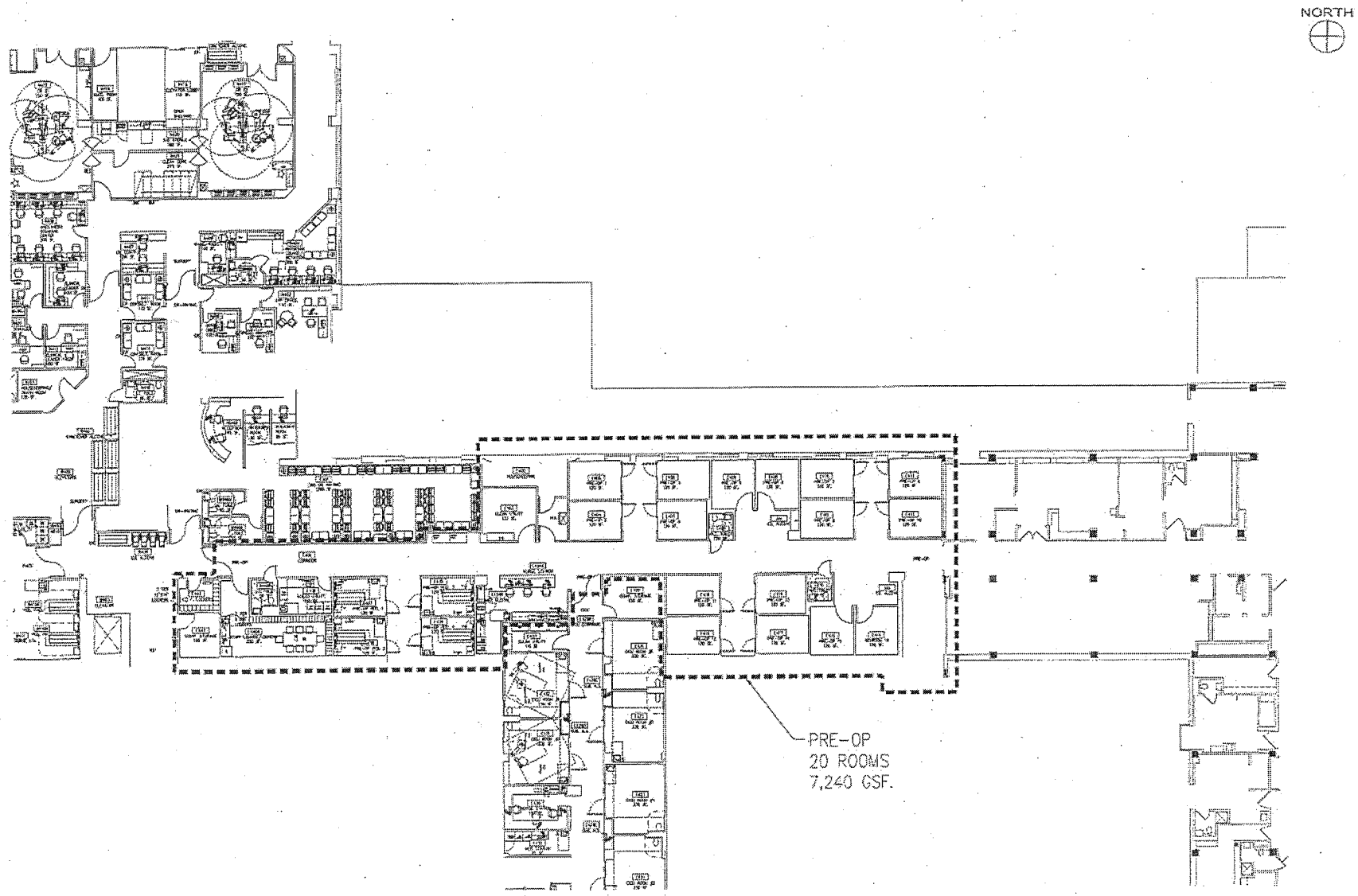


SINAI HOSPITAL
OR RENOVATION

PACU PROPOSED PLAN
FOURTH FLOOR

1/8"=1'-0"

12/01/07



SINAI HOSPITAL
OR RENOVATION

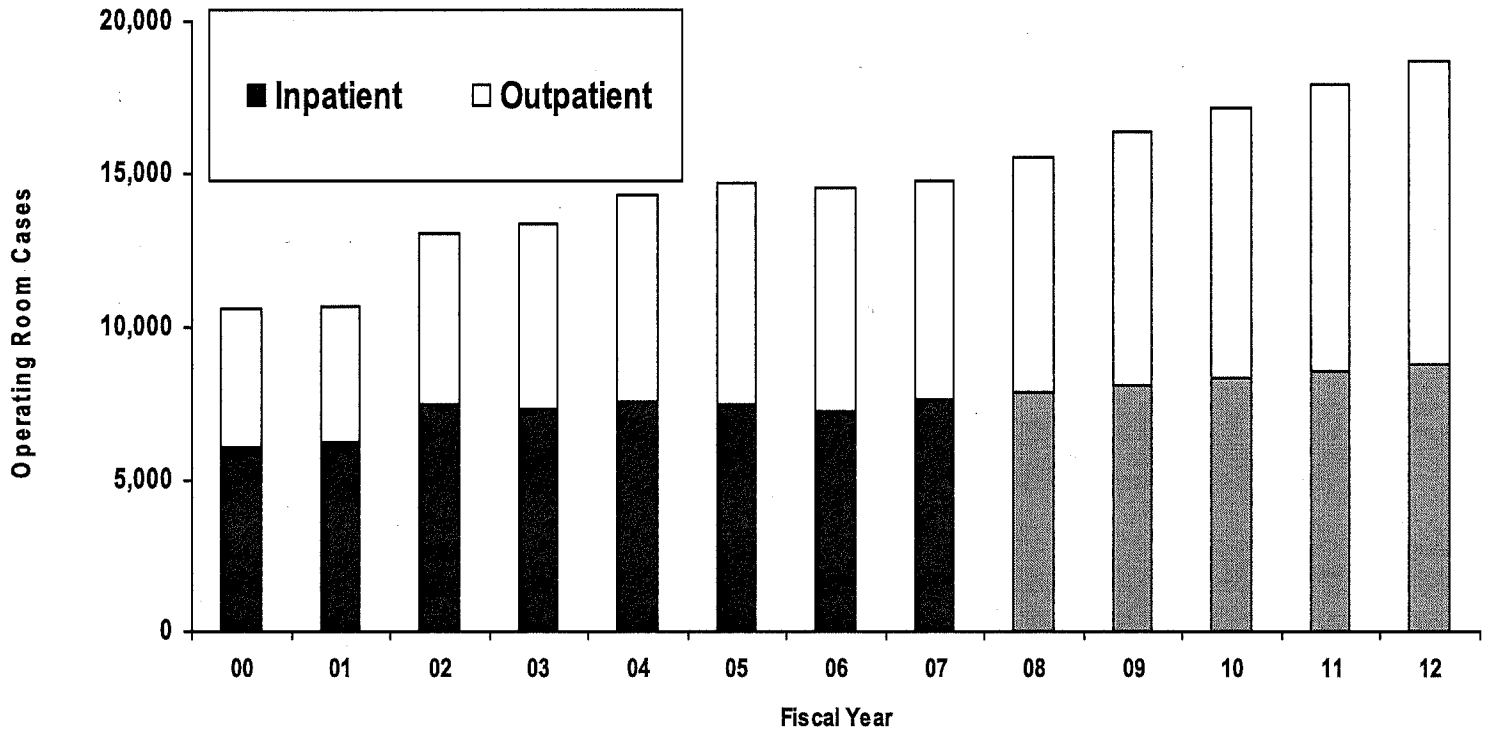
1/8"=1'-0"

Pre-OP PROPOSED PLAN
FOURTH FLOOR

Appendix B

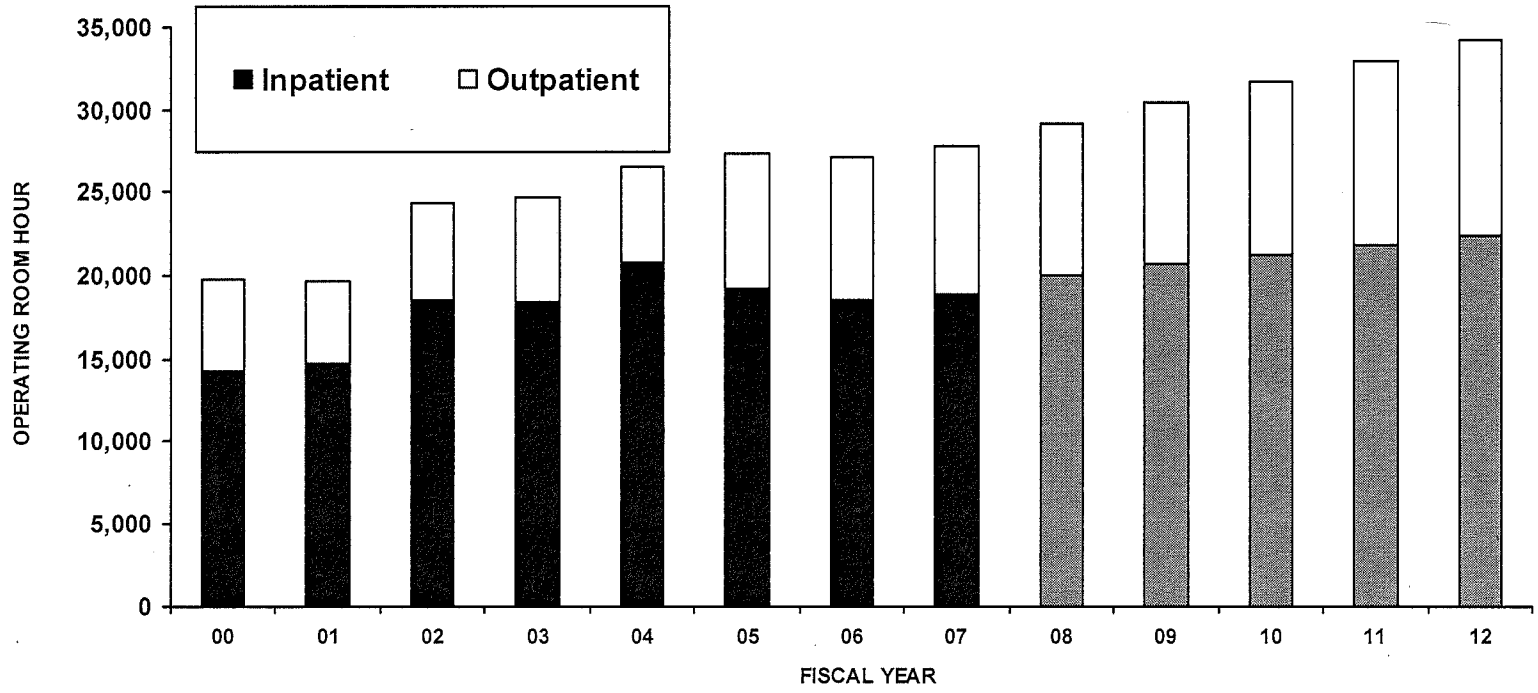
Chartbook: Profile of Recent Utilization of Surgical Facilities at Sinai Hospital of Baltimore

CHART 1: OPERATING ROOM CASES
EXCLUDING OPEN HEART SURGERY CASES
SINAI HOSPITAL OF BALTIMORE
HISTORIC FY2000-2007 AND PROJECTED FY2008-2012

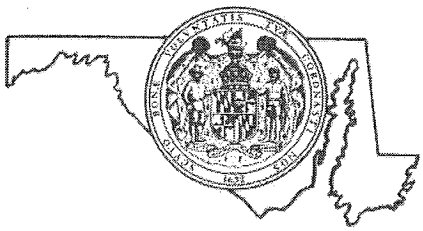


SOURCE: SINAI HOSPITAL CON

CHART 2: OPERATING ROOM HOURS (excluding cleanup time)
EXCLUDING OPEN HEART SURGERY CASES
SINAI HOSPITAL OF BALTIMORE
HISTORIC FY2000-2007 AND PROJECTED FY2008-2012



SOURCE: Sinai Hospital of Baltimore CON APPLICATION



MARYLAND HEALTH CARE COMMISSION
4160 PATTERSON AVENUE – BALTIMORE, MARYLAND 21215
TELEPHONE: 410-764-3460 FAX: 410-358-1236

MEMORANDUM

TO: Commissioners

FROM: Pamela W. Barclay
Deputy Director, Health Resources

DATE: October 13, 2005

RE: Certificate of Need Request from Sinai Hospital of Baltimore
Docket No. 05-24-2160

Sinai Hospital of Baltimore is a general acute care hospital located in Baltimore City at 2401 West Belvedere Avenue. The Hospital is seeking Certificate of Need approval to expand its operating room capacity from 20 to 24, increase its number of Post Anesthesia Care Unit ("PACU") beds from 20 to 28, expand and renovate its Pathology Laboratory, construct a family waiting area, and relocate the hemodialysis unit.

