Mercy Medical Center Baltimore, Maryland Community Health Needs Assessment

Congress recently added several new requirements for hospital organizations to maintain federal income tax exemption under Section 501(r) of the Internal Revenue Code (the "Code") as part of the Affordable Care Act. One of the requirements set forth in Section 501(r) of the Code is for each hospital organization to conduct a Community Health Needs Assessment (CHNA) at least once every three tax years with respect to each hospital facility operated by such hospital organization. The requirement to conduct a CHNA applies to Mercy Medical Center, Inc., which is a hospital organization that operates one hospital facility (Mercy Medical Center).

In order to conduct a CHNA that meets the requirements of Section 501(r) of the Code, he CHNA for Mercy Medical Center must be completed and a CHNA written report published on Mercy Medical Center, Inc.'s s website by June 30, 2013 (the end of Mercy Medical Center, Inc.'s 2012 tax year). In addition, Mercy Medical Center, Inc. must adopt an Implementation Strategy to address certain of the community health needs identified in the CHNA by June 30, 2013. It is the intention of Mercy Medical Center, Inc. to publish the CHNA written report and for Mercy Medical Center Inc.'s Board of Directors or an appropriately delegated committee to approve the CHNA written report and Implementation Strategy during its 2012 tax year.

INTRODUCTION

Established in 1874 by the Sisters of Mercy, Mercy Health Services is the parent organization of a nonprofit health care system that includes Mercy Medical Center, Inc., a hospital organization that operates an acute care hospital (Mercy Medical Center); Stella Maris, Inc., a long-term care facility and hospice in Timonium; and a regional network of community-based primary care physician practices. Mercy Medical Center ("Mercy") has had a continuing presence in downtown Baltimore since its founding. Mercy's mission statement, "like the Sisters of Mercy before us, we witness God's healing love for all people by providing excellent clinical and residential services within a community of compassionate care," underscores our healing ministry. Mercy seeks to help those in need through investments in technology, staff, and programs; by maintaining exceptional quality, service, and patient experience; expanding and strengthening regional specialty centers; sustaining our commitment to the poor and underserved; and broadening services for the elderly.

In support of this mission, in fiscal year 2012, Mercy provided more than \$39 million in uncompensated and charitable care. Mercy is accredited by the Joint Commission on the Accreditation of Health Care Organizations. Mercy ranks in the top tier of hospitals in the Maryland Hospital Performance Report and was awarded a three-year accreditation by the Commission on Cancer, with commendation, as a Teaching Hospital Cancer Program. We recently opened a new, 18-story hospital in December 2010. Mercy was designated a MAGNET institution by the American Nurses Credentialing Center, which ranks Mercy among the top six percent of the hospitals in the nation. Mercy was named one of the Top 100 Hospitals in the nation by Thomson Reuters, the only Maryland hospital to earn this distinction in 2012. Mercy was also recognized in 2012 by *U.S. News & World Report* as the 3rd best hospital in Maryland, behind only the academic medical centers at Johns Hopkins and the University of Maryland. This ranking means Mercy is

the top-ranked community hospital in the state and confirms Mercy's reputation of providing university-level, quality care in a community hospital setting."

DEFINING THE COMMUNITY SERVED BY MERCY

In prior years, Mercy's community benefit outreach was focused on a large geographic area within Baltimore City. Mercy's primary service area historically covered 17 zip codes in which 60% of all inpatient admissions originated. 15 of these 17 zip codes were previously selected as Mercy's Community Benefit Service Area ("CBSA") based on the prevalence and concentration of emergency room visits. While appropriate and well intentioned, the use of zip codes as the basis for Mercy's CBSA has proved cumbersome for the following reasons:

- Zip codes are by nature large. Mercy's previous CBSA covered almost 70 square miles within the City—the total land area in Baltimore is 81 square miles. Other peer hospitals have designated a much smaller CBSA footprint that tends to focus on the immediate neighborhood(s) in which they reside.
- A concentration of emergency room visits (or any other variable) may only exist in a small portion of a zip code. Yet the entire zip code was being added into our CBSA.
- Accessible, timely, and high quality community health profiles have already been created by the Baltimore City Health Department. But these community health profiles are organized by much smaller Community Statistical Areas (CSAs), not zip codes.
- Finally, zip codes are faceless, impersonal designations that do not carry the same connection and impact as a specifically named community. Mercy's Community Benefits Committee believes that we should focus attention on our neighbors in "Midtown" or "Mt. Vernon", and not "21202".

