

RECEIVED

ILLINOIS HEALTH FACILITIES AND SERVICES REVIEW BOARD
APPLICATION FOR PERMIT

FEB 02 2012

SECTION I. IDENTIFICATION, GENERAL INFORMATION, AND CERTIFICATIONS HEALTH FACILITIES & SERVICES REVIEW BOARD

This Section must be completed for all projects.

ORIGINAL

12-013

Facility/Project Identification

Facility Name: SwedishAmerican Regional Cancer Center
Street Address: 3535 North Bell School Road
City and Zip Code: Rockford, Illinois 61114
County: Winnebago Health Service Area I Health Planning Area:

Applicant /Co-Applicant Identification

[Provide for each co-applicant [refer to Part 1130.220].

Exact Legal Name: SwedishAmerican Hospital
Address: 1401 E. State Street Rockford, Illinois 61104
Name of Registered Agent: Patricia Ann Dewane
Name of Chief Executive Officer: William R. Gorski, M.D.
CEO Address: 1313 E. State Street, Rockford, Illinois, 61104
Telephone Number: 779-696-4003

Type of Ownership of Applicant/Co-Applicant

<input checked="" type="checkbox"/> Non-profit Corporation	<input type="checkbox"/> Partnership
<input type="checkbox"/> For-profit Corporation	<input type="checkbox"/> Governmental
<input type="checkbox"/> Limited Liability Company	<input type="checkbox"/> Sole Proprietorship
	<input type="checkbox"/> Other

- Corporations and limited liability companies must provide an Illinois certificate of good standing.
- Partnerships must provide the name of the state in which organized and the name and address of each partner specifying whether each is a general or limited partner.

APPEND DOCUMENTATION AS ATTACHMENT 1 IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

Primary Contact

[Person to receive all correspondence or inquiries during the review period]

Name: Yerachmiel (Rocky) Ephraim
Title: Director, Performance Improvement
Company Name: SwedishAmerican Hospital
Address: 1401 E. State Street, Rockford, Illinois 61104
Telephone Number: 815-966-2085
E-mail Address: yephraim@swedishamerican.org
Fax Number: 815-966-2089

Additional Contact

[Person who is also authorized to discuss the application for permit]

Name: Michael I Copelin
Title: President
Company Name: Copelin Healthcare Consulting, Inc.
Address: 42 Birch Lake Drive, Sherman, Illinois 62684
Telephone Number: 217-725-4558
E-mail Address: micbball@aol.com
Fax Number: 217-496-3097

Post Permit Contact

[Person to receive all correspondence subsequent to permit issuance-THIS PERSON MUST BE EMPLOYED BY THE LICENSED HEALTH CARE FACILITY AS DEFINED AT 20 ILCS 3960

Name: Yerachmiel (Rocky) Ephraim
Title: Director, Performance Improvement
Company Name: SwedishAmerican Hospital
Address: 1401 E. State Street, Rockford, Illinois 61104
Telephone Number: 815-966-2085
E-mail Address: :yephraim@swedishamerican.org
Fax Number: 815-966-2089

Site Ownership

[Provide this information for each applicable site]

Exact Legal Name of Site Owner: SwedishAmerican Hospital
Address of Site Owner:1401 E. State Street, Rockford, Illinois 61104
Street Address or Legal Description of Site:3535 North Bell School Road, Rockford, Illinois 61114
Proof of ownership or control of the site is to be provided as Attachment 2. Examples of proof of ownership are property tax statement, tax assessor's documentation, deed, notarized statement of the corporation attesting to ownership, an option to lease, a letter of intent to lease or a lease.
APPEND DOCUMENTATION AS ATTACHMENT-2, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

Operating Identity/Licensee

[Provide this information for each applicable facility, and insert after this page.]

Exact Legal Name: SwedishAmerican Hospital
Address: 1401 E. State Street, Rockford, Illinois 61104
<input checked="" type="checkbox"/> Non-profit Corporation <input type="checkbox"/> Partnership <input type="checkbox"/> For-profit Corporation <input type="checkbox"/> Governmental <input type="checkbox"/> Limited Liability Company <input type="checkbox"/> Sole Proprietorship <input type="checkbox"/> Other
<ul style="list-style-type: none"> o Corporations and limited liability companies must provide an Illinois Certificate of Good Standing. o Partnerships must provide the name of the state in which organized and the name and address of each partner specifying whether each is a general or limited partner. o Persons with 5 percent or greater interest in the licensee must be identified with the % of ownership.
APPEND DOCUMENTATION AS ATTACHMENT-3, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

Organizational Relationships

Provide (for each co-applicant) an organizational chart containing the name and relationship of any person or entity who is related (as defined in Part 1130.140). If the related person or entity is participating in the development or funding of the project, describe the interest and the amount and type of any financial contribution.

APPEND DOCUMENTATION AS ATTACHMENT-4, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

Flood Plain Requirements

[Refer to application instructions.]

Provide documentation that the project complies with the requirements of Illinois Executive Order #2005-5 pertaining to construction activities in special flood hazard areas. As part of the flood plain requirements please provide a map of the proposed project location showing any identified floodplain areas. Floodplain maps can be printed at www.FEMA.gov or www.illinoisfloodmaps.org. This map must be in a readable format. In addition please provide a statement attesting that the project complies with the requirements of Illinois Executive Order #2005-5 (<http://www.hfsrb.illinois.gov>).

APPEND DOCUMENTATION AS ATTACHMENT-5, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

Historic Resources Preservation Act Requirements

[Refer to application instructions.]

Provide documentation regarding compliance with the requirements of the Historic Resources Preservation Act.

APPEND DOCUMENTATION AS ATTACHMENT-6, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

DESCRIPTION OF PROJECT

1. Project Classification

[Check those applicable - refer to Part 1110.40 and Part 1120.20(b)]

Part 1110 Classification:

- Substantive
- Non-substantive

Part 1120 Applicability or Classification:

[Check one only.]

- Part 1120 Not Applicable
- Category A Project
- Category B Project
- DHS or DVA Project

2. Narrative Description

Provide in the space below, a brief narrative description of the project. Explain **WHAT** is to be done in **State Board defined terms, NOT WHY** it is being done. If the project site does NOT have a street address, include a legal description of the site. Include the rationale regarding the project's classification as substantive or non-substantive.

The proposed project is for the construction of a free-standing comprehensive cancer treatment center to be located at 3535 North Bell School Road in Rockford, Illinois.

The proposed facility will have a total of 63,533 GSF of space and will house the following clinical services: Diagnostic Imaging, Radiation Therapy, Medical Oncology, Laboratory and Pharmacy. In addition the building will have the following non-clinical areas: Public Space (Stairs Elevator, Lobby and public corridors), Administration, Education, Research, and Staff facilities. The total space allocated for clinical space is 46,269 GSF. The space for non-clinical departments totals 17,264 GSF.

The proposed project will consolidate the cancer treatment program of SwedishAmerican Hospital from three separate sites into one new facility for outpatient services. (Space within the hospital, the 9th street facility and the ACT building).

The new facility will have two Linear Accelerators and a PET/CT with simulation capabilities. No individual piece of equipment exceeds the Capital Expenditure Minimum.

The total Project Cost is \$38,643,937.

This is a substantive project based upon its cost and the replacement of clinical services.

Project Costs and Sources of Funds

Complete the following table listing all costs (refer to Part 1120.110) associated with the project. When a project or any component of a project is to be accomplished by lease, donation, gift, or other means, the fair market or dollar value (refer to Part 1130.140) of the component must be included in the estimated project cost. If the project contains non-reviewable components that are not related to the provision of health care, complete the second column of the table below. Note, the use and sources of funds.

Project Costs and Sources of Funds			
USE OF FUNDS	CLINICAL	NONCLINICAL	TOTAL
Preplanning Costs	\$192,920	\$72,080	\$265,000
Site Survey and Soil Investigation	\$12,740	\$4,760	\$17,500
Site Preparation	\$873,600	\$326,400	\$1,200,000
Off Site Work			
New Construction Contracts	\$16,137,509	\$6,029,399	\$22,166,908
Modernization Contracts			
Contingencies	\$1,612,950	\$602,641	\$2,215,591
Architectural/Engineering Fees	\$1,335,880	\$499,120	\$1,835,000
Consulting and Other Fees	\$473,200	\$176,800	\$650,000
Movable or Other Equipment (not in construction contracts)	\$7,537,000	**	\$7,537,000
Bond Issuance Expense (project related)	\$602,493	\$225,107	\$827,600
Net Interest Expense During Construction (project related)	\$1,186,158	\$443,180	\$1,629,338
Fair Market Value of Leased Space or Equipment			
Other Costs To Be Capitalized	\$218,400	\$81,600	\$300,000
Acquisition of Building or Other Property (excluding land)			
TOTAL USES OF FUNDS	\$30,182,850	\$8,461,087	\$38,643,937
SOURCE OF FUNDS	CLINICAL	NONCLINICAL	TOTAL
Cash and Securities			
Pledges			
Gifts and Bequests			
Bond Issues (project related)	\$30,182,850	\$8,461,087	\$38,643,937
Mortgages			
Leases (fair market value)			
Governmental Appropriations			
Grants			
Other Funds and Sources			
TOTAL SOURCES OF FUNDS	\$30,182,850	\$8,461,087	\$38,643,937
NOTE: ITEMIZATION OF EACH LINE ITEM MUST BE PROVIDED AT ATTACHMENT-7, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.			

**** All equipment costs are listed as clinical; however, no single piece of equipment's cost exceeds the capital expenditure minimum.**

Related Project Costs

Provide the following information, as applicable, with respect to any land related to the project that will be or has been acquired during the last two calendar years:

Land acquisition is related to project <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Purchase Price: \$ <u>5,200,000</u>
Fair Market Value: \$ _____
The project involves the establishment of a new facility or a new category of service <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
If yes, provide the dollar amount of all non-capitalized operating start-up costs (including operating deficits) through the first full fiscal year when the project achieves or exceeds the target utilization specified in Part 1100.
Estimated start-up costs and operating deficit cost is \$ _____.

Project Status and Completion Schedules

Indicate the stage of the project's architectural drawings: <input type="checkbox"/> None or not applicable <input checked="" type="checkbox"/> Preliminary <input type="checkbox"/> Schematics <input type="checkbox"/> Final Working
Anticipated project completion date (refer to Part 1130.140): <u>June 30, 2014</u>
Indicate the following with respect to project expenditures or to obligation (refer to Part 1130.140): <input type="checkbox"/> Purchase orders, leases or contracts pertaining to the project have been executed. <input type="checkbox"/> Project obligation is contingent upon permit issuance. Provide a copy of the contingent "certification of obligation" document, highlighting any language related to CON Contingencies <input checked="" type="checkbox"/> Project obligation will occur after permit issuance.
APPEND DOCUMENTATION AS ATTACHMENT 8, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

State Agency Submittals

Are the following submittals up to date as applicable: <input checked="" type="checkbox"/> Cancer Registry <input checked="" type="checkbox"/> APORS All formal document requests such as IDPH Questionnaires and Annual Bed Reports been submitted All reports regarding outstanding permits Failure to be up to date with these requirements will result in the application for permit being deemed incomplete.

Cost Space Requirements

Provide in the following format, the department/area **DGSF** or the building/area **BGSF** and cost. The type of gross square footage either **DGSF** or **BGSF** must be identified. The sum of the department costs **MUST** equal the total estimated project costs. Indicate if any space is being reallocated for a different purpose. Include outside wall measurements plus the department's or area's portion of the surrounding circulation space. **Explain the use of any vacated space.**

Dept. / Area	Cost	Gross Square Feet		Amount of Proposed Total Gross Square Feet That Is:			
		Existing	Proposed	New Const.	Modernized	As Is	Vacated Space
REVIEWABLE							
Medical Surgical							
Intensive Care							
Diagnostic Radiology							
MRI							
Total Clinical							
NON REVIEWABLE							
Administrative							
Parking							
Gift Shop							
Total Non-clinical							
TOTAL							

APPEND DOCUMENTATION AS ATTACHMENT-9, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

Facility Bed Capacity and Utilization

Complete the following chart, as applicable. Complete a separate chart for each facility that is a part of the project and insert following this page. Provide the existing bed capacity and utilization data for the latest Calendar Year for which the data are available. Include observation days in the patient day totals for each bed service. Any bed capacity discrepancy from the Inventory will result in the application being deemed incomplete.

FACILITY NAME: SwedishAmerican Hospital			CITY: Rockford, Illinois		
REPORTING PERIOD DATES:					
From: January 1, 2010			to: December 31, 2010		
Category of Service	Authorized Beds	Admissions	Patient Days	Bed Changes	Proposed Beds
Medical/Surgical	209	11,902	51,922	0	209
Obstetrics	34	3,237	8,228	0	34
Pediatrics	28	498	1,365	0	28
Intensive Care	30	1,867	8,130	0	30
Comprehensive Physical Rehabilitation					
Acute/Chronic Mental Illness	32	1,078	6,493	0	32
Neonatal Intensive Care					
General Long Term Care					
Specialized Long Term Care					
Long Term Acute Care					
Other ((identify))					
TOTALS:	333	17,305	76,138	0	333

CERTIFICATION

The application must be signed by the authorized representative(s) of the applicant entity. The authorized representative(s) are:

- o in the case of a corporation, any two of its officers or members of its Board of Directors;
- o in the case of a limited liability company, any two of its managers or members (or the sole manger or member when two or more managers or members do not exist);
- o in the case of a partnership, two of its general partners (or the sole general partner, when two or more general partners do not exist);
- o in the case of estates and trusts, two of its beneficiaries (or the sole beneficiary when two or more beneficiaries do not exist); and
- o in the case of a sole proprietor, the individual that is the proprietor.

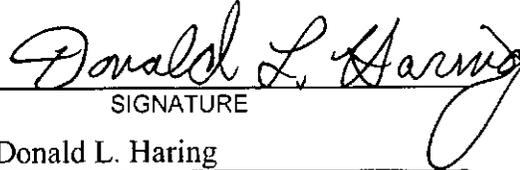
This Application for Permit is filed on the behalf of SwedishAmerican Hospital * in accordance with the requirements and procedures of the Illinois Health Facilities Planning Act. The undersigned certifies that he or she has the authority to execute and file this application for permit on behalf of the applicant entity. The undersigned further certifies that the data and information provided herein, and appended hereto, are complete and correct to the best of his or her knowledge and belief. The undersigned also certifies that the permit application fee required for this application is sent herewith or will be paid upon request.



 SIGNATURE
 William R. Gorski, MD

 PRINTED NAME
 Chief Executive Officer

 PRINTED TITLE



 SIGNATURE
 Donald L. Haring

 PRINTED NAME
 VP Finance, Chief Financial Officer

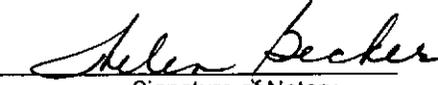
 PRINTED TITLE

Notarization:
Subscribed and sworn to before me
this 9th day of January

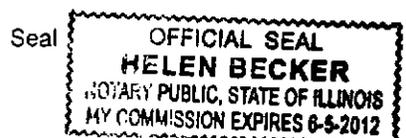
Notarization:
Subscribed and sworn to before me
this 9th day of January



 Signature of Notary



 Signature of Notary



*Insert EXACT legal name of the applicant

SECTION III – BACKGROUND, PURPOSE OF THE PROJECT, AND ALTERNATIVES - INFORMATION REQUIREMENTS

This Section is applicable to all projects except those that are solely for discontinuation with no project costs.

Criterion 1110.230 – Background, Purpose of the Project, and Alternatives

READ THE REVIEW CRITERION and provide the following required information:

BACKGROUND OF APPLICANT

1. A listing of all health care facilities owned or operated by the applicant, including licensing, and certification if applicable.
2. A certified listing of any adverse action taken against any facility owned and/or operated by the applicant during the three years prior to the filing of the application.
3. Authorization permitting HFSRB and DPH access to any documents necessary to verify the information submitted, including, but not limited to: official records of DPH or other State agencies; the licensing or certification records of other states, when applicable; and the records of nationally recognized accreditation organizations. **Failure to provide such authorization shall constitute an abandonment or withdrawal of the application without any further action by HFSRB.**
4. If, during a given calendar year, an applicant submits more than one application for permit, the documentation provided with the prior applications may be utilized to fulfill the information requirements of this criterion. In such instances, the applicant shall attest the information has been previously provided, cite the project number of the prior application, and certify that no changes have occurred regarding the information that has been previously provided. The applicant is able to submit amendments to previously submitted information, as needed, to update and/or clarify data.

APPEND DOCUMENTATION AS ATTACHMENT-11, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM. EACH ITEM (1-4) MUST BE IDENTIFIED IN ATTACHMENT 11.

PURPOSE OF PROJECT

1. Document that the project will provide health services that improve the health care or well-being of the market area population to be served.
2. Define the planning area or market area, or other, per the applicant's definition.
3. Identify the existing problems or issues that need to be addressed, as applicable and appropriate for the project. [See 1110.230(b) for examples of documentation.]
4. Cite the sources of the information provided as documentation.
5. Detail how the project will address or improve the previously referenced issues, as well as the population's health status and well-being.
6. Provide goals with quantified and measurable objectives, with specific timeframes that relate to achieving the stated goals as appropriate.

For projects involving modernization, describe the conditions being upgraded if any. For facility projects, include statements of age and condition and regulatory citations if any. For equipment being replaced, include repair and maintenance records.

NOTE: Information regarding the "Purpose of the Project" will be included in the State Agency Report.

APPEND DOCUMENTATION AS ATTACHMENT-12, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM. EACH ITEM (1-6) MUST BE IDENTIFIED IN ATTACHMENT 12.

ALTERNATIVES

- 1) Identify **ALL** of the alternatives to the proposed project:

Alternative options **must** include:

- A) Proposing a project of greater or lesser scope and cost;
 - B) Pursuing a joint venture or similar arrangement with one or more providers or entities to meet all or a portion of the project's intended purposes; developing alternative settings to meet all or a portion of the project's intended purposes;
 - C) Utilizing other health care resources that are available to serve all or a portion of the population proposed to be served by the project; and
 - D) Provide the reasons why the chosen alternative was selected.
- 2) Documentation shall consist of a comparison of the project to alternative options. The comparison shall address issues of total costs, patient access, quality and financial benefits in both the short term (within one to three years after project completion) and long term. This may vary by project or situation. **FOR EVERY ALTERNATIVE IDENTIFIED THE TOTAL PROJECT COST AND THE REASONS WHY THE ALTERNATIVE WAS REJECTED MUST BE PROVIDED.**
- 3) The applicant shall provide empirical evidence, including quantified outcome data that verifies improved quality of care, as available.

APPEND DOCUMENTATION AS ATTACHMENT-13, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

SECTION IV - PROJECT SCOPE, UTILIZATION, AND UNFINISHED/SHELL SPACE

Criterion 1110.234 - Project Scope, Utilization, and Unfinished/Shell Space

READ THE REVIEW CRITERION and provide the following information:

SIZE OF PROJECT:

1. Document that the amount of physical space proposed for the proposed project is necessary and not excessive. **This must be a narrative.**
2. If the gross square footage exceeds the BGSF/DGSF standards in Appendix B, justify the discrepancy by documenting one of the following:
 - a. Additional space is needed due to the scope of services provided, justified by clinical or operational needs, as supported by published data or studies;
 - b. The existing facility's physical configuration has constraints or impediments and requires an architectural design that results in a size exceeding the standards of Appendix B;
 - c. The project involves the conversion of existing space that results in excess square footage.

Provide a narrative for any discrepancies from the State Standard. A table must be provided in the following format with Attachment 14.

SIZE OF PROJECT				
DEPARTMENT/SERVICE	PROPOSED BGSF/DGSF	STATE STANDARD	DIFFERENCE	MET STANDARD?

APPEND DOCUMENTATION AS ATTACHMENT-14, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

PROJECT SERVICES UTILIZATION:

This criterion is applicable only to projects or portions of projects that involve services, functions or equipment for which HFSRB has established utilization standards or occupancy targets in 77 Ill. Adm. Code 1100.

Document that in the second year of operation, the annual utilization of the service or equipment shall meet or exceed the utilization standards specified in 1110.Appendix B. A narrative of the rationale that supports the projections must be provided.

A table must be provided in the following format with Attachment 15.

