Manchester Memorial Hospital &
Rockville General Hospital

Community Health Needs Assessment

Final Report
2013
Overview

Manchester Memorial Hospital (MMH) and Rockville General Hospital (RGH), as part of the Eastern Connecticut Health Network (ECHN), dedicate millions of dollars and thousands of staff hours to activities that enhance the overall health and wellness of their shared 19-town service area with special focus on the unmet needs of financially disadvantaged and underserved populations.

In 2013, MMH & RGH collaborated to conduct a comprehensive community health needs assessment (CHNA). The goals of the assessment were:

• To identify current and future healthcare needs in the community
• To improve and strengthen programs and services provided to address them
The Community Served
The Community Served


The primary service area, shaded in orange, includes any town where total inpatient and newborn discharges are $\geq$ 20 percent.

The secondary service area, shaded in yellow, includes any town where total inpatient and newborn discharges are $\geq$ five percent and $< 20$ percent.
The Community Served

Demographic Profile:

Population: 341,499 people

Gender: 48.9% male
51.1% female

Age: Median age 39.5 years
33.3% 50 years or older
The Community Served

Race

White, 80%

Other/Multi-Race, 6.1%

Asian 5.3%

Black 8.3%

Native American 0.2%
Community Health Needs Assessment (CHNA)

The Community Served

Ethnicity

- White Not Hispanic/Latino: 90.6%
- Hispanic/Latino: 9.4%
Community Health Needs Assessment (CHNA)

The Community Served

Education: 91.5% High school graduates
            35.6% Bachelor’s degree or higher

Average Household Size: 2.61 people

Employment: 7.4% unemployment rate

Median Household Income: $82,075 per year

Poverty Rate: 7.6%
Demographic Summary:

• The total service area population has increased 4% in two years.

• Gender, Age, and Household Size are all very similar to CT and US ratios.

• Compared to CT and US rates, the service area has a higher White population and a lower Black population percentage.

• The Hispanic/Latino population percentage is lower than CT and US percentages.

• The median household income is well above the state ($67,034) and national ($50,502) annual figures.

• The unemployment rate is below that of the state (8.0%) and matches the nation.

• Higher percentage of high school college graduates than CT (88.6%) and US (85.9%). Percentage who’ve earned a bachelor’s degree or higher matches the state’s percentage and exceeds the nation’s (28.5%).
Community Health Needs Assessment (CHNA)

The Assessment Process
Community Health Needs Assessment (CHNA)

The Process

Oversight
The CHNA initiative was steered by an Oversight Committee that included members of the ECHN organization, many who have established relationships with community groups and agencies. The Committee included:

• Senior Vice President, Planning, Marketing, & Communications
• President, Visiting Nurse & Health Services of Connecticut, Inc.
• Vice President, Patient Care Services
• Assistant Vice President, Patient Care Services
• Executive Director, Woodlake at Tolland
• Administrative Director, Women’s Services
• Administrative Director, Cancer Services
• Regional Director, Eastern Connecticut Medical Professionals Foundation
• Director, Patient Financial Services
• Community Benefit & Education Manager
• Quality Improvement Manager
• Market Analyst
Community Health Needs Assessment (CHNA)

The Process

Secondary Data Profile
Data from publicly available sources, including the US Census Bureau, Center for Disease Control and other community, civic and social service agencies, was collected to create a “secondary data profile,” which provides a statistical snapshot of the service area:

- Demographics
- Disease state profiles
- Mortality statistics
- Infectious diseases
- Maternal health statistics
- Environmental health statistics
Community Health Needs Assessment (CHNA)

The Process

Community Health Survey

A community health survey, modeled after the Center for Disease Control (CDC) Behavior Risk Factor Surveillance System (BRFSS) survey, was developed to gather information from service area residents on how lifestyle and behaviors affect health risks and outcomes.

The survey was promoted and made available to residents in paper form and online.