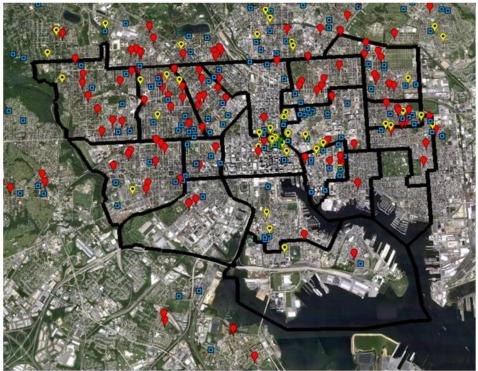
During a series of meetings, Mercy's Community Benefits Committee discussed the socioeconomic and health parameters that should help define Mercy's "community" for purposes of this CHNA. The Sisters of Mercy were originally founded in Dublin, Ireland to care for homeless, abused and neglected women and children. This timeless legacy influenced the Committee to focus attention on certain target populations, such as infants, women, and the impoverished. With a strong desire to be data-driven and mission focused, the Committee identified three relevant factors to help shape the community in which Mercy will focus its limited financial resources as part of the CHNA process:

- Low birth weight babies born at Mercy
- Repeat emergency room visitors (10+ visits in one year)
- Charity care recipients

These data points were compiled and plotted by CSA to identify any concentrations or obvious areas in need of intervention. While these target populations are found throughout Baltimore City and into the surrounding Counties, the map below highlights the disproportionate share of low birth weight babies, repeat emergency department visitors, and charity care recipients in the downtown core. As a result of these findings, Mercy has determined that its community served for purposes of this CHNA includes the

18 CSAs that represent downtown and the communities east, west, and south of the city center. The Committee believes that this definition of Mercy's community, which represents a smaller geographic area than the CBSA previously utilized by Mercy, will foster greater coordination, better strategic partnerships and improved measurement of outcomes, in particular with respect to the targeted populations described above.

First Step – Defining Our Service Area



Clifton-Berea Downtown / Seton Hill Fells Point **Greater Rosemont** Greenmount East Harbor East / Little Italy Inner Harbor / Fed Hill Madison / East End Midtown Oldtown / Middle East Patterson Park North & East Poppleton /Terraces/Hollins Market Sandtown-Winchester/Harlem Park South Baltimore Southwest Baltimore Washington Village Upton / Druid Heights

Canton

- Red Pins Low Birth Weight Babies by Address
- Blue Pins Repeat ED Visitors by Address (10+ visits in one year)
- Yellow Pins Charity Care Recipients by Address

DATA GATHERING PROCESS

Quantitative and qualitative data was gathered by Mercy in order to undertake the CHNA. The process for gathering this data is described below.

<u>Quantative Data – Process and Analytical Methods</u>

To obtain the quantitative data required to complete the assessment, Mercy's Community Benefit Committee used the high quality and comprehensive Neighborhood Health Profiles completed by the Baltimore City Health Department in 2008 and 2011 (and updated in March 2012). The Neighborhood Health Profiles present demographic, social and health outcome information at the CSA level in Baltimore

City to support community-level health improvement efforts to achieve the Healthy Baltimore 2015 plan, the City's comprehensive public health agenda to improve health outcomes in Baltimore. The City plans to conduct these comprehensive Neighborhood Health Profiles every two to three years. By partnering with the Baltimore City Health Department, Mercy avoided the unnecessary expense of conducting a redundant community survey andreceived an extremely high quality, current, and narrowly tailored dataset. Mercy was able to leverage this existing data source to help create a single community health profile that spans across the 18 CSAs in the hospital's community. Thus, Mercy can state specifically the demographic and health status of residents living in our specific community and not rely on extrapolations from aggregate citywide data. As we develop long term implementation strategies, this ability to measure trends in specific communities should prove to be very useful. Beyond providing a solid foundation for data analysis and ongoing programmatic accountability, this strategic partnership with the City Health Department ensures that the community health priorities of Mercy Medical Center remain aligned with the health priorities of the City and the City Health Commissioner.

In order to put together the Neighborhood Health Profiles, the Baltimore City's Office of Epidemiology Services compiled an enormous amount of data from a variety of public and private sources such as the following:

- U.S. Census
- American Community Survey
- The Baltimore Neighborhoods Indicators Alliance—Jacob France Institute
- Baltimore City Public Schools System
- The Mayor's Office of Information Technology
- Baltimore City Housing Department
- Baltimore City Comptroller's Office
- Baltimore City Planning Department
- Baltimore City Real Property Management Database
- Baltimore City Liquor Board
- Baltimore City Health Department
- The Center for a Liveable Future
- Vital Statistics Administration at the Maryland Department of Health and Mental Hygiene
- Maryland Department of the Environment
- The National Center for Health Statistics

The Baltimore City's Office of Epidemiology utilized rigorous research methods and survey analysis techniques to aggregate all the data to the CSAs. At the end of this document, Appendix A contains a direct excerpt from the citywide Neighborhood Health Profiles that provides a detailed explanation of the sources of data as well as detailed definitions of the various metrics and methodoligies (life table calculators, etc.) used to develop the Neighborhood Health Profiles. Mercy's unique Community Health Profile, covering the 18 CSAs composing Mercy's community, is provided in its entirety in Appendix B.

