

**Division of Health Planning and
Resource Development
May 2010**

**CON REVIEW HG-NIS-1209-037
Natchez Community Hospital, LLC
Establishment of Diagnostic Cardiac Catheterization Lab and
Offering of Diagnostic Cardiac Catheterization Services
Capital Expenditure: \$796,055
Location: Natchez, Mississippi**

STAFF ANALYSIS

I. PROJECT SUMMARY

A. Applicant Information

Natchez Community Hospital, LLC is a Limited Liability Company whose parent organization is Health Management Associates, Inc. (“HMA”). The limited liability company has seven officers/directors and eleven members. Natchez Community Hospital (Natchez Community) is a 101-bed general acute care hospital licensed by the state of Mississippi and has been certified by the Secretary of State’s Office as being in good standing. The facility is also certified by the Joint Commission of Accreditation of Healthcare Organizations.

The occupancy rates, average lengths of stay (ALOS) and the Medicaid utilization rates for the facility for the past three fiscal years are as follows for medical surgical beds only:

**Natchez Community Hospital
Utilization Data**

| Fiscal Year | Occupancy* Rate (%) | ALOS (Days) | Medicaid* Utilization Rate (%) |
|--------------------|--------------------------------|------------------------|---|
| 2006 | 44.82 | 4.09 | 23.50 |
| 2007 | 44.67 | 4.08 | 23.62 |
| 2008 | 43.66 | 4.15 | 24.42 |

Source: Division of Health Facilities Licensure and Certification, MSDH

B. Project Description

Natchez Community Hospital (Natchez Community) requests certificate of need (CON) authority to establish a diagnostic cardiac catheterization lab (“Cath Lab”) and offer diagnostic cardiac catheterization (“cardiac cath”) services at its facility in order to meet the needs of its patients and area residents. The applicant states that currently the residents of Adams County and the surrounding areas have to travel out-of-state or distances in excess of 60 miles to receive cardiac cath services from other Mississippi providers as Natchez Regional Medical Center ceased providing cardiac services in the Spring of 2007. The proposed project intends to replace lost services in the area by renovating approximately 400 square feet of space within the hospital to house the Cath Lab. The Cath Lab would be managed by Riverpark Community Cath Lab, LLC (“Riverpark”). The hospital proposes to assume Riverpark’s lease for the Philips Healthcare (“Philips”) Allura FD10 Ceiling System from GE Financial to establish the Cath Lab

and provide the cardiac cath services. Riverpark will close its cath lab upon the relocation of the equipment and services to the Natchez Community Hospital.

The project will require the addition of 2.0 FTE personnel at an annual cost of \$109,979 the first year.

The final objective for the project is to provide state of the art cardiac cath services at the hospital to meet the needs of the residents residing in the service area of the hospital.

The site has been approved by the MSDH Division of Health Facilities Licensure and Certification and the applicant proposes to obligate the capital expenditure upon approval of the CON with completion of the project within a year thereafter.

II. TYPE OF REVIEW REQUIRED

Projects which involve the establishment of specified institutional health services require CON review by the State Department of Health, pursuant to Section 41-7-191, subparagraphs (1)(d)(ii), and (f) for cardiac catheterization services, Mississippi Code 1972, Annotated, as amended, and all adopted rules, procedures, plans, criteria, and standards of the Mississippi State Department of Health.

The Certificate of Need Review Manual requires that projects for cardiac catheterization services be batched within a review cycle. The project was received on December 18, 2009, too late to be entered into the January – March Review Cycle. On January 13, 2010, Natchez Regional Medical Center filed its application to re-establish diagnostic cardiac catheterization and digital subtraction angiography services. The Natchez Regional project was also submitted too late to be entered into the January – March Review Cycle and due to its submission for the same service (cardiac catheterization), the two projects were entered into the April-June Review Cycle as competing applications.

In accordance with Section 41-7-197(2) of the Mississippi Code of 1972 Annotated, as amended, any affected person may request a public hearing on this project within 20 days of publication of the staff analysis. The opportunity to request a hearing expires on June 7, 2010.

III. CONFORMANCE WITH THE STATE HEALTH PLAN AND OTHER ADOPTED CRITERIA AND STANDARDS

A. State Health Plan (SHP)

The *FY 2010 State Health Plan* addresses policy statements, criteria, and standards which an applicant is required to meet before receiving CON authority to provide diagnostic cardiac catheterization services. The application submitted by Natchez Community Hospital is in substantial compliance with applicable criteria and standards contained in the *Plan*.

SHP Criterion 1 - Need

The *FY 2010 State Health Plan* indicates that the applicant shall document a minimum population base of 100,000 in the CC/OHSPA where the proposed diagnostic cardiac catheterization equipment/service is to be located.

Natchez Community Hospital is located in CC/OHSPA 7, which is made up of the following nine counties: Adams, Amite, Franklin, Jefferson, Lawrence, Lincoln, Pike, Walthall, and Wilkinson. According to the projected 2010 population, these nine counties had a total projected population of 176,215.*

***Source:** Mississippi Population Projections for 2010, 2015, and 2020, Center for Policy Research and Planning, Mississippi Institutions of Higher Learning, August, 2005, herein after referred to as "2010 Population Projections".