A summary of the key findings in the Staff Report and Recommendation is provided below:

Surgical Services Utilization Trends: 2000-2005

- Over the six-year period, 2000-2005, total non-OHS surgical volumes at Sinai increased by 30.35 percent – from 10,587 to 13,800. Most of the growth in the surgical caseload occurred between 2000-2002, with the most significant increase experienced between 2001 and 2002. Data reported by Sinai shows that growth in outpatient surgery cases has been stronger than the inpatient surgery experience. There was a 47 percent increase in outpatient surgery cases as compared to an almost 18 percent increase in inpatient surgery cases over the period 2000 to 2005. As a consequence, outpatient surgery as a proportion of total surgery increased from 43 to 49 percent.

Projected Surgical Services Utilization: 2010

- Based on trending the growth experienced between fiscal years 2000 and 2004, Sinai projects that total surgical cases will increase from an estimated 13,800 in fiscal year 2005 to 18,426 by fiscal year 2010. This level of growth assumes an average annual increase in total surgical cases of 5.95 percent. Staff believes this is a reasonable projection of future surgical caseloads likely to be experienced at Sinai. On average, inpatient cases increased by 3.6 percent annually over the

six-year period, 2001-2005; outpatient cases increased by 8.5 percent. Trending historic use patterns over the six-year period, 2000-2005, for inpatient and outpatient surgery suggests that the Hospital would experience about 18,600 total cases by 2010.

Availability of More Cost-Effective Alternatives

- The analysis of future need for surgical services supports the expansion of operating room capacity and related services as proposed by Sinai. The Hospital has a total of 20 operating rooms, including two operating rooms dedicated to the open heart surgery (OHS) program. By 2010, the number of operating rooms required to serve projected inpatient and outpatient surgical cases, excluding OHS cases, at Sinai would range from 25 to 26, based on a range of assumptions for average surgical minutes per case. The four operating room capacity expansion (increasing non-OHS operating rooms from 18 to 22 and total operating room capacity from 20 to 24) proposed by Sinai is reasonable given projected surgical cases and minutes.

Viability and Impact of the Proposal

- The project's estimated new construction and renovation costs are below the index cost standard as required by the State Health Plan.

- Sinai has adequately documented that it has the financial resources to develop the proposed project. The Hospital does not anticipate seeking a rate increase from the Health Services Cost Review Commission to fund the project.

- Given historical utilization patterns at Sinai, the proposed project addresses an institution-specific need for additional capacity in the operating room suite, PACU, and Pathology laboratory and will not have a negative impact on existing providers in the service area.

Staff finds that Sinai Hospital's proposed project is consistent with the applicable State Health Plan (COMAR 10.24.10) standards and with the general Certificate of Need criteria found in COMAR 10.24.01.08G(3)(a)-(f). The total capital cost of the project (including capitalized construction interest) is $15,090,051, with additional financing costs and cash requirements of $30,000; this results in a total project cost of $15,120,051. Sinai Hospital proposes to finance the project with a cash equity contribution of $3,780,013, and authorized bonds in the amount of $11,340,038. For reasons presented in this Report, Staff recommends that the Commission **APPROVE** Sinai Hospital's Certificate of Need application.

Enclosure

IN THE MATTER OF	*	BEFORE THE
	*	
SINAI HOSPITAL OF BALTIMORE	*	MARYLAND HEALTH
	*	
	*	CARE COMMISSION
	*	
DOCKET NO. 05-24-2160	*	
	*	

* *

Staff Report and Recommendation
October 19, 2005

TABLE OF CONTENTS

I. INTRODUCTION

Sinai Hospital of Baltimore ("Sinai" or "Hospital") is a general acute care hospital located in Baltimore City at 2401 West Belvedere Avenue. The Hospital has a total licensed acute care capacity of 392 beds and provides medical-surgical-gynecology-addictions (MSGA), pediatrics, obstetric, and psychiatric services.[1] Sinai Hospital is part of LifeBridge Health, a merged asset health system formed in 1998, which also includes Northwest Hospital Center, Levindale Hebrew Geriatric Center and Hospital, and the Jewish Convalescent and Nursing Home. Sinai is seeking Certificate of Need approval to expand its operating room capacity from 20 to 24, increase its number of Post Anesthesia Care Unit ("PACU") beds from 20 to 28, expand and renovate its Pathology Laboratory, construct a family waiting area, and relocate the hemodialysis unit. Table 1 summarizes the capacity of the operating/procedure rooms at Sinai Hospital before and after the project.

Sinai states that the four additional ORs will be used for both inpatient and outpatient surgery. The dimensions (in square feet) of the four proposed ORs, located together adjacent to the general OR suite, are as follows: 741, 735, 724, and 702 (DI #3, Exhibit 1, Phase 1A- 4th Floor Plan). In order to expand its PACU, the hospital proposes to use space that is currently a waiting area and a hemodialysis unit. To enable this reconfiguration of space, Sinai will construct a new waiting area in newly constructed space that will be cantilevered from the hospital's fourth floor. In addition, Sinai proposes to relocate the 6-bay hemodialysis unit into space that is currently not being used. On the third floor, the hospital intends to expand the Pathology Laboratory in 9,455 square feet of newly constructed space just below the four additional ORs. In addition, Sinai proposes to renovate approximately 2,389 square feet of its existing Pathology Laboratory. This will result in repositioning lab work areas to integrate old and new space. Sinai notes it will expand its third floor waiting area just under the fourth floor waiting area by cantilevering the additional space along with the fourth floor cantilevered space.

The proposed project consists of approximately 17,759 square feet of new construction added to Sinai's Ground, Third, and Fourth floors and the renovation of approximately 9,691 square feet on the hospital's existing Third and Fourth floors. The total cost of the project is $15,120,051. Sinai intends to finance the project with $3,780,013 in cash, and $11,340,038 in bonds through the Maryland Health and Higher Education Authority (DI #11, p.1). Sinai does not anticipate seeking a rate increase to cover the cost of this project.

[1] Maryland Health Care Commission, *Annual Report on Licensed Acute Care Hospital Bed Capacity: Fiscal Year 2006*, Effective July 1, 2005, p. 2.

Table 1
Existing and Proposed Operating Room/Procedure Room Capacity at Sinai Hospital of Baltimore

Operating/Procedure Room	Before Project		After Project	
	Inside Sterile Area	Outside Sterile Area	Inside Sterile Area	Outside Sterile Area
General Purpose Operating Room				
• Inpatient	0		0	
• Outpatient	4		4	
• Mixed Use	9		13	
Special Purpose Operating Room				
• Inpatient	2		2	
• Outpatient	0		0	
• Mixed Use	5		5	
Total Operating Rooms	**20**		**24**	
Procedure Rooms				
• Cystoscopy	1		1	
• Endoscopy	2		2	
• Other	0		0	1
Total Procedure Rooms	3		3	1
Dedicated C-Section OR	1		1	

Source: CON Application (DI #3, p. 11; Ambulatory Surgery Provider Directory Information, May, 25, 2005)

STAFF RECOMMENDATION

Staff finds that Sinai Hospital's proposed project is consistent with the applicable State Health Plan (COMAR 10.24.10) standards and with the general Certificate of Need criteria found in COMAR 10.24.01.08G(3)(a)-(f). The total capital cost of the project (including capitalized construction interest) is $15,090,051, with additional financing costs and cash requirements of $30,000; this results in a total project cost of $15,120,051. Sinai Hospital proposes to finance the project with a cash equity contribution of $3,780,013, and authorized bonds in the amount of $11,340,038. For reasons presented in this Report, Staff recommends that the Commission **APPROVE** Sinai Hospital's Certificate of Need application to expand its operating room capacity from 20 to 24, increase its number of Post Anesthesia Care Unit ("PACU") beds from 20 to 28, expand and renovate its Pathology Laboratory, construct a family waiting area, and relocate the hemodialysis unit.

A summary of the key findings in the Staff Report and Recommendation is provided below:

Surgical Services Utilization Trends: 2000-2005

- Over the six-year period, 2000-2005, total non-OHS surgical volumes at Sinai increased by 30.35 percent – from 10,587 to 13,800. Most of the growth in the surgical caseload occurred between 2000-2002, with the most significant increase experienced between 2001 and 2002. Data reported by Sinai shows that growth in outpatient surgery cases has been stronger than the inpatient surgery experience. There was a 47 percent increase in outpatient surgery cases as compared to an almost 18 percent increase in inpatient surgery cases over the period 2000 to 2005. As a consequence, outpatient surgery as a proportion of total surgery increased from 43 to 49 percent.

Projected Surgical Services Utilization: 2010

- Based on trending the growth experienced between fiscal years 2000 and 2004, Sinai projects that total surgical cases will increase from an estimated 13,800 in fiscal year 2005 to 18,426 by fiscal year 2010. This level of growth assumes an average annual increase in total surgical cases of 5.95 percent. Staff believes this is a reasonable projection of future surgical caseloads likely to be experienced at Sinai. On average, inpatient cases increased by 3.6 percent annually over the six-year period, 2001-2005; outpatient cases increased by 8.5 percent. Trending historic use patterns over the six-year period, 2000-2005, for inpatient and outpatient surgery suggests that the Hospital would experience about 18,600 total cases by 2010.

Availability of More Cost-Effective Alternatives

- The analysis of future need for surgical services supports the expansion of operating room capacity and related services as proposed by Sinai. The Hospital has a total of 20 operating rooms, including two operating rooms dedicated to the open heart surgery (OHS) program. By 2010, the number of operating rooms required to serve projected inpatient and outpatient surgical cases, excluding OHS cases, at Sinai would range from 25 to 26, based on a range of assumptions for average surgical minutes per case. The four operating room capacity expansion (increasing non-OHS operating rooms from 18 to 22 and total operating room capacity from 20 to 24) proposed by Sinai is reasonable given projected surgical cases and minutes.

Viability and Impact of the Proposal

- The project's estimated new construction and renovation costs are below the index cost standard as required by the State Health Plan.

- Sinai has adequately documented that it has the financial resources to develop the proposed project. The Hospital does not anticipate seeking a rate increase from the Health Services Cost Review Commission to fund the project.

- Given historical utilization patterns at Sinai, the proposed project addresses an institution-specific need for additional capacity in the operating room suite, PACU, and Pathology laboratory and will not have a negative impact on existing providers in the service area.