Information Gaps

Mercy's Community Benefits Committee is extremely pleased with our partnership with the Baltimore City Health Department. As stated earlier, the data provided by the Baltimore City Health Department is current, highly detailed, and well-designed. The inclusion of metrics related to the social determinants of health and the physical environment provides Mercy with a well rounded view of the quality of life for residents in our community. However, no survey or profile exercise can capture every important data point or performance measure. A few gaps exist in our current quantitative data set that Mercy must attempt to remedy via outside (and currently unknown) sources. In future assessments, the Community Benefits Committee will attempt to find additional data from existing sources in the following areas:

- Access to Insurance—Mercy has general estimates on the number of uninsured residents in the City, but we do not yet know how to <u>proactively</u> identify uninsured or underinsured residents within our community.
- Aging Data—as our community ages and baby boomers begin to more fully utilize the City's health care system, we will need to obtain more data related to our elderly residents' health and lifestyle.
- Survey vs Profile—Mercy's health profile data has some limitations simply because it was not developed through polling or survey sampling of individual citizen's behavior. In other words, we do not have the ability to extrapolate the behaviors or opinions of a subset of residents in our community based on a phone survey or a focus group. We know the top three contributors to years of potential life lost in each of our 18 CSAs. But we need more information on personal habits and lifestyle in order to best utilize the knowledge we have gained from the health profile.

FINDINGS FROM ANALYSIS OF QUANTITATIVE DATA—MERCY'S COMMUNITY HEALTH PROFILE

<u>Demographic Characteristics—Race, Age & Gender</u>

The first chart below details the demographic makeup of Mercy's community. 187,714, or 30%, of the City's 620,961 residents live within Mercy's defined community. Of note, the total population of the City in the health profile does not include incarcerated residents. Mercy's community ranges from the Gwynns Falls to the west, Edison Highway to the east, North Avenue to the north and the South Baltimore peninsula to the south. The area of focus comprises an incredibly diverse cross section of the City. However, on the whole, the diversity of this geographic area represents an aggregate diversity; there are distinctive concentrations of racial and ethnic groups as well as wealth and poverty within the eighteen community statistical areas. Almost 67% of the residents within Mercy's community are minorities. In 13 of the 18 CSAs, racial and ethnic minorities make up the majority of residents. In 8 of the 18 CSAs, the Black resident population exceeds 83%. White residents make up more than 75% of the population in Canton, Fells Point, Inner Harbor/Federal Hill, and South Baltimore. Hispanic/Latino residents comprise 4.4% of the population in our target area, which is slightly higher than the citywide percentage. The highest concentration of Hispanic/Latino residents in our community is located in Patterson Park North

& East (21.1%) and Fells Point (15.1%). Though only 3.1% of our community's population is Asian, the percentage of Asian residents in our target area is higher than the citywide percentage. In particular, the Asian population in Downtown/Seton Hill (16%), Fells Point (7.6%), and Washington Village/Pigtown (5.3%) are all more than double the 2.2% citywide Asian representation.

2011 Neighborhood Health Profile Summary

Mercy Health Services Proposed Community Benefit Service Area

			/				
							Hispanic
CSA	Population	Black	White	Asian	Other	Two or More	Latino
Canton	8,100	4.1	88.9	3.4	1.9	1.7	5.0
Clifton-Berea	9,874	96.9	1.2	0.3	0.5	1.2	1.0
Downtown/Seton Hill	6,446	37.5	41.8	16.0	1.5	3.1	4.5
FellsPoint	9,039	8.0	76.7	4.6	7.3	3.3	15.1
Greater Rosemont	19,258	97.1	0.7	0.2	0.5	1.5	1.0
Green mount East	9,262	94.3	3.6	0.3	0.7	1.1	1.2
nner Harbor/Federal Hill	12,855	11.7	81.5	3.9	1.2	1.8	3.2
Jonestown/Oldtown*	10,841	75.7	17.7	2.7	2.1	1.8	4.3
Madison/EastEnd	7,781	91.1	4.0	0.9	2.2	1.7	4.0
Midtown	15,685	34.3	53.4	7.6	1.4	3.3	3.8
Patterson Park North & East	14,549	38.7	44.1	2.0	11.8	3.4	21.1
Perkins/Middle East*	4,587	87.1	7.5	3.6	0.6	1.3	1.5
Poppleton/The Terraces/Hollins Market	5,086	83.5	13.2	1.0	0.9	1.4	1.7
Sandtown-Winchester/Harlem Park	14,801	96.9	1.2	0.3	0.3	1.2	0.7
South Baltimore	6,406	2.7	92.1	2.7	0.8	1.7	2.6
South west Baltimore	17,886	76.2	17.6	1.2	2.6	2.4	3.6
Upton/Druid Heights	9,755	94.3	3.1	0.5	0.6	1.5	1.4
Washington VIIIage/Pigtown	5,503	49.7	40.7	5.3	1.6	2.7	3.4
Mercy Health Services Area Estimate	187,714	60.0	32.7	3.1	2.1	2.0	4.4
Baltimore City	620,961	63.6	29.7	2.4	2.2	2.1	4.2