1,047 responses received from service area residents
80% submitted on paper; 20% online
Community Health Needs Assessment (CHNA)

The Process

Community Stakeholder Survey

In February 2013, community agencies and organizations throughout the service area, representing a variety of medically underserved, low-income and minority populations, were invited to participate in an online survey, which asked:

- What is healthy about your community?
- What is unhealthy about your community?
- What is your perception of MMH/RGH and the programs and services it offers?
- What can MMH/RGH do to improve the health and quality of life in the community?
Community Health Needs Assessment (CHNA)

The Process

Community Stakeholder Survey

Responses received from:

<table>
<thead>
<tr>
<th>Agency/Organization</th>
<th>Population Served</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>WIC Program</strong>, Department of Public Health</td>
<td>Low income and at nutritional risk women, infants and children</td>
</tr>
<tr>
<td><strong>Community Child Guidance Clinic</strong></td>
<td>Children &amp; families with mental health needs</td>
</tr>
<tr>
<td><strong>Vernon Youth Services Bureau</strong>, Town of Vernon</td>
<td>Youth</td>
</tr>
<tr>
<td><strong>Town of Ellington Human Services</strong></td>
<td>Residents of Ellington; programs specifically for youth and elderly</td>
</tr>
<tr>
<td><strong>Town of Manchester Health Department</strong></td>
<td>Residents of Manchester</td>
</tr>
<tr>
<td>Town of Andover, <strong>Elder Services</strong></td>
<td>Seniors residing in Andover</td>
</tr>
<tr>
<td>Maple Street School, Vernon</td>
<td>children</td>
</tr>
<tr>
<td>Bev’s Corner, Vernon</td>
<td>General community</td>
</tr>
<tr>
<td><strong>Vernon Adult Education</strong></td>
<td>Vernon adults</td>
</tr>
<tr>
<td>Indian Valley YMCA</td>
<td>Families, including low-income</td>
</tr>
<tr>
<td><strong>MARC, Inc.</strong></td>
<td>People with developmental disabilities</td>
</tr>
</tbody>
</table>
Key Findings
Circulatory Disease
Key Findings

Circulatory Disease

Heart disease remains the #1 cause of death in the state; Stroke ranks third.

Incidence rates are all similar to national rates:

<table>
<thead>
<tr>
<th>Circulatory Disease Incidence (2012 Estimates)</th>
<th>United States</th>
<th>ECHN Total Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Angina Pectoris (New Only; Age 45+)</td>
<td>5.5</td>
<td>4.5</td>
</tr>
<tr>
<td>Cardiovascular Disease (New Only; Age 45+)</td>
<td>20.6</td>
<td>19.9</td>
</tr>
<tr>
<td>Heart Failure (New Only; Age 65+)</td>
<td>14.0</td>
<td>14.6</td>
</tr>
<tr>
<td>Myocardial Infarction (New Only; Age 35+)</td>
<td>7.1</td>
<td>7.7</td>
</tr>
<tr>
<td>Stroke (New Only; Age 55+)</td>
<td>9.1</td>
<td>8.7</td>
</tr>
</tbody>
</table>

Data Source: American Heart Association
Community Health Needs Assessment (CHNA)

Key Findings

Circulatory Disease

Community Health Survey respondents:

High Blood Pressure (44.2%) & High Cholesterol (43.2%) were the top two health conditions reported.

8.1% report having Angina/Coronary Heart Disease
3.2% report having had a Heart Attack
3.0% Stroke

Within the past year: 94.8% had Blood Pressure checked
81.3% had Cholesterol checked
Cancer
Key Findings

Cancer

Second leading cause of death in the total service area, CT, & US.

<table>
<thead>
<tr>
<th>Cancer Incidence (2012 Estimates)</th>
<th>United States</th>
<th>Connecticut</th>
<th>ECHN Total Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cancer (All Sites)</td>
<td>465.0</td>
<td>508.5</td>
<td>490.6</td>
</tr>
<tr>
<td>Breast (Female)</td>
<td>122.0</td>
<td>137.3</td>
<td>134.7</td>
</tr>
<tr>
<td>Colon &amp; Rectum</td>
<td>46.2</td>
<td>47.2</td>
<td>48.6</td>
</tr>
<tr>
<td>Lung &amp; Bronchus</td>
<td>67.2</td>
<td>68.0</td>
<td>66.0</td>
</tr>
<tr>
<td>Prostate (Male)</td>
<td>151.4</td>
<td>165.2</td>
<td>167.3</td>
</tr>
</tbody>
</table>

Data Source: National Cancer Institute SEER Database
Key Findings

Cancer

Among All Cancer Sites: Incidence rate estimates above US, below CT rates

Breast: Incidence rate above that of the nation but below CT rates

Prostate: Incidence rate above CT and US

Colon & Rectum: Incidence rate above CT and US
23.0% of community survey respondents reported never having had a colonoscopy

Skin: 32.2% of survey respondents reported never having a skin cancer screening.
Diabetes
Key Findings

Diabetes

Total service area prevalence rate (per 100): 9.3

An estimated 60,000 to 93,000 adults have undiagnosed Diabetes.