II. PROCEDURAL HISTORY

On October 14, 2004, Susan Whiteside, Manager of Planning and Business Development at LifeBridge Health, submitted a Letter of Intent on behalf of Sinai Hospital, to apply for a CON to renovate space to increase its complement of mixed-use operating rooms. On October 29, 2004, Ruby Potter, Health Facilities Coordinator for the Commission, acknowledged receipt of the Letter of Intent submitted by Sinai Hospital (DI #1). On April 5, 2005, Howard Sollins, Esq. submitted a revised Letter of Intent (DI #2).

On April 12, 2005, Sinai Hospital submitted a CON application (DI #3). On April 14, 2005, Commission Staff acknowledged receipt of the CON application (DI #4) and requested that the *Baltimore Sun* publish notice of receipt (DI #5). Legal notice of receipt of the CON application was published in the *Baltimore Sun* on April 20, 2005 (DI #7) and in the *Maryland Register* on April 29, 2005 (DI #6).

On April 26, 2005, Commission staff informed Sinai Hospital of a delay in forwarding completeness questions (DI #8). On May 2, 2005, completeness and additional information questions were forwarded to Sinai Hospital (DI #9). On May 13, 2005, Howard Sollins, Esq. requested an extension until June 10, 2005 to submit responses to the completeness and additional information questions. Commission staff agreed to extend the filing date in a letter dated May 13, 2005 (DI #10). On June 10, 2005, Sinai Hospital filed responses to the completeness and additional information questions (DI #11).

On June 24, 2005, Commission staff notified Sinai Hospital that the CON application was complete and would be docketed for formal review as of July 8, 2005 and requested additional information concerning the project budget (DI #12). Notice of the docketing of the application appeared in the July 8, 2005 *Maryland Register* (DI #13). On June 28, 2005, Commission staff requested publication of the docketing notice in the *Baltimore Sun* (DI #14). The notice of docketing was published in the Baltimore Sun on July 6, 2005 (DI #16). Commission Staff forwarded a copy of Sinai's CON application to the Baltimore City Health Department, requesting that the Department review the materials, and provide comments or recommendations on the project to the Commission (DI # 15).

On July 12, 2005, Howard Sollins, Esq. submitted a response to the request for additional information concerning the project budget (DI #17).

On August 1, 2005, Commission Staff sent a letter to the staff of the Health Services Cost Review Commission ("HSCRC"), requesting that the HSCRC review the financial information provided in Sinai's CON application (DI #8).

Local Government Review and Comment

A copy of the CON application was forwarded to the Baltimore City Health Department requesting that the Department review the materials, and provide comments or recommendations on the project to the Commission (DI #15). The Commission has not received comment from the Baltimore City Health Department.

III. STAFF ANALYSIS

Commission statute provides that the applicable review criteria for this CON application are the general Certificate of Need review criteria at COMAR 10.24.01.08G(3)(a) through (f). The first of these six general criteria requires that the Commission consider and evaluate applications for Certificate of Need according to all relevant State Health Plan standards, policies, and projections. Staff has analyzed the proposed project's compliance with the applicable standards in COMAR 10.24.10, State Health Plan for Acute Inpatient Services.

A. The State Health Plan

COMAR 10.24.01.08G(3)(a) requires that the Commission shall evaluate applications for Certificate of Need according to all relevant State Health Plan standards, policies, and criteria.

PART ONE: APPLICABLE STATE HEALTH PLAN STANDARDS

COMAR 10.24.10 STATE HEALTH PLAN: ACUTE INPATIENT SERVICES.

.06A System Standards

(1) Identification of Bed Need.

(a) Minimum and maximum need for acute inpatient medical/surgical/ gynecological/addictions, obstetrical, and pediatric beds are identified using the need projection methodologies in Regulation .07 of this Chapter.
(b) Projected need for trauma, critical care, and progressive care beds, and care for AIDS patients is included in the calculated medical/surgical/gynecological/ addictions need projection.

Because the project does not involve a change in acute care beds, Staff finds that this standard is not applicable.

(2) Utilization Review and Control Programs. ***Each hospital shall participate in or have utilization review and control programs and treatment protocols, including written policies governing admission, length of stay, and discharge planning and referral, which conform to the requirements of Health-General Article, §19-319(d), and enforcing regulations.***

Sinai Hospital provided a copy of their Utilization Management Plan which was updated in July 2003 (DI #3, Exhibit 2). The purpose of the Utilization Management Plan is to provide for a review of hospital admissions and lengths of stay in order to reduce or eliminate unnecessary or inappropriate hospital care by the application of nationally recognized and accepted criteria. According to the Plan, the procedures, authority, and accountability for utilization management are designed to meet the standards of State licensing, the Joint

Commission on Accreditation of Healthcare Organizations, the requirements for delegated revision of Federal patients, and third party requirements. The applicant is consistent with this standard.

(3) Travel Time. ***Medical/surgical/gynecological/addictions, critical and progressive care, obstetrical, and pediatric services shall be available within 30 minutes one-way average automobile travel time under normal driving conditions for at least 90 percent of each health service area's population.***

Because the proposed project will not change the location of current acute care hospital services, this standard does not apply.

(4) Information Regarding Charges. ***Each hospital shall provide to the public, upon inquiry, information concerning charges for and the range and types of services provided.***

Sinai Hospital states that the information required by this standard is provided to the public upon request. Furthermore, the Hospital states that a new Patient Handbook, currently in the process of being printed, will indicate that patients have a right to request and receive information regarding the charges for any treatment, and to receive an explanation of their bill upon request (DI #3, p. 21).

Based on this information, Sinai Hospital is consistent with this standard.

(5) Charity Care Policy.

(a) Each hospital shall develop a written policy for the provision of complete and partial charity care for indigent and Medicaid patients to promote access to all services regardless of an individual's ability to pay.

(b) Public notice and information regarding a hospital's charity care policy shall include, at a minimum, the following:

(i) Annual notice by a method of dissemination appropriate to the hospital's patient population (for example, radio, television, newspaper);

(ii) Posted notices in the admission, business office, and, if existing, emergency room areas within the hospital; and

(iii) Individual notice provided to each person who seeks services in the hospital at the time of preadmission or admission.

(c) Within two business days following a patient's request for charity care services, application for medical assistance, or both, the facility must make a determination of probable eligibility.

To promote financial access to hospital services, the State Health Plan for Acute Inpatient Services requires hospitals to develop and disseminate a written policy for charity care. In response to this standard, Sinai states that the hospital's charity care policy meets the requirements of this standard. The CON application submitted by Sinai includes a copy of its Charity Care Policy (DI #3, Exhibit 3). This policy, last revised in February 2005, provides

guidelines and procedures used by Sinai for unplanned, emergency services and continuing care admissions and planned, non-emergent services. Under the policy unplanned and emergent services are defined as admissions through the emergency room. Continuing care admissions are defined as admissions related to the same diagnosis/treatment as a prior admission for the patient.

The State Health Plan [COMAR 10.24.10.08.B(5)(a)-(b)] defines charity care as care for which there is no means of payment by the patient or any third-party payor. Charity care does not mean uninsured or partially insured days of care designated as deductibles or co-payments in patient insurance plans, or that portion of charges not paid as a consequence of either a contract or agreement between a provider and an insurer, or a waiver of payment due to family relationship, friendship, or professional courtesy. In analyzing compliance with the standard, Staff reviewed the Sinai Hospital Charity Care Policy, the provisions for public notice and information regarding the Hospital's charity care policy, and the length of time required for determining probable eligibility. Sinai has a written policy for provision of complete and partial charity care for indigent and Medicaid patients as required by System Standard .06A(5). For unplanned, emergent services and continuing care admissions, the policy states that patients will receive a determination of probable eligibility for charity care within two business days from receipt of the application (DI #3, Exhibit 3, p. 3). For planned, non-emergent services, the Vice President of Finance will review the case and determine whether charity be provided with a final determination being made on a case-by-case basis.

With respect to the second component of the Standard requiring public notice, Sinai states that the charity care policy is provided to patients using posted notices and direct communication. According to Sinai, notices are posted in the Business Office, Admitting Office and Emergency Room. Sinai also states that it publishes notice of the availability of charity care annually in the *Baltimore Sun* and provides documentation of the June 11, 2004 notice (DI #3, Exhibit 4 and 5).

Although data on the amount of charity care provided is not available, Staff reviewed data from HSCRC on the amount of uncompensated care (including both charity care and bad debt) provided by Sinai. The data, which are summarized on Table 2, show that the level of uncompensated care ranged between 7.0 – 9.72 percent of gross patient revenues between fiscal years 2000-2004. For the most recent year of available data (fiscal year 2004), Sinai provided about $31.0 million in uncompensated patient care.

Table 2
Gross Patient Revenue and Uncompensated Care:
Sinai Hospital of Baltimore, Fiscal Years 2000-2005

Fiscal Year	Gross Patient Revenue	Uncompensated Care	Uncompensated Care % of Gross Patient Revenues
2000	$267,842,600	$24,487,700	9.14%
2001	$288,397,800	$28,041,700	9.72%
2002	$327,337,100	$29,943,500	9.15%
2003	$380,306,800	$26,617,400	7.00%
2004	$422,745,200	$31,230,803	7.39%

Source: Health Services Cost Review Commission, Disclosure of Hospital Financial and Statistical Data, Fiscal Years 2000-2005 (Reports released April 2, 2002, April 16, 2003, June 2, 2004, and July 6, 2005).

Staff finds Sinai Hospital consistent with System Standard .06A(5).

(6) Compliance with Quality Standards. ***Each hospital shall be able to demonstrate, upon request by the Commission, compliance with all mandated federal, State, and local health and safety regulations, applicable Joint Commission on Accreditation of Healthcare Organizations and other appropriate national accrediting organization standards, applicable State certification standards, unless otherwise exempted by an appropriate waiver.***

Sinai Hospital has a three-year accreditation from the Joint Commission on Accreditation of Health Care Organizations for the period 2003-2006 (DI #3, Exhibit 6). The Hospital is also accredited by The Rehabilitation Accreditation Commission (CARF) for Brain Injury Inpatient Rehabilitation, Brain Injury Outpatient Rehabilitation, Employment Services: Comprehensive Vocational Evaluation, Employment Services: Employee Development, Employment Services: Employment Skills Training, and Inpatient Rehabilitation-Hospital services for adults (DI #11, Exhibit 3).

Staff finds that Sinai has demonstrated compliance with this standard.

(7) Transfer and Referral Agreements.

(a) Each hospital shall have written transfer and referral agreements with:

(i) Facilities capable of managing cases which exceed its own capabilities; and

(ii) Facilities which provide inpatient, outpatient, long term, home health, aftercare, follow-up, and other alternative treatment programs appropriate to the types of services the hospital offers.

(b) Written transfer agreements shall meet the requirements of Department of Health and Mental Hygiene regulations implementing Health-General Article §19-308.2 and shall include, at a minimum, the following:

(i) A mechanism for notifying the receiving facility of the patient's health status and services needed by the patient prior to transfer;

(ii) That the transferring hospital will provide appropriate life-support measures, including personnel and equipment, to stabilize the patient before transfer and to sustain the patient during transfer;

(iii) That the transferring hospital will provide all necessary patient records to the receiving facility to ensure continuity of care for the patient; and

(iv) A mechanism for the receiving facility to confirm that the patient meets its admission criteria relating to appropriate bed, physician, and other services necessary to treat the patient.

In response to System Standard .06A(7), Sinai reports that it has numerous written transfer and referral agreements with health care facilities and services in the region. Transfer agreements with Sunrise of Pikesville, North Charles Healthcare Center, Levindale Hebrew Geriatric Center and Hospital, and several other nursing homes are provided to document compliance with this standard (DI #3, Exhibit 7; DI #11, Exhibit 5). In addition, a medical transportation agreement with TransCare is provided in the CON application (DI #3, Exhibit 7). The agreements are consistent with the requirements of this standard.