UTILIZATION					
	DEPT./ SERVICE	HISTORICAL UTILIZATION (PATIENT DAYS) (TREATMENTS) ETC.	PROJECTED UTILIZATION	STATE STANDARD	MET STANDARD?
YEAR 1					
YEAR 2					

APPEND DOCUMENTATION AS ATTACHMENT-15, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

R. Criterion 1110.3030 - Clinical Service Areas Other than Categories of Service

1. Applicants proposing to establish, expand and/or modernize Clinical Service Areas Other than Categories of Service must submit the following information:
2. Indicate changes by Service: Indicate # of key room changes by action(s):

Service	# Existing Key Rooms	# Proposed Key Rooms
<input type="checkbox"/>		
<input type="checkbox"/>		
<input type="checkbox"/>		

3. READ the applicable review criteria outlined below and **submit the required documentation for the criteria:**

PROJECT TYPE	REQUIRED REVIEW CRITERIA	
New Services or Facility or Equipment	(b) -	Need Determination - Establishment
Service Modernization	(c)(1) -	Deteriorated Facilities
		and/or
	(c)(2) -	Necessary Expansion
		PLUS
	(c)(3)(A) -	Utilization - Major Medical Equipment
		Or
	(c)(3)(B) -	Utilization - Service or Facility

APPEND DOCUMENTATION AS ATTACHMENT-37, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

X. 1120.140 - Economic Feasibility

This section is applicable to all projects subject to Part 1120.

A. Reasonableness of Financing Arrangements

The applicant shall document the reasonableness of financing arrangements by submitting a notarized statement signed by an authorized representative that attests to one of the following:

- 1) That the total estimated project costs and related costs will be funded in total with cash and equivalents, including investment securities, unrestricted funds, received pledge receipts and funded depreciation; or
- 2) That the total estimated project costs and related costs will be funded in total or in part by borrowing because:
 - A) A portion or all of the cash and equivalents must be retained in the balance sheet asset accounts in order to maintain a current ratio of at least 2.0 times for hospitals and 1.5 times for all other facilities; or
 - B) Borrowing is less costly than the liquidation of existing investments, and the existing investments being retained may be converted to cash or used to retire debt within a 60-day period.

B. Conditions of Debt Financing

This criterion is applicable only to projects that involve debt financing. The applicant shall document that the conditions of debt financing are reasonable by submitting a notarized statement signed by an authorized representative that attests to the following, as applicable:

- 1) That the selected form of debt financing for the project will be at the lowest net cost available;
- 2) That the selected form of debt financing will not be at the lowest net cost available, but is more advantageous due to such terms as prepayment privileges, no required mortgage, access to additional indebtedness, term (years), financing costs and other factors;
- 3) That the project involves (in total or in part) the leasing of equipment or facilities and that the expenses incurred with leasing a facility or equipment are less costly than constructing a new facility or purchasing new equipment.

C. Reasonableness of Project and Related Costs

Read the criterion and provide the following:

- 1. Identify each department or area impacted by the proposed project and provide a cost and square footage allocation for new construction and/or modernization using the following format (insert after this page).

COST AND GROSS SQUARE FEET BY DEPARTMENT OR SERVICE											
Department (list below)	A	B	C		D		E	F	G	H	Total Cost (G + H)
	Cost/Square Foot New	Mod.	Gross Sq. Ft. New	Circ.*	Gross Sq. Ft. Mod.	Circ.*	Const. \$ (A x C)	Mod. \$ (B x E)			
Contingency											
TOTALS											

* Include the percentage (%) of space for circulation

D. Projected Operating Costs

The applicant shall provide the projected direct annual operating costs (in current dollars per equivalent patient day or unit of service) for the first full fiscal year at target utilization but no more than two years following project completion. Direct cost means the fully allocated costs of salaries, benefits and supplies for the service.

E. Total Effect of the Project on Capital Costs

The applicant shall provide the total projected annual capital costs (in current dollars per equivalent patient day) for the first full fiscal year at target utilization but no more than two years following project completion.

APPEND DOCUMENTATION AS ATTACHMENT 42, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

XI. Safety Net Impact Statement

SAFETY NET IMPACT STATEMENT that describes all of the following must be submitted for **ALL SUBSTANTIVE AND DISCONTINUATION PROJECTS:**

1. The project's material impact, if any, on essential safety net services in the community, to the extent that it is feasible for an applicant to have such knowledge.
2. The project's impact on the ability of another provider or health care system to cross-subsidize safety net services, if reasonably known to the applicant.
3. How the discontinuation of a facility or service might impact the remaining safety net providers in a given community, if reasonably known by the applicant.

Safety Net Impact Statements shall also include all of the following:

1. For the 3 fiscal years prior to the application, a certification describing the amount of charity care provided by the applicant. The amount calculated by hospital applicants shall be in accordance with the reporting requirements for charity care reporting in the Illinois Community Benefits Act. Non-hospital applicants shall report charity care, at cost, in accordance with an appropriate methodology specified by the Board.
2. For the 3 fiscal years prior to the application, a certification of the amount of care provided to Medicaid patients. Hospital and non-hospital applicants shall provide Medicaid information in a manner consistent with the information reported each year to the Illinois Department of Public Health regarding "Inpatients and Outpatients Served by Payor Source" and "Inpatient and Outpatient Net Revenue by Payor Source" as required by the Board under Section 13 of this Act and published in the Annual Hospital Profile.
3. Any information the applicant believes is directly relevant to safety net services, including information regarding teaching, research, and any other service.

A table in the following format must be provided as part of Attachment 43.

Safety Net Information per PA 96-0031			
CHARITY CARE			
Charity (# of patients)	Year	Year	Year
Inpatient			
Outpatient			
Total			
Charity (cost in dollars)	Year	Year	Year
Inpatient			
Outpatient			
Total			
MEDICAID			
Medicaid (# of patients)	Year	Year	Year
Inpatient			
Outpatient			
Total			

Medicaid (revenue)			
Inpatient			
Outpatient			
Total			

APPEND DOCUMENTATION AS **ATTACHMENT-43**, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.

XII. Charity Care Information

Charity Care Information **MUST** be furnished for **ALL** projects.

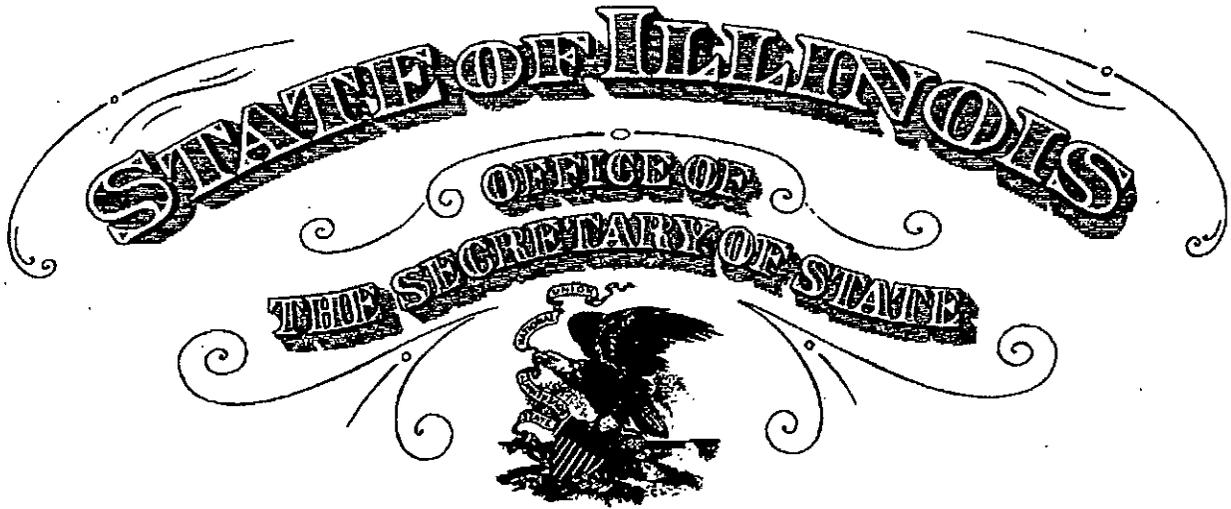
1. All applicants and co-applicants shall indicate the amount of charity care for the latest three **audited** fiscal years, the cost of charity care and the ratio of that charity care cost to net patient revenue.
2. If the applicant owns or operates one or more facilities, the reporting shall be for each individual facility located in Illinois. If charity care costs are reported on a consolidated basis, the applicant shall provide documentation as to the cost of charity care; the ratio of that charity care to the net patient revenue for the consolidated financial statement; the allocation of charity care costs; and the ratio of charity care cost to net patient revenue for the facility under review.
3. If the applicant is not an existing facility, it shall submit the facility's projected patient mix by payer source, anticipated charity care expense and projected ratio of charity care to net patient revenue by the end of its second year of operation.

Charity care" means care provided by a health care facility for which the provider does not expect to receive payment from the patient or a third-party payer. (20 ILCS 3960/3) Charity Care **must** be provided at cost.

A table in the following format must be provided for all facilities as part of Attachment 44.

CHARITY CARE			
	Year	Year	Year
Net Patient Revenue			
Amount of Charity Care (charges)			
Cost of Charity Care			

APPEND DOCUMENTATION AS **ATTACHMENT-44**, IN NUMERIC SEQUENTIAL ORDER AFTER THE LAST PAGE OF THE APPLICATION FORM.



To all to whom these Presents Shall Come, Greeting:

I, Jesse White, Secretary of State of the State of Illinois, do hereby certify that

SWEDISHAMERICAN HOSPITAL, A DOMESTIC CORPORATION, INCORPORATED UNDER THE LAWS OF THIS STATE ON JUNE 06, 1911, APPEARS TO HAVE COMPLIED WITH ALL THE PROVISIONS OF THE GENERAL NOT FOR PROFIT CORPORATION ACT OF THIS STATE, AND AS OF THIS DATE, IS IN GOOD STANDING AS A DOMESTIC CORPORATION IN THE STATE OF ILLINOIS.



Authentication #: 1136201376

Authenticate at: <http://www.cyberdriveillinois.com>

In Testimony Whereof, I hereto set my hand and cause to be affixed the Great Seal of the State of Illinois, this 28TH day of DECEMBER A.D. 2011

Jesse White

SECRETARY OF STATE

Attachment # I

12/29/11
W

(12/29/11) : 00031

12-11-202-008

(BRK) 12-02-401-011



* 2 0 1 1 1 0 4 5 8 0 4 4 *

20111045804

16

Filed for Record in
WINNEBAGO COUNTY, IL
NANCY MCPHERSON, RECORDER
12/29/2011 09:22:38AM

DEED

35.75

**WARRANTY
DEED**

5,000,000

THIS INDENTURE WITNESSETH, that the Grantor, **Landmark Riverside LLC**, an Illinois limited liability company duly organized and existing under and by virtue of the laws of the State of Illinois, for and in consideration of ten dollars and other good and valuable consideration, the receipt of which is hereby acknowledged, **CONVEYS AND WARRANTS** to **SwedishAmerican Hospital**, an Illinois not-for profit corporation whose address is 1401 East State Street, Rockford, IL 61104 the following described real estate to-wit:

PARCEL I:

Lot One (1) as designated upon Plat 1 of Riverside Marketplace, being a Subdivision of part of the Southeast Quarter (1/4) of Section 2 and part of the Northeast Quarter (1/4) of Section 11, Township 44 North, Range 2 East of the Third Principal Meridian, the Plat of which is recorded in Book 47 of Plats on Page 27; situated in the County of Winnebago and State of Illinois.

Address: 3408 Bend Trail, Rockford, IL
PIN: 12-11-202-008

PARCEL II:

Part of Lot Three (3) as designated upon Plat No. 2 of Riverside Marketplace, the Plat of which is recorded in Book 48 of Plats on Page 119A in the Recorder's Office of Winnebago County, Illinois, being a Subdivision of part of the Southeast Quarter (1/4) of Section 2 and part of the Northeast Quarter (1/4) of Section 11, Township 44 North, Range 2 East of the Third Principal Meridian, more particularly bounded and described as follows, to-wit:

Beginning at the most Southerly corner of said Lot Three (3); thence North 21 degrees 55' 19" West along the Northeasterly right-of-way line of Bend Trail, a distance of 9.94 feet; thence Northwesterly along the curved Northeasterly right-of-way line of said Bend Trail, said curve to the left having a radius of 330.00 feet and

W198074cm
TUA

a central angle of 53 degrees 11' 32" (the chord of which bears North 48 degrees 31' 05" West, a distance of 295.48 feet); to the Easterly right-of-way line of North Bell School Road; thence Northerly along the curved Easterly right-of-way line of said North Bell School Road, said curve to the left having a radius of 550.00 feet and a central angle of 02 degrees 47' 12" (the chord of which bears North 00 degrees 55' 45" East, a distance of 26.75 feet); thence North 00 degrees 27' 51" West along the Easterly right-of-way line of said North Bell School Road, a distance of 1,115.24 feet; thence North 89 degrees 32' 09" East, a distance of 789.58 feet to the Westerly right-of-way line of the Illinois Tollway (Interstate 90); thence South 16 degrees 37' 07" East along the Westerly right-of-way line of said Illinois Tollway (Interstate 90), a distance of 494.08 feet; thence South 00 degrees 15' 06" East along the Westerly right-of-way line of said Illinois Tollway (Interstate 90), a distance of 485.72 feet; thence South 00 degrees 14' 54" East along the Westerly right-of-way line of said Illinois Tollway (Interstate 90), a distance of 112.49 feet to the South line of said Lot Three (3); thence South 68 degrees 04' 41" West along the South line of said Lot Three (3), a distance of 754.35 feet to the point of beginning; situated in the County of Winnebago and State of Illinois.

Address: Part of 37XX N. Bell School Road, Rockford, IL
✓ PIN: Part of 12-02-401-011

Subject to real estate taxes and assessments for the year 2011 and subsequent years; all covenants, conditions, restrictions and easements apparent or of record.

IN WITNESS WHEREOF, said Grantor has caused its name to be signed to these presents by its Member, this 22nd day of December, 2011.

Landmark Riverside LLC,
an Illinois limited liability company

By: 
Daniel K. Ericson
Its Member

STATE OF ILLINOIS
ms
DEC. 29. 11
WINNEBAGO COUNTY

6570100000

REAL ESTATE TRANSFER TAX
0750000
FP 326680

INCELLE

STATE OF ILLINOIS)
) SS.
COUNTY OF WINNEBAGO)

I, the undersigned, a Notary Public, in and for said County, in the State aforesaid, DO HEREBY CERTIFY THAT Daniel K. Ericson, personally known to me to be a member of Landmark Riverside LLC (the "Company"), is personally known to be to be the same person whose name is subscribed to the foregoing instrument, appeared before me this day in person and acknowledged that as such member of said Company, he signed and delivered the said instrument, pursuant to authority, given by the Members of said Company as their free and voluntary acts, and as the free and voluntary act and deed of said Company, for the uses and purposes therein set forth.

Given under my hand and Notarial Seal this 20th day of December, 2011.



J. Christiansen
Notary Public

Future Taxes to & ~~Return this document to:~~
SwedishAmerican Hospital
Attn. June Koch
2550 Charles Street
Rockford, IL 61108

This Instrument was prepared by:
Christopher T. Logli
McGreevy Williams, P.C.
6735 Vistagreen Way
P.O. Box 2903
Rockford, Illinois 61132-2903

• Return this document to:
Amanda J. Adams
Holmstrom & Kennedy P.C.
800 N. Church Street
Rockford, IL 61103

00575856.WPD



To all to whom these Presents Shall Come, Greeting:

I, Jesse White, Secretary of State of the State of Illinois, do hereby certify that

SWEDISHAMERICAN HOSPITAL, A DOMESTIC CORPORATION, INCORPORATED UNDER THE LAWS OF THIS STATE ON JUNE 06, 1911, APPEARS TO HAVE COMPLIED WITH ALL THE PROVISIONS OF THE GENERAL NOT FOR PROFIT CORPORATION ACT OF THIS STATE, AND AS OF THIS DATE, IS IN GOOD STANDING AS A DOMESTIC CORPORATION IN THE STATE OF ILLINOIS.



Authentication #: 1136201376

Authenticate at: <http://www.cyberdriveillinois.com>

In Testimony Whereof, I hereto set
my hand and cause to be affixed the Great Seal of
the State of Illinois, this 28TH
day of DECEMBER A.D. 2011

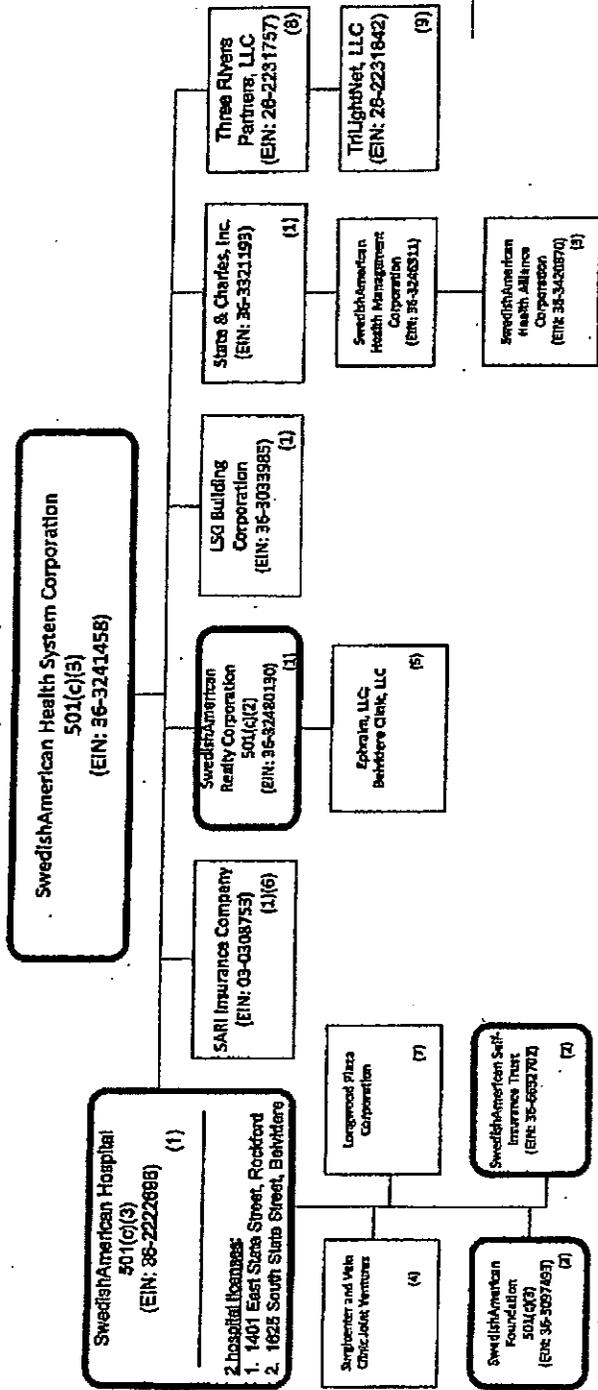
Jesse White

SECRETARY OF STATE

ATTACHED 23

21

**SWEDISHAMERICAN HEALTH SYSTEM
LEGAL STRUCTURE
(August 2011)**



FOOTNOTES:

1. Appointment of Board of Directors is controlled by Swedish American Health System Corporation (SAHSC).
2. Appointment of Board of Directors of Swedish American Foundation is controlled by Swedish American Hospital (SAH) and power to amend or revoke the self-insurance trust, or replace the trustee, is held by SAH.
3. Swedish American Health Management Corporation owns a one-half (1/2) interest.
4. Surgical and Vascular Joint Ventures is a limited partnership (The Featherstone Partnership, L.P.), and SAH is a limited partner, with a 33.33% interest. The Vascular Joint Ventures is a limited liability company (Northern Illinois Vascular Clinic, LLC) and SAH owns a 50% interest in the LLC.
5. Epirata, L.L.C. is a limited liability company and Swedish American Realty Corporation (SAR) owns a 33-1/3% interest. Bedders Clinic, L.L.C. is a limited liability company and SAR owns a 15% liquidation interest.
6. A Vermont captive insurance company.
7. Swedish American Hospital owns a 21% interest.
8. Three Rivers Partners, LLC is a limited liability company and SAHSC owns a 50% interest in the LLC.
9. TriLightNet, LLC is a limited liability company. Three Rivers Partners, LLC is the sole member.