The applicant submits that in addition to the population of the service area, Concordia Parish, adjacent to Adams County in Louisiana had a population of 19,064 in 2008, according to estimates from the U. S. Census Bureau.

According to information submitted by the applicant, its primary service area includes the following counties: Adams, Franklin, and Jefferson in Mississippi. These are the counties from which the applicant derived three percent or more of its patients from January 1, 2009 to December 31, 2009. These counties have a combined 2010 Population Projection of 48,256. When the population of the Louisiana parish is added to the population of the three counties in the applicant's primary service area, the actual patient base for the Applicant's cardiac cath service increases to 67,320. According to the 2008 Report on Hospital, the applicant received patients from the following counties in Mississippi for the four quarter period ending July 2008: Adams, Wilkinson, Jefferson, and Franklin. These counties have a combined projected population of 58,509.

There is currently one existing provider of cardiac catheterization services in CC/OHSPA 7, which is Southwest Mississippi Regional Medical Center, in McComb, Pike County. Southwest Mississippi Regional Medical Center performed 1,260 diagnostic procedures in 2007 and 1,176 procedures in 2008. Southwest Mississippi Regional Medical Center also offers Therapeutic Cardiac Catheterization services, performing 488 PTCAs in 2007 and 400 in 2008.

In accordance with Policy Statement 7 as stated in the 2010 State Health Plan, the Department did not rely upon market share analysis to determine the applicant's compliance with this criterion, as it was found inadequate to address access to care concerns.

SHP Criterion 2 - Minimum Procedures

The applicant projects the following utilization for the cardiac services at Natchez Community Hospital for the first three years:

| <u>Year</u> | <u>Catheterization</u> |
|-------------|------------------------|
| One | 261 |
| Two | 341 |
| Three | 420 |

The applicant submits that to make this projection, the hospital considered two factors: the historical utilization of Natchez Regional Medical Center's discontinued program and market analysis based on statewide adult diagnostic cardiac catheterization rates for 2008. The 2009 State Health Plan indicates that Natchez Regional Medical Center performed 457 diagnostic cardiac cath procedures in 2006 and 20 in 2007. The applicant states that since Natchez Regional ceased providing these services in the Spring of 2007, patients needing these services must travel to providers outside of the Natchez area to receive cath services. The applicant states that these patients currently travel to Vidalia, Louisiana to Riverpark, or to Southwest.

The application contains an affidavit from Vikramaditya Dulam, M.D. indicating that he will refer 17 patients per month to Natchez Community Hospital's diagnostic cardiac cath lab, for total of 204 per year. The applicant states that Dr. Dulam currently performs cath services at both

Riverpark and Southwest. Natchez Community states it has also recruited and hired a general vascular surgeon that will utilize the cath lab.

For the market analysis, the applicant used population estimates from the Mississippi Institutes of Higher Learning for 2011, 2012, and 2013, and historical population estimates from the U. S. Census Bureau for 2007 and 2008. A summary of the population data determined by the applicant is as follows:

Table 1
 CC/OHSPA 7
 Historical and Projected Total Population

| Year | Projected Population |
|------|----------------------|
| 2007 | 175,615 |
| 2008 | 175,704 |
| 2011 | 175,233 |
| 2012 | 176,276 |
| 2013 | 176,433 |

The applicant then determined the historical rate of diagnostic cardiac cath for CC/OHSPA 7 and Mississippi as a whole. These rates are presented below:

| | Mississippi | | CC/OHSPA 7 | |
|-------------------------|-------------|-----------|------------|---------|
| | 2007 | 2008 | 2007 | 2008 |
| Diagnostic Cardiac Cath | 39,774 | 43,756 | 1,280 | 1,176 |
| Population | 2,921,030 | 2,938,618 | 175,615 | 175,704 |
| Cardiac Cath per 1,000 | 13.62 | 14.89 | 7.29 | 6.69 |

Further, the applicant states that based on the statewide diagnostic cardiac cath use rates stated above, the projected diagnostic cardiac cath would be 2,609 for 2011, 2,625 for 2012, and 2,627 for 2013. Natchez Community indicates that it assumed a 10% market share of these procedures.

Approximately 43,756 diagnostic cardiac catheterization procedures were performed in Mississippi at 25 health care facilities in fiscal year 2008. Based on Mississippi's 2010 Population Projection of 2,975,550, Mississippi residents utilized diagnostic cardiac catheterization services an average of 14.7 per 1,000 population. Based on the statewide utilization rate of 14.7/1,000 and the projected population of Adams County (30,497), staff estimates that there is an unmet need of 441 diagnostic cardiac cath procedures in Adams County alone.