Therefore, Staff finds that Sinai is consistent with the standard.

(8) Outpatient Services. ***Each hospital shall offer outpatient diagnostic and treatment services to support its patient services, either directly or through referral.***

Sinai states it currently offers a comprehensive array of outpatient diagnostic and treatment services including Department of Medicine (cardiology, endocrinology and metabolism, gastroenterology, neurology, pulmonary and critical care medicine, rheumatology, oncology, and infectious diseases), Women's Services, Emergency Services, Laboratory Services, Outpatient Adult Psychiatry, Krieger Eye Institute, Park West Primary Care Clinics, Sinai Rehabilitation Center, Ambulatory Surgery, Radiological Services, and Rubin Institute for Advanced Orthopedics.

Staff finds that Sinai meets this standard.

(9) Interpreters. ***Each hospital shall have staff or volunteer interpreters available or on call to translate for deaf and non-English speaking patients and families who do not otherwise have interpreters available to them.***

The Hospital utilizes the services of ATT to translate for non-English speaking patients and families. Sinai employs one Russian interpreter. Services for the deaf and hearing-impaired are provided through a contract with CIRS, a hearing and speech agency. Sinai also has patient educational materials and health promotion pamphlets in the Russian language and utilizes Micromedex, a comprehensive data base that provides educational information in English and Spanish (DI #3, Exhibit 8).

Staff finds Sinai consistent with this standard.

(10) In-Service Education. ***Each hospital shall institute or maintain, or both, and be able to document standardized in-service orientation and continuing education programs for all categories of direct service personnel, whether paid or volunteer.***

In response to System Standard .06A(10), Sinai provides its in-service training policy (DI #3, Exhibit 9). Staff finds the Hospital consistent with this standard.

(11) Overnight Accommodations. ***Each hospital shall make available information concerning nearby overnight accommodations to the family of each patient during that patient's stay in the facility.***

Sinai sponsors the Hackerman-Patz House, a 10-bed inn, located across the street from the hospital, which provides low cost accommodations for patients and families. Sinai also provides patients a list of nearby hotels, including name, address, telephone number, and room rates (DI #3, Exhibit 10). Staff finds Sinai consistent with this system standard.

(12) Required Social Services. ***Each hospital shall have social services available to patients and families, and written guidelines and procedures for referrals to appropriate social services following patient discharge.***

The Hospital is consistent with this standard because it provides social services for patients and their families. According to Sinai, social work is a core service in the discharge planning process (DI #3, Exhibit 2).

Standards .06A (13)-(18) of COMAR 10.24.10, which address obstetric facilities and services, have been superseded by COMAR 10.24.12.

(19) Minimum Size for Pediatric Unit. ***There shall be a minimum of ten designated pediatric beds in a unit unless:***

(a) Travel time from the unit to another pediatrics unit exceeds 30 minutes; or

(b) The hospital is the sole provider of pediatric services in its jurisdiction.

Sinai Hospital maintains a pediatric unit. As of July 1, 2005, the pediatric unit is licensed for 31 beds. The Hospital is consistent with this standard.

(20) Admission to Non-Pediatric Beds. ***Stable non-emergency pediatric patients may be admitted to licensed medical/surgical beds, which are separated from other adult beds, only when the quality and the level of care is equal to that of a designated pediatric unit.***

Sinai Hospital states that it admits pediatric patients to its Pediatric Unit. Staff finds that Sinai meets this standard.

(21) Required Services When Providing Critical Care. ***Each hospital providing critical care services shall make available, directly or through referral, health education, mental health consultation, and physical rehabilitation services for patients and, where appropriate, their families.***

Sinai states that it provides extensive health education through its in-house Education and Resource Development Department and community-based education events. Based on this representation, Staff finds Sinai consistent with this standard.

(22) Average Length of Stay for Critical Care Units. ***A hospital that has, or proposes to establish, a definitive observation cost center must achieve lower case-mix adjusted average lengths of stay in its critical care unit or units than hospitals which do not have this cost center and are otherwise comparable with respect to size and type of critical care service. The hospital has a reasonable period of time (up to six months) after opening its definitive observation unit to achieve the reduced length of stay.***

Because Sinai does not have or propose to develop a definitive observation unit, System Standard .06A(22) does not apply.

(23) Waiver of Standards for Proposals Responding to the Needs of AIDS Patients. *The Commission may waive any of the standards in the State Health Plan which would prevent the approval of an application proposing to respond to the inpatient needs of AIDS patients if:*

(a) An applicant can demonstrate that the waiver is in the public interest; and

(b) The Commission, in consultation with the Secretary of Health and Mental Hygiene, determines that a public health emergency exists.

System Standard .06A(23) does not apply to this project.

COMAR 10.24.10.06B Certificate of Need—New Construction or Expansion of Beds or Services.

The Commission will review proposals involving new construction or expansion of beds or services, including replacement of existing beds or services if new outside walls are proposed, using the following standards:

(1) Compliance with Systems Standards. *Each Certificate of Need applicant shall submit, as part of its application, written documentation of compliance with all applicable standards in Regulation .06A of this Chapter.*

The applicant's responses to the COMAR 10.24.10.06A System Standards demonstrate compliance with all applicable standards. Therefore, Sinai is consistent with this standard.

(2) Duplication of Services and Adverse Impact. *The Commission will only grant a Certificate of Need if a hospital seeking to establish or expand a service, or to construct a new facility, documents that none of the following will occur as a result of the project:*

(a) Duplication of existing services beyond that allowed by this Chapter;

(b) If the hospital's costs are above the mean, any necessary rate increase will not change the hospital's cost ranking on adjusted Screen A, prepared by the Health Services Cost Review Commission;

(c) If the hospital's costs are below the mean, any necessary rate increase will not raise the hospital's cost ranking above the mean of adjusted Screen A, prepared by the Health Services Cost Review Commission; or

(d) Inappropriately diminishing the quality of care, access to care, or the provision of uncompensated care.

Sinai proposes to expand surgical services capacity in this project. Under COMAR 10.24.01.08G(3)(b), Sinai analyzed projected population growth in its service area, trends in overall hospital utilization and surgical discharges, and the impact of future growth in surgical use rates to examine the need for additional operating room capacity. Staff believes that the capacity expansion proposed by Sinai is reasonable given projected surgical cases and minutes. Sinai states that a rate increase is not anticipated for this project. The project is designed to promote patient safety and have a positive impact on quality of care. Table 3 displays the patient safety design features of the project. The applicant is consistent with this standard.

Table 3
Patient Safety Design Features of the Proposed Project: Sinai Hospital of Baltimore

Safety Factor	Description of Design Features
Visibility of Patients	• Stage 2 PACU Bays – Recovery bays will be arranged around the nurse station with the support spaces off to the side. This provides direct visibility and proximity to each recovery bay. • Pre-op Holding – Due to the configuration of the existing space that will be renovated, full visualization of each bay will not be achievable. Because of this, the nurse station will be centrally located in order to control the flow of patients and family members in and out of the suite as well as provide close proximity to each bay. • Inpatient Dialysis – The nurse stations will be centrally located between the dialysis treatment bays. The space between the bays will have low walls to ensure full visualization is achieved.
Standardization	• Headwalls and stretcher parking location will be arranged the same for each pre-op bay and 2nd stage recovery bay. Treatment bays within the dialysis suite will also be standardized so the stretcher or bed, equipment and side chair will be in the same orientation.
Automation	• Sinai will extend the Cerner medical information system for use within the newly renovated patient areas. Sinai is currently implementing wireless CPOE technology throughout the hospital. Each pre-op and recovery bay will have a wall or bracket mounted PC dedicated to physician order entry and electronic charting. The wireless medical information system will allow staff to bring up a patient record anywhere in the hospital. • P-Tube System: There is an existing pneumatic tube station adjacent to the OR control station between the stage 1 recovery suite and the OR suite. There are no plans to extend the system or add another station within pre-op, stage 2 recovery or inpatient dialysis.
Immediate Access to Information	• Sinai will extend the Cerner medical information system for use within the newly renovated patient areas. Sinai is currently implementing wireless CPOE technology throughout the hospital. Each pre-op and recovery bay will have a wall or bracket mounted PC dedicated to physician order entry and electronic charting. The dialysis suite will have 2 mobile-wireless carts for CPOE and electronic charting. The wireless medical information system will allow staff to bring up a patient record anywhere in the hospital.
Scale-ability/ Adaptability	• The design of the new building addition still allows for future horizontal expansion of the 3rd and 4th floors over the top of the existing Hecht Building. When the Hecht Building was constructed in the early 1960's, structural capacity was built into the columns and beams for an additional 3 floors. However, based on current code requirements, the existing structure will need to be reinforced to accommodate this future expansion, if and when it ever happens.
Noise Reduction	• From an infection control standpoint, common sense says that all surfaces should be easily cleanable and the easiest and most reliable surfaces to clean are harder monolithic materials. Other than the acoustical ceiling tile, monolithic finish materials and easily scrubable fabrics will be used in the patient recovery and treatment areas. Sound absorbing cubicle curtain fabric or electronic white noise technology offer the best solutions for environments that must remain sterile. • Sinai is currently implementing voice recognition pendant pagers in order to phase out the overhead paging system.

Safety Factor	Description of Design Features
Patient Involvement in Care	• The use of mobile and wireless charting systems will allow better interaction between the staff and patient or family member directly at the point of care.
Design for Vulnerable Patients	• The circulation within the proposed areas have been arranged to minimize the cross between inpatients and outpatients, visitors, staff and materials. The OR Waiting space will be relocated to provide a near direct connection to the renovated pre-op and 2nd stage recovery bays. The current locations for ICU are within close proximity of the surgery suite. • Floor materials within the dialysis suite will be slip resistant and easily cleanable.
Human Factor Review	• Sinai is committed to patient safety and this has been at the forefront of all user group and design discussion from the outset. The majority of work involved will be expansion or additions to the existing building programs. As the design progresses, the decisions made by the user groups will set the precedent for future modifications of adjacent areas, if and when they occur.
Efficient Use of Staff Time	• Location of nurse stations and support areas in each of the recovery and treatment areas will be centralized to provide close proximity to patient bays. While maintaining a centralized nurse station at each of the nursing units, decentralized nurse work areas and multiple charting stations are spread evenly throughout the floor to reduce travel distances and allow more time for patient care. Each nurse station countertop will be constructed at sitting height to allow the nurse to sit while working.
Failure Modes & Effects Analysis (MFEA)	• Sinai has not implemented an analysis tool such a FMEA, instead relying on scheduled design process reviews and interaction between the dedicated user groups, infection control officers and hospital safety officers as well as campus services functions of housekeeping, dietary security, information systems and facilities management.

Source: DI #3, p. 33-37.

(3) **Optimal Alternative.** ***An applicant proposing new construction or expansion of beds or services, including ancillary services, shall demonstrate that it has considered the costs and effectiveness of the following alternatives: not carrying out the project, renovation, merger, consolidation, closure of the service, and delivery of the service in another setting, and that the proposed project is the optimal alternative.***

Sinai discusses the alternatives of not carrying out the project, renovation, merger and consolidation, closure of the service, and delivery of the service in another setting. According to Sinai, its need analysis shows that the Hospital needs three additional operating rooms today to meet optimal utilization levels established by the Commission. Not carrying out the project would not resolve the overcrowded conditions in the operating rooms. This project involves both renovation and new construction. Sinai states that there is not enough existing space to accommodate four additional operating rooms without new construction. Essentially, the major component of the new construction is limited to accommodating the four additional operating rooms and the expansion of the Pathology Lab. There is also some minor construction to relocate the waiting area on the fourth floor to accommodate the PACU expansion. Sinai notes that the Hospital is already part of a merged system with Northwest Hospital Center. Both hospitals have surgical programs and the surgical service could not be consolidated in one hospital. With respect to the alternative of delivery in another setting, Sinai notes that carrying out the project as proposed would allow the Hospital to be able to accommodate both inpatient and outpatient surgical growth without requiring physicians to leave the OR suite when they are performing multiple, consecutive surgeries. According to Sinai, establishing a freestanding surgery center would require the Hospital to duplicate staff and resources.