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52% of residents within Mercy's community are female and 48% are male. Mercy's community has slightly more male residents and slightly fewer female residents when compared to Baltimore City as a whole. With respect to the age of the population within Mercy's community, residents in our community tend to be younger than the City as a whole. As portrayed in the chart below, 34.7% of residents in our focus area are between the ages of 25 and 44. Only 28.8% of residents in the entire City are between 25 and 44. The age data for the community is skewed upward by the high concentrations of young adults in some of the more affluent neighborhoods near the Inner Harbor. In Canton, Downtown/Seton Hill, Fells Point, South Baltimore, and the Inner Harbor/Federal Hill, the percentage of the population between the ages of 25 and 44 exceeded 47%. Mercy's community also has fewer senior citizens when compared to the City as a whole. Only 9.8% of the community's residents are 65 and up as compared to 11.8% of the citywide population.

1. Demographics (continued)

		Percentage of Population by Age (years)					Percentage of Population by Gender	
CSA	Under 18	18-24	25-44	45-64	65 and up	Male	F emale	
Canton	7.1	10.5	53.0	18.5	10.9	49.5	50.5	
Clifton-Berea	25.5	10.5	22.5	26.1	15.5	45.3	54.7	
Downtown/Seton Hill	8.0	20.6	50.7	16.9	3.8	49.1	50.9	
Fells Point	9.7	11.3	51.7	19.5	7.7	51.0	49.0	
Greater Rosemont	26.1	11.0	22.3	27.6	12.9	45.6	54.4	
Greenmount East	23.0	11.2	24.1	30.7	11.1	50.6	49.4	
nner Harbor/Federal Hill	9.5	13.3	47.2	19.4	10.6	50.8	49.2	
Jonestown/Oldtown*	24.0	11.2	32.5	23.5	8.8	48.1	51.9	
Madison/East End	32.8	13.1	24.9	22.6	6.6	46.1	53.9	
Midtown	6.4	22.2	39.0	19.6	12.7	48.5	51.5	
Patterson Park North & East	22.2	11.6	41.2	18.7	6.2	50.1	49.9	
Perkins/Middle East*	26.2	12.0	25.8	23.2	12.8	42.8	57.2	
Poppleton/The Terraces/Hollins Market	25.5	10.5	28.7	25.9	9.3	47.2	52.8	
Sandtown-Winchester/Harlem Park	25.8	11.5	23.9	26.9	11.8	45.7	54.3	
South Baltimore	10.6	10.4	51.3	19.6	8.1	50.9	49.1	
Southwest Baltimore	27.1	11.0	25.3	26.6	10.0	48.6	51.4	
Upton/Druid Heights	30.0	12.0	23.7	24.4	10.0	44.7	55.3	
Washington Village/Pigtown	21.0	11.3	37.6	22.0	8.1	49.8	50.2	
Mercy Health Services Area Estimate	20.0	12.5	34.7	22.9	9.8	48.0	52.0	
Baltimore City	21.6	12.5	28.8	25.2	11.8	46.7	53.3	

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Socioeconomic Characteristics

In general, Mercy's community is poorer than the City as a whole. 40.6% of households in Mercy's community earn less than \$25,000 compared to 33.3% for the City. Adult unemployment ranges from highs of 21% in Sandtown-Winchester/Harlem Park and 20% in Clifton-Berea to a low of 2.5% in the Inner Harbor/Federal Hill community. This alarmingly high range in unemployment rates highlights the severity of the socioeconomic disparities found within Mercy's community. 11 of the 18 CSAs in Mercy's service area have unemployment rates that exceed the City's already high unemployment rate of 11%. Poverty levels within Mercy's community are also disturbingly high. 21.4% of families in Mercy's community have incomes below the federal poverty level. Again, the range within our community is striking—48.8% of families in Upton/Druid Heights earn below the poverty level; only 1.6% of families in Canton earn below the poverty level. According to the Annie E. Casey Foundation's 2012 Kids Count Report, 84% of City school children receive free and reduced price meals, which is double the statewide average of 42%. These socioeconomic characteristics strike at the heart of the real world challenges confronting any government or hospital-led efforts to improve health outcomes in Mercy's community. If 1 in 8 adults are unemployed and more than 1 in 5 families are living below the poverty level, then

personal health choices and accessing health systems take a back seat to more basic day to day needs. Any effort to affect change in the community must be grounded in this fundamental reality.

Education

The education data in Mercy's Neighborhood Health Profile reveals that children in our community are less prepared for kindergarten, score lower on key reading assessments, and are more chronically absent from school. Increased public funding for pre-K programs in the City is currently helping to address school readiness issues in Baltimore. However, the drop off in advanced or proficient reading levels between the 3rd and 8th grade is alarming (a 41% reduction in this key performance indicator occurred in the Poppleton CSA).