SHP Criterion 3 - Impact on Existing Providers

Applicant submits that due to Natchez Regional cessation of services for over a year, there is not a CON approved cath service provider within 45 miles that would suffer an adverse impact. Southwest Mississippi Regional Medical Center, the only cardiac cath provider in CC/OSHPA 7, performed 1,748 diagnostic and therapeutic cardiac cath procedures in 2007 and 1,576 in 2008. Southwest Mississippi Regional Medical Center is located in excess of 45 miles from the proposed provider; therefore, the instant project is not perceived to have an adverse impact on the current provider.

SHP Criterion 4 - Staffing Standards

Natchez Community certified that it will have, with the approval of this application, the ability to administer the proposed services, provide sufficiently trained and experienced staff, and evaluate the performance of the program. Applicant further states that the hospital's joint venture, Riverpark, currently employs appropriate staff and these staff will become employees of the hospital with approval of this application. Dr. Dulam, an invasive cardiologist and medical director at the hospital, and currently medical director at Riverpark, will perform the cath procedures.

SHP Criterion 5 - Staff Residency

The Applicant certified that the medical staff performing cardiac catheterization procedures will reside within 45 minutes driving time of the facility.

SHP Criterion 6 - Recording and Maintenance of Data

The applicant affirms that Natchez Community will maintain the data required by this criterion and make it available to the Mississippi State Department of Health annually.

SHP Criterion 7 - Referral Agreement

The applicant affirmed that an Emergency Transfer Agreement will be secured and in place and operational at the time of the inception of cardiac catheterization services. The application contains transfer agreements with various facilities offering therapeutic cardiac cath services. The applicant proposes that similar agreements for the proposed project will be in place prior to the offering of cath services. In addition, the application contains a letter from Central Mississippi Medical Center verifying that it will enter into a transfer agreement with Natchez Community in substantially the same form as the one currently in place with Riverpark should the CON application is approved.

SHP Criterion 8 - Patient Selection

The applicant delineates the steps which will be taken to insure that high-risk or unstable patients are not catheterized in the facility. Natchez Community furthermore certified that therapeutic cardiac catheterization services will not be performed in the facility unless and until the applicant has received CON approval to provide therapeutic cardiac catheterization services.

SHP Criterion 9 - Regulatory Approval

Natchez Community Hospital requests approval for the addition of a diagnostic cardiac catheterization services at the facility.

B. General Review (GR) Criteria

Chapter 8, *Mississippi Certificate of Need Review Manual*, December 1, 2009, contains general criteria by which all applications for Certificate of Need are reviewed. This project is in substantial compliance with applicable criteria.

GR Criterion 1 – Compliance with State Health Plan

As discussed above, the application is in compliance with the 2010 State Health Plan.

GR Criterion 2 - Long Range Plan

The applicant states that the hospital is committed to providing the highest quality medical services to the residents in Adams County and the surrounding areas. The applicant states the market demonstrates that provision of diagnostic cardiac catheterization services at the hospital would better serve its residents as currently they travel either to Louisiana or to providers in excess of 60 miles to receive cath services.

GR Criterion 3 - Availability of Alternatives

Natchez Community submits that the only alternative to the offering of diagnostic cardiac catheterization is not to seek CON approval to offer the services in Natchez and to continue to have patients travel to receive cath services. This alternative, according to the applicant, had many disadvantages, and thus, it was rejected.

GR Criterion 4 - Economic Viability

Natchez Community projects a net income of \$106,680, \$154,229, and \$212,854 for the first, second and third years of operation, respectively. Therefore, the project appears to be economically viable.

Costs and charges appear to be comparable to the charges established by other facilities in the planning area and the State.

The applicant believes that the projected levels of utilization are reasonably consistent with those experienced by similar facilities and are consistent with the need level of the service area. The applicant submits that Riverpark performed 101 procedures in 2008 and 94 procedures in 2009 with year-to-date approximately 100% coming from the service area. In addition, Natchez Regional performed 457 diagnostic cardiac cath procedures in 2006, thereby evidencing that the projections are reasonable and also demonstrating the need level for the service area.

GR Criterion 5 - Need for Project

The applicant submits that because Natchez Regional ceased providing cath services over two years ago, the residents of Adams County and its surrounding areas no longer have a local provider of diagnostic cardiac catheterization services. Reviewing the number of procedures previously performed by Natchez Regional coupled with the affidavits and support of local providers evidencing patients in need of these services, Natchez Community states there is definitely a need present in Adams County for cardiac services.

Natchez Community further contends that since Natchez Regional discontinued its provision of cath services, the only other provider in the service area is Southwest, which is located approximately 66 miles away.

Natchez Community is located in CC/OSHPA 7, which consists of nine counties. The applicant serves patients from five of these counties: Adams, Amite, Franklin, Jefferson, and Wilkinson. The other four counties in CC/OHSPA are served primarily by Southwest Mississippi Regional Medical Center in McComb. The facility in McComb served well in excess of the required 450 therapeutic and diagnostic procedures, and with the exception of Amite County, serves an entirely different population than the applicant. The offering of diagnostic cardiac cath services at Natchez Community is not expected to have an adverse impact on the offering of services in McComb.