Sinai states that the proposed project is the optimal alternative because it makes best use of available space through renovation, requires the smallest amount of new construction that would be necessary to accommodate the additional operating rooms, relieves the current over-utilization of the surgical service, supports other hospital services, and does not require duplication of resources.

Staff finds that Sinai is consistent with the intent of this standard.

(4) **Burden of Proof Regarding Need.** ***The burden of demonstrating need for services not covered by Regulation .07 of this Chapter or by other parts of the State Health Plan, including sub-services for which need is not separately projected, rests on applicants.***

Sinai submitted an analysis of the need for the project. This need analysis is discussed under COMAR 10.24.01.08G(3)(b).

(5) **Discussion With Other Providers.** ***In multiple-hospital jurisdictions with excess capacity, the Commission will only grant a Certificate of Need to a hospital not part of a merged or consolidated organization seeking to establish or expand a service, or to construct a new facility, if the applicant demonstrates in the proposal that merged, consolidated, and shared services, programs, or facilities have been discussed with other health care providers.***

This standard does not apply because Sinai is part of LifeBridge, a merged asset hospital system.

(6) Cost Per Square Foot of Hospital Space.

(a) ***The cost per square foot of hospital construction projects shall be no greater than the cost of good quality Class A hospital construction given in the Marshall and Swift Valuation Quarterly, updated to the nearest quarter using Marshall and Swift update multipliers, and adjusted as shown in the Marshall and Swift guide as necessary for terrain of the site, number of levels, geographic locality, and other listed factors.***

(b) Each Certificate of Need applicant proposing costs per square foot above the limitations set forth in the Marshall and Swift guide must demonstrate that the higher costs are reasonable.

This standard requires a comparison of the project's estimated construction cost with an index cost derived from the Marshall Valuation Service (MVS).[2] Incorporating appropriate adjustments, the estimated MVS cost index for new construction is $542.84; the MVS cost index for renovation is $335.81. Table 4 summarizes the MVS analysis for the Sinai project.

Table 4
Comparison Construction Cost Estimates with the Marshall Valuation Service Cost Index: Sinai Hospital of Baltimore

Cost Component	New Construction	Renovation
Building	$7,622,553	$1,379,288
Fixed equipment	390,000	135,350
Site preparation	362,662	-0-
Architect/engineering fees	966,150	499,300
Permits	80,200	29,200
Capitalized construction interest	154,647	27,983
TOTAL	$9,576,212	$2,071,121
Adjusted Project Costs	$8,815,564	$2,071,121
Square Footage	17,759	9,691
Total Cost per Square Foot	$496.40	$213.72
Marshall Valuation Service Cost Index	$542.84	$335.81

Source: DI#3, p. 16 and DI #11, Attachment 7.

Because the project new construction cost of $496.40 and renovation cost of $213.72 is below the MVS benchmarks, Staff finds that the project is consistent with this review standard.

(7) Cost Per Square Foot of Non-Hospital Space.

(a) For construction of non-hospital projects sponsored by hospitals, cost per square foot of construction must be within the limitations of the appropriate good quality class A construction costs given in the Marshall and Swift guide for the appropriate structure.

[2] In July 2003, the Marshall and Swift Valuation Service index was superseded by the Marshall Valuation Service. The replacement document contains an expanded and a more detailed version of the replaced Marshall and Swift Valuation Quarterly and is updated monthly.

(b) Each Certificate of Need applicant proposing costs per square foot above the limitations set forth in the Marshall and Swift guide must demonstrate that the higher costs are reasonable.

Sinai's project does not involve the construction of non-hospital space; therefore, this standard is not applicable.

(8) Maximum Square Footage.

(a) For all new construction projects, the following maximum standards for departmental gross square feet per bed apply:

(i) Medical/surgical nursing units--325;

(ii) Intensive care and coronary care--365;

(iii) Pediatric--300; and

(iv) Psychiatric--405.

(b) Square footage needed for compliance with the federal Americans with Disabilities Act may be added to the maximums in (a).

(c) When the following areas are necessary, the square footage allotted must be shown to be needed when their inclusion results in exceeding the standard: solariums, patient and visitor lounges, social spaces for patients (day rooms), teaching or conference space, nurses' lounges, special purpose treatment rooms (ear, nose and throat rooms; cast rooms; psychiatric group therapy and occupational therapy rooms; and others), and unit manager's office.

(d) Each Certificate of Need applicant proposing to construct a nursing unit larger than that allowed in (a) shall provide evidence that the service cannot be provided safely and effectively within the limits of (a).

The proposed project does not involve the construction of acute care general hospital rooms so this standard does not apply.

(10) Approval of Project Beyond Construction Cost and Square Footage Standards. *A Certificate of Need applicant proposing construction costs or square footage above those allowed in Standards .06B(7)(a), (8)(a), or (9)(a), as adjusted by findings under Standards .06B(7)(a), (8)(b), or (9)(b)-(d), must demonstrate that all additional costs will be financed by the applicant without increases in rates.*

Sinai Hospital's proposed construction project does not involve construction costs above allowed standards. Therefore, this standard does not apply.

(11) Rate Reduction Agreement. *A high cost hospital will not be approved for Certificate of Need for the establishment of a new acute care service, or for the construction, renovation, upgrading, expansion, or modernization of acute care services, including support and ancillary services, unless it has first agreed to enter into a rate reduction agreement with the Health Services Cost Review Commission, or the Health Services Cost Review Commission has determined that a rate reduction agreement is not necessary.*

Sinai Hospital has been under a "spend down" agreement with the Health Services Cost Review Commission (HSCRC). This agreement terminated on October 1, 2005. Sinai Hospital is consistent with this standard.

(12) Efficiency. ***For Certificate of Need applications that involve improved facility or service efficiency, applicants must identify the specific portion of the project for which efficiency claims are made and demonstrate that efficiencies will be realized as a result of the project.***

The applicant states that this project is designed to address space inadequacies in the existing building and not inefficiencies. This standard is not applicable.

(13) Expedited Review for Conversions.

(a) The Commission will grant an expedited review of a Certificate of Need application for conversions of excess acute care capacity to a non-acute health care service under the expedited review provisions of COMAR 10.24.01.07B(3), if the proposed service does not exceed a need identified in the State Health Plan and no other applicant proposes the same service to meet the same need.

(b) The Commission will approve the Certificate of Need application under this expedited review if the:

(i) Applicant demonstrates that appropriate quality of care will be assured, including meeting applicable standards established in the State Health Plan and by federal, State, local, and private accrediting bodies;

(ii) Proposed service will provide financial access to care consistent with standards for the service, or similar services, found in the State Health Plan;

(iii) Proposed service will be offered at a reasonable cost, and the hospital can document that its charges will be acceptable to payers, that is, public payers, private insurance, or private pay patients; and

(iv) ***Proposed services are in the public interest.***

This project does not involve the conversion of excess acute care capacity to a non-acute health care service; therefore, this standard is not applicable.

(14) Preference for Conversion to Non-Acute Care. ***When a hospital proposes a conversion of excess acute care capacity to a non-acute care service subject to Certificate of Need review, the Commission may give preference to such a hospital project over a non-hospital applicant in a comparative review for that non-acute care service.***

This project does not involve the conversion of excess acute care capacity to a non-acute health care service. This standard is not applicable to Sinai's project.

(15) Preference for Conversion to Acute Psychiatric Care. ***When two or more hospitals are in a comparative review for acute psychiatric care services, the Commission will give preference to a proposal for conversion of excess acute care capacity over a proposal for***

new construction to provide the same services, and will give a preference to applicants who sign a written agreement with the Mental Hygiene Administration as part of an application for state hospital conversion bed need, as described in the Acute Psychiatric Services section of the State Health Plan, COMAR 10.24.07.02B.

This project does not involve a comparative review for acute psychiatric services; therefore, this standard is not applicable.

(16) Emergency Certificate of Need. *In granting an emergency Certificate of Need requiring new construction or expansion of beds or services under COMAR 10.24.01.20, the Commission does not apply the standards in Regulation .06B of this Chapter.*

This project does not involve an emergency Certificate of Need; therefore, this standard is not applicable.

COMAR 10.24.10.06C Certificate of Need-Renovation of Existing Beds or Services.

(1) Types of Projects. *The Commission will consider proposals for renovation of hospital beds or services, including ancillary services, if the applicant demonstrates that the project is needed, and addresses one or more of the following:*

(a) The service needs additional space, as documented by written recommendations from appropriate accreditation and licensing agencies regarding comparisons to the departmental square footage of comparable services, or square footage standards contained in this Chapter;

(b) There are operating problems which can be corrected by the proposed renovation, as documented to the satisfaction of the Commission by specific data regarding cost savings which would occur if the project is completed, and for which the Commission is satisfied that the proposed level of investment is appropriate in relation to the operating efficiencies to be generated;

(c) The renovation project is being proposed to correct deficiencies that place the facility at risk of health and safety citations from licensing and accrediting organizations; or

(d) The hospital can demonstrate to the Commission's satisfaction that the renovation is necessary to maintain a modern facility in a good state of repair, and acceptable to its community.

The need for this project is discussed under Standard 10.24.01.08G(3)(b).

(2) Compliance with System Standards. *Each Certificate of Need applicant shall submit, as part of its application, written documentation of compliance with all applicable standards in Regulation .06A of this Chapter.*

The applicant's responses to the COMAR 10.24.10.06A System Standards demonstrate compliance with all applicable standards. Therefore, Sinai is consistent with this standard.

(3) Conditions for Approval. *The Commission will grant a Certificate of Need to a hospital proposing to renovate existing hospital beds or services, including ancillary services, only if the applicant demonstrates that the project:*

(a) Will be financially feasible, after evaluating projected revenues based on historical patient utilization data from the most recent period available, as well as Commission predictions of future changes in utilization of the service in the jurisdiction;

(b) Will not have an adverse impact on the health care system, after evaluating that none of the following will occur:

(i) There will be a diminution in quality of care, access to care, or the provision of charity care as a result of the project;

(ii) Any other impact results which the Commission determines, based on substantial evidence, is detrimental to health care consumers; or

(c) Costs.

(i) If the hospital's costs are above the mean, any necessary rate increase will not change the hospital's cost ranking in adjusted Screen A, prepared by the Health Services Cost Review Commission;

(ii) If the hospital's cost are below the mean, any necessary rate increase will not raise the hospital's cost ranking above the mean of adjusted Screen A, prepared by the Health Services Cost Review Commission; and

(d) Is the optimal alternative, after considering the costs and effectiveness of the following alternatives: not carrying out the project, new construction, other renovations, merger, consolidation, closure of the service, and delivery of the service in another setting.

Sinai is proposing to add four operating rooms, increase the number of PACU beds, and expand and renovate the Pathology Laboratory in this CON project. Findings concerning the financial feasibility, impact on existing providers, cost, and alternatives to the project are discussed in detail under COMAR 10.24.01.08G(3)(c), 10.24.01.08G(3)(d), 10.24.01.08G(3)(f).