For-profit (Illinois corporation, unless otherwise noted)

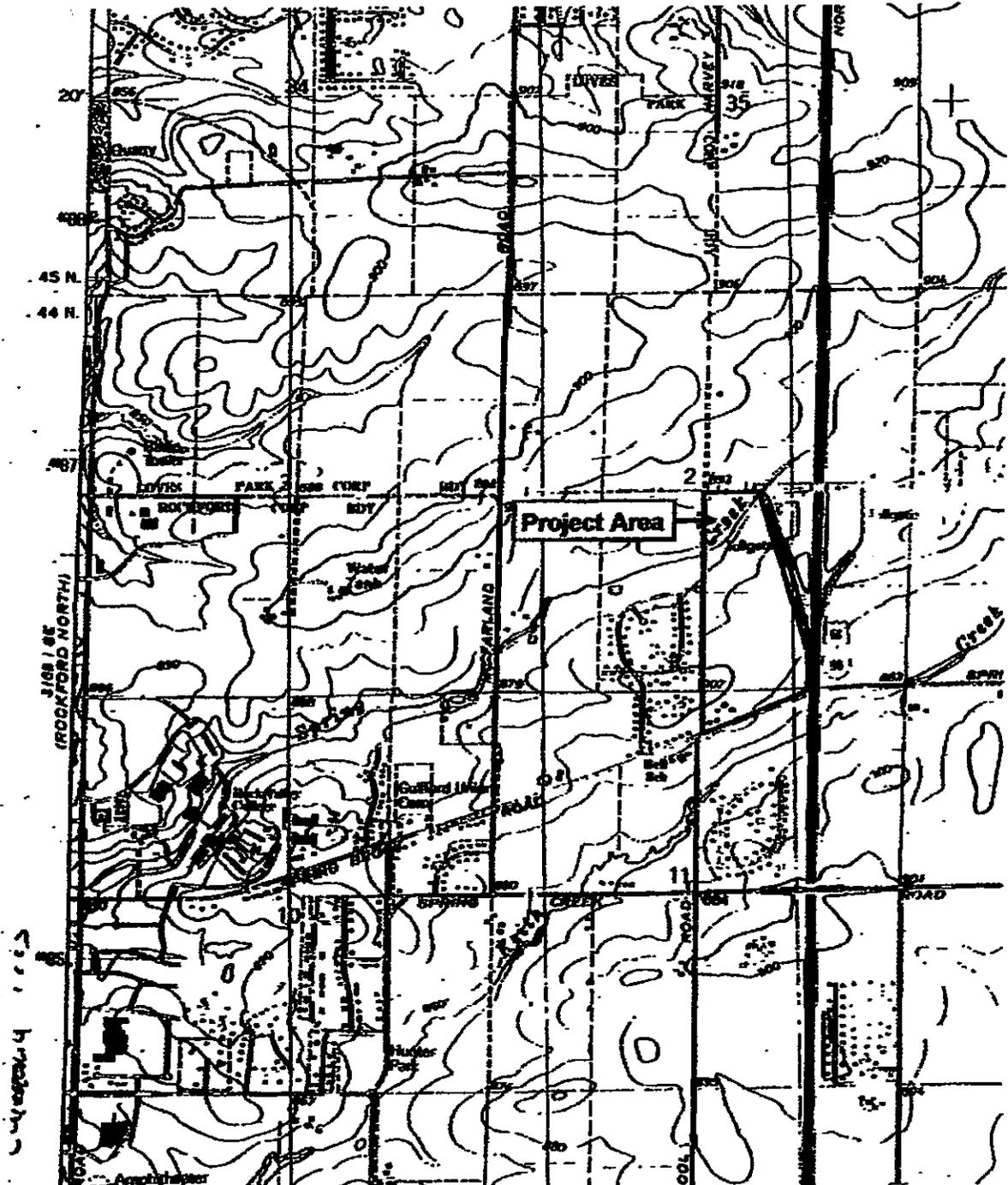
Not-for-profit

Ownership of 100% of stock or assets (unless otherwise noted)

Prepared by Holmstrom & Kennedy, P.C. (August 2011)
 429/241/033-LL11st

FLOOD PLAIN REQUIREMENTS

This project is not in a flood plain, and the location of the proposed project complies with the Flood Plain Rule under Illinois Executive Order #2005-5.



Caledonia 7.5' USGS Topographic Quadrangle Sheet, 1993



Illinois Historic
Preservation Agency

1 Old State Capitol Plaza • Springfield, Illinois 62701-1512 • www.illinois-history.gov

Winnébagò County
Rockford
3535 Bell School Road
New construction, Comprehensive Cancer Care Center

PLEASE REFER TO: IHPA LOG #001011012

January 11, 2012

Michael Copelin
Copelin Health Care Consulting
42 Birch Lake Dr.
Sherman, IL 62684

Dear Mr. Copelin:

The Illinois Historic Preservation Agency is required by the Illinois State Agency Historic Resources Preservation Act (20 ILCS 3420, as amended, 17 IAC 4180) to review all state funded, permitted or licensed undertakings for their effect on cultural resources. Pursuant to this, we have received information regarding the referenced project for our comment.

Our staff has reviewed the specifications under the state law and assessed the impact of the project as submitted by your office. We have determined, based on the available information, that no significant historic, architectural or archaeological resources are located within the proposed project area.

According to the information you have provided concerning your proposed project, apparently there is no federal involvement in your project. However, please note that the state law is less restrictive than the federal cultural resource laws concerning archaeology. If your project will use federal loans or grants, need federal agency permits, use federal property, or involve assistance from a federal agency, then your project must be reviewed under the National Historic Preservation Act of 1966, as amended. Please notify us immediately if such is the case.

This clearance remains in effect for two (2) years from date of issuance. It does not pertain to any discovery during construction, nor is it a clearance for purposes of the IL Human Skeletal Remains Protection Act (20 ILCS 3440).

Please retain this letter in your files as evidence of compliance with the Illinois State Agency Historic Resources Preservation Act.

Sincerely,

Anne E. Haaker
Deputy State Historic
Preservation Officer

Attachment 6

Regional Cancer Center Project

Sources and Uses of Funds

Preplanning Cost

Architectural Firm Initial Design and Cost estimate	\$	265,000
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Site Survey and Soil Investigation

Soil testing and Survey	\$	17,500
-------------------------	----	--------

Site Preparation

	\$	30,000
--	----	--------

1) Phase 1 Report

2) Site survey

3) Aerial photos

4) Soil borings

Site Preparation

1) Earth moving for building platform and parking lots	\$	1,170,000
--	----	-----------

Consulting and Other Fees

Construction Manager	\$	650,000
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Total	\$	<u>2,132,500</u>
-------	----	------------------

Medical Equipment

New True Beam with Rapid Arc Treatment Machine	\$	4,481,501
--	----	-----------

Software	\$	500,000
----------	----	---------

PET/CT Scan/Simulator	\$	1,905,284
-----------------------	----	-----------

Software	\$	190,528
----------	----	---------

Radiology Equipment		300,000
---------------------	--	---------

Pharmacy Equipment		56,042
--------------------	--	--------

Laboratory Equipment		<u>103,645</u>
----------------------	--	----------------

Total equipment		<u><u>\$7,537,000</u></u>
-----------------	--	---------------------------

Other Costs to be Capitalized

Permit and Utility fees	\$	180,000
-------------------------	----	---------

Commissioning cost	\$	115,000
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Concrete testing	\$	<u>5,000</u>
------------------	----	--------------

Total	\$	<u><u>300,000</u></u>
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ATTACHMENT 7

Dept. / Area	Cost	Gross Square Feet		Amount of Proposed Total Gross Square Feet That Is:			
		Existing	Proposed	New Const.	Modernized	As Is	Vacated Space
REVIEWABLE							
Medical Imaging	\$1,695,910	*	3,465	3,465	0	N/A	N/A
Radiation Oncology	\$6,081,718	7,897	12,432	12,432	0	0	7,897**
Medical Oncology	\$13,181,059	21,990	26,931	26,931	0	0	21,990***
Laboratory	\$916,295	*	1,866	1,866	0	0	0
Pharmacy	770,868	*	1,575	1,575	0	0	0
Equipment	\$7,537,000	****	Included	In the	Individual	Departments	
Total Clinical	\$30,182,850	29,887	46,269	46,269	0	0	29,887
NON REVIEWABLE							
Administrative/Education	\$3,753,677	*****	7,659	7,659	0	0	0
Public Areas	\$2,599,980	*****	5,305	5,305	0	0	0
Staff Areas	\$2,107,430	*****	4,300	4,300	0	0	0
Total Non-clinical	\$8,461,087	*****	17,264	17,264	0	0	0
TOTAL	\$38,643,937	29,887	63,533	63,533	0	0	29,887

*The Medical Imaging equipment, the Laboratory, and the Pharmacy will all serve this freestanding center solely and as such will not impact those departments as they are now located in the hospital. The square footages now allocated to these departments in the hospital will not change.

**The space now occupied by Radiation Oncology is located in the hospital and will be utilized as is to house offices and community education space at no cost.

***The space now utilized for Medical Oncology is currently located in two freestanding buildings which are leased by the hospital. When the new facility is constructed and the leases on these buildings expire, the leases will not be renewed leaving no vacant space for other uses.

**** The equipment space is contained in the individual departments

***** The proposed project calls for the construction of a new freestanding cancer treatment center with its own administrative and support space. This space in the existing facility does not impact the needs of the cancer treatment center and is therefore not considered to be a part of the proposed project. As stated earlier, all space vacated as a result of the new center, in the existing hospital will be used as is at no cost for offices and education space.

Criterion 1110.230 – Background of Applicant

The applicant is SwedishAmerican Hospital located in Rockford, Illinois. The hospital also owns the SwedishAmerican Medical Center located in Belvidere, Illinois.

There has been no adverse action taken against either of these hospitals.

Appended to this attachment are copies of the Licenses of both of the above facilities and a letter from the CEO providing the Board and its staff access to any documents necessary to verify the above information.

The applicant does not currently have any other outstanding permits.

SWEDISHAMERICAN 
HOSPITAL

Winner Of The Lincoln Award For Excellence

January 23, 2012

Illinois Health Facilities and Services Review Board
2nd Floor
525 West Jefferson Street
Springfield, Illinois 62761

SwedishAmerican Hospital
1401 East State Street
Rockford, IL 61104

Illinois Health Facilities and Services Review Board:

I, hereby submit authorization permitting IHFSRB and IDPH access to any documents necessary to verify the information submitted, including, but not limited to: official records of IDPH or other State agencies; the licensing or certification records of other states, when applicable; and the records of nationally recognized accreditation organizations.



William R. Gorski, MD
Chief Executive Officer
SwedishAmerican Hospital

ATTACHMENT 11

DISPLAY THIS PART IN A CONSPICUOUS PLACE

REMOVE THIS CARD TO CARRY AS AN IDENTIFICATION

State of Illinois 2009515
Department of Public Health
 LICENSE, PERMIT, CERTIFICATION, REGISTRATION
SWEDISH AMERICAN HOSPITAL

EXPIRATION DATE 12/31/11	CATEGORY B630	I.D. NUMBER 0002725
-----------------------------	------------------	------------------------

FULL LICENSE
GENERAL HOSPITAL
 EFFECTIVE: 01/01/11

11/06/10

SWEDISH AMERICAN HOSPITAL
1400 CHARLES STREET

ROCKFORD IL 61101 9863

FEE RECEIPT NO.

State of Illinois 2009515
Department of Public Health
 LICENSE, PERMIT, CERTIFICATION, REGISTRATION

The person, firm or corporation whose name appears on this certificate has complied with the provisions of the Illinois Statutes and/or rules and regulations, and is hereby authorized to engage in the activity as indicated below.

DAMON L. ARNOLD, M.D.
 DIRECTOR
 Department of Public Health

EXPIRATION DATE 12/31/11	CATEGORY B630	I.D. NUMBER 0002725
-----------------------------	------------------	------------------------

FULL LICENSE
GENERAL HOSPITAL
 EFFECTIVE: 01/01/11

BUSINESS ADDRESS:
 SWEDISH AMERICAN HOSPITAL
 1401 EAST STATE STREET
 ROCKFORD IL 61101 9863

The face of this license has a colored background. Printed by Authority of the State of Illinois • 457 •

Criterion 1110.230 - PURPOSE OF PROJECT

The primary purpose of the proposed project is to improve the delivery of cancer treatment to the Northwestern portion of Illinois by providing a new comprehensive cancer care center which consolidates the three different sites the applicant currently utilizes to provide cancer treatment. This consolidation allows all of the cancer treatment specialists to be located in a single location where they can more easily share their expertise and experience to provide the best possible outcomes to the hospital's cancer patients.

The proposed project will also be a part of a new cooperative agreement with the University of Wisconsin, which will allow for the expertise of the University of Wisconsin physicians and specialists to be directly involved in patient care as well as being available for consultation when needed. This affiliation will also allow the applicant to be involved in research projects and have access to clinical trials for treatment which are not now available.

In conjunction with the University of Wisconsin the applicant will also be establishing and expanding the Multidisciplinary clinics with the University of Wisconsin physicians being either on-site or via referral for patient evaluation and treatment.

The new facility will be able to make appointments with the University of Wisconsin physicians as needed for specialized treatment and evaluation.

The equipment proposed by the new facility will be "State of the Art" and the new PET/CT unit will also be utilized for treatment simulation which will improve the treatment of the Radiation Oncology patients by refining the treatment areas and controlling the radiation dosages more precisely.

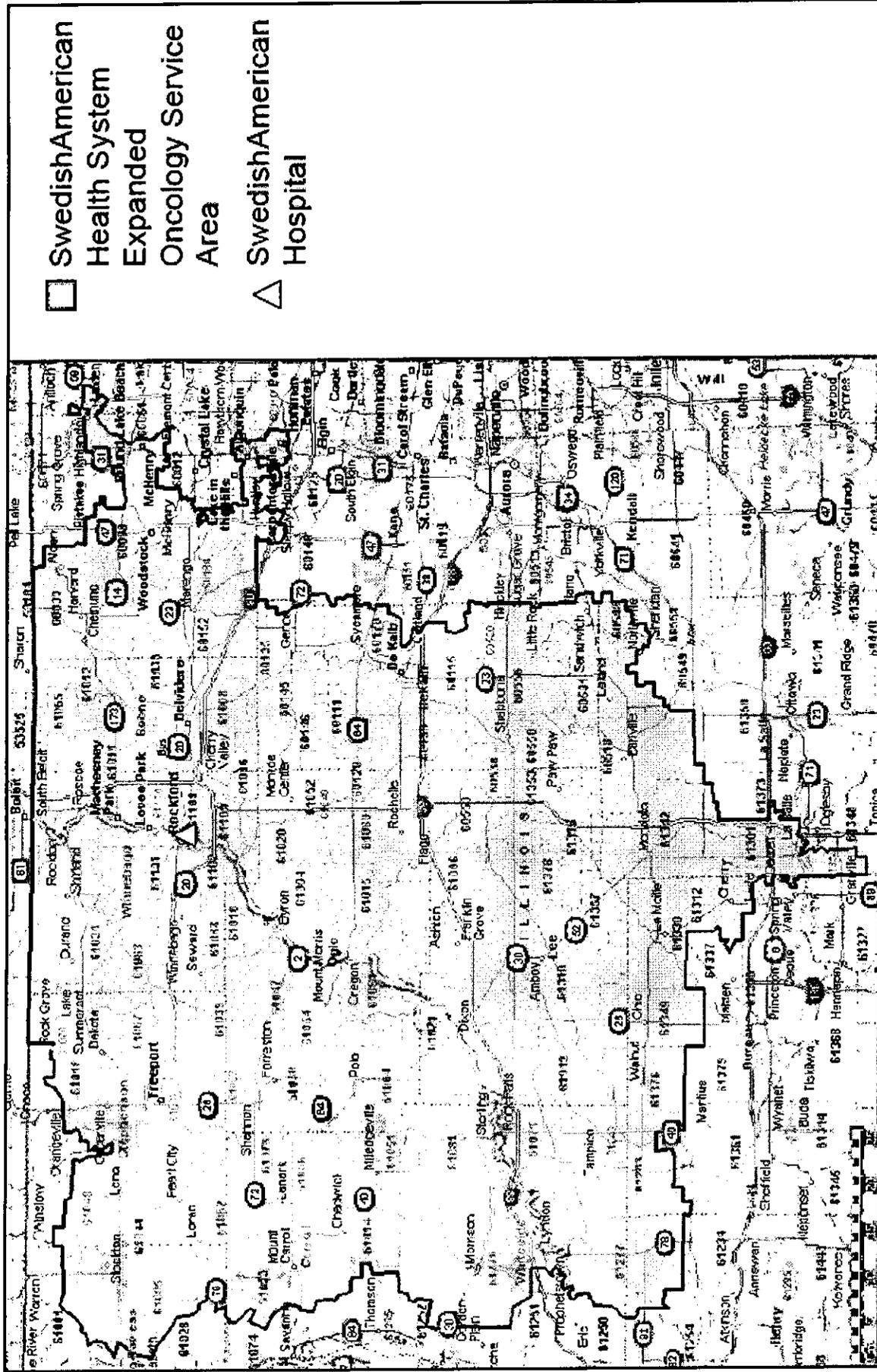
The total patient experience will be enhanced by the consolidation of services in a single location. An education area will be provided to give the patients the resources to research their treatment options and find out more about their disease. It will also be possible to provide services such as massages, prosthetics, and wigs for the patients where there are experienced, professional staff to assist the patients. This holistic approach to cancer care is often desired by the patient and the positive experience can aid in achieving a positive outcome from treatment.

Many of the area patients are now leaving the planning area (HSA) for care at cancer treatment centers in Chicago, Milwaukee or Madison because the involvement of the university medical centers are not readily available in the applicant's service area. This project will provide patients with that type of access while allowing them to stay close to home which requires less travel and more family involvement in the care of the patient.

The trend in patient care continues to increase the use of outpatient facilities especially in the area of cancer treatment. While the incidence of a cancer diagnosis is projected to increase as the population ages, the use of comprehensive outpatient facilities is projected to increase at an even faster rate. In order to stay competitive in the marketplace while providing high quality care the applicant must provide more patient friendly and efficient outpatient treatment options for the residents of the service area. The service area for this program encompasses the 16 counties in Illinois. (See the attached map).

In summary the primary purpose of the proposed project is to consolidate the three sites now used by the applicant into a single cancer treatment center which provides efficient cost-effective cancer treatment in a patient friendly environment which has access to the full range of cancer treatment modalities and services.

SwedishAmerican Hospital defined Oncology service area



Criterion 1110.230 - ALTERNATIVES

The applicant considered four alternatives to the proposed project in addition to the alternative chosen.

First the alternative of consolidating the oncology services on the existing campus. This alternative was rejected for the following reasons:

1. This alternative was rejected because the existing facilities could not house all of the oncology services in one location without major renovation and remodeling. In addition to the major disruption this alternative would have caused to existing services the cost of doing so would be far in excess of building the facility on a free standing site.
2. The estimated cost of this alternative; 60,000 square feet of space would be in excess of \$90 million dollars.

The second alternative considered was constructing a free standing facility on property adjacent to SwedishAmerican Hospital. This alternative was rejected for the following reasons:

1. This alternative could not be accomplished with a reasonable time frame. We estimated that it would take a minimum of 2 years just to acquire the property necessary to build the facility. The size of property needed (a minimum of 12 acres) would require us to purchase land and buildings from numerous owners, and in talking with city officials about doing that they indicated that they did not believe we would be able to acquire all of the necessary properties without their assistance through eminent domain. They estimated that process would take a minimum of two years at best.
2. In addition we could not predict up front what the estimated cost of the property would be because the value of the properties identified varied greatly and there was no good way of estimating what it would actually cost us to purchase and then demolish these properties.

The third alternative considered was to construct a free standing building on property located in downtown Rockford taking advantage of financial incentives offered by the city. This alternative was rejected for the following reasons:

1. An existing building on the site has been designated a historical land mark. Before it could be demolished for our construction the city would have to go through a process to allow the demolition that would take at least 6 months to complete and there was no guarantee that they would be successful in demolishing the facility at the end of the process.
2. The City would be required to complete major road and other reconstruction leading to the site that would take a minimum of 2 years to complete assuming everything went according to plan without any delays. We were uncomfortable taking that risk with the timeframe for the same reasons we rejected buying property adjacent to the hospital.