Higher incidence of Diabetes among Connecticut’s Black and Hispanic populations.
Diabetes Estimates
Prevalence Rates (per 100)

2012 Rate vs 2017 Rate

<table>
<thead>
<tr>
<th>Region</th>
<th>2012 Rate</th>
<th>2017 Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>TSA</td>
<td>9.3</td>
<td>11.0</td>
</tr>
<tr>
<td>CT</td>
<td>9.3</td>
<td>9.3</td>
</tr>
<tr>
<td>US</td>
<td>9.5</td>
<td>9.7</td>
</tr>
</tbody>
</table>
Key Findings

Diabetes

Survey respondents:

15.0% report having been told they have Diabetes

79.9% have had their Blood Sugar checked in the past year
Musculoskeletal Disorders
### Key Findings

#### Musculoskeletal Disorders

Higher incidence in the service area when compared with national prevalence rates.

<table>
<thead>
<tr>
<th>Prevalence Rates per 100 (Age 18+)</th>
<th>United States</th>
<th>ECHN Total Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Arthritis</td>
<td>21.1</td>
<td>22.8</td>
</tr>
<tr>
<td>Chronic Joint Pain</td>
<td>26.4</td>
<td>28.1</td>
</tr>
<tr>
<td>Lower Back Pain (Lumbar)</td>
<td>27.8</td>
<td>28.8</td>
</tr>
<tr>
<td>Lower Back Pain (Below Knee)</td>
<td>9.1</td>
<td>9.6</td>
</tr>
<tr>
<td>Neck Pain (Cervical Back Pain)</td>
<td>14.5</td>
<td>15.0</td>
</tr>
</tbody>
</table>

Data Source: Burdon of Musculoskeletal Diseases in the United States
Neurological Disease
# Key Findings

## Neurological Disease

Higher incidence rates of Alzheimer’s disease and Multiple Sclerosis compared to US

<table>
<thead>
<tr>
<th>Neurological Disease Incidence</th>
<th>United States</th>
<th>ECHN Total Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Parkinson's Disease (New Only; Age 65+)</td>
<td>477.7</td>
<td>462.3</td>
</tr>
<tr>
<td>Alzheimer’s Disease (Age 65+)</td>
<td>12500.0</td>
<td>13271.8</td>
</tr>
<tr>
<td>Multiple Sclerosis</td>
<td>87.0</td>
<td>97.8</td>
</tr>
</tbody>
</table>

Parkinson’s Disease Data Source: Neuroepidemiology/Karger  
Alzheimer’s Disease Data Source: The Alzheimer’s Association  
Multiple Sclerosis Data Source: Neurology (Pub of the American Academy of Neurology)
Prenatal Care
Community Health Needs Assessment (CHNA)

Key Findings

Prenatal Care

The rate of “non-adequate” prenatal care is now similar to the state rate

<table>
<thead>
<tr>
<th></th>
<th>2009</th>
<th>2006</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Connecticut</td>
<td>ECHN Total Service Area</td>
</tr>
<tr>
<td>Intensive</td>
<td>35.9%</td>
<td>34.0%</td>
</tr>
<tr>
<td>Adequate</td>
<td>44.3%</td>
<td>45.7%</td>
</tr>
<tr>
<td>Non-Adequate*</td>
<td>19.8%</td>
<td>19.7%</td>
</tr>
</tbody>
</table>

Data Source: Connecticut Department of Public Health
Community Health Needs Assessment (CHNA)