This application included 17 letters of support/comment from physicians, and other community organizations.

GR Criterion 6 - Access to the Facility or Service

Applicant certifies that all residents of the health planning service area, hospital service area or patient service area, including Medicaid recipients, charity/medically indigent patients, racial and ethnic minorities, women, handicapped persons, and the elderly have access to the services of the existing facility and will continue to have access to the proposed services.

The applicant estimates that approximately five to eight percent of its hospital's patients could be classified as medically underserved. The hospital anticipates this same percentage of medically underserved patients will use the services offered at the Cath Lab. The table below depicts the level of care offered or proposed to be offered to medically indigent and charity patients;

| Gross Patient Revenues | | | | |
|------------------------|------------------------|------------------|-------------------------|-------------------|
| | Medically Indigent (%) | Charity Care (%) | Medically Indigent (\$) | Charity Care (\$) |
| Historical Year 2008 | 5.8% | 2.0% | \$15,066,576.84 | \$307,481.16 |
| Historical Year 2009 | 5.6% | 2.0% | \$14,918,582.14 | \$304,460.86 |
| Projected Year 1 | 6.0% | 2.0% | \$16,499,689.64 | \$336,728.36 |
| Projected Year 2 | 6.0% | 2.02% | \$17,159,677.50 | \$350,197.50 |

GR Criterion 7 - Information Requirement

The applicant affirms that they will record and maintain the information required by this criterion and make it available to the Mississippi State Department of Health within 15 business days of request.

GR Criterion 8 - Relationship to Existing Health Care Systems

Adams County is served by one other acute care hospital – Natchez Regional Medical Center. Natchez Regional previously offered diagnostic cardiac cath services but ceased providing the service over two years ago. Natchez Regional also has filed an application for the re-establishment of diagnostic cardiac catheterization and digital subtraction angiography service in Adams County. Both applications were filed within the same review cycle and were therefore, entered into review as competing applications. The offering of cardiac cath services would enhance the overall delivery of health care services to the region and would specifically better serve the goal of the Department in increasing the availability of cardiac cath services around the state.

The applicant submits that there are no comparable services in the area and if this project is not approved, patients will continue to be forced to travel to receive this service which was once provided locally.

GR Criterion 9 - Availability of Resources

Applicant demonstrated that it will have the requisite staff in place to service the proposed Cath Lab. To the extent any new personnel are required, the applicant states the hospital is confident it can recruit such personnel as it previously was involved in recruiting the personnel required to service Riverpark's cath lab.

GR Criterion 15 – Competing Applications

The Department received two applications for the offering of diagnostic cardiac catheterization services in Natchez, Adams County, Mississippi. With competing applications, the Department must determine which applicant, if any, would be the most appropriate applicant to provide the proposed service. (See Attachment 2 for a comparative analysis on the two applications).

GR Criterion 16 - Quality of Care

Natchez Community Hospital is in compliance with the *Minimum Standards of Operation for Mississippi Hospitals*, according to the Division of Health Facilities Licensure and Certification. The Hospital is accredited by the Joint Commission on Accreditation of Health Care Organizations and certified as a participant in the Medicare/Medicaid programs.

IV. FINANCIAL FEASIBILITY

A. Expenditure Summary

The total estimated capital expenditure is allocated as follows:

| Cost Item | Projected Cost | % of Total |
|--|-------------------------|----------------------|
| Construction Cost - Renovation | \$500,000 | 62.8% |
| Capital Improvements | 0 | 0.00% |
| Total Fixed Equipment Cost | 246,055 | 31.0% |
| Total Non-Fixed Equipment Cost | 0 | 0% |
| Fees - architectural, engineering, etc. | 35,000 | 4.3% |
| Fees - legal and accounting | 15,000 | 1.9% |
| Total Proposed Capital Expenditures | <u>\$796,055</u> | <u>100.0%</u> |

B. Method of Financing

The applicant proposes to finance the project with related company, HMA, financing. The application contains a letter from HMA stating that as an owner of Natchez Community Hospital, LLC d/b/a Natchez Community Hospital, it will provide any and all funding or financial resources

which may be required for the completion and continued operation of the diagnostic cardiac catheterization lab and offering of diagnostic cardiac catheterization services.

C. Effect on Operating Cost

The Three-Year Projected Operating Statement is presented in Attachment 1.

D. Cost to Medicaid/Medicare

The impact of the project on third party payers is as follows:

| Payor Mix | Utilization Percentage | Cost to Medicaid First Year |
|--------------|------------------------|-----------------------------|
| Medicaid | 8.0 | \$122,559 |
| Medicare | 64.0 | 980,471 |
| Other Payers | 28.0 | 428,956 |
| Total | 100.0 | \$1,531,986 |

V. RECOMMENDATIONS OF OTHER AFFECTED AGENCIES

The Division of Medicaid was provided a copy of this application for comment. Medicaid estimates that the increased annual cost as a result of the project will be \$90,158. The Division of Medicaid opposes this proeject.