(4) Relationship to New Construction Costs. *The Commission will not approve renovation costs in excess of costs for good quality Class A new construction listed in Marshall and Swift's Valuation Quarterly.*

The estimate for the Sinai project is below the Marshall Valuation Service estimate as discussed under Standard .06B(7). Therefore, Staff finds that Sinai is in compliance with this standard.

(5) Maximum Square Footage. *A renovation project must adhere to the maximum square footage requirements contained in Regulation .06B(9) of this Chapter.*

This standard does not apply because Sinai is not proposing the renovation of medical-surgical nursing units, intensive care/coronary care, pediatric or psychiatric inpatient services.

(6) Approval of Project Beyond Square Footage Standards. *A Certificate of Need applicant proposing square footage above those allowed in Regulation .06B(9) of this Chapter must demonstrate that all additional costs will be financed by the applicant without increases in rates.*

This standard does not apply because Sinai is not proposing the renovation of medical-surgical nursing units, intensive care/coronary care, pediatric or psychiatric inpatient services.

(7) Conversions to Non-Health Related Uses. *Providing a hospital has delicensed excess acute care capacity, a proposal to convert delicensed capacity to a non-health care use is not subject to Commission review under Certificate of Need, including requests for exemptions from Certificate of Need review.*

This standard does not apply because Sinai is not proposing to convert delicensed bed capacity to non-health related uses.

(8) Excess Capacity. *Where excess capacity in a jurisdiction has been projected in accordance with Regulation .07 of this Chapter, the Commission will approve a hospital renovation project for acute care services only if one or more of the following conditions are met:*

(a) The occupancy rate for the service or services to be renovated will meeting the applicable minimum occupancy standards in Regulation .07D and COMAR 10.24.07.02B following completion of the project;

(b) The applicant waives its right to increase its bed complement through exemption from Certificate of Need review permitted under COMAR 10.24.01 until the occupancy rate for the service or services to be renovated meets the applicable minimum occupancy standards in Regulation .07D and COMAR 10.24.07.02B;

(c) If at least 50 percent of the applicant's primary service area is located within a planned high growth area designated by an appropriate governmental authority consistent with the requirements of Economic Growth, Resource Protection, and Planning Act of 1992, the applicant may retain its current complement of licensed beds without waiving its right to increase its beds complement through exemption from Certificate of Need review permitted under COMAR 10.24.01; or

(d) The project is designed and demonstrated to enhance physical and institutional efficiency.

The project proposed by Sinai is designed to enhance the physical and institutional efficiency of the operating room suite. The Hospital is consistent with this standard.

(9) Emergency Certificate of Need. *In granting an emergency Certificate of Need requiring renovation under COMAR 10.24.01.20, the Commission does not apply the standards in Regulation .06 of this Chapter.*

This project does not involve an emergency Certificate of Need; therefore, this standard is not applicable.

B. Need

COMAR 10.24.01.08G(3)(b) requires that the Commission consider the applicable need analysis in the State Health Plan. If no State Health Plan need analysis is applicable, the Commission shall consider whether the applicant has demonstrated unmet needs of the population to be served, and established that the proposed project meets those needs.

To examine the need for additional operating room capacity Sinai analyzed projected population growth in its service area and trends in surgical cases. According to Sinai, the primary service area for surgical cases includes 20 zip code areas; the secondary service area includes 39 zip code areas. The combined primary and secondary service areas for surgical services at Sinai predominantly cover the central Maryland region, including Baltimore City and the counties of Anne Arundel, Baltimore, Carroll, Harford, and Howard. Between 2004 and 2010, the total population of the primary service area is projected to grow by 1.3 percent (or 0.2 percent annually); the population of the combined primary and secondary service area is projected to grow by 3.4 percent (or 0.6 percent annually). Over this six-year period (2004-2010), the 65 and over population is projected to increase by 3.4 percent in the primary service area and 8.8 percent in the combined primary and secondary service area. (Table 5 provides population projections for the primary and secondary service areas for surgical discharges from Sinai Hospital.)

Table 5
Surgical Services Primary and Secondary Service Area
Total and 65 Years and Over Population:
Sinai Hospital of Baltimore, 2004 and 2010

Sinai Service Area	2004	2010	% Change
Primary Service Area, All Ages	785,264	795,522	1.3%
Primary Service Area, 65 Years +	109,049	112,805	3.4%
Primary and Secondary Service Area, All Ages	1,937,046	2,002,123	3.4%
Primary and Secondary Service Area, 65 Years +	247,338	269,221	8.8%

Source: DI #3, p. 57-61.

Sinai states that it currently has a total of 20 operating rooms, including two operating rooms dedicated to the open heart surgery (OHS) program (DI #3, p. 62). According to Sinai, assuming full utilization of 122,400 minutes per operating room, the 18 non-OHS operating rooms are currently functioning at 91 percent of capacity. Given an optimal level of utilization (80 percent or 97,920 minutes per OR), Sinai would require 20.4 operating rooms based on projected fiscal year 2005 non-OHS surgical volumes (Refer to Table 6).

Although there is a projected decline between fiscal years 2004 and 2005, Sinai notes that total surgical case volumes grew from 10,587 to 13,800 between 2000-2005—an increase of 30.3 percent. According to Sinai, the decline in surgical case volume from July-December 2004 (used to estimate total fiscal year 2005 experience), is primarily due to the loss of surgical case volume

in three specialties. Sinai lost one of two high volume pediatric surgeons in September 2004 when that physician accepted a position at a pediatric hospital in another state. In addition, one of Sinai's highest volume neurosurgeons was precluded from doing cases at Sinai from July

Table 6
Surgical Cases, Surgical Minutes, Percent Utilization at Full Capacity and Needed Operating Rooms at Optimal Capacity: Sinai Hospital of Baltimore, Fiscal Years 2000-2005

Fiscal Year	Surgical Cases	Surgical Minutes			Full Utilization (122,400 Minutes per OR)		Optimal Capacity	
		Case Minutes	Cleanup Minutes	Total Minutes	Available Minutes	% Utilization	Minutes Per OR	Number of OR's
2000	10,587	1,188,894	317,610	1,506,504	1,713,600	87.91%	97,920	15.4
2001	10,683	1,180,070	320,490	1,500,560	1,713,600	87.57%	97,920	15.3
2002	13,020	1,461,431	390,600	1,852,031	2,203,200	84.06%	97,920	18.9
2003	13,340	1,485,613	400,200	1,885,813	2,203,200	85.59%	97,920	19.3
2004	14,261	1,590,282	427,830	2,018,112	2,203,200	91.60%	97,920	20.6
2005	13,800	1,587,816	414,000	2,001,816	2,203,200	90.86%	97,920	20.4

Source: DI #3, p. 63; DI #11, p.23. (The data reported reflects 14 operating rooms for fiscal years 2000 and 2001; and, 18 operating rooms for fiscal years 2002-2005. Available minutes is based on full utilization at 122,400 minutes per OR. Surgical volumes are based on use of the non-OHS operating rooms. Fiscal Year 2005) data is annualized based on July-December experience.)

to October 2004 because of a business dispute within his practice. The dispute has since been resolved, and the surgeon resumed surgical work at Sinai in October. The Hospital's orthopedic volumes also declined earlier this year when one of the large orthopedic groups doing surgery at Sinai stopped taking worker's compensation cases because of declining reimbursement. Because Sinai has recruited several surgeons and is in the process of recruiting others, the Hospital anticipates that actual fiscal year 2005 volumes will exceed the estimated volumes shown in Table 7. Based on the trend in surgical cases between 2000 and 2004, Sinai projects 18,426 total surgical cases by 2010. Assuming that total average minutes per case remains constant (141.5 minutes per case) and optimal occupancy levels of 97,920 minutes per OR, Sinai states that the Hospital would require 27 non-OHS operating rooms by 2010. Due to space constraints, Sinai is proposing an increase at this time of four operating rooms—from 20 to 24 (DI #3, p. 64-66).

In reviewing the number of rooms required to meet future surgical caseloads at Sinai, Staff analyzed projected trends in inpatient and outpatient surgery and the impact of alternate assumptions on the total number of minutes per case. Over the six-year period, 2000-2005, total non-OHS surgical case volume at Sinai increased by 30.35 percent – from 10,587 to 13,800. As shown on Table 8 and Figure 1, most of the growth in the surgical caseload occurred between 2000-2002, with the most significant increase experienced between 2001 and 2002. Data reported by Sinai shows that growth in outpatient surgery cases has been stronger than the inpatient surgery experience. There was a 47 percent increase in outpatient surgery cases as compared to an almost 18 percent increase in inpatient surgery cases over the period 2000 to 2005. As a consequence, outpatient surgery as a proportion of total surgery increased from about 43 to 49 percent.

Table 7
Operating Rooms Needed Based on Trended Growth in Total Surgical Cases:
Sinai Hospital of Baltimore

Fiscal Year	Surgical Cases	Surgical Minutes			Optimal OR Capacity (in minutes)	Needed OR's	Total Minutes Per Case
		Case Minutes	Cleanup Minutes	Total Minutes			
2000	10,587	1,188,894	317,610	1,506,504	97,920	15.4	142.3
2001	10,683	1,180,070	320,490	1,500,560	97,920	15.3	140.5
2002	13,020	1,461,431	390,600	1,852,031	97,920	18.9	142.2
2003	13,340	1,485,613	400,200	1,885,813	97,920	19.3	141.4
2004	14,261	1,590,282	427,830	2,018,112	97,920	20.6	141.5
2005	13,800	1,587,816	414,000	2,001,816	97,920	20.4	145.1
2006	14,725	1,642,055	441,750	2,083,805	97,920	21.3	141.5
2007	15,651	1,745,235	469,530	2,214,765	97,920	22.6	141.5
2008	16,576	1,848,415	497,280	2,345,695	97,920	24.0	141.5
2009	17,501	1,951,595	525,030	2,476,625	97,920	25.3	141.5
2010	18,426	2,054,775	552,780	2,607,555	97,920	26.6	141.5

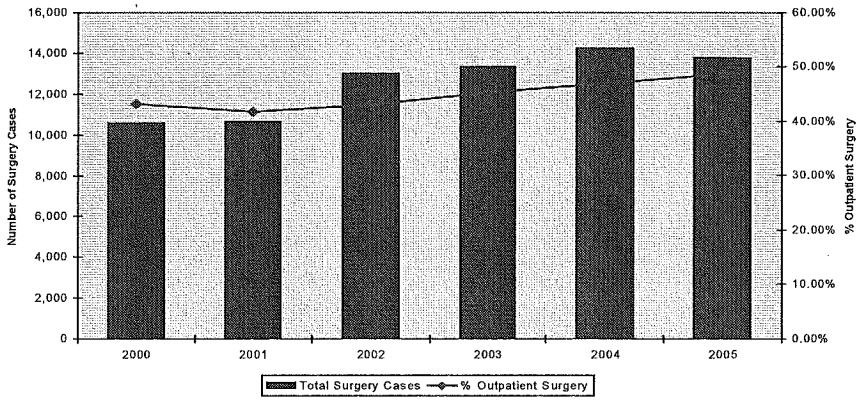
Source: DI #3, p. 65. (Surgical volumes are based on use of the non-OHS operating roms, Fiscal year 2005 data is annualized based on July-December experience.)