Lyme Disease
### Key Findings

#### Lyme Disease

<table>
<thead>
<tr>
<th>Lyme Disease (2011)</th>
<th>Connecticut</th>
<th>ECHN Total Service Area</th>
<th>ECHN Primary Service Area</th>
<th>ECHN Secondary Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Cases</td>
<td>3,041</td>
<td>266</td>
<td>130</td>
<td>136</td>
</tr>
<tr>
<td>Rates per 100,000</td>
<td>89.3</td>
<td>77.9</td>
<td>75.3</td>
<td>80.5</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Lyme Disease (2008)</th>
<th></th>
<th>ECHN Total Service Area</th>
<th>ECHN Central Service Area</th>
<th>ECHN North Service Area</th>
<th>ECHN South Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>2008 total cases</td>
<td>3,896</td>
<td>432</td>
<td>134</td>
<td>92</td>
<td>206</td>
</tr>
<tr>
<td>2008 rates per 100,000</td>
<td>114.0</td>
<td>143.2</td>
<td>69.6</td>
<td>290.7</td>
<td>258.5</td>
</tr>
</tbody>
</table>

Data Source: CT DPH

Rates in the service area have decreased significantly compared to data collected three years earlier.
Community Health Needs Assessment (CHNA)

Childhood Lead
Key Findings

Childhood Lead

Fewer children in the service area are being screened for lead compared to state percentages.

Percentage of children with elevated level levels in the service area remain lower than the state rate.

<table>
<thead>
<tr>
<th>2009</th>
<th>Connecticut</th>
<th>ECHN Total Service Area</th>
<th>ECHN Primary Service Area</th>
<th>ECHN Secondary Service Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percentage of Children Screened</td>
<td>31.6%</td>
<td>27.7%</td>
<td>26.0%</td>
<td>29.6%</td>
</tr>
<tr>
<td>Percentage of Children with ug/dL greater than or equal to 10</td>
<td>0.9%</td>
<td>0.4%</td>
<td>0.5%</td>
<td>0.3%</td>
</tr>
</tbody>
</table>

Data Source: CT DPH
Mental Health
Key Findings

Mental Health

Among Community Stakeholder Survey respondents:

• 60% feel Substance Abuse is a serious problem
• 50% feel Mental Health is a serious problem
Summary of Key Findings
Community Health Needs Assessment (CHNA)

Summary of Key Findings

**Circulatory Disease:** Heart disease remains the #1 cause of death in the state and Stroke ranks third. The incidence rate of Angina Pectoris, Cardiovascular Disease, Heart Failure, Myocardial Infarction and Stroke are all similar to national rates.

**Cancer:** Cancer continues to be the second leading cause of death in the service area, Connecticut, and the United States. Incidence rate estimates for Cancer (All Sites) and Breast for the service area are above that of the nation but below Connecticut rates. Prostate and Colon & Rectum cancer rates for the service area are above both the state and the nation.

**Diabetes:** Estimated diabetes prevalence rates for 2017 show an alarming increase in the service area, while state and national estimates remain at or near 2012 rates. Connecticut’s Black and Hispanic populations suffer disproportionately from diabetes.
Summary of Key Findings:

**Musculoskeletal Disorders:** There is a higher incidence of arthritis, chronic lower back pain, lower back pain, and neck pain in the service area when compared with national prevalence rates among individuals over the age of 18 years of age.

**Neurological Disease:** There is a higher incidence of Alzheimer’s disease among service area residents over the age of 65 compared to national incident rate estimates. The incidence rate of Multiple Sclerosis is higher in the service area when compared to national figures.

**Prenatal Care:** The rate of “non-adequate” prenatal care is now similar to the state rate, whereas the 2010 CHNA found it to be higher than state proportions.
Summary of Key Findings

**Lyme Disease:** Lyme disease rates in the service area and state have decreased significantly compared to data collected three years earlier. The 2010 CHNA found incidence rates of Lyme disease, particularly in the secondary service area, to be significantly higher than that of the state. Total, primary and secondary service area rates are all now below state rate.

**Childhood Lead:** Fewer children in the service area are being screened for lead compared to state percentages but the percentage of children with elevated level levels in the service area remain lower than the state rate.