3. Several of the financial incentives offered by the City were contingent upon the City getting funds from the State and federal governments. We were not comfortable with committing to building on the site without better guarantees on the financial incentives.

The fourth alternative considered was to construct a free standing facility located on other land at I39/90 in Loves Park. This alternative was rejected for the following reasons:

1. There were concerns about the developer's ability to put in place the necessary road, utilities and other infrastructure necessary to begin construction of the facility within our timeframe. The site as it exists today is vacant land with no road access and no utilities connected to the site.
2. Also the incentives offered by the City of Loves Park could not match those offered by the City of Rockford. The biggest one being the City providing bus service to the new facility.

The alternative chosen was to construct the new facility on the proposed site within the City of Rockford, as it was the best site available to meet the facilities needs at the lowest cost possible within a reasonable time frame.

SIZE OF PROJECT				
DEPARTMENT/SERVICE	PROPOSED BGSF/DGSF	STATE STANDARD	DIFFERENCE	MET STANDARD?
Medical Oncology	26,931	None Available	N/A	N/A
Radiation Oncology	12,432	4,800	7,632	No
Diagnostic Imaging	3,465	3,100	365	No
Laboratory	1,866	None Available	N/A	N/A
Pharmacy	1,575	None Available	N/A	N/A

Criterion 1110.234 - SIZE OF PROJECT:

The proposed project consists of 5 clinical departments/areas all of which are directly related to the establishment of a cancer treatment center.

Medical Oncology

This department will house the exam and treatment rooms for the cancer patients receiving treatment other than radiation. The department will have 17 private treatment rooms, 33 treatment stations, and 24 Exam rooms.

The number of exam rooms was based upon the needs of the eight medical oncologists' current providing services at the hospital's various sites in the community. (3 exam rooms per oncologist). This number was determined by the benchmarking data provide by Sg2 Insight at the 50th percentile. (See the attached document titled Improving Infusion Suite Efficiency 2010.)

The number of treatment stations was based upon "The Journal of Oncology Practice" which indicated that a mean of 5.7 treatment stations per Oncologist. Based upon that figure the hospitals 8 oncologists would require 45.6 treatment stations. The remaining 4.4 stations are to accommodate additional infusion services to be provided on site by the specialists from the University of Wisconsin Health Program in Madison, Wisconsin.

The volume of Oncology patients is projected to grow significantly over the next 10 years due to the aging of the population, the increased use of combinations of treatment i.e., radiation therapy and chemotherapy, the increase of recurrence or secondary malignancy, and the reduction in the wait and watch treatment rather than chemotherapy as a first choice. This increase in the use of infusion therapy will only serve to increase the number of treatment stations needed. Therefore, it appears that the applicant's use of the 50th percentile as a benchmark is a very conservative method of projecting need.

The construction of this new facility allows for an efficient use of resources to provide cancer treatment.

The total gross square footage for this department is 26,931 GSF, which amounts to 363.9 gross square feet per treatment room/exam room. This space compares favorably to the space allowed by the HFSRB for Dialysis station at 470 GSF/Station or Ambulatory Care space at 800 GSF/room. The applicant's space plan must be adjusted for the equipment and support space required for infusion patients but it is still well below State standards for departments with similar space demands.

Radiation Oncology

The proposed space for this department will house 2 linear accelerators, and a brachytherapy room. The only State Board standards are for the linear accelerator rooms which allow 2,400 GSF per Linear Accelerator. The brachytherapy room occupies approximately the same space as the linear accelerators and as such would account for an additional 2,400 GSF.

The proposed space allows all of the radiation therapy modalities to be located in one area with the physicists, and radiation oncologists offices (7) included in the space. The exam rooms (6) allow the patient to only have to go to one location rather than travel to multiple locations for exams and then treatment.

The consultation room allows the physicians to meet with either the patient, or other personnel such as the specialists from the University of Wisconsin. It also allows the support staff to meet with the patient or the physicians as needed without leaving the treatment area.

The department is also located in close proximity to the imaging area which houses the PET/CT/Simulator for efficient treatment planning.

The space was planned by reviewing each of the departmental functions and determining what the space needs were for that function. A drawing of the proposed department layout as well as the layout of the other departments is appended to this attachment.

The establishment of a freestanding center requires that additional space be allocated to the departments. The support areas normally associated with a hospital, have to be provided, but are not spread over the larger number of departments included in a hospital. For instance a waiting area must be established for the Radiation Therapy department within a hospital could be easily utilized by several departments thereby reducing the GSF allocated to any one department. Support space such as storage, clean and soiled laundry, and security must also be provided in the department rather than having a central supply department from which supplies can easily be drawn as needed or a centralized hospital security department which would serve the entire hospital. This need for direct departmental support space increases the overall square footage of the individual departments. Due to their locations within the department they are also considered clinical space rather than non-clinical space which makes the department appear larger than other hospital based programs review by the Board.

The spaces included in this department are essential to its operation and are consistent with other similar freestanding facilities. The total gross square footage is reasonable when compared to other freestanding facilities across the country. Note a copy of the drawings for this center are appended to this attachment as are the space planning guidelines used by the applicant.

Medical Imaging

This department will house a general X-ray unit and a PET/CT/Simulator. The Board's Appendix B allows 1,800 GSF for a CT scanner and 1,300 GSF for a general X-ray unit. In addition to these two pieces of equipment the department will also house a hot lab, and its support space for the preparation of the isotopes used in the PET scanning process. The hot lab utilizes approximately 600 square feet when its support areas are included. When this space is included the Medical Imaging Department is consistent with State Norms.

Pharmacy

This space is to be used to prepare the infusion materials and other meds to be used by the patients in the departments of both Radiation Therapy and Medical Oncology as well as the patients receiving non-cancer related infusion therapy at the center. The State Board does not have standards for this service.

The applicant developed the space plan for this department by consulting with the staff working in the department and by reviewing other similar facilities in centers across the State and Country. The proposed space is consistent with those other facilities based upon the number of FTE's and the volume of services proposed. This pharmacy area will also contain a retail pharmacy which will provide services only to the patients of the cancer treatment center.

Normally a department of this type is sized based upon the number of beds located in the hospital; however, in this application the cancer treatment center does not have any beds which make this type of comparison impossible. The department will have 5.7 FTE's upon completion of this project. Given the space needs to mix and prepare infusion materials for many different types of patients both cancer and non-cancer related patients the space proposed, 1,575 GSF is needed.

Laboratory

This department has a total of 1,866 GSF and will be used to provide laboratory testing and blood drawing exclusively for the patients of the cancer treatment center. The department will have a total of 5.5 FTE's upon opening the new center. The department consists of both the blood drawing area, the testing area, a waiting area and the support space for a laboratory.

The proposed 1,866 GSF amounts to 327.4 GSF per FTE which when the blood drawing area and the waiting area are removed compares favorably to previously approved laboratories in both hospital and freestanding facilities. No standards have been set for laboratories primarily because of the diverse nature of the laboratories themselves, where the degree of automation and the type of testing make significant differences in the space required. This laboratory will perform testing primarily as it relates to the cancer patients being treated at the facility which rely less on highly automated testing modalities and more on manual testing.

CLIENT: SARGENT & Lundy 1000 15th Street, N.W. Washington, D.C. 20004	ARCHITECT: Skidmore, OWINGS & Merrill 110 Park Avenue New York, N.Y. 10017	DATE: 11/10/83
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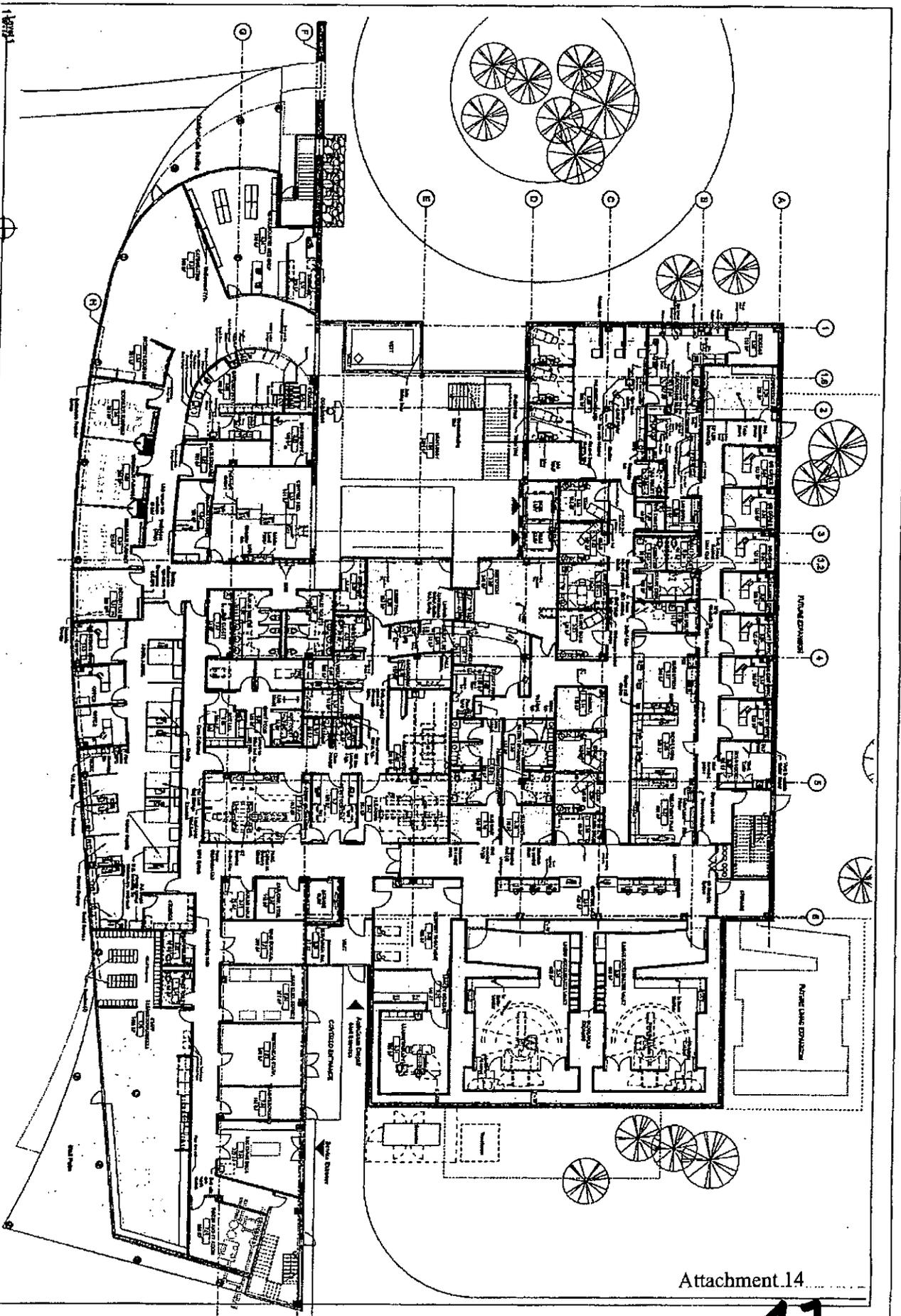
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Attachment 14

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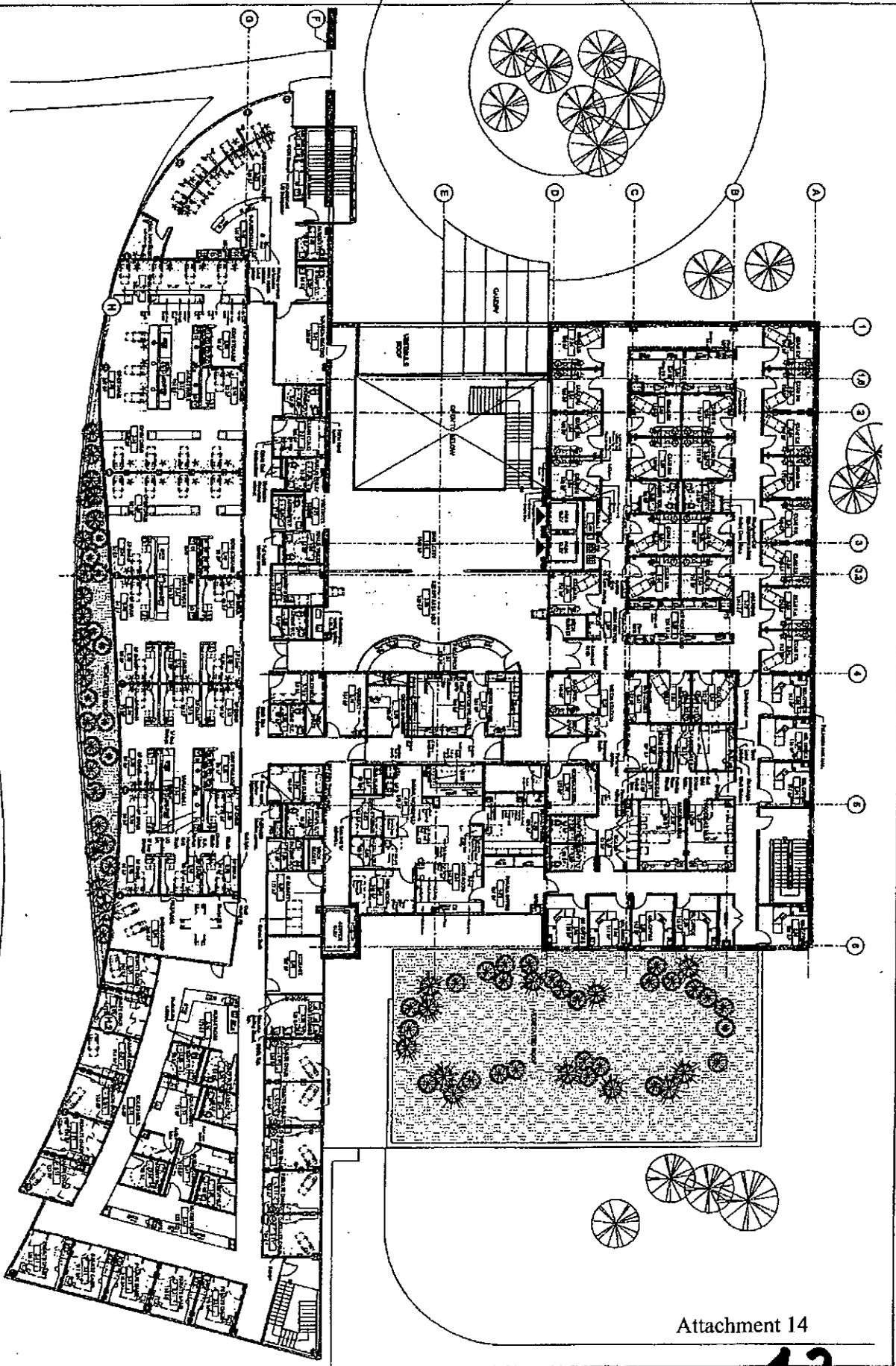
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 REGIONAL TOWER
 SOUTHWEST UNIVERSITY HEALTH SYSTEM

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Attachment 14

42

INSIGHT

Improving Infusion Suite Efficiency

2010



Attachment 14

43

Sg2 Staff

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Executive Summary

Improving Infusion Suite Efficiency 2010

The infusion suite is an essential part of any hospital cancer program. Yet it also is an area commonly plagued by inefficiency and financial strain. In the face of rising demand for chemotherapy services and declining reimbursement, programs must work to streamline core processes and optimize staff utilization.

Infusion suite efficiency hinges primarily on the strength of the links across a broad interdepartmental team, which includes clinic coordinators, phlebotomists, pharmacists, laboratory and pharmacy technicians, infusion and oncology nurses, and oncologists. Ineffective processes that complicate the work of these critical players and failed handoffs between them cause bottlenecks and undermine performance of the suite.

Numerous strategies can be employed to optimize scheduling, improve lab and pharmacy turnaround times, and make documentation less onerous without compromising quality. Improving operations reaps multiple benefits, including decreased direct costs, maximized treatment capacity, enhanced patient safety and, ultimately, higher satisfaction scores among staff and patients.

Improving Infusion Suite Efficiency 2010 outlines the challenges of efficiently providing chemotherapy and details process improvement steps. In addition, case studies illuminate changes programs can make to enhance day-to-day operations of their infusion suites.

Chemotherapy Landscape

- Demand for chemotherapy treatments will jump 42% over the next decade as the population ages and cancer survivorship increases.
- A payment squeeze on chemotherapy drugs has forced hospitals to find new ways to curb direct treatment costs and achieve profitability.
- Although the availability of oral chemotherapeutics is increasing, infusion-based drug delivery remains core to the comprehensive patient experience.

Strategies for Improving Infusion Suite Efficiency

- Assemble key players to evaluate current processes.
- Develop a patient acuity rating system.
- Schedule staff and treatments based on acuity level.
- Optimize infusion chair scheduling.
- Improve laboratory handoffs to expedite treatment.
- Standardize orders to enhance pharmacy operations.
- Reduce the time and work required for documentation.

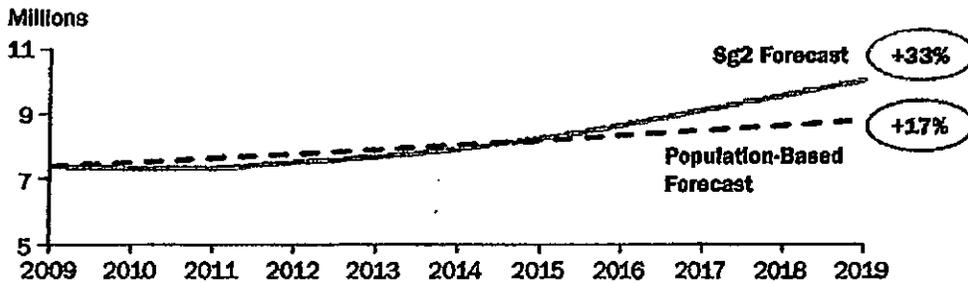
Demand for Chemotherapy Will Surge

Significant growth in chemotherapy demand will require extra treatment capacity, which can be achieved by expanding staff and facilities or by improving day-to-day efficiency.

■ Sg2 Forecasts 33% Growth From 2009 to 2019

With an aging population and increasing cancer survivorship, chemotherapy volumes will significantly outpace population growth estimates.

Chemotherapy Outpatient Forecast US Market, 2009-2019



■ Multiple Factors Contribute to Increase

Heightened patient risks for recurrence or secondary malignancy due to increased survivorship are key factors behind increased demand.

Trends Behind the Forecast

Increased patient survivorship	↑↑↑
Increased patient risk for recurrence or secondary malignancy	↑↑↑
Increasing number of metastatic breast cancer patients (e.g., tamoxifen therapy with aromatase inhibitors)	↑↑
Increased use of targeted therapies leading to identify appropriate chemotherapy-based combination	↑↑
Increased use of targeted therapies in primary treatment	↓

Sources: Impact of Change® v8.0; Pharmetrics; CMS; Sg2 Analysis, 2010.

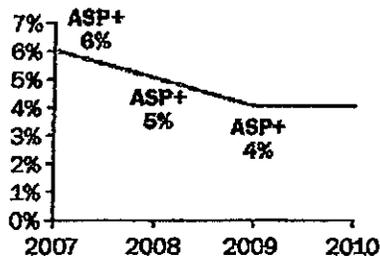
Slim Margins Put Pressure on Operations

Cancer service lines continue to feel the pain of declining reimbursement rates, especially for their infusion suites. Tight purse strings make any degree of inefficiency particularly problematic.

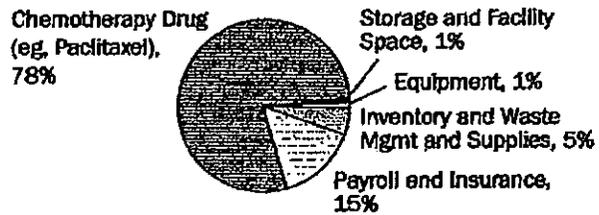
Cost per Dose Must Be Extracted From Ever-Lower Reimbursement

Medicare is continuing its crackdown on payments for chemotherapy drugs. The federal payer has targeted ASP +3% as its near-term goal. With the bulk of chemotherapy suite costs attributed to drugs, the payment squeeze amplifies the need for cost-effective operations.