VI. CONCLUSION AND RECOMMENDATION

This project is in substantial compliance with criteria and standards for establishment of diagnostic cardiac catheterization services, as contained in the *FY 2010 State Health Plan*, the Mississippi Certificate of Need Review Manual, revised 2009 and all adopted rules, procedures and plans of the Mississippi State Department of Health.

However, the Department received two applications requesting CON authority to provide diagnostic cardiac catheterization services in Adams County – Natchez Community Hospital and Natchez Regional Medical Center. The Department prepared a comparative analysis of the two applications and made the following findings:

- Natchez Regional Medical Center already has a diagnostic cardiac catheterization laboratory and cardiac cath equipment which it states is fully paid for. Natchez Regional also has the capacity to perform digital subtraction angiography services upon approval of the CON. Natchez Community will need to expend \$796,055 to purchase equipment and is not requesting to provide digital subtraction angiography services.
- Natchez Regional Medical Center has the backing of Jackson Heart Clinic and a transfer agreement with St. Dominic-Jackson Memorial Hospital. While Natchez Community Hospital has a transfer agreement with Central Mississippi Medical Center, in staff's opinion the cardiologist support does not appear to be as strong as that obtained by Natchez Regional.
- Finally, Natchez Regional Medical Center has a larger community support for the project, receiving over 30 letters of support from physicians and business, educational, and community leaders. Staff contends that support for the Natchez Community Hospital project is significantly less than the support expressed for Natchez Regional.

The Division of Health Planning and Resource Development recommended approval of the application submitted by Natchez Regional Medical Center for the re-establishment of diagnostic cardiac catheterization and digital subtraction angiography services. The approval of the application by Natchez Regional Medical Center precludes the approval of any other application in the area.

Consequently, the Division of Health Planning and Resource Development recommends disapproval of this application submitted by Natchez Community Hospital for the establishment of diagnostic cardiac catheterization laboratory and the offering of diagnostic cardiac catheterization services.

Attachment I

**Natchez Community Hospital
Establishment of Cardiac Cath Services
Three-Year Projected Operating Statement
Project Only**

| | Year 1 | Year 2 | Year 3 |
|--------------------------------------|--------------------------|--------------------------|----------------------------|
| Patient Revenue | | | |
| Inpatient Revenue | 533,232 | 612,795 | 704,204 |
| Outpatient Revenue | 799,848 | 919,191 | 1,056,308 |
| Total Patient Revenue | \$ 1,333,080 | \$ 1,531,986 | \$ 1,760,512 |
| Charity Care | | | |
| Deductions from Revenue | - 566,692 | - 651,247 | - 748,393 |
| Total Deductions | -566,692 | - 651,247 | - 748,393 |
| Net Patient Revenue | <u>\$ 766,388</u> | <u>\$ 880,739</u> | <u>\$ 1,012,119</u> |
| Other Operating Revenue | | | |
| Net Revenue | <u>\$ 766,388</u> | <u>\$ 880,739</u> | <u>\$ 1,012,119</u> |
| Operating Expenses | | | |
| Salaries & Wages | \$ 109,979 | \$ 126,389 | \$ 145,242 |
| Benefits | | | |
| Supplies | 219,958 | 252,777 | 290,484 |
| Services | 43,992 | 50,555 | 58,097 |
| Lease | 10,200 | 10,200 | 10,200 |
| Depreciation | 132,000 | 129,000 | 120,000 |
| Interest | 33,600 | 31,200 | 30,000 |
| Other | 109,979 | 126,389 | 145,242 |
| Total Operating Expenses | <u>\$ 659,708</u> | <u>\$ 726,510</u> | <u>\$ 799,265</u> |
| Income (Loss) from Operations | \$ 106,680 | \$ 154,229 | \$ 212,854 |
| Inpatient days | 252 | 290 | 332 |
| Outpatient days | 189 | 217 | 250 |
| Procedures | 315 | 362 | 416 |
| Charge per inpatient day | \$ 2,116 | 2,113 | 2,121 |
| Charge per outpatient day | \$ 4,232 | \$ 4,232 | \$ 4,232 |
| Charge per procedure | \$ 4,232 | \$ 4,232 | \$ 4,232 |
| Cost per inpatient day | \$ 2,618 | \$ 2,505 | \$ 2,407 |
| Cost per outpatient day | \$ 3,491 | \$ 3,345 | \$ 3,202 |
| Cost per procedure | 2,094 | 2,007 | 1,921 |

Attachment 2
Mississippi State Department of Health
Division of Health Planning and Resource Development

Comparative Analysis
Offering of Diagnostic Cardiac Catheterization Services

The Department received two applications requesting certificate of need (CON) authority for the offering of diagnostic cardiac catheterization ("Cardiac Cath") services in Natchez, Adams County, Mississippi. The applicants are:

- CON Review HG-NIS-1209-037
Natchez Community Hospital, LLC
Establishment of Diagnostic Cardiac Catheterization Lab and
Offering of Diagnostic Cardiac Catheterization Services
Capital Expenditure: \$796,055
Submitted December 18, 2009

- CON Review HG-NIS-0110-002
Natchez Regional Medical Center
Re-Establishment of Diagnostic Cardiac Catheterization and
Digital Subtraction Angiography Services
Capital Expenditure: \$0
Submitted January 13, 2010

The Certificate of Need Review Manual requires that projects for cardiac catheterization services be batched within a review cycle. As both projects were submitted after the December 1, 2009, filing deadline for projects to be entered into the January – March Review Cycle, both applications were deemed complete on April 1, 2010, and entered into the April – June Review Cycle as competing applications.