**Mental Health:** Community stakeholders reported overall mental illness to be a serious problem in the service area, including drug and alcohol abuse.
Identified Community Health Needs

After reviewing the CHNA data, the Oversight Committee identified the following areas of need:

• Heart Disease Incidence
• Cancer Incidence
• Diabetes Incidence
• Arthritis Incidence
• Alzheimer’s Disease Incidence
• Multiple Sclerosis Incidence
• Substance Abuse
• Childhood Lead Screening
Priority Health Needs

The Oversight Committee prioritized the CHNA’s identified health needs based primarily on the size and severity of a particular need, and also took into account the hospital’s ability to impact the need, and the availability of resources that exist to address it. Based on these criteria, the following health needs were given the highest priority:

• Heart Disease Incidence

• Cancer Incidence

• Diabetes Incidence

• Arthritis Incidence
Implementation Plan

Strategies to Address the Health Needs
Community Health Needs Assessment (CHNA)

Strategies to Address

Heart Disease

Educate the public about managing lifestyle behaviors that impact diet, blood pressure, cholesterol, weight, physical activity, and stress.

- Offer free community health educational programs
- Provide education in *Better Being*, community free wellness magazine
- Participate in community health fairs
- Develop “Freedom from Smoking” smoking cessation program
- Provide nutrition counseling services
- Offer integrative medicine programs for stress reduction
Community Health Needs Assessment (CHNA)

Strategies to Address

Heart Disease

Provide information and services to individuals diagnosed with heart disease to help them best manage their symptoms

- Develop “Heart Talk” community program for people living with heart failure
- Promote Cardiac Rehabilitation services
Community Health Needs Assessment (CHNA)

Strategies to Address

Cancer

Monitor reports of newly-diagnosed cancer cases in the service area using the National Cancer Center Data Base (NCDB) to identify significant changes, trends or abnormal activity.

Educate the public about managing lifestyle behaviors that impact cancer risks

- Free community health educational programs
- Articles in Better Being
- Health fair participation
- “Freedom from Smoking” smoking cessation program
Community Health Needs Assessment (CHNA)

Strategies to Address

Cancer

Provide free screenings through the community and access to follow-up care

Offer comprehensive support programs for cancer survivors and caregivers

• Oncology Nurse Navigator and Survivorship Navigators services
• Annual Cancer Survivors Day event
• Regular support group meetings
• Cancer Caregiver Workshops
Community Health Needs Assessment (CHNA)

Strategies to Address

Diabetes

Raise awareness of diabetes preventable risk factors and educate the public on ways to manage lifestyle behaviors that affect them including diet, weight and physical activity

• Free community health educational programs
• Articles in Better Being
• Health fair participation

Community Health Needs Assessment (CHNA)

Strategies to Address

Arthritis

Educate the public about ways to help prevent or slow the progression of arthritis and manage the symptoms of joint pain.

- Free community health educational programs
- Articles in Better Being
- Health fair participation
Community Health Needs Assessment (CHNA)

Strategies to Address

Arthritis

Offer free program to help individuals with arthritis prepare for hip or knee replacement surgery and achieve the best outcome.

Develop a comprehensive surgical spine program to support individuals experiencing chronic neck and back pain including symptom management and perioperative care.
Community Collaboration

An important component of these strategies will be collaboration with community resources including those currently available to respond to the health needs including:

- Cornerstone Foundation
- Eastern Highlands Health District
- Hockanum Valley Community Council, Inc.
- Johnson Health Network
- Manchester Area Conferences of Churches
- MARC, Inc. of Manchester
- Natchaug Hospital
- North Central Health Department
- Town Departments of Health & Human Services
- Town Departments of Social Services
- Tri-Town Shelter Services
- United Way
- Vernon Community Network
- Visiting Nurse and Health Services of CT
Measuring the Impact
Measuring the Impact

Measureable impact of the above strategies will take time to materialize, however ongoing analysis of hospital utilization data for specific diagnoses, enrollment in hospital-sponsored education or disease management programs, feedback from community partners and reassessing community health needs in three years will assist in the evaluation of strategy effectiveness.
Approval
Approval

The Community Health Needs Assessment and the strategies to address the priority needs identified (Implementation Plan) were reviewed and approved by the ECHN Strategic Planning Committee on August 21, 2013.

The ECHN Board of Trustees reviewed and approved the CHNA and Implementation Plan on September 25, 2013.