CMS Chemotherapy Drug Reimbursement, 2007-2010



Sample Chemotherapy Suite Costs (Per Drug Dosage)



Inefficiencies Drive Up Costs

Inefficient practices commonly plague each component of infusion centers' direct costs.

Common Revenue Drains

Direct Cost Component	Operational Inefficiency
Pharmacy Equipment	<ul style="list-style-type: none"> Lack of patient volumes to cover cost of in-house pharmacy Overpayment to outsourced pharmacy Misaligned pharmacy staff-to-treatment volumes
Storage and Facility Space	<ul style="list-style-type: none"> High cost per square footage Overpayment to rent vs own
Inventory and Waste Management	<ul style="list-style-type: none"> Poor inventory monitoring and management Poor negotiations with suppliers Drug waste
Supplies and Devices	<ul style="list-style-type: none"> Overordering supplies Misuse of supplies or devices
Payroll and Insurance	<ul style="list-style-type: none"> Extraneous staffing or understaffing Unclear staff roles and responsibilities Poor communication between staff members

ASP = average sales price; CMS = Centers for Medicare & Medicaid Services; mgmt = management.
 Sources: Brinker DJ et al. *J Natl Compr Canc Netw* 2008;4(3):197; US Oncology, February 2009; CMS. 2009 Final Hospital Outpatient Prospective Payment System (HOPPS) Regulations (CMS-1404-FC). Accessed January 2010; Sg2 Analysis, 2010.

Case Mix Variability Complicates Treatment Delivery

Highly varied patient acuity and treatment types complicate infusion delivery and challenge efficiency.

■ Treatment Intensity and Timing Vary Widely

Patients require a broad range of staff time, support and oversight during infusions that can last minutes or hours. This diversity makes it difficult to standardize and streamline treatment practices.

Infusion Suite Treatments, by Chair and Nurse Time

Patient Time in Chair	Average Nurse Time	Treatments
10-59 minutes	7-22 minutes	Short treatments or troubleshooting ports
1-2 hours	23-45 minutes	Chemotherapy treatment, platelet transfusion, patient education, or laboratory draw via port-a-catheter
2-3 hours	46-60 minutes	Chemotherapy treatment, patient needing symptom management, or patient education followed by short treatment
3-4 hours	61-90 minutes	Chemotherapy treatment, or patient education followed by medium length treatment
4-5 hours	91-180 minutes	Chemotherapy treatment, patient education followed by long chemotherapy, patient needing fever/neutropenia workup with fluids, or lengthy hydration followed by chemotherapy treatment
5+ hours	181+ minutes	Chemotherapy treatment, transfusion with type and cross, or complex patient with possible admission

■ Staff Roles Must Reflect Case Mix and Volumes

Multiple clinical and administrative staff members from various hospital departments make up the chemotherapy team. Each has a unique educational background, skill set and responsibilities.

Example Multidisciplinary Staffing

Staff	Roles and Responsibilities
Supervising Oncologist	<ul style="list-style-type: none"> Examines and, if needed, admits patients experiencing adverse reactions Changes chemotherapy dosages as necessary
Infusion Nurse	<ul style="list-style-type: none"> Ensures patient drug order matches administered treatment Starts IV line, monitors patient during treatment and discontinues IV
Clinical Research RN	<ul style="list-style-type: none"> Ensures clinical trial lab and chemo orders are complete and accurate
Phlebotomist	<ul style="list-style-type: none"> Performs timely blood draws to expedite lab receipt of samples
Laboratory Technologist	<ul style="list-style-type: none"> Accurately and efficiently runs blood tests
Pharmacist and Technicians	<ul style="list-style-type: none"> Evaluate orders for accuracy and compliance Accurately measure, mix and prepare treatment
Administrative Staff Members	<ul style="list-style-type: none"> Relay patient complaints to clinicians Inform patients of treatment delays
Pharmacy Director	<ul style="list-style-type: none"> Manages safety and quality of pharmacy Oversees drug purchase and storage

Multiple Handoffs Leave Room for Error

Chemotherapy administration requires numerous handoffs of patient information and therapeutics. Each juncture presents a potential risk to safety and efficiency.

■ Poor Staff and Patient Communication Can Hinder Process

Staff communication can make or break your ability to administer treatment efficiently. Numerous potential treatment delays and bottlenecks can be created during patient handoffs.

Challenges Posed at Key Junctures

Key Handoff	Potential Challenge
MD to Pharmacy	<p>Example: Chemotherapy order is incomplete.</p> <p>Impact: Pharmacist spends 20 minutes trying to locate the physician to rewrite the order. Patient wait time for treatment doubles. Chemotherapy waiting room overflows from avoidable delay.</p>
Laboratory to MD	<p>Example: Lab value is posted to patient online chart, but result requires physician contact and approval for treatment. Lab tech must locate MD or nurse to relay message. Pharmacist awaits response.</p> <p>Impact: Slow physician response delays patient's treatment and creates pharmacy processing backlog. Lab tech falls behind processing patient lab values.</p>
Nurse to MD	<p>Example: Patient informs nurse of abnormal treatment complications.</p> <p>Impact: Nurse must locate physician for instructions. Patient awaits physician evaluation in chemo chair or exam room, causing a backlog. If treatment must be cancelled, changes to the patient's future schedule must be accommodated and pharmacy notified to shred future orders. Patient must await physician discharge.</p>
Chemotherapy Suite Staff to Patient	<p>Example: Medical emergency occurs in chemotherapy suite.</p> <p>Impact: Infusion suite and medical staff are diverted to emergency. Delays cascade for all scheduled patients for that day. Administrative staff must relay delay message and reschedule those patients with flexible treatment plans.</p>

■ Effective Operations Can Facilitate Quality Assurance

Rigorous standards have been put in place by multiple quality control organizations (eg, Joint Commission, American Society of Clinical Oncology, Oncology Nursing Society). Standardizing processes, implementing guidelines and other efforts to optimize daily operations help programs avoid common quality assurance (QA) pitfalls and meet stringent QA standards.

Common QA Pitfalls

- Failing to document patients' current medications at every treatment visit
- Failing to capture, document and receive required approval for standard treatment deviations
- Accepting verbal chemotherapy orders
- Failing to give patients written documentation/educational materials about specific treatments
- Failing to utilize a risk-free reporting system
- Failing to review and evaluate medical errors and near-misses in a timely manner
- Failing to provide 24/7 access to patients in case of complications or toxicities
- Failing to document toxicities
- Failing to have 2 independent practitioners prepare/administer chemotherapy and verify each order

Strategies to Improve Infusion Suite Efficiency

Many factors complicate cancer programs' efforts to improve the efficiency of their infusion suites. But timely, cost-effective treatment is essential to provide superior patient care. With many programs already facing capacity issues, steps must be taken now to identify and address common bottlenecks, improve interdepartmental communication, and maximize staff and chair utilization.

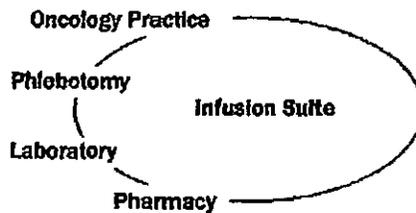
Assemble Key Players to Evaluate Current Processes	Page 7
Develop a Patient Acuity Rating System	Page 8
Schedule Staff and Treatments Based on Acuity Level	Page 9
Optimize Infusion Chair Scheduling	Page 10
Improve Laboratory Handoffs to Expedite Treatment	Page 11
Standardize Orders to Enhance Pharmacy Operations	Page 12
Reduce the Time and Work Required for Documentation	Page 13

Assemble Key Players to Evaluate Current Processes

Uncovering improvement opportunities requires a broad-based perspective. Input of individuals beyond the administrators and clinicians within the infusion suite is essential for identifying and implementing an improvement strategy.

■ Identify Key Stakeholders

Include team members within the oncology practice, phlebotomy department, laboratory and pharmacy. If they help shape strategy from the outset, it will be easier to gain their buy-in and optimize interdepartmental processes.



■ Create a Planning Team

A small, cross-departmental team should be formed to identify efficiency gaps, devise solutions, implement changes and measure success. Each team member should clearly understand current work flow and departmental processes.

Team Composition

Staff	Planning Team Role
Manager of Administrative Staff	<ul style="list-style-type: none"> ■ Outlines relevant administrative work flows ■ Solicits feedback from front desk and other administrative staff on current inefficiencies, patient complaints, common backlogs
Oncologist Representative	<ul style="list-style-type: none"> ■ Represents oncologists' perspective ■ Advises on clinical practice guidelines ■ Solicits oncologist feedback on inefficiencies, problematic staff interactions and other day-to-day concerns
Oncology Nurse or Research Nurse Representative	<ul style="list-style-type: none"> ■ Represents noninfusion nurses, who function as a link between oncologists, infusion nurses, pharmacy and laboratory ■ Obtains nurse feedback on inefficient handoffs and/or clinical trial concerns
Pharmacy Director or Pharmacist Representative	<ul style="list-style-type: none"> ■ Educates team on pharmacy operating procedures ■ Solicits pharmacist/pharmacy tech feedback ■ Details challenges in chemotherapy processing, patient handoffs and order miscommunications
Laboratory and Phlebotomy Director(s)	<ul style="list-style-type: none"> ■ Outlines laboratory and phlebotomy standard practices and operations ■ Elicits phlebotomy and lab staff feedback on miscommunications and patterns of incorrect blood orders
Infusion Nurse Manager	<ul style="list-style-type: none"> ■ Details infusion suite activity, infusion nurse responsibilities and work flow ■ Solicits feedback from infusion nurses on current inefficiencies

Develop a Patient Acuity Rating System

The infusion suite administers a wide range of treatments to patients with varied clinical needs. Patients scheduled to receive the same treatment may require vastly different levels of nursing care. Creating appointment and staff schedules based on treatment type, therefore, can be extremely challenging.

■ Devise a Scale That Reflects Patients' Individual Nursing Needs

Segmenting infusion suite patients by required nursing time rather than by treatment type can be helpful. Such an approach requires development of a patient acuity rating scale that accurately reflects each patient's acuity level and nursing needs. Time frames set for each level must account for not only the actual infusion duration, but also nursing time for pretreatment hydration and antiemetic administration, patient education, side effect management, documentation and other supportive care.

Sample Medical Oncology Acuity Rating System

Patient Acuity Level	Average Nurse Time	Average Chair Time	Treatment Descriptions	Treatment Examples
Level 1	7-22 minutes	10-59 minutes	Short treatments; subcutaneous injections; troubleshooting ports	Zoledronate, Herceptin® (second dose or more), Zoladex®, Avastin
Level 2	23-45 minutes	60-120 minutes	Chemotherapy lasting 1-2 hours; patient education; chemotherapy port laboratory draws	Cytosan®, Taxol® (1 hour only), Adriamycin and Cytosan, Taxotere, Avastin
Level 3	46-60 minutes	121-180 minutes	Chemotherapy lasting 2-3 hours; patient needing symptom management	IV potassium, Taxol (first time, 1 hour), Herceptin (first time)
Level 4	61-90 minutes	181-240 minutes	Chemotherapy lasting 3-4 hours maximum	FOLFOX and FOLFIRI
Level 5	91-180 minutes	241-300 minutes	Chemotherapy lasting 4-5 hours or packed red blood cell	FOLFOX or FOLFIRI plus Avastin, R-CHOP, cisplatin/VP16, Rituxan®
Level 6	181+ minutes	301+ minutes	Complex chemotherapy administration with blood products	Any complex chemotherapy plus 2 hours of hydration

FOLFOX = folinic acid, fluorouracil and oxaliplatin; FOLFIRI = folinic acid, fluorouracil and Irinotecan; R-CHOP = Rituxan, cyclophosphamide, hydroxydaunorubicin, Oncovin and prednisolone.

Sources: Adapted from: Hawley E and Carter NG. *Oncology Issues* November/December 2009:34-37; Sg2 Analysis, 2010.

Schedule Staff and Treatments Based on Acuity Level

The goal of the acuity rating scale is to best estimate each patient's nursing needs. Unfortunately, patients too often must wait for nurses to become available. Improperly allocating nurses to patients can create inefficiencies that impact operations across the infusion suite.

Match Nursing Assignments to Patient Acuity Ratings

The acuity rating system enables programs to staff based on case mix rather than number of patients. Staffing by acuity level ensures fair workload distribution.

Example Infusion Center: Nurse Staffing Based on Patient Acuity*

Infusion Nurse	Number of Patients	Patient Acuity Level	Average Nursing Time
Nurse A	1	Level 2	0.5 hours
	2	Level 1	0.25 hours
	3	Level 5	6 hours
Total	6 patients		6.75 hours
Nurse B	1	Level 5	2 hours
	3	Level 4	4.5 hours
Total	4 patients		6.5 hours
Nurse C	2	Level 5	4 hours
	3	Level 3	3 hours
Total	5 patients		7 hours

Optimize Nurse Utilization Through Acuity Level Scheduling

To optimize nurse utilization, treatment start times should be staggered and treatments should overlap. Further efficiency can be gained by scheduling higher-acuity patients earlier in the day. Final patients of the day should be scheduled to allow time for closure of suite.

Example Infusion Center: Scheduling Based on Patient Acuity*

Nurse A's Patient Schedule Using Acuity Tool

Scheduled Start Time	Acuity Level	Chart Time Required	Nursing Time Required
8:00 am	Level 5	5 hr	2 hr
8:30 am	Level 5	5 hr	2 hr
9:00 am	Level 5	5 hr	2 hr
11:00 am	Level 1	30 min	7 min
12:30 pm	Level 2	1 hr	30 min
1:30 pm	Level 1	45 min	8 min
Total Time		17 hr 15 min	6 hr 45 min

Staff Instructions for Scheduling Patients

Acuity Level	Scheduling Supplication
Level 1	After 1 pm, no later than 4 pm
Level 2	After 1 pm, no later than 3 pm
Level 3	Between 10 am and 1 pm
Level 4	Between 9 am and 1 pm
Level 5	Between 7 am and 10 am
Level 6	Between 7 am and 9 am

*The example infusion center is open from 7:00 am to 6:00 pm.
Source: Hawley E and Carter NG. *Oncology Issues* November/December 2009:34-37.

Optimize Infusion Chair Scheduling

Improving nurse utilization is only 1 step toward elevating infusion suite efficiency. Steps also should be taken to minimize the extent to which the number of infusion chairs limits treatment capacity.

■ Slot Chair Use Based on Realistic Patient Flow

Overlay the patient acuity schedule with available chairs to ensure efficient patient flow. Adjust schedules to match chair availability with nurse availability and patient acuity. Chair utilization per hour may vary throughout the day. This is not a problem as long as the schedule is designed based on ideal treatment case mix and nurse staffing.

Sample Schedule by Chair, Time and Patient Acuity Level

Chair	Time Slot 1	Time Slot 2	Time Slot 3	Time Slot 4	Time Slot 5
1	Level 1	Level 2	Level 3	Level 1	Level 2
2	Level 1	Level 2	Level 3	Level 1	Level 2
3	Level 1	Level 2	Level 3	Level 1	Level 2
4	Level 1	Level 2	Level 3	Level 1	Level 2
5	Level 1	Level 2	Level 3	Level 1	Level 2
6	Level 1	Level 2	Level 3	Level 1	Level 2
7	Level 1	Level 2	Level 3	Level 1	Level 2
8	Level 1	Level 2	Level 3	Level 1	Level 2

■ Minimize Chair Downtime

As nursing allocation per patient improves, so will chair turnover times*. Several strategies can help minimize chair downtime.

- Move patients into infusion chairs only once the nurse is ready to start treatment.
 - Supply alternate seating for patients requiring lab draws and other medical checks.
 - Allocate separate space for patient and family education.
 - Build adequate chair turnover time into each treatment block to minimize scheduling backlogs.
- Call to remind patients about appointments, which will help minimize missed appointments and patient tardiness.
- Encourage staff (eg, medical oncologists, research nurses) to report treatment cancellations immediately to allow time to fill gaps in chair and nurse availability.
- Designate offices and private rooms for nurses to use when reviewing discharge instructions with patients and families.

*Chair turnover time is typically measured from the time the nurse discontinues treatment IV to the time an infusion nurse begins treatment on the next patient. Steps calculated in chair turnover time include: extra recovery time for patient before exiting chair, time for sanitizing chair, nurse and pharmacist preparation time, and other patient preparation time.

Improve Laboratory Handoffs to Expedite Treatment

Phlebotomy and laboratory processing delays can double or triple a patient's wait time for treatment. The longer every infusion patient waits for a blood draw, the more inefficient chair and staff utilization becomes.

■ Recognize Prime Culprits in Laboratory Delays

Most chemotherapy treatments are dependent on lab results. Improving lab order standardization helps to improve phlebotomy and laboratory efficiency. But hurdles are common.

Laboratory Inefficiencies Have Widespread Impacts on Care

Hurdle	Impact
Lack of standardized laboratory drawing process for chemotherapy patients	Lengthy phlebotomy wait times that delay pharmacy processing
Inaccurate or incomplete laboratory orders	Delayed treatment starts and backlogs for phlebotomy and laboratory staff
Failing to mark orders as "STAT"	Delayed pharmacy processing and treatment starts
Lack of standardized communication process for abnormal lab results	Increased staff time required to search for clinicians to make treatment or admission decisions

■ Streamline Processes to Shorten Time to Treatment

Several steps can be taken to ensure phlebotomy and the chemistry and hematology laboratories do not become a treatment bottleneck.

- Provide the phlebotomy and laboratory managers with an advance patient schedule so that technician staffing volumes align with peak times for infusion suite blood draws.
- Perform chemotherapy-dependent laboratory tests at least 1 day prior to treatment when feasible.
- Accept outside laboratory results as 1 route for verifying patients' treatment eligibility. Designate a unique fax machine for receipt of all outside reports, and ensure it is checked routinely for incoming reports.
- Allocate a phlebotomy chair specifically to the infusion suite. Assign a nurse or other infusion staff member to manage prechemotherapy laboratory walk-ins and access chemotherapy ports for lab draws. Ensure the nurse documents patients' laboratory drawing preferences for future schedule planning.
- Create a standardized process for cases in which redraws become necessary. Consider direct communication from the lab technician to infusion suite administrative staff. Staff can then arrange with the patient for an immediate redraw.
- Assign a clinical staff member each day to review the next day's patient list and ensure all required lab orders are clear and complete. Outside lab results also should be confirmed as part of this process and clearly identified for the phlebotomy, front desk and pharmacy staff.

Standardize Orders to Enhance Pharmacy Operations

Filling chemotherapy orders can be a time-consuming task for hospital pharmacies. Unclear or incomplete physician orders can add even more time, resulting in treatment delays and infusion backlogs.

Pinpoint Order Documentation Lapses That Hinder Pharmacy Efficiency

Eliminating any unnecessary work is the best strategy for improving work flow between the pharmacy and infusion suite. Yet breakdowns in communication between clinicians and the pharmacy frequently occur.

- Failure of physicians and other clinicians to use standardized electronic chemotherapy ordering templates can heighten the rate of inaccurate, incomplete or illegible orders.
- Incomplete orders and those out of sync with clinical practice standards require extra pharmacist follow-up and can compromise patient safety.
- Clinicians' failure to document patients' current medications requires extra pharmacist time to gather further information to avoid potential drug interactions.
- Delays in cancelling chemotherapy orders with the pharmacy can lead to drug waste or increase risk that the patient could receive an incorrect treatment.

Standardize Pharmacy Order Processes to Prevent Errors

Most chemotherapy drug errors occur at the prescribing and/or ordering stage. Prescribing errors must be intercepted early. Several strategies prove key to improving chemotherapy ordering processes.

- Establish clearly defined guidelines for physicians ordering chemotherapy. Require designated physician prescribers to use standardized electronic (or pretyped) chemotherapy order templates. Eliminate abbreviations, acronyms and brand names. Consider requiring 2-physician verification and a cosignature on all chemotherapy orders.
- Require physicians to include in the initial order any potential pretreatment medications and/or hydration needs to best estimate the treatment time and acuity rating.
- Require either the pharmacist or infusion nurses to initiate a chemotherapy order check* 3 days before scheduled appointment. Repeat the check no later than 24 hours prior to patient appointment to ensure any necessary corrections have been made.