In the case of competing applications, the Department must make a determination that the entity approved is the most appropriate applicant for providing the proposed health care facility or service. Additional consideration may be given to how well each of the applicants can meet the criteria of need, access, relationship to existing health care system, availability of resources, and financial feasibility. In addition, the Department may use a variety of statistical methodologies, including but not limited to market share analysis, patient origin data and state agency reports.

Need for the Project

Natchez is located in General Hospital Service Area (GHSA) 7, which has a 2010 population projection of 176,215. The only cardiac catheterization provider in GHSA 7 is Southwest Mississippi Regional Medical Center ("Southwest"), McComb, Mississippi, which is located over 45 miles from the proposed providers. In addition, there are no other Mississippi facilities offering cardiac catheterization services within a 45-mile radius of the proposed facilities. Therefore, staff determined that there is an unmet need for diagnostic cardiac cath services in Natchez, Adams County, Mississippi.

Approximately 43,756 diagnostic cardiac cath procedures were performed in Mississippi in fiscal year 2008. Based on Mississippi's 2010 Population Projection of 2,975,550, Mississippi facilities performed an average of 14.7 cardiac cath procedures per 1,000 residents. Based on the

statewide utilization rate of 14.7/1,000, and the 2010 population projection for Adams County (30,497), there is an unmet need of 441 procedures in Adams County.

Access to Care

Both applicants certified that they serve all residents of the health planning service area, hospital service area or patient service area, including Medicaid recipients, charity/medically indigent patients, racial and ethnic minorities, women, handicapped persons, and the elderly and will continue to serve these populations.

As stated above, the only provider of cardiac cath services in GHSA 7 is located an excess of 45 miles away. Therefore, as provided in Policy Statement 7 of the *2010 State Health Plan*, the Department did not rely upon market share analysis to determine applicants' compliance with the population projections as it was found to be inadequate to address access to care concerns.

Natchez Regional Medical Center provided .08% care to medically indigent and 1.52% charity care in 2009. This amounts to \$128,189 of gross patient revenue for medically indigent and \$2,435,587 for charity care. The applicant's percentage of care for medically indigent and charity care appears to be low. However, the applicant does not appear to have policies that would prohibit provision of care to the underserved population. In addition, Natchez estimates that approximately 11% of care will be offered to Medicaid patients, and slightly over 80% will be provided to Medicare patients and approximately 8% of care will be provided for uncompensated charity care with 2% provided to medically indigent patients.

Natchez Community Hospital provided 5.8% care to medically indigent patients in FY 2009 and 2.0% for charity care, yielding \$15,066,576.84 of patient revenues for medically indigent and \$307,481.16 for charity care patients. The applicant projects similar results for the first and second years after completion of the project.

Relationship to Existing Healthcare System

There are currently no providers of diagnostic cardiac cath services in Natchez or within 45 miles from the proposed applicants. The only provider of cardiac cath services located in the applicants' service area is Southwest Mississippi Regional Medical Center located in McComb, Mississippi. Southwest, located in excess of 45 miles away, performed 1,748 cardiac cath procedures in 2007 and 1,576 in 2008. Approximately 43,756 diagnostic cardiac cath procedures were performed in Mississippi as a whole in fiscal year 2008, utilizing 59 labs, for an average of 742 procedures per lab.

Staff reviewed Patient Origin Studies submitted by the applicants to determine how many patients were served by each facility from the service area during the period October 2008 to September 2009. Table 1 below shows the total number of patients reported by the applicants compared with the 2010 population projections for each county of residence. In addition, staff reviewed the 2008 Report on Hospitals to determine how many patients from the Service Area used the facilities, including Southwest Mississippi Regional Medical Center, for the four quarters ending July 2009, to determine if the service area of the applicants overlapped with that of the existing provider in the service area. Table 2 below indicates the percentages of patients from each county that used Natchez Regional Medical Center, Natchez Community Hospital, or Southwest Mississippi Regional Medical Center for the defined period.

Table 1 below reveals that Natchez Regional Medical Center served 56% of the total patients identified from GHSA 7 and the four Louisiana Parishes during the period October 2008 to September 2009. Natchez Community Hospital served approximately 44% of the total patients from the service area.

As shown in Table 2, Southwest Mississippi Regional Medical Center serves an entirely different population base than Natchez Regional Medical Center and Natchez Community Hospital.