2011 Neighborhood Health Profile Summary Mercy Health Services Proposed Community Benefit Service Area

3. Education

	% of Kindergarten Students "Fully Ready"	proficient of advanced		% of students	missing 20 or m school	nore days of
CSA	to Learn	3rd Grade	8th Grade	Elementary	Middle	High
Canton	47.8	79.2	75.7	9.9	14.7	33.3
Clifton-Berea	71.0	65.0	42.8	12.7	18.6	45.4
Downtown/Seton Hill	65.5	72.5	48.1	5.6	22.2	41.9
Fells Point	74.3	78.2	52.3	6.3	19.4	31.9
Greater Rosemont	56.0	74.2	51.0	9.9	19.3	47.0
Greenmount East	43.3	72.4	44.4	14.2	21.3	45.3
nner Harbor/Federal Hill	55.0	81.8	67.2	8.2	14.9	41.2
Jonestown/Oldtown*	57.9	72.8	52.6	13.1	21.1	50.9
Madison/East End	64.2	70.9	41.0	14.2	26.5	52.6
Midtown	59.6	75.1	56.3	13.3	13.9	46.9
Patterson Park North & East	60.1	62.1	43.6	13.4	23.7	46.3
Perkins/Middle East*	44.7	73.8	45.7	17.1	27.0	47.2
Poppleton/The Terraces/Hollins Market	76.6	84.1	43.4	11.3	26.7	49.6
Bandtown-Winchester/Harlem Park	60.1	65.6	51.6	7.3	21.5	45.8
South Baltimore	70.4	85.9	70.2	9.8	18.8	25.0
Southwest Baltimore	61.2	73.2	45.9	11.8	27.6	48.0
Upton/Druid Heights	55.1	58.8	40.6	10.9	33.5	49.0
Washington Village/Pigtown	69.3	70.9	53.0	6.5	23.8	41.3
Mercy Health Services Area Estimate	60.7	73.1	51.4	10.9	21.9	43.8
Baltimore City	65.0	77.6	58.6	10.1	16.3	39.2

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Physical, Built, and Social Environment

Though often overlooked in health surveys, the Baltimore City Health Department's health profile project compiled data on the built and social environment affecting residents in the City. These policy experts

sought to identify and track environmental factors that directly contribute to the health and well-being of our community's residents. Scholarly research like the CDC's Adverse Childhood Experiences (ACE) study highlights the link between childhood trauma and later-life health. The CDC's ACE study found a strong correlation between adverse childhood experiences and poor health outcomes. The ACE Study suggests that children exposed to the "toxic stress" of violence, homelessness, abuse, and neglect are at a greater risk for illness and premature death as well as a lower quality of life. Children are also greatly impacted by family dysfunction when their parents are separated, mentally ill or incarcerated. The chart below reveals that residents in Mercy's community are disproportionately exposed to alcohol and liquor stores, juvenile arrests, domestic violence and gun violence. In addition to these adverse social conditions, the built environment presents similar challenges within our community. Data from our health profile reveals that our community has more than twice the rate of vacant homes and lead paint violations as the rest of the City. Furthermore, an oversupply and over-reliance on carry out restaurants and corner stores for food supply also highlights the existence of food deserts within our community.

2011 Neighborhood Health Profile Summary Mercy Health Services Proposed Community Benefit Service Area

4. Community Built and Social Environment

CSA	Alcohol Store Density per 10,000 Residents	Tobacco Store Density per 10,000 Residents	Juvenile Arrests per 1,000 10-17 Year Olds	Domestic Violence Incidents Reported per 1,000 Res.	Non-Fatal Shootings per 10,000 Residents
Canton	4.9	23.5	179.3	18.7	2.5
Clifton-Berea	8.1	49.6	326.5	58.2	126.6
Downtown/Seton Hill	20.2	130.3	906.7	45.5	69.8
Fells Point	6.6	50.9	129.4	21.7	13.3
Greater Rosemont	7.8	36.9	182.1	56.8	95.0
Greenmount East	9.7	49.7	280.3	53.2	115.5
Inner Harbor/Federal Hill	4.7	38.1	264.7	14.5	6.2
Jonestown/Oldtown*	5.5	25.8	187.5	46.6	76.6
Madison/East End	5.1	50.1	280.2	66.2	169.6
Midtown	8.3	28.7	249.1	19.1	22.3
Patterson Park North & East	2.7	32.3	205.4	42.6	49.5
Perkins/Middle East*	6.5	50.1	337.1	59.7	117.7
Poppleton/The Terraces/Hollins Market	9.8	43.3	155.6	57.1	72.7
Sandtown-Winchester/Harlem Park	8.1	56.1	252.3	68.1	91.2
South Baltimore	3.1	18.7	102.1	15.9	1.6
Southwest Baltimore	11.2	51.4	250.0	66.3	117.4
Upton/Druid Heights	6.2	39.0	340.0	55.0	108.7
Washington Village/Pigtown	7.3	50.9	204.5	46.1	50.9
Mercy Health Services Area Estimate	7.6	45.9	268.5	45.1	72.6
Baltimore City	4.6	21.8	145.09	40.6	46.5