*Chemotherapy order check includes patient identification, treatment history, prescribed drug dosage, protocol compliance and potential concomitant drug interactions based on current medications.

Reduce the Time and Work Required for Documentation

A third of infusion nurses' time is dedicated to documentation. Effectively integrating information or automating documentation can free up time for nurses to spend providing direct patient care.

■ Make Pertinent Patient Records Readily Accessible to Infusion Staff

All clinically relevant information should be made available for infusion nurses at the patient's chair or bedside.

In a paper-charting environment:

- Combine all pertinent patient information with a copy of the chemotherapy order and drug treatment, including: previous chemotherapy treatment history, current and previous laboratory results, current history and physical (H&P), the most recent physician note, current patient medication list and previous infusion nursing notes.

In a paperless environment:

- Provide multiple mobile workstations within the infusion suite to ensure all clinicians have convenient access to required patient and treatment information. Alternatively, provide an accessible computer next to each treatment chair.
- Use scanners to increase ease of information access and more efficiently upload nursing notes and other time-sensitive records.
- Add pertinent patient treatment and drug notes to the infusion suite scheduling system for ease of access.
- Consider installing an oncology information system (OIS) to better integrate critical information now commonly found in separate databases.

■ Assess the Feasibility of Smart Infusion Systems

The use of smart infusion systems at the point of care can significantly reduce documentation requirements and identify and correct infusion pump programming errors by calculating dosages in real time. The systems provide many advantages, some of which are listed below.

- Automatically complete nurse documentation when integrated with electronic medication administration records (eMARs), reducing nurses' time per patient by as much as 35%
- Capture and record metrics, including the reasons behind treatment errors
- Provide downloadable reports, such as infusion usage
- Update hospital-wide drug library, reducing the risk of medication errors
- Automate dispensing to control drug distribution
- Decrease drug doses that fall outside of hospital parameters
- Record repeated dosage errors for any given drug
- Optimize restocking, including minimizing overordering of chemotherapy and chemotherapy-related drugs

Source: David BA et al. *Risk Reduction and Systematic Error Management: Standardization of the Pediatric Chemotherapy Process*. Memorial Healthcare System, Hollywood, FL. www.ahrq.gov/downloads/pub/advances2/vol2/Advances-David_13.pdf. Accessed February 2010.

Making It Happen

Heightened demand and financial pressure for chemotherapy services make operational improvements focused on the infusion suite critical for cancer programs. To enhance efficiency, programs must optimize scheduling, lab and pharmacy handoffs, and treatment delivery processes. These steps will help cancer programs to consistently provide high-quality, cost-effective care.

<input checked="" type="checkbox"/> Strategies for Improving Infusion Suite Efficiency	
Assemble Key Players to Evaluate Current Processes	<input type="checkbox"/> Identify key stakeholders. <input type="checkbox"/> Create a planning team.
Develop a Patient Acuity Rating System	<input type="checkbox"/> Devise a scale that reflects patients' individual nursing needs.
Schedule Staff and Treatments Based on Acuity Level	<input type="checkbox"/> Match nursing assignments to patient acuity ratings. <input type="checkbox"/> Optimize nurse utilization through acuity level scheduling.
Optimize Infusion Chair Scheduling	<input type="checkbox"/> Slot chair use based on realistic patient flow. <input type="checkbox"/> Minimize chair downtime.
Improve Laboratory Handoffs to Expedite Treatment	<input type="checkbox"/> Recognize prime culprits in laboratory delays. <input type="checkbox"/> Streamline processes to shorten time to treatment.
Standardize Orders to Enhance Pharmacy Operations	<input type="checkbox"/> Pinpoint order documentation lapses that hinder pharmacy efficiency. <input type="checkbox"/> Standardize pharmacy order processes to prevent errors.
Reduce the Time and Work Required for Documentation	<input type="checkbox"/> Make pertinent patient records readily accessible to infusion staff. <input type="checkbox"/> Assess the feasibility of smart infusion systems.

Appendix

Staff Responsibilities

No process improvement initiative can succeed in the infusion suite without ensuring all staff members adhere to the procedures established for administering treatment. Accountability must be well-defined for each care delivery step. Clear lines of communication also must be established.

Infusion Suite Staff and Responsibilities

Staff	Key Responsibilities
Front Desk Staff	<ul style="list-style-type: none"> Act as a liaison for patients, oncologists, infusion nurses, phlebotomists, administrative and clinical managers, and hematology/chemistry laboratories
Phlebotomy and Vitals Staff	<ul style="list-style-type: none"> Double-check patient identification Provide timely care Document pertinent medical information
Hematology and/or Chemistry Laboratory Technicians	<ul style="list-style-type: none"> Double-check patient samples against medical record information and former comparable results Clearly communicate any necessary patient blood redraws Process and post results in a timely manner
Oncologist	<ul style="list-style-type: none"> Ensures only completed chemotherapy orders are delivered to pharmacy
Oncology Nurse or Other Clinician	<ul style="list-style-type: none"> Provides patients with treatment pamphlets and contact numbers to use when they require additional guidance Educates patients and their family members Serves as a link between patients and their oncologists and infusion nurses
Pharmacist and Pharmacy Technicians	<ul style="list-style-type: none"> Perform a 3-day advanced check of all chemotherapy orders Review orders, verify protocol compliance and perform redundant checks while entering and dispensing orders For oral chemotherapy dispensing: ensure patients understand proper dosage, specify time of day drugs should be taken and outline potential interactions that could decrease effectiveness
Chemotherapy Suite Manager	<ul style="list-style-type: none"> Collects data necessary to improve the efficiency, quality and safety of daily processes Works with oncologists and cancer directors to improve operational efficiency and quality Facilitates patient reporting of side effects or adverse events
Infusion Nurses	<ul style="list-style-type: none"> Review chemotherapy order, patient's dosing protocol and administration schedule to ensure they match the dispensed, labeled chemotherapy bag (must be conducted by 2 certified oncology nurses) Calculate patient's absolute neutrophil count (ANC) as needed Review, verify and document relevant lab results and orders Immediately prior to administration, verify with the patient his/her name, record number, symptoms, chemotherapy agent, dose, route, volume and infusion time (must be conducted by 2 certified chemotherapy nurses)
Cancer Director	<ul style="list-style-type: none"> Appropriately responds to patient or staff complaints Initiates process improvement projects Establishes a quality assurance team to review errors and any near-misses

Source: Jacobson JD et al. *Oncol Nurs Forum* 2009;36(6):651-658.

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Appendix

Implementation of Acuity Rating System

Case Example: Cleveland (OH) Clinic at Hillcrest Cancer Center

Background (2008)

- 11,000 patient visits
- 8,800 chemotherapy/biotherapy and/or therapeutic administrations
- Dedicated chemotherapy pharmacy located within the infusion suite

Infusion Suite Staffing

- Physicians (2 FTE medical oncologists/hematologists)
- Oncology-certified nurses (11.3 FTEs)
- Supportive care/palliative medicine nurse practitioner (1 FTE)
- Secretaries and medical assistants (5.2 FTEs)
- Dedicated social worker, certified genetic counselor and research nurse (3 FTEs)
- Pharmacy staffed by pharmacist, pharmacy technician and PharmD (3 FTEs)

Situation

- A 2-week throughput study conducted in 2006 required staff to document all patient flow within the infusion suite. Each step of the care process was timed and results were logged into a database.
- An ad hoc committee comprised of nurses and other frontline staff reviewed data and identified various bottlenecks.

Solution

- Development of the Medical Oncology Acuity of Care Rating System, a 5-level rating based on time needed for "ideal" care delivery
- Creation of a treatment length scheduling template, which detailed daily clinic hours and guidelines on best times for scheduling various patient acuity levels
- Assignment of nurses to patients using the rating system to better balance nurse workloads

Results

- Enabled the cancer center to more effectively use its infusion nurses, eliminating the need to hire additional staff
- Achieved patient satisfaction scores of 98%
- Boosted employee engagement scores by 10%
- Enabled growth of chemotherapy volumes

FTE = full-time equivalent.

Source: Hawley E and Carter NG. *Oncology Issues* November/December 2009:34-37.

Appendix Plan to Maximize Chair Utilization

Case Example: Roswell Park Cancer Institute, Buffalo, NY

Background

- 38 chairs and beds included in the chemotherapy center; 92 average daily patients
- Hours: 13 hours daily, Monday through Friday; 7:30 am to 4:00 pm, weekends

Situation

- Rapidly increasing numbers of patients requiring chemotherapy, transfusion and/or infusion and those enrolled in phase 1 or phase 2 clinical trials
- Capacity analysis that uncovered inefficient chair utilization

Percentage of Chairs Occupied During Weekday Hours, February 2005

Time	Average Chair Utilization	Utilization Range
7:00 am-9:00 am	30%	7%-50%
9:01 am-3:00 pm	87%	74%-94%
3:01 pm-4:00 pm	62%	61%-65%
4:01 pm-8:00 pm	21%	1%-31%
Overall Utilization	59%	

Solution

- The chemotherapy team used patient focus groups to identify bottlenecks and process improvements.
- To improve patient throughput without compromising care quality/safety the team devised a plan that:
 - Refined staffing: Start times of several nurses were adjusted; part-time nurses were hired.
 - Initiated patient reminder calls: Staff placed reminder calls to every patient with an early morning appointment.
 - Targeted cancellations: Cancellation rates were shared with medical oncologists and they were encouraged to immediately notify the suite of any cancellation.
 - Improved long-term scheduling: Protocol patients were scheduled well in advance to enable better infusion suite volume planning.
 - Expedited lab draws: A phlebotomy station was created within the infusion suite.
 - Clarified chemotherapy orders: Physicians and ordering clinicians were required to list hydration requirements and premedications as part of their chemotherapy orders.
 - Incentivized off-peak scheduling: Patients were offered free parking during off-peak hours.

Results

- Increased overall chair utilization by 15% within a year

Percentage of Chairs Occupied During Weekday Hours, February 2006

Time	Average Chair Utilization	Utilization Increase From Previous Year
7:00 am-9:00 am	36%	6%
9:01 am-3:00 pm	92%	5%
3:01 pm-4:00 pm	86%	24%
4:01 pm-8:00 pm	30%	9%
Overall Utilization	65%	6%

Sources: Gruber M et al. *J Nurs Care Qual* 2008;23(1):76-83.

Journal of Oncology Practice

jop.ascopubs.org

doi: 10.1200/JOP.0712604

JOP January 2007 vol. 3 no. 1 9-12

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Benchmarking Practice Operations: Results From a Survey of Office-Based Oncology Practices

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The Medicare Modernization Act of 2003¹ brought with it sweeping changes to community-based oncology practices. As Medicare payment for both drugs and drug administration services have changed, oncology practices have become more aware of their business practices and have responded by closely evaluating and monitoring operations. In a January 2006 report to the Centers for Medicare & Medicaid Services and Congress, titled "The Effects of Medicare Payment Changes on Oncology Services,"² the Medicare Payment Advisory Commission stated that "oncologists responded by cutting costs and increasing efficiency." As oncology practices continue to strive to further improve practice efficiency, they will need to develop metrics to measure current performance and trend improvements. They also will need to benchmark key practice business indicators specific to oncology.

The Medical Group Management Association (MGMA), a professional association that includes medical practice managers and administrators throughout the United States, conducts a comprehensive annual cost survey that reports key practice business indicators and related benchmarks. However, the resulting benchmarks lack specificity for the oncology specialty. In the late 1990s, the Assembly of Oncology and Hematology Administrators, an MGMA specialty assembly, developed additional survey questions to report benchmarks specifically for oncology. MGMA published an oncology-hematology survey for several years. However, because of low participation and high administrative burden, the collection of oncology-specific data was discontinued. The last MGMA oncology-specific report was published in 2003 and was based on 2002 data. More recently, MGMA published its *Cost Survey for Single*

Specialty Practices 2006 Report, which was based on 2005 data. The survey contained 138 questions and had participation from only 12 oncology practices nationwide.³

To meet the growing demand for oncology-specific business benchmarks, Onmark created a user-friendly survey tool to collect data on business operations from its member practices. Onmark Inc, an OTN company in South San Francisco, California, is one of the largest group purchasing organizations in the community-based treatment setting, with more than 2,100 members representing more than 3,600 physicians and more than \$4 billion in annual drug purchases. To ensure confidentiality, Oncology Metrics LP, was commissioned to conduct the survey and report the results. The goal was to develop a number of key practice business indicators, or benchmarks, by which to measure and trend changes in oncology practice efficiency. To simplify the survey process, the 34-question survey was offered as a Web-based survey tool. A total of 178 oncology practices participated in this First Annual Onmark Office-Based Oncology Business Benchmarking Survey.

Methods

The survey was designed to be simple to complete, to ensure that a substantial portion of the target population would respond. First, a number of key benchmarks were identified, including total full-time equivalent (FTE) staff per FTE physician and new patients per FTE physician. Questions were then developed for these benchmarks and organized into four categories (ie, demographics, staffing, revenue and procedure volume, and expenses) so that the easiest questions could be answered first. Participants were not required to answer all questions.

The calculation formula for each of the benchmarks was written using data elements that are available to a typical practice administrator. These formulas were then analyzed to determine a minimum number of data elements sufficient to calculate the benchmarks. Wherever possible, any data element that could be calculated from other data elements was eliminated to reduce the total number of survey questions. For example, the survey asked respondents for the number of treatment chairs and the number of initial drug administration services. The number of patients per treatment chair per working day was then calculated from these data. Definitions were developed in conjunction with the construction of the formulas so they could be incorporated into the survey instrument.

After alpha testing by a small group of practice administrators, the final survey instrument was posted to the survey Web site. The entire target survey group was notified by email about two national audio conference presentations that were held to explain the survey instructions and definitions. After the first audio conference was completed, invitations to take the survey were emailed to the target audience, and the Web site was launched.

A total of 829 Onmark member practices, consisting of single-site and multisite community-based oncology practices throughout the United States, received the emailed invitation to take the survey. Responses were received from 178 practices

(21%). Of those, 171 practices identified their group type: 42 as multispecialty, 114 as hematology/oncology only, and 15 as gynecologic oncology only. Data were requested for calendar year 2005 or the practice's most recently completed fiscal year. Practices with multiple sites of service were instructed to report total data for all sites, with only one response accepted from each reporting practice.

After 1 week, the survey was closed. The data elements were formatted into an Excel (Microsoft Corp, Redmond, Washington) spreadsheet, and the appropriate formulas were run against the collected data elements. Some individual respondent surveys included questionable data elements, but no data were excluded from the analysis. The apparent outlier data are not thought to have materially affected the benchmark outcomes.

Survey results were categorized as financial and operational. Most benchmarks were reported at the mean and the 25th, 50th, and 75th percentiles. The complete survey report included 11 financial benchmarks and 10 operational benchmarks; this article will focus only on key operational benchmarks. These survey data are based on voluntary responses by Onmark member practices and may not be representative of all medical oncology practices in the United States.

Results

Physician Productivity

Physician productivity is generally measured by the number of patient encounters per FTE physician during a specified period. For this benchmarking survey, an FTE physician was defined as a physician who sees patients in the office or clinic a minimum of 4 days per week. (In this survey, we left the definition of FTE at "4 days per week" and did not stipulate how many hours per day the physician worked.) Each practice was asked to report the number of FTE physicians, as well as the number of FTE hematology/oncology physicians and the number of FTE gynecologic oncology physicians. (Practices were allowed to report fractional FTEs; ie, 4.5 or 3.8.)

New patient encounters are an important metric to determine physician productivity, as the volume of new patients drives virtually all practice activity—from staffing levels to the addition of new practice services. New patient encounters per FTE physician are also frequently used by medical oncology practices to determine when additional physicians should be added to the practice. The survey instrument identified new patients by CPT code⁴ and included new patients and consultations in the office setting as well as inpatient consultations using the codes noted in Table 1.

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Table 1.
Codes for New Patient and
Consultation Visits

The survey found that the mean number of new patients per FTE physician (including multispecialty, hematology/oncology, and gynecologic oncology physicians) was 265.

The mean number for physicians in hematology/oncology only practices was significantly higher, at 300 patients.

The number of established patient visits per FTE physician is another important physician productivity indicator. Survey participants reported the number of established patient visits at the practice level in both the office and hospital settings using the codes noted in Table 2. Results showed that established patient visits per FTE physician (including multispecialty practice physicians) were 2,800 visits at the mean, with 1,003 visits at the 25th percentile and 3,925 visits at the 75th percentile. Results for hematology/oncology-only practices were higher, with a mean of 3,481 visits, and 1,375 visits at the 25th percentile and 4,616 at the 75th percentile.

<p>View this table: In this window In a new window</p>	<p>Table 2. Codes for Established Patient Visits</p>
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Staffing

Survey respondents were asked to indicate the number of FTE staff in their practices, defined as individuals working for 1 year at 40 hours per week, or 2,080 hours per year. Practices were instructed to calculate the number of FTE staff by dividing the number of hours worked per week by 40 for each staff member, then calculating the total number of FTEs in their practice.

Hematology/oncology only practices reported five FTE staff per FTE physician at the 25th percentile, six FTE staff at the 50th percentile, and nine FTE staff at the 75th percentile (Fig 1). The average reported FTE staff per FTE hematology/oncology physician was 7.3. When the data were reported per FTE physician (including multispecialty practices), results showed a lower average, with 6.6 FTE staff per FTE physician.

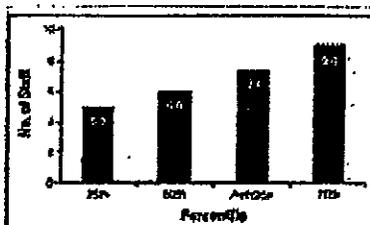


Figure 1.

Total full-time equivalent (FTE) staff per FTE hematology/oncology physician.

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In addition to total FTE staff, respondents were asked to report the number of FTE registered nurses involved in chemotherapy administration. Practices in which nurses split their duties between chemotherapy administration and other tasks were asked to estimate the time spent by each nurse on chemotherapy administration and to

calculate that as an FTE. They were then asked to add and report the total number of FTE nurses involved in chemotherapy administration. The survey found that the average number of FTE nurses administering chemotherapy per FTE hematology/oncology physician was 1.7, with a range of one FTE nurse at the 25th percentile to two FTE nurses at the 75th percentile (Fig 2).

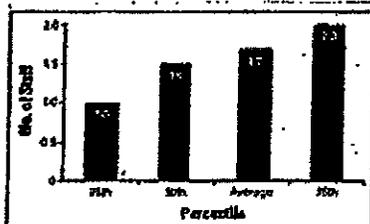


Figure 2.

Full-time equivalent (FTE) chemotherapy nurses per FTE hematologist/oncologist physician.

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Survey respondents also were asked to identify the number of FTE midlevel providers in their practice. Midlevel providers were defined as health care professionals licensed by the state to provide certain services traditionally provided by physicians, including physician assistants and nurse practitioners. Results showed an average of 0.7 FTE midlevel providers per FTE physician (Fig 3). When the impact of midlevel providers on physician productivity was evaluated, the survey results indicated that physicians in hematology/oncology practices with midlevel providers see significantly more new patients per FTE physician than practices that do not utilize midlevel providers (Fig 4).

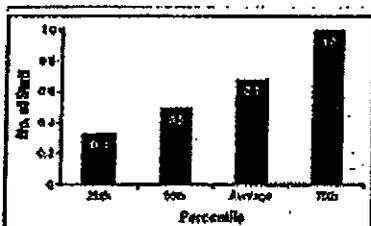


Figure 3.

Midlevel providers per full-time equivalent physician in 2005.

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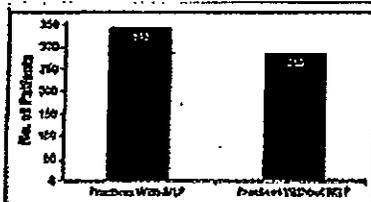


Figure 4.

New patients per full-time equivalent hematologist/oncologist physician in practices with and without midlevel providers (MLP).

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Resource Utilization

Respondents were asked to indicate the total number of chemotherapy treatment chairs in their practice. These data were then used to calculate several benchmarks to measure resource utilization.

According to the survey results, the number of treatment chairs per FTE chemotherapy nurse ranged from 2.7 at the 25th percentile to 4.0 at the 75th percentile, with an average of 3.8 treatment chairs per FTE nurse (Fig 5). The number of treatment chairs per FTE medical oncologist ranged from 3.5 at the 25th percentile to 7.4 at the 75th percentile, with a mean of 5.7 (Fig 6).