Table 8
Trends in Inpatient and Outpatient Surgical Cases:
Sinai Hospital of Baltimore, Fiscal Years 2000-2005

Year	Inpatient Cases			Outpatient Cases			Total Cases	
	Number	% of Total	% Annual Change	Number	% of Total	% Annual Change	Number	% Annual Change
2000	6,021	56.87%		4,566	43.13%		10,587	
2001	6,226	58.28%	3.40%	4,457	41.72%	-2.39%	10,683	0.91%
2002	7,422	57.00%	19.21%	5,598	43.00%	25.60%	13,020	21.88%
2003	7,303	54.75%	-1.60%	6,037	45.25%	7.84%	13,340	2.46%
2004	7,549	52.93%	3.37%	6,712	47.07%	11.18%	14,261	6.90%
2005	7,078	51.29%	-6.24%	6,722	48.71%	0.15%	13,800	-3.23%
2000-2002			23.27%			22.60%		22.98%
2003-2005			-3.08%			11.35%		3.45%
2000-2005			17.56%			47.22%		30.35%

Source: DI# 3, p. 63. (Fiscal year 2005 data is annualized based on July-December experience.)

Figure 1
Total Surgery Cases and Percent Outpatient Surgery Cases: Sinai Hospital of Baltimore, Fiscal Years 2000-2005



Source: DI #3, p. 63.

Based on trending the growth experienced between fiscal years 2000 and 2004, Sinai projects that total surgical cases will increase from an estimated 13,100 in fiscal year 2005 to 18,426 by fiscal year 2010. This level of growth assumes an average annual increase in total surgical cases of 5.95 percent. Staff believes this is a reasonable projection of future surgical caseloads likely to be experienced at Sinai. On average, inpatient cases increased by 3.6 percent annually over the six-year period, 2001-2005; outpatient cases increased by 8.5 percent. Trending historic use patterns over the six-year period, 2000-2005, for inpatient and outpatient surgery suggests that the Hospital would experience about 18,600 total cases by 2010.

Analysis of data on total operating room minutes per case for inpatient and outpatient surgery is shown on Table 9. Between 2000 and 2005, total minutes per case for inpatient surgery have increased an average of about 2.1 percent annually. In 2000, the average inpatient surgical case required a total of about 172 minutes to complete. By 2005, about 191 minutes were required to complete an average inpatient surgical case. For outpatient surgery, the minutes per case have declined an average of 0.6 percent annually over the past six years. About 103 total minutes were required to complete the average outpatient surgery case in 2000 as compared to a total of about 97 minutes in 2005. When compared to hospitals in their HSCRC Reasonableness of Charges (ROC) Peer Group, Sinai's 2004 inpatient surgery minutes per case are 16.5 percent above the average (i.e., adjusted for cleanup minutes the peer group average is 172 minutes per case as compared to 195 minutes per case for Sinai).[3] For outpatient surgery, Sinai's minutes per case experience is below the average (i.e., adjusted for cleanup minutes the peer group average is 91 minutes as compared to 90 minutes per case for Sinai).

[3] The HSCRC ROC Peer Group 3 includes: Bon Secours Hospital; Harbor Hospital; Johns Hopkins Bayview Medical Center; Maryland General Hospital; Mercy Medical Center; Prince George's Hospital Center; Sinai Hospital; and Union Memorial Hospital. The Peer Group data does not exclude open heart surgery cases.

Table 9
Trends in Inpatient and Outpatient Surgery Cases, Surgical Minutes, and Minutes Per Case Using Alternate Assumptions: Sinai Hospital of Baltimore, Fiscal Years 2000-2005 and Projected 2006-2010

INPATIENT SURGERY		Inpatient Cases	Surgical Minutes: Case Minutes	Surgical Minutes: Cleanup Minutes	Surgical Minutes: Total Minutes	Total Minutes Per Case
Fiscal Year	2000	6,021	855,343	180,630	1,035,973	172.06
	2001	6,226	886,210	186,780	1,072,990	172.34
	2002	7,422	1,111,482	222,660	1,334,142	179.76
	2003	7,303	1,108,335	219,090	1,327,425	181.76
	2004	7,549	1,249,835	226,470	1,476,305	195.56
	2005	7,078	1,137,396	212,340	1,349,736	190.69
Projected Minutes Assuming Constant Minutes Per Case (FY 2004 Actual):						
Fiscal Year	2006	7,335			1,434,419	195.56
	2007	7,601			1,486,489	195.56
	2008	7,877			1,540,448	195.56
	2009	8,163			1,596,366	195.56
	2010	8,459			1,654,315	195.56
Projected Minutes Assuming Peer Group Average Minutes Per Case (FY 2004 Actual):						
Fiscal Year	2006	7,335			1,261,620	172.00
	2007	7,601			1,307,372	172.00
	2008	7,877			1,354,844	172.00
	2009	8,163			1,404,036	172.00
	2010	8,459			1,454,948	172.00
OUTPATIENT SURGERY		Outpatient Cases	Surgical Mintues: Case Minutes	Surgical Mintues: Cleanup Minutes	Surgical Mintues: Total Minutes	Total Minutes Per Case
Fiscal Year	2000	4,566	333,551	136,980	470,531	103.05
	2001	4,457	293,860	133,710	427,570	95.93
	2002	5,598	349,949	167,940	517,889	92.51
	2003	6,037	377,278	181,110	558,388	92.49
	2004	6,712	340,447	201,360	541,807	80.72
	2005	6,722	450,420	201,660	652,080	97.01
Projected Minutes Assuming Constant Minutes Per Case (FY 2004 Actual):						
Fiscal Year	2006	7,292			588,612	80.72
	2007	7,910			638,527	80.72
	2008	8,581			692,674	80.72
	2009	9,309			751,412	80.72
	2010	10,098			815,132	80.72
Projected Minutes Assuming Peer Group Average Minutes Per Case (FY 2004 Actual):						
Fiscal Year	2006	7,292			663,572	91.00
	2007	7,910			719,810	91.00
	2008	8,581			780,871	91.00
	2009	9,309			847,119	91.00
	2010	10,098			918,918	91.00

Source: Maryland Health Care Commission

Table 9 analyzes the impact on total project minutes of alternate assumptions regarding minutes per case for inpatient and outpatient surgery. Under one set of assumptions, the minutes per case in 2004, the most recent year of complete data, are used to project total surgical minutes through 2010. The second set of assumptions uses the peer group average minutes per case for inpatient and outpatient surgery to project total surgical minutes through 2010. Table 10 analyzes the number of operating rooms required given these two sets of assumptions. By 2010, the number of operating rooms required to serve projected inpatient and outpatient surgical cases at Sinai would range from 25 to 26. Staff believes that the capacity expansion proposed by Sinai is reasonable given projected surgical cases and minutes.

Table 10
Projected Inpatient and Outpatient Surgical Minutes
and Number of Operating Rooms Needed at Full and Optimal Capacity

				Full Capacity		Optimal Capacity	
	Total Minutes				Operating		Operating
Year	Inpatient	Outpatient	Total	Minutes	Rooms	Minutes	Rooms
2000	1,035,973	470,531	1,506,504	122,400	12.3	97,920	15.4
2001	1,072,990	427,570	1,500,560	122,400	12.3	97,920	15.3
2002	1,334,142	517,889	1,852,031	122,400	15.1	97,920	18.9
2003	1,327,425	558,388	1,885,813	122,400	15.4	97,920	19.3
2004	1,476,305	541,807	2,018,112	122,400	16.5	97,920	20.6
2005	1,349,736	652,080	2,001,816	122,400	16.4	97,920	20.4
Projected Minutes Assuming Constant Minutes Per Case (FY 2004 Actual):							
2006	1,434,419	588,612	2,023,031	122,400	16.5	97,920	20.7
2007	1,486,489	638,527	2,125,016	122,400	17.4	97,920	21.7
2008	1,540,448	692,674	2,233,122	122,400	18.2	97,920	22.8
2009	1,596,366	751,412	2,347,778	122,400	19.2	97,920	24.0
2010	1,654,315	815,132	2,469,447	122,400	20.2	97,920	25.2
Projected Minutes Assuming Peer Group Average Minutes Per Case (FY 2004 Actual):							
2006	1,261,620	663,572	1,925,192	122,400	15.73	97,920	19.66
2007	1,307,372	719,810	2,027,182	122,400	16.56	97,920	20.70
2008	1,354,844	780,871	2,135,715	122,400	17.45	97,920	21.81
2009	1,404,036	847,119	2,251,155	122,400	18.39	97,920	22.99
2010	1,454,948	918,918	2,373,866	122,400	19.39	97,920	24.24

Source: Maryland Health Care Commission

Sinai states that it currently has 20 post anesthesia care unit (PACU) beds. According to Sinai, this capacity is much lower than the typical ratio of PACU beds to ORs (2.0 to 2.5), even for the existing ORs. As part of this project, Sinai is proposing to increase the PACU beds from 20 to 28 beds. In order to enable the expansion of the PACU, Sinai will relocate a hemodialysis unit into space that is currently vacant on the 4th floor. The project also includes expansion of the Pathology Laboratory on the 3rd floor. According to Sinai, several areas within the current lab function in outdated and cramped quarters in an older building. Office space and staff support space are now spread throughout the entire lab rather than centralized in a dedicated area. According to Sinai, centralization of these functions would decrease unnecessary foot traffic through testing areas. While the Pathology Laboratory has not received any written citations

focused on the deficiencies of this space during annual surveys, last year's surveyors addressed the inadequacies of the space in verbal comments (DI #3, p. 66-67).

In summary, Sinai has demonstrated the need for four additional operating rooms and provided a reasonable proposal for expansion of the PACU and Pathology Laboratory. The applicant is consistent with this review criterion.

C. Availability of More Cost-Effective Alternatives

COMAR 10.24.01.08G(3)(c) requires the Commission to compare the cost-effectiveness of providing the proposed service through the proposed project with the cost-effectiveness of providing the service at alternative existing facilities, or alternative facilities which have submitted a competitive application as part of a comparative review.

According to Sinai, its need analysis shows that the Hospital requires three additional operating rooms today to meet optimal utilization levels established by the Commission. Sinai's current utilization rates result in posting delays, expansion of the surgical day into evening hours with associated overtime costs, and patient, family and surgeon dissatisfaction. Although Sinai employs performance improvement strategies, current volumes also limit the ability to deploy the two most frequently used strategies to decrease surgical throughput times—"block times" and scheduling like cases in specific rooms (DI #3, p 34). Because Sinai can reasonably support the need for expanding operating room capacity on its campus, the option of providing additional surgical capacity through a freestanding ambulatory surgery facility was rejected. Sinai notes that carrying out the project as proposed would allow the Hospital to be able to accommodate both inpatient and outpatient surgical growth without requiring physicians to leave the OR suite when they are performing multiple, consecutive surgeries.

Staff finds that the analysis of future need for surgical services at Sinai supports the proposed expansion of operating room capacity and related services.

D. Viability of the Proposal

COMAR 10.24.01.08G(3)(d) requires the Commission to consider the availability of financial and nonfinancial resources, including community support, necessary to implement the project within the time frame set forth in the Commission's performance requirements, as well as the availability of resources necessary to sustain the project.

Availability of Financial Resources

Sinai Hospital is proposing a major construction project to: 1) increase operating rooms (ORs), 2) increase the post-anesthesia care unit (PACU) for recovery of surgical patients, 3) relocate the Pathology lab, and 4) relocate a waiting area and a hemodialysis unit. The Hospital proposes four additional operating rooms, expanding its total OR complement to 24, in new space cantilevered off the fourth floor. The hospital proposes an 8-bed increase in its complement of PACU beds from 20 to 28. In order to expand the PACU area, Sinai will use space that is currently a waiting area and a hemodialysis unit. The current waiting area will be

relocated into newly constructed space and the hemodialysis unit will be relocated to space that is currently not being used. Finally, the Hospital will expand the Pathology lab into newly constructed space just below the four additional operating rooms.