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Community Health Indicators

• Premature Mortality and Years of Potential Life Lost (YPLL)

In the citywide health profile, the City Health Department used life expectancy estimates that reflected the mortality rates in the City from 2005 thru 2009. The estimated citywide life expectancy at birth in Baltimore was 71.8 years. Life expectancy is a significant indicator of overall health. The City Health Department used the life expectancy and mortality rates to calculate the years of potential life lost (YPLL) throughout our community. YPLL measure the impact of premature mortality on a specific population. The City Health Department defined premature mortality as death before age 75. The Health Department then calculated the YPLL by adding together the years of life that were not lived because people died before the age of 75. Thus, infant deaths and juvenile deaths can heavily impact a community's life expectancy data and YPLL.

The chart below reveals that more people die prematurely from all causes in Mercy's community than in the City as a whole. The Health Department calculated that 36.2% of all deaths in the City are avertable. Avertable deaths are defined as being deaths that could have been avoided if all Baltimore communities had the same opportunities for health. Specifically, the Health Department created a baseline by calculating the death rate in the five communities with the highest income in the City. The assumption is that the death rate in the five highest-income neighborhoods can be achieved by every other community. In the chart below, a positive percentage in the column labeled "% of deaths potentially avertable" reflects the percentage of deaths that could have been avoided if a particular CSA had the same death rate as the baseline rate from the five highest-income communities. While the overall death rates in our community is higher than the city average, the data for the Downtown/Seton Hill community, Madison/East End, Poppleton, and Upton/Druid Heights merits further examination. On the most basic level, the data suggests that we have a significant problem in these areas with residents dying far earlier than residents in higher income neighborhoods. One potential factor in the Downtown/Seton Hill data point (approx 70% avertable death) could be the disproportionate concentration of homeless persons in the downtown area. During a CHNA interview of Kevin Lindamood, the President and CEO of Healthcare for the Homeless, the Mercy Community Benefit Committee learned that the average life expectancy for an individual experiencing homelessness at any point is only 47 years

7. Health Outcomes

CSA	Age-adjusted Deaths per 10,000 Residents, All Causes	Total Annual YPLL, per 10,000 Residents	% of Deaths Potentially Avertable
Canton	86.7	506.7	15.9
Clifton-Berea	141.9	2,423.5	45.8
Downtown/Seton Hill	238.2	1,511.9	69.9
Fells Point	110.6	806.9	35.0
Greater Rosemont	140.0	1,902.1	46.7
Greenmount East	144.9	2,241.6	54.1
Inner Harbor/Federal Hill	83.5	624.7	15.6
Jonestown/Oldtown*	113.2	1,431.0	42.9
Madison/East End	157.9	2, 264.0	64.0
Midtown	90.6	875.0	18.2
Patterson Park North & East	133.9	1,312.8	50.4
Perkins/Middle East*	128.9	1,852.6	48.5
Poppleton/The Terraces/Hollins Market	171.7	2,366.5	64.0
Sandtown-Winchester/Harlem Park	144.5	2,323.1	50.8
South Baltimore	122.3	782.4	40.6
Southwest Baltimore	157.8	2, 250.4	57.3
Upton/Druid Heights	175.8	2,494.5	63.2
Washington Village/Pigtown	145.9	1,482.8	55.3
Mercy Health Services Area Estimate	128.0	1,636.3	46.6
Baltimore City	110.8	1,377.4	36.2

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Top Causes of Premature Death

A significant output of Mercy's community health profile is the identification of the top causes of premature death within our specific community. **The top four causes of premature death in our 18 priority communities are heart disease, cancer, homicides, and HIV/AIDS.** These four categories contribute greatly to the years of potential life lost in each neighborhood. These four causes also match up with the highest percentages of potential life lost in the City as a whole (see chart below). Of note, these four conditions are not necessarily the top causes of death in our community. For example, there are 5.2 strokes deaths per 10,000 residents in the City and 3.5 homicide deaths per 10,000 residents in the City. However, when calculating the years of potential life lost, the younger age of homicide victims prioritizes the impact of their premature death in our health profile.