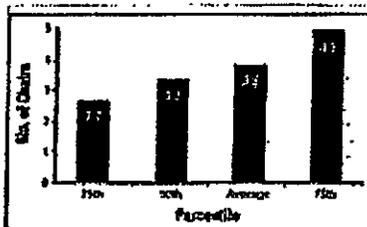


Figure 5.

Treatment chairs per full-time equivalent chemotherapy nurse.

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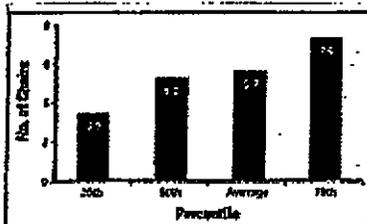


Figure 6.

Treatment chairs per full-time equivalent hematology/oncology physician.

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Infusion patients per treatment chair per working day, and infusion patients per FTE nurse per working day also were calculated from survey data. The numerator for each of these metrics was determined by adding the number of initial drug administration codes (hydration, therapeutic, and chemotherapy) reported by the practice, using the 2005 code set: G0345, G0347, 90780, G0353, 90784, G0357, 96408, G0359, and 96410. Although this calculation does not capture total hours of treatment chair time, it is considered to be a surrogate for the number of patients in treatment chairs per day.

The number of patients per treatment chair per working day was calculated by dividing the total number of initial drug administration codes by the number of treatment chairs. This total, the number of initial drug administrations per treatment chair in 2005, was then divided by the number of working days in 2005 (250 days) to

establish the number of initial drug administrations per treatment chair per working day. As a patient receives only one initial drug administration per chemotherapy encounter, the count of initial drug administrations is a reasonable surrogate for the count of individual patients. Results showed that patients per treatment chair per working day ranged from 0.6 at the 25th percentile to 1.6 at the 75th percentile, with a mean of 1.3 patients.

The number of infusion patients per FTE nurse per working day was calculated in a similar manner. The number of initial drug administration codes (not including injections or other services) was divided by the number of FTE nurses and then divided by the number of working days in 2005. Patients per FTE nurse per working day ranged from 2.1 at the 25th percentile to 5.8 at the 75th percentile, with a mean of 4.1.

Conclusion

Improving practice efficiency has become an essential component of managing today's medical oncology practice, as practices continue to experience the effects of the Medicare Modernization Act of 2003. Physician owners and practice administrators must continually evaluate and measure every aspect of practice operations. Benchmarking is a valuable tool to compare one's practice to regional or national standards and to evaluate practice performance over time.

It can be difficult for practices to find meaningful specialty-specific data to use in the benchmarking process. The metrics provided in this article include benchmarks that are frequently requested by practice administrators at meetings and on listservs, such as the number of staff per medical oncologist. Practices should use these easily measured benchmarks as a tool to assess themselves. After conducting their own measurements, practices should then identify and explore significant variances between their data and these national benchmarks. While variances do not necessarily indicate a problem, they do represent areas for further assessment and evaluation. This survey provides meaningful operational metrics by which practices can benchmark current performance and perhaps more importantly, trend practice improvements over time. Practices that use this tool, and others as they are available, will be the successful practices of the future.

Footnotes

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[Full Text] [PDF]

PROJECT SERVICES UTILIZATION

The State Board has utilization standards for the Linear Accelerators. The historical utilization of the linear accelerators for the last 12 months totaled 8,464 Procedures. The State standard for linear accelerators is 7,000 visits per year. Based upon this standard the applicant's historical volume supports the need for 1.21 or 2 Linear Accelerators, which is the number proposed by the applicant.

The proposed project also includes a PET/CT scanner, which will so be used as a simulator for treatment planning for Radiation Therapy patients. The State Board has utilization standards for CT scanners and for PET scanners. There are no standards for simulators. This unit will not be utilized for either a CT scanner or a PET scanner on a full time basis. The simulator capability of the unit will be the major use of the equipment. The projected use of the PET scanner is shown below, while the project use of the simulator and the CT scanner is based upon the number of new cancer patients treated at the center.

PET Volume

Year	CY 2010	CY 2012	CY 2013	CY 2014	CY 2015
Volume	380*	316	332	348	366

*procedures on Mobile PET unit both inpatient and outpatient volume.

Unique Cancer Patient Encounters

Year	2010	2011	2012	2013	2014	2015
Volume	1,865	3,032	3,194	3,270	3,813	4,145

The volumes for Medical Oncology are shown below as professional service days. The State Board does not have any published standards for this department. In addition to this volume the applicant is also proposing to serve non-cancer infusion patients in this department.

Year	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013	FY 2014	FY 2015
Volume	13,206	14,376	26,785	29,174	29,866	33,100	35,322

Service	# Existing Key Rooms	# Proposed Key Rooms
<input type="checkbox"/> Medical Imaging	N/A	2
<input type="checkbox"/> Radiation Oncology	3	3
<input type="checkbox"/> Medical Oncology	39 Treatment rooms 18 Exam rooms	50 Treatment rooms 24 Exam rooms
<input type="checkbox"/> Laboratory	N/A	N/A
<input type="checkbox"/> Pharmacy	N/A	N/A

Medical and Radiation Oncology

Since the proposed project calls for the construction of a new building to house the above departments and this new building is not on the site of the existing hospital we will address the criterion 1110.3030 (b) -Need Determination.

According to the Centers for Disease Control and Prevention, Cancer ranked second to heart disease for the leading cause of death in the region, while patients are living longer and increased utilization on an outpatient basis categorized Cancer as a “chronic disease”. According to the 2010 American Cancer Society, Surveillance and Health Policy Research there is an estimated 63,890 new Cancer cases projected in Illinois. The top tumor sites identified include Lung; Breast; Prostate; Colon; Bladder; and Skin. According to the US Cancer Statistics the Age adjusted Cancer incidence rates per 100K population in Illinois is 483.9, higher than the National average of 461.8.

SwedishAmerican Hospital has defined its service area for Oncology as 16 Counties with a combined total population of approximately 800,000. Within the 16-county market is SAHS’s traditional primary service area (PSA). In the PSA, SAH is the market leader for encounters. SAHS also is the preference leader, according to a 2011 survey done by Professional Research Corporation, with 33%. However, 32% of the PSA has no opinion on preference or chooses some entity other than the Rockford-based providers, making this service line the most undifferentiated program among 18 categories. (See attached map), The map shows that the boundaries of the service area exceed the State Agency description of HSA I, however, the area within the HSA and its resulting patient population shows that well over 70% of the patients receiving care in the hospital are from within the planning area.

Market indicators show a shift in demand from inpatient to outpatient Oncology procedures particularly in radiation and chemotherapy services. SAH recognized the need to be proactive in addressing centralized Cancer services throughout the service area, and the need to improve access and integration of cancer services to accommodate the growing demand. SAH acquired ACT- a Medical Oncology practice in 2010 and recruited an additional Radiation Oncologist totaling 7 General Oncologists and 2 Radiation Oncologists.

SAHS engaged SG2, a consultant company that provides advanced analytics, business intelligence, education and publications that help Hospitals deliver measurable value across the full continuum of its health care services.

The projected utilization for the oncology portion of this project is shown on the charts below.

Unique Cancer Patient Encounters

Year	2010	2011	2012	2013	2014	2015
Volume	1,865	3,032	3,194	3,270	3,813	4,145

Medical Oncology Visits

Year	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013	FY 2014	FY 2015
Volume	13,206	14,376	26,785	29,174	29,866	33,100	35,322

The analysis of these projections show that the hospital would run out of space in the next 2-3 years. Therefore, it was determined that additional space was needed and that the best alternative to meet this growing utilization was to construct a single facility where all of the outpatient cancer services could be provided in a consolidated. While that is not the primary reason the new facility is to be constructed it was a factor, the primary reasons for development of the new facility are the ability to create a consolidated service in one location to serve all of the cancer patients' needs and to more fully develop the affiliation with The University of Wisconsin and its specialists and academic medical center capabilities.

The above projections are based upon three indicators: the historical utilization of the facility, the projected growth in the incidence of cancer as the population in the area ages, and the increase in referrals expected from the affiliation with the University of Wisconsin.

Outpatient/Other Demand Forecast

The Outpatient/Other Demand Forecast applied to the model patient dataset is based on SG2's 2010 SAHS specific, localized outpatient disease-based forecast. The application of the forecast to the model follows the same secondary grouping system of the principal ICD-9 codes for Oncology services as was used for Inpatient mapping. The secondary grouping allows for cross-walking the patient record to both a custom DX Group, in addition to the unique grouping system (CARE Family) used by SG2 for the Cancer Service Line. The demand forecast aggregates data into a Care Family, and reflects the demand growth or decline across a 10 year forecast timeline by family. The linear percentage change rates were applied to the historical model patient records based on the associated CARE Family assigned to the record for each individual forecast year, and then output from the model in a variety of reports.

Market Capture Rates

SAHS has identified the following disease sites for incremental market capture over 5 years within the service area as:

DX Group (over 5 Years)	Assigned Market Capture	DX Group (over 5 Years)	Assigned Market Capture
Benign Neoplasm	0%	Liver Cancer	2%
Bladder Cancer	2%	Lung Cancer	4%
Bone Cancer/Other	6%	Multiple Myelomas	4%
Bone Metastases	6%	Non-Hodgkin's Lymphoma	4%
Brain/CNS	2%	Ovarian Cancer	6%
Breast Cancer	4%	Pancreas Cancer	6%
Cervical/Genital Cancer	4%	Prostate Cancer	1%
Colorectal Cancer	4%	Renal Cancer	2%
GI/Stomach/Esophageal	4%	Skin Cancer	0.6%
Head/Neck Cancer	4%	Testicular/Genitourinary	3%
Hodgkin's Lymphoma	4%	Thyroid Cancer	6%
Leukemia	4%	Uterine Cancer	4%

Partnership with an Academic Medical Center (AMC)

A strong regional-academic partnership can defend SAHS current position, as well as result in market share gains in the SA. Patients are migrating from the Greater Rockford region in search for Oncology services to the North into Wisconsin and East to Chicago. Although data shows that patients prefer to stay geographically local for outpatient care, a growing number of patients travel to the Academic Medical Centers for inpatient and outpatient treatments. Most of the patients migrate to UW Health (UW), which is a nationally recognized Academic Medical Center in Madison, Wisconsin. UW remains the market leader among the Academic Medical Centers who capture patients that migrate out of the region. UW includes the University of Wisconsin Hospital and Clinics in Madison, the American Family Children's Hospital, the University of Wisconsin School of Medicine and Public Health, the University of Wisconsin Paul P. Carbone Comprehensive Cancer Center, and the University of Wisconsin Medical Foundation.

SAH service area is considered by UW as the Northern Illinois region and is viewed as volatile. Beginning with the failed Advocate-RMH merger attempt of 2009, relationships in the service area have shifted significantly. UW Health perceived that neutrality on its part was unlikely to be a maintainable strategy, and selected SAHS as the preferred partner. RMH and OSF are currently pursuing a merger which could ultimately polarize the market.

In 2010, SAH entered into an affiliation with UW to significantly impact SAH strategy to differentiate itself in providing Oncology services in this region. University of Wisconsin is one of forty Comprehensive Cancer Centers in the Nation designated by the National Cancer Institute. This affiliation will provide access to highly sophisticated surgical sub-specialists and the opportunity to offer more specialized services in Rockford and the surrounding region. SAH and UW partnership in the development of a RCC will enhance the delivery of cancer care, advance medical research, grow regional telemedicine infrastructures, and achieve seamless patient transfers and referrals between the two health systems.

The branded SAH/UW Regional Cancer Center project will protect SAH Oncology business, build market capture in the region, maximizing referral of tertiary business to UW Health and reduce the out migration of cases going to AMC's in Chicago.

Portraying an integrated system to patients and the market, UW Health and SAHS will provide the most clinically advanced cancer care in a more convenient and supportive setting for patients and family.

When a patient requires technology or skills only available in a world class academic medical setting, the transition will be seamless. If after consultation, treatment can be administered at the SAH/UW Regional Cancer Center in Rockford those cases will be referred back to Rockford. Care will transition smoothly between inpatient and outpatient settings between the RCC and UW facilities.

The planned SAH/UW RCC details the patient-centered, holistic services designed for the new, consolidated building. These will be enhanced by the UW brand, supported by a cohesive working relationship among UW, SAHS and Rockford physicians.

In addition to the RCC consolidated Oncology services, the RCC partnership adds an on site presence of UW tumor site experts for Breast and GYN patients. For GI and Lung, patients will have expedited referral processes to UW tumor site experts. Where indicated for best outcomes, patients will receive surgical care from highly specialized teams at UWHC. RCC patients will also access research trial protocols at UWHC. On-site services will be enhanced through application of telemedicine technology, shared quality benchmarking, physician conferencing, and shared electronic health record. Clinical services meet or surpass those available from Rockford competitors, with exception of robotic prostate surgery offered at RMH.

The applicant does not project a decrease in the utilization of other area facilities. The projected increase in utilization is projected based upon increased incidence of cancer in an aging population, the return to the service area of patients now being treated at the University of Wisconsin, and the return to the service area of patients now being referred to academic medical centers in Chicago and the surrounding area in HSAs VI and VII.

Medical Imaging

This department will serve only the patients of the Cancer Center and will not be impacted by the inpatient services provided by the hospital or any of the other outpatient services of the hospital.

This department will house a general X-ray unit and a PET/CT/Simulator. The Board's Appendix B allows 1,800 GSF for a CT Scanner, and 1,300 GSF for a general X-ray unit. In addition to these two pieces of equipment the department will also house a hot lab, and its support space for the preparation of the isotopes used in the PET Scanning process. The hot lab utilizes approximately 600 square feet when its support areas are included. When this space is included the Medical Imaging Department is consistent with State norms.

The rooms proposed are needed in order to meet the needs of the cancer center. The one general X-ray unit will be utilized for basic X-rays used for diagnosis and treatment of the cancer center patients by the oncologists located at the cancer center.

The combination CT/PET scanner will be used as a PET scanner and a CT scanner for diagnosis and treatment and as a simulator for treatment planning services. The PET volume projections are shown below.

PET Volume					
Year	CY 2010	CY 2012	CY 2013	CY 2014	CY 2015
Volume	380*	316	332	348	366

*procedures on Mobile PET unit both inpatient and outpatient volume.

Pharmacy

This space is to be used to prepare the infusion materials and other meds to be used by the patients in the departments of both Radiation Therapy and Medical Oncology as well as the patients receiving non-cancer related infusion therapy at the center. The State Board does not have standard for this service.

The applicant developed the space plan for this department by consulting with the staff working in the department and by reviewing other similar facilities in centers across the State and Country, The proposed space is consistent with those other facilities based upon the number of FTE's and the volume of services proposed. This pharmacy area will also contain a retail pharmacy which will provide services only to the patients of the cancer treatment center

Normally a department of this type is sized based upon the number of beds located in the hospital; however, in this application the cancer treatment center does not have any beds, which make this type of comparison impossible. The department will have 5.7 FTE's upon completion of this project. Given the space needs to mix and prepare infusion materials for many different types of patients both cancer and non-cancer related patients the space proposed, 1,575 GSF is needed.

Laboratory

This department will serve only the patients of the cancer center and will not be impacted by the inpatient services provided by the hospital or any of the other outpatient services of the hospital.

This department has a total of 1,866 GSF and will be used to provide laboratory testing and blood drawing exclusively for the patients of the cancer treatment center. The department will have a total of 5.5 FTE's upon opening the new center. The department consists of both the blood drawing area, the testing area, a waiting area and the support space for a laboratory.

The proposed 1,866 GSF amounts to 327.4 GSF per FTE which when the blood drawing area and the waiting area are removed compares favorably to previously approved laboratories in both hospital and freestanding facilities. No standards have been set for laboratories primarily because of the diverse nature of the laboratories themselves, where the degree of automation and the type of testing make significant differences in the space required. This laboratory will perform testing primarily as it relates to the cancer patients being treated at the facility which rely less on highly automated testing modalities and more on manual testing.

Criterion 1120.130 - Financial Viability

This criterion is not applicable because the applicant has provided documentation of an A bond rating by Fitch.

FitchRatings

FITCH AFFIRMS SWEDISHAMERICAN HEALTH SYSTEM'S (IL) REVS AT 'A'; OUTLOOK STABLE

Fitch Ratings-Chicago-22 March 2011: As part of its ongoing surveillance review process, Fitch Ratings has affirmed the following rating:

--\$90,550,000 Illinois Finance Authority's (SwedishAmerican Health System), revenue bonds, series 2004 at 'A'.

The Rating Outlook is Stable.

RATING RATIONALE:

--Although operating performance was down in the fiscal year ended May 31, 2010, mostly due to an increase in the provision for bad debts, SwedishAmerican Health System (SAHS) is controlling expenses and expects improved operations in fiscal 2011.

--Liquidity, which was somewhat light in fiscal 2008 and 2009 compared to the rating category, has shown improvement in fiscal 2010 and through the six-month interim.

--SAHS debt burden is light with strong coverage of maximum annual debt service (MADS) by EBITDA.

--Leading market position despite the competitive service area.

KEY RATING DRIVERS:

--Return to historical profitability.

--Maintain liquidity at the current level.

SECURITY:

Debt payments are secured by a pledge of the gross revenues of the obligated group.

CREDIT SUMMARY:

The 'A' rating reflects SAHS' historically good operating performance, improving liquidity and strong debt service coverage. SAHS also benefits from its leading market position in a competitive service area.

Weaker than historical operating levels were reported in fiscal 2010, which were principally driven by an increase in bad debt. However, SAHS is working to better classify charity care versus bad debt and is also better controlling expenses and expects improved operations in fiscal 2011. Fiscal 2010 produced an adequate operating margin of 1.9% and operating EBITDA margin of 7.4%, compared to the category medians of 3% and 10%, respectively. Through the six-month interim (Nov. 30, 2010), operating margin is an improved 3.1% and operating EBITDA margin is 8.6%.

SAHS' historically light liquidity position has improved incrementally over the last few years and is now close to the 'A' category medians. As of Nov. 30, 2010 (six-month interim), SAHS had \$171.4 million of unrestricted cash and investments, equating to 167.9 days cash on hand (DCOH), 18.8 times (x) cushion ratio and 154% cash to debt, comparing favorably to the 'A' category median of 183.8 DCOH, 14.4x and 105.5%, respectively.

SAHS' debt burden is low and conservative with all fixed rate debt and compares favorably to Fitch's 'A' category medians. Relative to the 2010 'A' category median of 3%, SAHS' MADS of \$9.1 million is modest at 2.2% of revenues. MADS coverage by operating EBITDA in fiscal 2010 was a solid 4.5%.

Fitch's primary credit concern is the competitive market place and the unfavorable payor mix. Although SAHS has a leading market share that has incrementally grown over the last few years, the market is divided among three competitors (SAHS, Rockford Memorial Hospital and Saint

Anthony's Medical Center; part of the OSF Healthcare System, rated 'A'; Stable Outlook by Fitch). SAHS has controlled its position as the market leader over the past few years by pursuing its physician alignment strategy. Currently, SAHS controls about 40.5% of the primary service area, compared to Rockford Memorial Hospital, its nearest competitor that controls 29.1%. SAHS' payor mix has historically been unfavorable, but because of the effects of the recession in the primary service area (PSA), Medicaid accounted for 20% of SAHS' gross revenues in 2010 up from 19% the prior year, which exposes the system to cost containment at the state level.

The Stable Outlook reflects Fitch's expectation that SAHS will maintain its market share position and profitability will be at a minimum maintained at the current level.

Located in Rockford, IL, about 70 miles west of Chicago, SAHS is a full-service acute care provider with 386 licensed beds. SAHS had total operating revenues of \$416 million in fiscal 2010. SAHS covenants to provide quarterly disclosure within 60 days of the quarter end and annual audited financials to bondholders and voluntarily distributes to EMMA. Disclosure to date has included a balance sheet, income statement, and operating statistics for the obligated group only but excludes a cash flow statement and management discussion and analysis.

Contact:

Primary Analyst
Dana N. Sodikoff
Associate Director
+1-312-368-3215
Fitch, Inc.
70 West Madison Street
Chicago, IL 60602

Secondary Analyst
Michael Borgani
Director
+1-415-732-5620

Committee Chairperson
Eva Thein
Senior Director
+1-212-908-0674

Media Relations: Cindy Stoller, New York, Tel: +1 212 908 0526, Email: cindy.stoller@fitchratings.com.