**Table 1
 Comparison of Hospital Patients with
 Population Projection of each County**

| County | Population | Total Patients | Natchez Regional Med Ctr. | | | Natchez Community Hospital | | |
|---------------|----------------|----------------|---------------------------|---------------|---------------|----------------------------|---------------|---------------|
| | | | % Total Patients | Market Share | NRMC Patients | % Total Patients | Market Share | NCH Patients |
| Adams | 30,497 | 35,903 | 55.93% | 17,057 | 20,080 | 44.07% | 13,440 | 15,823 |
| Amite | 13,303 | 378 | 42.59% | 5,666 | 161 | 57.41% | 7,637 | 217 |
| Franklin | 8,460 | 2,213 | 59.51% | 5,035 | 1,317 | 40.49% | 3,425 | 896 |
| Jefferson | 9,299 | 3,694 | 50.70% | 4,715 | 1,873 | 49.30% | 4,584 | 1,821 |
| Lawrence | 13,936 | | | * | | | * | |
| Lincoln | 34,904 | | | * | | | * | |
| Pike | 40,619 | | | * | | | * | |
| Walthall | 14,944 | | | * | | | * | |
| Wilkinson | 10,253 | 1,100 | 75.09% | 7,699 | 826 | 24.91% | 2,554 | 274 |
| Catahoula, LA | 10,522 | 1,749 | 56.66% | 5,962 | 991 | 43.34% | 4,560 | 758 |
| Concordia, LA | 19,064 | 10,695 | 53.42% | 10,184 | 5,713 | 46.58% | 8,880 | 4,982 |
| Franklin, LA | 20,006 | 157 | 38.22% | 7,646 | 60 | 61.78% | 12,360 | 97 |
| Tensas, LA | 5,694 | 837 | 67.14% | 3,823 | 562 | 32.86% | 1,871 | 275 |
| Totals | 246,504 | 56,726 | | 67,786 | 31,583 | | 59,312 | 25,143 |

Source: Patient Origin information submitted by Natchez Regional Medical Center and Natchez Community Hospital for period October 2008 – September 2009

*Number of total patients deemed insufficient to include in service area.

Table 2
Percentage of Patients Using Facilities in GHSA 7

| | NRMC | NCH | SWMMC |
|-----------|-------|--------|--------|
| Adams | 55.07 | 51.30% | 0.00% |
| Amite | 0.00 | 0.00% | 9.86% |
| Franklin | 2.33 | 2.89% | 0.00% |
| Jefferson | 7.26 | 6.65% | 0.00% |
| Lawrence | 0.00 | 0.00% | 1.85% |
| Lincoln | 0.00 | 0.00% | 9.63% |
| Pike | 0.00 | 0.00% | 59.63% |
| Walthall | 0.00 | 0.00% | 7.94% |
| Wilkinson | 4.11 | 6.79% | 0.00% |
| Louisiana | 29.45 | 29.05% | 2.70% |
| Other | 1.78 | 3.32% | 8.40% |

Source: Division of Health Facilities Licensure & Certification
 2008 Report on Hospitals, MSDH and 2010 State Health Plan

Availability of Resources

Natchez Community Hospital proposes to assume a lease agreement from Riverpark Community Cath Lab, LLC (“Riverpark”) for a Philips Healthcare (“Phillips”) Allura FD10 Ceiling System from GE Financial to establish the cath lab at its facility. Riverpark will close its cath lab in Louisiana upon relocation of the lab to Natchez Community Hospital, where it will manage the lab at Natchez Community Hospital.

Riverpark Community Cath Lab, LLC has transfer agreements with Central Mississippi Medical Center, for the transfer of patients for emergency care. Central Mississippi Medical Center submitted a letter for the application indicating that it will sign a similar agreement with Natchez Community Hospital should the CON be approved.

Natchez Regional Medical Center purchased a Goldseal Engineering Bay LCV+ Combo Cath Lab with a new Mac Lab 7000, Acist injector and accessories in 2003. The applicant states that the cath lab and equipment are completely paid for. The applicant has a contractual agreement with Jackson Heart Clinic, P.A. for management of the Cath Lab.

In addition, Natchez Regional Medical Center has a transfer agreement with St. Dominic-Jackson Memorial Hospital for the transfer of patients for emergency care. Dr. Brad LeMay, cardiologist, submitted a letter indicating that his intent to move to Natchez and begin seeing patients in the area on April 12, 2010.

Financial Feasibility

Both applicants project to perform an excess of 400 procedures by the end of the third year of operation. Southwest, the only provider located in the applicants’ service area, performed 1,176 diagnostic cardiac cath procedures in 2008. According to the 2009 State Health Plan, Natchez

Regional performed 457 diagnostic cardiac cath procedures in 2006. Therefore, both applicants' projections appear to be reasonable.

Natchez Regional Medical Center projects gross patient revenues of \$9,697,455 for the first year of operation. The applicant projects to perform 1,853 procedures in the Cath Lab the first year of operation. According to Natchez Regional, this number includes 350 diagnostic cardiac cath procedures in addition to DSA and all other procedures associated with the addition of diagnostic cardiac cath services. Natchez Regional estimates that the cost of diagnostic cardiac cath procedures will be \$965 per procedure and the charge will be \$5,233. See Table Below.