7. Health Outcomes (continued)

437		% of Yearsof Pot	tential Life Lost by	Cause of Deati	ns
CSA	Heart Disease	Cancer (AII)	Lung Cancer	Stroke	HIV/AIDS
Canton	18.2	20.6	3.8	3.9	+
Clifton-Berea	15.1	14.7	3.4	3.1	7.8
Downtown/Seton Hill	14.8	17.4	4.0	0.0	15.3
Fells Point	12.1	15.4	3.6	3.8	+
Greater Rosemont	15.2	13.6	3.5	2.1	8.6
Greenmount East	14.3	14.7	4.7	3.1	10.7
Inner Harbor/Federal Hill	19.8	15.4	2.7	2.7	5.6
Jonestown/Oldtown*	14.0	12.4	2.8	2.8	10.4
Madison/East End	13.0	10.2	3,5	1.9	6.9
Midtown	20.0	14.0	3.9	1.9	15.7
Patterson Park North & East	12.5	16.2	4.2	2.2	7.5
Perkins/Middle East*	15.0	12.0	3.0	2.4	11.4
Poppleton/The Terraces/Hollins Market	9.9	9.6	4.1	3.4	12.5
Sandtown-Winchester/Harlem Park	14.1	13.4	3.2	2.1	7.3
South Baltimore	15.5	18.0	6.7	1.1	*
Southwest Baltimore	17.0	13.3	4.2	2.1	7.5
Upton/Druid Heights	16.8	10.6	2.8	1.7	12.8
Washington Village/Pigtown	15.8	14.8	8.2	3.9	6.3
Mercy Health Services Area Estimate	15.1	14.3	4.0	2.5	8.6
Baltimore City	15.4	14.7	4.2	2.6	7.6

⁺ Rate not calculated - fewer than five deaths

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7. Health Outcomes (continued)

. de		% of Years of Pot	ential Life Lost b	y Cause of Death	s
CSA	Chronic Lower Respiratory Disease	Homicide	Diabetes	Septicemia	Drug-Induced Deaths
Canton	2.3	+	2.9	3.0	+
Clifton-Berea	0.9	16.3	1.1	2.5	7.7
Downtown/Seton Hill	0.8	7.7	3.7	2.3	6.7
Fells Point	1.4	8.3	1.6	1.1	15.9
Greater Rosemont	1.5	17.6	1.0	2.3	7.8
Greenmount East	1.9	12.6	2.8	3.2	8.6
Inner Harbor/Federal Hill	2.1	+	3.6	4.2	10.1
Jonestown/Oldtown*	3.0	12.9	1.5	0.6	5.7
Madison/East End	1.6	24.2	0.5	2.0	7.1
Midtown	0.6	4.5	3.2	0.5	6.8
Patterson Park North & East	0.6	13.6	1.3	1,5	9.4
Perkins/Middle East*	0.9	15.7	2.6	4.4	4.7
Poppleton/The Terraces/Hollins Market	1.6	13.0	1.2	2.9	11.1
Sandtown-Winchester/Harlem Park	1.3	16.4	1.2	2.4	9.1
South Baltimore	3.8	+	0.0	1.8	10.5
Southwest Baltimore	1.4	13.0	2.0	2.2	10.0
Upton/Druid Heights	0.8	14.6	1.9	2.9	8.4
Washington Village/Pigtown	1.6	9.7	1.4	2.6	6.2
Mercy Health Services Area Estimate	1.6	11.4	1.9	2.4	7.2
Baltimore City	1.6	12.5	2.0	2.1	7.8

⁺ Rate not calculated - fewer than five deaths

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• Maternal and Child Health Indicators

The Sisters of Mercy were originally founded in Dublin, Ireland, to care for the needs of women and children. From our founding principles to the fact that more babies are born at Mercy than at any other hospital, Mercy Medical Center is highly invested in improving maternal and child health outcomes in our community for a variety of reasons. The data below suggests that despite the hospitals strong efforts and the early success of the City's B'more for Healthy Babies campaign, much more must be done to improve the health outcomes for mothers, infants, and children in our City. Despite reductions in the citywide teen birth rate in recent years, the rate of births to persons 15-19 years old remains 50% higher in Mercy's community. 10 of the 18 CSAs in our community have a teen birth rate that is at least 75%

higher than the citywide average. With respect to the percentage of women receiving prenatal care in the first trimester, Mercy's community is on par with the Citywide average. However, the disparity within Mercy's community merits further attention. Only 50.2% of women in Madison/East End received prenatal care in the first trimester compared to 75% in both Canton and South Baltimore. The southern boundary of Madison/East End is physically located five blocks (approximately 1700 feet) from a northern boundary of Canton. Furthermore, the data suggests that several areas within our community are unfortunately confronted by high rates of smoking during pregnancy, pre-term births, low birth weights, and infant deaths. These particular findings suggest that community specific interventions will be needed to affect real change.