Additional information is available at 'www.fitchratings.com'

Applicable Criteria and Related Research:

--'Revenue-Supported Rating Criteria', dated Oct. 8, 2010;
--'Nonprofit Hospitals and Health Systems Rating Criteria' dated Dec. 29, 2009.

For information on Build America Bonds, visit www.fitchratings.com/BABs.

Applicable Criteria and Related Research:

Revenue-Supported Rating Criteria
http://www.fitchratings.com/creditdesk/reports/report_frame.cfm?rpt_id=564565
Nonprofit Hospitals and Health Systems Rating Criteria
http://www.fitchratings.com/creditdesk/reports/report_frame.cfm?rpt_id=493186

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AND PROCEDURES ARE ALSO AVAILABLE FROM THE 'CODE OF CONDUCT' SECTION
OF THIS SITE.

Merrill Lynch Weekly Healthcare Update
Week of November 28, 2011

Merrill Lynch Weekly Healthcare Update Market Update

Commentary⁽¹⁾

- Through 11/24/11 municipal issuance for the month was \$33.4 billion and municipal issuance for the year was \$257.2 billion. 49.4% of the total issuance for the year was related to refundings, compared to 37.2% in the same period last year.
- The Lipper fund flow report showed that \$137.5 million flowed into municipal mutual funds in the week ending 11/25/11. It was the 7th consecutive week of inflows.
- Q3 real GDP was revised down to 2.0% from 2.5%. The bulk of the revision came from inventory reduction as businesses reduced stockpiles by \$8.5b billion.
- The Super-Committee failed to come up with a \$1.2 trillion long-term debt reduction plan. The failure to execute a deal triggers automatic discretionary and defense cuts of \$1.2 trillion over nine years, beginning in 2013.
- Durable goods orders dropped 0.7% month-over-month in October after a 1.5% decline in September. The decline was driven by a 16.4% decrease in nondefense aircraft orders.
- New October single-family home sales increased by a higher-than-expected 1.3% month-over-month to a seasonally adjusted annual rate of 307,000.
- Real consumer spending rose 0.1% in October with the savings rate rising for the first time in four months.

(1) Source: BAC/Merrill Lynch Research as of November 25, 2011.
(2) Source: Bloomberg.

"Street" Interest Rate Forecast

Metric	Current	2012Q1	2012Q2	2012Q3	2012Q4	2013Q1
STREET MEDIANS						
Fed Fund Rate	0.25%	0.25%	0.25%	0.25%	0.25%	0.25%
3-Month LIBOR	0.52%	0.45%	0.43%	0.43%	0.45%	0.52%
2YR T-Note	0.28%	0.31%	0.40%	0.71%	0.61%	0.74%
10YR T-Note	2.06%	2.29%	2.45%	2.62%	2.77%	2.93%
30YR T-Note	3.01%	3.42%	3.52%	3.67%	3.80%	3.92%
BoFA Merrill Lynch						
Fed Fund Rate	0.25%	0-0.25%	0-0.25%	0-0.25%	0-0.25%	0-0.25%
3-Month LIBOR	0.52%	0.45%	0.45%	0.60%	0.50%	0.50%
2YR T-Note	0.28%	0.25%	0.40%	0.80%	0.80%	0.80%
10YR T-Note	2.06%	2.50%	2.75%	3.00%	3.25%	3.25%
30YR T-Note	3.01%	3.90%	4.20%	4.50%	4.80%	4.80%

Economic Calendar for Week of 11/28/2011⁽²⁾

Date	Statistic	Period	Market Expects	Prior
28-Nov	Case-Shiller 20-city Index	Sep	-3.00%	-3.80%
28-Nov	Consumer Confidence	Nov	42.5	39.8
28-Nov	FHFA Housing Price Index	Sep	N/A	-0.1%
30-Nov	MBA Mortgage Index	28-Nov	N/A	-1.2%
30-Nov	ADP Employment Change	Nov	125K	110K
30-Nov	Unit Labor Costs	Q3	-2.1%	-2.4%
30-Nov	Chicago PMI	Nov	57.5	58.4
30-Nov	Pending Home Sales	Sep	0.10%	-4.80%
30-Nov	Fed's Balge Book	Nov	-	-
1-Dec	Initial Claims	28-Nov	380K	393K
1-Dec	Continuing Claims	18-Nov	3,650K	3,691K
1-Dec	ISM Index	Nov	51.0	50.8
2-Dec	Nonfarm Payrolls	Nov	123K	80K
2-Dec	Unemployment Rate	Nov	9.0%	9.0%
2-Dec	Average Workweek	Nov	34.3	34.3

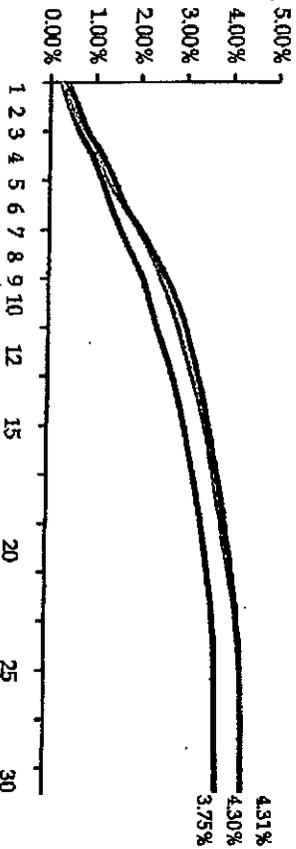
Merrill Lynch Weekly Healthcare Update

Healthcare Market Update

Healthcare Yields⁽¹⁾

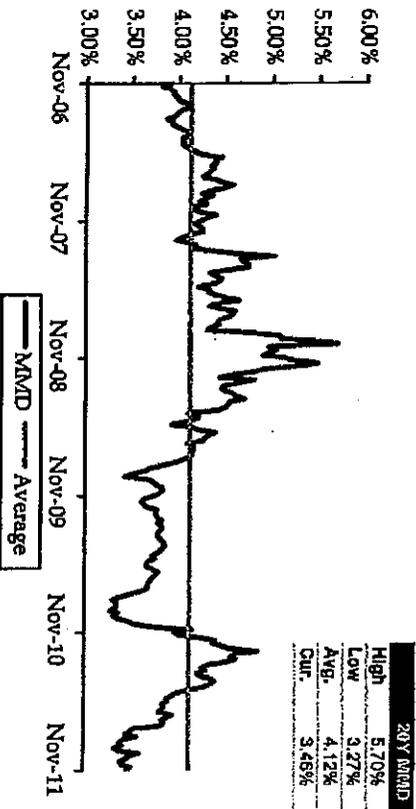
YRS	Healthcare		US		MMD
	As/AA	A/A	Baa/BBB	Treasuries	
1	0.57%	1.23%	1.78%	—	0.25%
2	0.92%	1.51%	2.40%	0.28%	0.42%
3	1.17%	1.87%	2.77%	0.42%	0.63%
4	1.57%	2.27%	2.23%	0.71%	0.91%
5	1.85%	2.64%	2.60%	0.99%	1.13%
6	2.08%	2.91%	3.84%	1.27%	1.32%
7	2.38%	3.19%	4.09%	1.54%	1.54%
8	2.67%	3.78%	4.40%	1.71%	1.80%
9	2.97%	3.78%	4.65%	1.89%	2.05%
10	3.12%	3.93%	4.74%	2.06%	2.21%
20	4.70%	5.21%	5.92%	2.54%	3.46%
30	5.05%	6.53%	6.11%	3.01%	3.75%

MMD Curve⁽²⁾



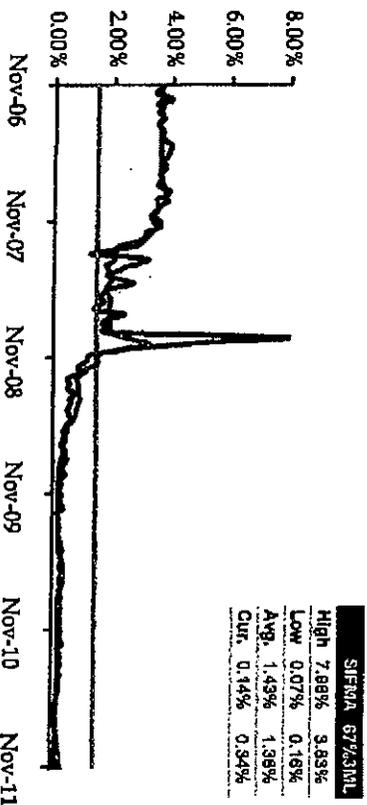
(1) Source: Thompson Financial as of November 25, 2011.
 (2) Source: BAs/Merrill Lynch Research as of November 25, 2011

MMD Fixed Rates⁽²⁾



20Y MMD	
High	5.70%
Low	3.27%
AVG	4.12%
Cur	3.45%

Short Term Interest Rates⁽²⁾



SIEMVA 67%/3M	
High	7.98%
Low	0.07%
AVG	1.43%
Cur	0.14%

SIEMVA Average 67% 3M LIBOR

Merrill Lynch Weekly Healthcare Update

Recent Healthcare Deals

Healthcare Deals Priced Week of 11/21/2011⁽¹⁾

Issuer	Origin	State	Maturity	Rating	SSRP	FFR	Maturity	Coupon	Yield	Amount (\$ million)	Manager
University of Pittsburgh Med Center ⁽²⁾	Pittsburgh	PA	(A2)	(A+)	(AA-)	2021	3.85%	3.85%	100.0	BBC Capital	
Westchester County Health Care Corp	Westchester County	NY	(A2)	(BBB)	NR	2041	5.13%	5.32%	64.3	Wells Fargo	

Healthcare Deals Expected to Price Week of 11/28/2011⁽¹⁾

Issuer	Origin	State	Maturity	Rating	SSRP	FFR	Maturity	Coupon	Yield	Amount (\$ million)	Manager
CA Health Facilities Financing Auth	Orange-Sinal	CA	(A2)	NR	(A+)	2021	TBD	TBD	TBD	197.9	BAML
Jefferson County, Arkansas	Jefferson Regional Medical Center ⁽³⁾	AR	NR	(A)	NR	2026	TBD	TBD	TBD	24.9	Stephens
Kentucky Economic Dev Fin Auth	Baptist Healthcare System Oblig Group	KY	(A1)	NR	(AA-)	TBD	TBD	TBD	TBD	140.0	Goldman Sachs
Valdosta & Lowndes Co Hosp Dist	South Georgia Medical Center	GA	(A2)	(AA-)	NR	TBD	TBD	TBD	TBD	148.5	Morgan Keegan

(1) Source: Bloomberg
 (2) Tumble
 (3) Insured by Assured Guaranty; AIG is rated "Aa3" by Moody's and "AA+" by S&P; Jefferson Regional Medical Center has an underlying rating of "A" from S&P

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Merrill Lynch Weekly Healthcare Update Strategic Advisory

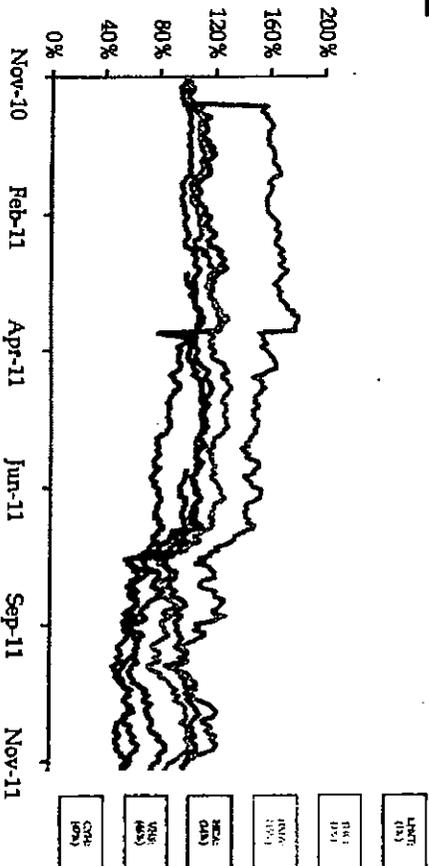
Recent M&A Transactions⁽¹⁾

- Indiana-based Elkhart General Hospital and Memorial Hospital are merging and will create a new parent company with equal representation from both hospitals at the board level
- Baptist Healthcare System in Louisville, KY is acquiring a surgery center from Jewish Hospital & St. Mary's HealthCare, which are in the process of forming a statewide system with University of Louisville Hospital and CHI's Saint Joseph Health System. Baptist Healthcare also recently agreed to provide a site for University of Louisville physicians to perform tubal ligations post merger

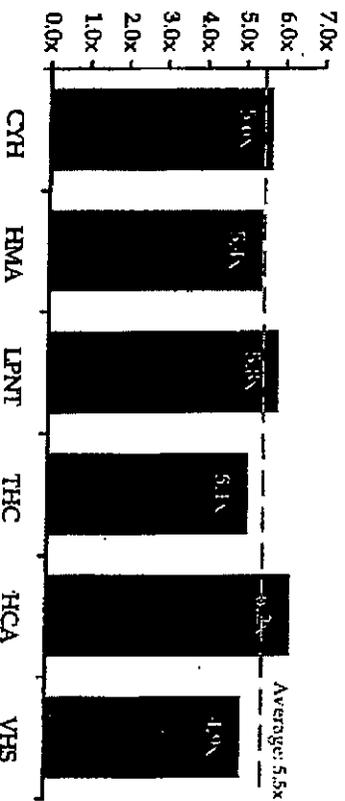
Recent M&A News⁽¹⁾

- For-profit provider Steward Health Care plans to pursue sale lease-back strategies for up to 11 medical office buildings in order to raise capital that can be redeployed to other areas of its operations
- Community Health Systems ended its pursuit of Memorial Health System in Colorado Springs, CO. Remaining bidders include HCA, Centura Health, Sisters of Charity of Leavenworth Health System, University of Colorado Hospital, and Memorial Health's current management team

LTM Indexed Stock Performance⁽²⁾



2012 EV/EBITDA⁽²⁾



(1) Source: Beder's Hospital Review.
(2) Source: Wall Street Research.

C. Reasonableness of Project and Related Costs

Read the criterion and provide the following:

1. Identify each department or area impacted by the proposed project and provide a cost and square footage allocation for new construction and/or modernization using the following format (insert after this page).

COST AND GROSS SQUARE FEET BY DEPARTMENT OR SERVICE									
Department (list below)	A	B	C	D	E	F	G	H	Total Cost (G + H)
	Cost/Square Foot New	Mod.	Gross Sq. Ft. New	Circ.*	Gross Sq. Ft. Mod.	Circ.*	Const. \$ (A x C)	Mod. \$ (B x E)	
Medical Imaging	\$348.78	0	3,465	22%	0		\$1,208,508		\$1,208,508
Radiation Oncology	\$348.78	0	12,432	22%	0		\$4,335,981		\$4,335,981
Medical Oncology	\$348.78	0	26,931	22%	0		\$9,392,882		\$9,392,882
Laboratory	\$348.78	0	1,866	22%	0		\$650,816		\$650,816
Pharmacy	\$348.78	0	1,575	22%	0		\$549,322		\$549,322
Contingency	\$34.86	0	46,269		0		\$1,612,950		\$1,612,950
TOTALS	\$383.64	0	46,269	22%	0		\$17,750,459		\$17,750,459

* Include the percentage (%) of space for circulation

Projected Operating Costs

The applicant shall provide the projected direct annual operating costs (in current dollars per equivalent patient day or unit of service) for the first full fiscal year at target utilization but no more than two years following project completion. Direct cost means the fully allocated costs of salaries, benefits and supplies for the service. **FY 2015 = \$1,587.96**

Total Effect of the Project on Capital Costs

The applicant shall provide the total projected annual capital costs (in current dollars per equivalent patient day) for the first full fiscal year at target utilization but no more than two years following project completion. **FY 2015 = \$192.99**

SWEDISHAMERICAN HOSPITAL

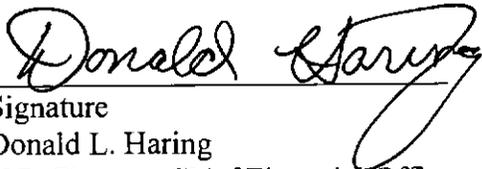
Winner Of The Lincoln Award For Excellence

Illinois Health Facilities and Services Review Board
2nd Floor
525 West Jefferson Street
Springfield, IL 62761

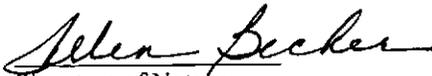
SwedishAmerican Hospital
1401 East State Street
Rockford, IL 61104

Illinois Health Facilities and Services Review Board:

I, hereby attest, that borrowing is less costly than the liquidation of existing investments, and the existing investments being retained may be converted to cash or used to retire debt within a 60-day period for the SwedishAmerican Hospital Regional Cancer Center project.


Signature
Donald L. Haring
V.P. Finance, Chief Financial Officer

Notarization:
Subscribed and sworn to before me
this 13th day of January, 2012


Signature of Notary

Seal



ATTACHMENT 42A

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1401 East State Street, Rockford, Illinois 61104-2315 Phone (815) 968-4400 www.swedishamerican.org
A Teaching Hospital Affiliated With The University Of Illinois College Of Medicine At Rockford

"Through excellence in healthcare and compassionate service, we care for our community."

SWEDISH AMERICAN 
HOSPITAL

Winner Of The Lincoln Award For Excellence

Illinois Health Facilities and Services Review Board
2nd Floor
525 West Jefferson Street
Springfield, Illinois 62761

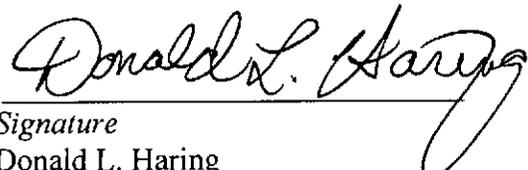
Swedish American Hospital
1401 East State Street
Rockford, IL 61104

Illinois Health Facilities and Services Review Board:

I, hereby submit that the selected form of debt financing for the Swedish American Hospital Regional Cancer Center project will be at the lowest net cost available.



Signature
William R. Gorski, MD
Chief Executive Officer



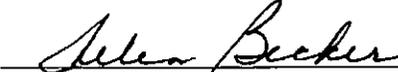
Signature
Donald L. Haring
VP Finance, Chief Financial Officer

Notarization:
Subscribed and sworn to before me
This 9th day of January

Notarization:
Subscribed and sworn to before me
This 9th day of January



Signature of Notary



Signature of Notary

Seal



Seal



ATTACHMENT 42B

While the proposed project will enhance the services provided to the community it does not impact the provision of safety net services to the community. The basic safety net services will continue to be provided to the community by the same providers who now provide the services.

Safety Net Information per PA 96-0031			
CHARITY CARE			
Charity (# of patients)	Year FY 2008	Year FY 2009	Year FY 2010
Inpatient	797	787	534
Outpatient	7,084	6,671	6,092
Total	7,881	7,458	6,616
Charity (cost in dollars)			
Inpatient	\$2,785,786	\$3,664,440	\$4,480,693
Outpatient	\$1,489,230	\$2,723,657	\$3,954,490
Total	\$4,275,016	\$6,388,097	\$8,435,183
MEDICAID			
Medicaid (# of patients)	Year CY 2008	Year CY 2009	Year CY 2010
Inpatient	4,009	4,288	4,373
Outpatient	35,820	44,512	49,902
Total	39,929	48,800	54,275
Medicaid (revenue)			
Inpatient	\$24,326,626	\$27,026,888	\$35,720,296
Outpatient	\$5,648,408	\$6,721,298	\$9,598,617
Total	\$29,977,034	\$33,748,186	\$44,318,913

Swedish American Hospital Regional Cancer Center

CHARITY CARE			
	FY2009	FY2010	FY2011
Net Patient Revenue*	347,020,000	379,607,000	402,201,000
Amount of Charity Care (charges)	22,143,768	31,699,524	43,799,018
Cost of Charity Care	6,388,097	8,435,183	11,342,433

* excludes Public Aid Assessment Revenue (Expense), per Audited Financials.

After paginating the entire, completed application, indicate in the chart below, the page numbers for the attachments included as part of the project's application for permit:

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