Natchez Community Hospital projects gross patient revenues of \$1,333,080 the first year of operation and 315 procedures at a cost of \$2,094 per procedure and a charge of \$4,232 per procedure.

**Comparison of Natchez Community and Natchez Regional
 First Year Projected Operating Statements**

| | Natchez Regional | Natchez Community |
|--------------------------|-------------------------|--------------------------|
| Inpatient Revenue | \$5,333,600 | \$533,232 |
| Outpatient Revenue | 4,363,855 | 799,848 |
| Total Revenue | \$9,697,455 | \$1,333,080 |
| Charity Care | 0 | 566,692 |
| Total Deductions | \$7,480,375 | \$566,692 |
| Salaries | \$796,871 | \$109,979 |
| Benefits | 237,845 | |
| Supplies | 250,674 | 219,958 |
| Services | | 43,992 |
| Lease | 503,674 | 10,200 |
| Depreciation | - | 132,000 |
| Interest | - | 33,600 |
| Other | - | 109,979 |
| Total Operating Expenses | \$1,788,592 | \$659,708 |
| Income (Loss) | \$428,486 | \$106,680 |
| Procedures* | 1,895 | 315 |
| Cost/Procedure | \$965 | \$2,094 |
| Charge/Procedure | \$5,233 | \$4,232 |

*NRMC states these procedures include ER visits and all procedures that will occur due to the re-instatement of the diagnostic cardiac cath lab.

Other Considerations

Natchez Regional Medical Center received CON authority in 2001 to establish diagnostic cardiac catheterization and digital subtraction angiography services. The facility purchased a Goldseal Engineering Bay LCV+ Combo Cath Lab with a new Mac Lab 7000, Acist injector and accessories in which applicant states is completely paid for. The facility initiated the services in 2003 but was forced to cease providing services in 2007 due to loss of its cardiologist.

Natchez Regional Medical Center received in excess of 30 letters of support/comment from physicians, sheriff's office, police department, banks, universities, politicians, and other community organizations.

Natchez Community Hospital received CON authority to establish diagnostic cardiac catheterization services in 1997 and commenced offering the service in July 1998 utilizing a mobile facility but also ceased operating the services in February 1999 due to loss of its cardiologist. Natchez Community Hospital stated that the cost of the mobile unit was very high and determined that it was necessary to return the unit until such time as they recruited another cardiologist.

Natchez Community Hospital received approximately 17 letters of support/comment from physicians and other community organizations.

Conclusion/Recommendation

Both applicants are located in GHSA 7 which has a population projection in excess of 100,000. Each applicant projects to perform a minimum of 300 diagnostic cardiac cath procedures by its third year of operation. Both applicants were once providers of diagnostic cardiac cath services and both ceased to offer the service due to loss of a cardiologist.

Because there is not a provider of cardiac cath services within 45 miles of the proposed services, staff did not rely upon market share analysis for determination of need for diagnostic cardiac cath services in Natchez, Adams County. However, staff did perform a market share analysis to determine each applicant's share of the existing patient population shared in the service area. Based on staff's analysis, Natchez Regional Medical Center has a market share of 56% of the patients from GHSA 7 that use a facility in Natchez while Natchez Community Hospital has a share of 44% of the patients. These percentages include patients coming to the facilities from parishes in Louisiana.

Staff finds that each facility is equally capable of providing diagnostic cardiac cath services. However, staff contends that a patient population of 57,000 to 60,000 can only support one cardiac cath program. Staff further contends that Natchez Regional Medical Center is the most appropriate applicant to provide diagnostic cardiac cath services at this time for the following reasons:

- Natchez Regional Medical Center already has a Diagnostic Cardiac Catheterization Laboratory and cardiac cath equipment which it states is fully paid for. Natchez Regional also has the capacity to perform digital subtraction angiography services upon approval of the CON. Natchez Community will need to expend \$796,055 to purchase equipment and is not requesting to provide digital subtraction angiography services.
- Natchez Regional Medical Center has the backing of Jackson Heart Clinic and a transfer agreement with St. Dominic-Jackson Memorial Hospital. While Natchez Community Hospital has a transfer agreement with Central Mississippi Medical Center, in staff's opinion the cardiologist support does not appear to be as strong as that obtained by Natchez Regional.
- Finally, Natchez Regional Medical Center has a larger community support for the project, receiving over 30 letters of support from physicians and business, educational, and community leaders. Staff contends that support for the Natchez Community Hospital project is significantly less than the support expressed for Natchez Regional Medical Center.

Therefore, the Division of Health Planning and Resource Development recommends approval of the application submitted by Natchez Regional Medical Center for the re-establishment of diagnostic cardiac catheterization and digital subtraction angiography services. The approval of the application by Natchez Regional Medical Center precludes the approval of any other application in the area.