The total capital cost of the project (including capitalized construction interest) is $15,090,051, with additional financing costs and cash requirements of $30,000; this results in a total project cost of $15,120,051 per the CON application. Sinai Hospital proposes to finance the project with 1) a cash equity contribution of $3,780,013 and 2) authorized bonds in the amount of $11,340,038. Audited financial statements for fiscal year 2005 are not available as of this date. Staff reviewed the consolidated audited financial statements for the years ending June 30, 2004 and June 30, 2003, which include the Hospital, Children's Hospital at Sinai Foundation, Inc. and Baltimore Jewish Health Foundation (BJHF). BJHF was formed to hold and manage investments for the purpose of providing support to the hospital. These financial statements indicate availability of sufficient cash resources for the proposed equity contribution.

Recent Financial Performance

Sinai Hospital's most recent operational results for those services that are regulated by the Health Services Cost Review Commission are presented below:

Table 12
Recent Financial Performance: Sinai Hospital of Baltimore

Fiscal Year Ending	June 2004	June 2003	June 2002
Net Operating Revenue-Regulated	$368,299,197	$323,912,331	$281,503,800
Net Operating Profit-Regulated	$35,769,024	$23,326,613	$2,958,800
Operating Margin-Regulated	9.71%	7.20%	1.05%
Peer Group 1 Operating Margin-Median	4.32%	3.73%	3.43%
Total Excess Revenue	$21,624,807	$15,508,348	($5,571,500)

Source: Health Services Cost Review Commission, Disclosure of Hospital Financial and Statistical Data dated July 6, 2005 which reports regulated and non-regulated activity as reported on the R/E Schedule of the Annual Report.

As reflected in the table above, the operating margin of Sinai Hospital for services regulated by the Health Services Cost Review Commission has ranged from 1.05% to 9.71% of net operating revenue for fiscal years 2002-2004. For the fiscal years 2003 and 2004, the operating margin of Sinai was considerably above that of its peer group. Staff notes that the hospital experienced significant losses in unregulated revenue which reduced the profit margin in 2003 and 2004, and converted the small surplus in 2002 to a deficit.

Table 11- Sinai Hospital of Baltimore Project Budget

1. Capital Costs **a. New Construction**	**Budget**
(1) Building	$7,622,553
(2) Fixed Equipment(not included in construction	390,000
(3) Land Purchase	-
(4) Site Preparation	362,662
(5) Architect/Engineering Fees	966,150
(6) Permits	80,200
SUBTOTAL – New Construction	*$ 9,421,565*
b. Renovations (1) Building	$1,379,288
(2) Fixed Equipment(not included in construction	135,350
(3) Architect/Engineering Fees	499,300
(4) Permits	29,200
SUBTOTAL - Renovation	*$ 2,043,138*
c. Other Capital Costs (1) Major Movable Equipment	$2,464,000
(2) Minor Movable Equipment	-
(3) Contingencies	861,287
(4) Other (Specify)	-
SUBTOTAL – Other Capital Costs	*$ 3,325,287*
Total Current Capital Costs	**$14,789,990**
d. Capitalized Construction Interest	$300,061
e. Inflation	-
TOTAL PROPOSED CAPITAL COSTS	**$15,090,051**
2. Financing Cost and Other Cash Requirements	
a. Loan Placement Fees	-
b. Bond Discount	-
c. Legal Fees, Printing, etc.	$15,000
d. Consultant Fees	
CON Application Assistance	15,000
Other (Purchase bed rights)	-
e. Liquidation of Existing Debt	-
f. Debt Reserve Fund	-
g. Principal Amortization	-
h. Other	-
SUBTOTAL – Financing and Other Cash	*$30,000*
3. Working Capital Startup Costs	-
TOTAL USES OF FUNDS	**$15,120,051**
Sources of Funds For Project	
1. Cash	$3,780,013
2. Pledges	-
3. Gifts, bequests	-
4. Interest Income	-
5. Authorized Bonds	11,340,038
6. Mortgage	-
7. Working Capital Loans	-
8. Grants or Appropriation (Local)	-
TOTAL SOURCES OF FUNDS	**$15,120,051**

Source: DI #3, p. 16-17.

Table 13
Selected Financial and Operating Indicators
Regulated and Unregulated Revenue: Sinai Hospital of Baltimore

Maryland Hospitals-Statewide Average					
Year	Operating Margin	Excess Margin	Age of Plant	Debt to Capitalization	Days of Cash
2004	2.50%	2.90%	9.99	0.43	109
2003	1.70%	2.30%	10.40	0.43	98
Maryland Hospitals-Statewide Median					
Year	Operating Margin	Excess Margin	Age of Plant	Debt to Capitalization	Days of Cash
2004	1.89%	2.87%	10.94	0.39	83
2003	1.32%	1.71%	11.03	0.37	70
Sinai Hospital					
Year	Operating Margin	Excess Margin	Age of Plant	Debt to Capitalization	Days of Cash
2004	5.41%	4.99%	15.42	0.51	91
2003	3.48%	3.94%	16.05	0.50	70
HSCRC Target Values					
Year	**Operating Margin**	**Excess Margin**	**Age of Plant**	**Debt to Capitalization**	**Days of Cash**
	2.75%	**4.00%**	**8.5**	**0.40**	**115**

Source: Report on Financial Conditions, Fiscal year 2004, Health Services Cost Review Commission, which reports financial data of a corporate entity as submitted on the audited financial statements.

Table 13 represents the financial performance of the hospital as reported on the audited financial statements. Sinai Hospital generated operating and excess margins which exceeded the State-wide average and median values as well as the Target Values set by the Health Services Cost Review Commission, for both fiscal years 2004 and 2003. The age of plant measures the average age of fixed assets and is an indicator of the need for near-term replacement. This ratio indicates that the average age of the fixed assets of Sinai Hospital is higher than the State-wide median and average as well as the target values set by HSCRC, which indicates that the hospital may need to replace some of its fixed assets. The debt to capitalization ratio measures how much of a hospital's net worth is accounted for by long term debt, the relative importance of long-term debt in the hospital's permanent capital structure and the degree to which a hospital relies on debt as opposed to equity in financing assets. The hospital is slightly above the target value and the State-wide median for this ratio. Finally, days of cash measures the number of days an entity could meet its average daily expenditures with existing liquid assets. Sinai is below the State-wide median and the target values as set by HSCRC but approximately at the median value for Maryland hospitals.

Projected Financial Performance

The applicant has projected the financial performance of the hospital for fiscal years 2005 through 2010 as follows:

Table 14
Projected Financial Performance (in 000's): Sinai Hospital of Baltimore

Projected Years	2005 Current Year Projected	2006	2007	2008	2009 (First Use of Project)	2010
Operating Revenue	$427,703	$433,176	$438,728	$444,359	$450,072	$455,866
Income from Operation	8,996	8,500	8,583	8,724	8,867	9,012
Total Excess Profit	14,247	13,630	13,879	14,257	14,520	14,869
Operating Margin	2.10%	1.96%	1.96%	1.96%	1.97%	1.98%
Admissions	24,115	24,355	24,598	24,843	25,091	25,341
Patient Days	114,402	114,960	116,110	117,271	118,444	119,628
Outpatient Visits	147,387	150,022	152,714	155,463	158,273	161,143
Annual Increase in Admissions		0.49%	1.00%	1.00%	1.00%	1.00%
Annual Increase in Outpatient Visits		0.98%	1.79%	1.80%	1.80%	1.81%

Source: Table 1, Attachment 10, Completeness Response and Table 3, pages 77-79, in the CON application

The financial performance as projected by the applicant reflects a fairly conservative growth pattern in admissions and outpatient utilization. Applicant projects that the proposed project will be completed in 2009.

Community Support

The applicant has supplied six letters of support for this project from physicians, three of whom are employed at Sinai Hospital of Baltimore.

In summary, based on an analysis of the selected financial indicators, Sinai has been above average in profitability in recent years, has a relatively older physical plant, and does not have an excessive reliance on debt financing. While below the target range for liquidity, as compared to other Maryland hospitals, days of cash in the most recent fiscal year exceeded the state median. It projects overall profitability through 2010 based on fairly conservative growth in inpatient and outpatient utilization. Based on the reasonableness of its projections of surgical capacity use and the financial data reviewed above, it is reasonable to forecast that the proposed project is financially feasible.

E. Compliance with Conditions of Previous Certificates of Need

COMAR 10.24.01.08G(3)(e) requires the Commission to consider the applicant's performance with respect to all conditions applied to previous Certificates of Need granted to the applicant.

Sinai Hospital reports that it has received one CON since 1990. The Hospital received a CON to allow Sinai Home Health (Docket No. 95-06-1875) to provide specialized home care

services in Carroll County in 1996. There were no conditions included in that approval. Because there are no outstanding conditions on previous CON's, this standard is not applicable.

F. Impact on Existing Providers

COMAR 10.24.01.08G(3)(f) requires the Commission to consider information and analysis with respect to the impact of the proposed project on existing health care providers in the service area, including the impact on geographic and demographic access to services, on occupancy when there is a risk that this will increase costs to the health care delivery system, and on costs and charges of other providers.

Sinai states that the project will not have any impact on the costs or charges at any other facility. According to Sinai, three of the four operating rooms are needed today to operate at the Commission's optimal occupancy rate of 80 percent. Sinai has shown that the fourth OR will be needed by 2007 based on trended growth in surgical volumes. The applicant employs a variety of recruitment strategies, including: annual attendance at Association of OR Nurses Conferences; participation in local job fairs; print ads in local papers, trade journals and websites as well as using radio and TV ads; recruitment through community colleges and universities; payment of relocation expenses, if necessary; sign-on bonuses; and employee referral awards to existing employees. To retain employees, Sinai Hospital compensates OR nurses with a premium 15% differential in addition to the RN target rate. Sinai also offers flexible scheduling. To date, Sinai reports that these strategies have been extremely successful and the Hospital has not had difficulty recruiting and retaining OR nurses.

Given historical utilization patterns at Sinai, Staff finds that the proposed project addresses an institution-specific need for additional capacity in the operating room suite, PACU, and pathology laboratory and will not have a negative impact on existing providers in the service area. The applicant is consistent with this review criterion.

IV. SUMMARY AND STAFF RECOMMENDATION

Staff finds that Sinai Hospital's proposed project is consistent with the applicable State Health Plan (COMAR 10.24.10) standards and with the general Certificate of Need criteria found in COMAR 10.24.01.08G(3)(a)-(f). The total capital cost of the project (including capitalized construction interest) is $15,090,051, with additional financing costs and cash requirements of $30,000; this results in a total project cost of $15,120,051. Sinai Hospital proposes to finance the project with a cash equity contribution of $3,780,013, and authorized bonds in the amount of $11,340,038. For reasons presented in this Report, Staff recommends that the Commission **APPROVE** Sinai Hospital's Certificate of Need application to expand its operating room capacity from 20 to 24, increase its number of Post Anesthesia Care Unit ("PACU") beds from 20 to 28, expand and renovate its Pathology Laboratory, construct a family waiting area, and relocate the hemodialysis unit.

IN THE MATTER OF	*	**BEFORE THE**
	*	
SINAI HOSPITAL OF BALTIMORE	*	**MARYLAND HEALTH**
	*	
	*	**CARE COMMISSION**
	*	
DOCKET NO. 05-24-2160	*	
	*	

ORDER

Based on the analysis and findings in the Staff Report and Recommendation, it is this 19th day of October 2005:

ORDERED, that the application of Sinai Hospital of Baltimore for a Certificate of Need, Docket Number 05-24-2160, to expand its operating room capacity from 20 to 24, increase its number of Post Anesthesia Care Unit ("PACU") beds from 20 to 28, expand and renovate its Pathology Laboratory, construct a family waiting area, and relocate the hemodialysis unit at a total project cost of $15,120,051 is **APPROVED.**

Maryland Health Care Commission

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(Date)