2011 Neighborhood Health Profile Summary Mercy Health Services Proposed Community Benefit Service Area

7. Health Outcomes (Maternal and Child Health)

CSA	Live Births per 1,000 Persons	Teen Birth Rate per 1,000 Persons 15-19 Years Old	% of Live Births with Inadequate Birth Spacing (<12 months)	% of Women Receiving Prenatal Care in the 1st Trimester
Canton	12.0	51.2	2.3	75.0
Clifton-Berea	18.1	123.9	5.5	51.2
Downtown/Seton Hill	9.8	58.7	2.2	63,8
Fells Point	15.4	168.9	2.2	61.3
Greater Rosemont	18.1	113.9	6.3	54.9
Greenmount East	17.9	114.7	6.5	56.2
Inner Harbor/Federal Hill	12.3	68.0	4.2	72.4
Jonestown/Oldtown*	16.6	89.6	5.7	54.7
Madison/East End	24.6	128.1	5.9	50.2
Midtown	6.7	10.7	2.1	66.1
Patterson Park North & East	20.3	122.9	4.4	53.5
Perkins/Middle East*	19.9	142.5	4.6	52.4
Poppleton/The Terraces/Hollins Market	18.1	94.0	7.4	58.0
Sandtown-Winchester/Harlem Park	18.5	116.0	5.2	52.8
South Baltimore	14.2	55.4	2.6	75.0
Southwest Baltimore	20.6	117.9	7.2	57.4
Upton/Druid Heights	21.9	116.9	5.1	55.3
Washington Village/Pigtown	14.5	82.6	4.3	65.3
Mercy Health Services Area Estimate	16.6	98.7	4.7	59.8
Baltimore City	15.5	65.4	4.7	59.5

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7. Health Outcomes (Maternal and Child Health continued)

CSA	% of Births to Mothers who Reported Smoking During Pregnancy	% of Live Births Occurring Preterm (<37 weeks)	% of Births Classified as Low Birth Weight (<5 lb. 8 oz.)	Infant Mortality Rate per 1,000 Live Births
Canton	3.1	10.3	6.6	+
Clifton-Berea	15.2	19.3	15.3	16.8
Downtown/Seton Hill	6.0	13.0	10.2	+
Fells Point	3.9	13.5	7.9	7.1
Greater Rosemont	12.2	16.4	14.8	13.8
Greenmount East	13.4	18.7	18.6	15.7
Inner Harbor/Federal Hill	3.9	10.6	7.2	+
Jonestown/Oldtown*	10.5	17.0	12.4	12.1
Madison/East End	13.5	19.3	16.3	16.7
Midtown	7.1	12.1	12.5	11.5
Patterson Park North & East	9.6	15.4	10.5	8.8
Perkins/Middle East*	11.6	19.1	14.3	*
Poppleton/The Terraces/Hollins Market	10.7	19.1	15.4	13.0
Sandtown-Winchester/Harlem Park	14.8	17.9	16.0	21.2
South Baltimore	7.7	10.5	6.1	8.8
Southwest Baltimore	17.3	18.3	15.2	13.6
Upton/Druid Heights	12.3	19.0	15.2	15.0
Washington Village/Pigtown	19.8	17.1	14.1	12.6
Mercy Health Services Area Estimate	10.7	15.9	12.7	12.0
Baltimore City	10.2	16.0	13.0	12.1

⁺ Rate not calculated - fewer than five deaths

Office of Epidemiology Services, Baltimore City Health Department 2011
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Qualitative Data – Input from Community Representatives

In addition to gathering quantitive data, Mercy obtained input from important community stakeholders regarding the health needs of the community. Mercy's Community Benefit Committee received input from a diverse group of leaders that represent broad interests in our community, including: leaders of medically underserved and low-income populations, persons with expertise or special knowledge in public health, and persons who lead local health agencies. In particular, the Community Benefit Committee conducted in-person interviews with leaders of neighborhood associations, elected officials, chief executives of community health clinics, foundation executives, advocates for the homeless and elderly, and public health experts (among others). A list of the interviewees along with a description of

their special knowledge or expertise is provided in the chart below. The Committee developed a consistent and concise set of questions based on the quantitative data gathered and analyzed with respect to Mercy's community (see Appendix C). A pair of Committee members conducted each interview and one member took notes during each session. Each interview started with a brief overview of the CHNA process and a detailed description of Mercy's community. The interviewers then shared summaries of the specific health data from the community profile with each of the interviewees. Each interviewee was asked to share ideas on ways that Mercy could better partner with them and similar organizations to improve health outcomes in our community. The notes from each interview were compiled and emailed to every member of the Committee. The amount of knowledge gained and data collected during these interviews far exceeded the expectations of the Committee.

The Committee received high quality and realistic ideas on potential partnership opportunities. Of note, eight of the community leaders that we interviewed provided feedback that was remarkably similar to advice given by their peers. Given the range of disparities and challenges that exist in Mercy's community, the most frequently cited need to improve health outcomes in the community was for a social worker/care coordinator/navigator/experienced nurse(s) to be placed outside the hospital in the community clinic setting. Many interviewees believed that coordinating care in the City's Federally Qualified Health Centers (FQHCs) would lead to better outcomes and lower health costs in our community. The second most common refrain from our interviewees was that there was a need for more effective health education to be provided in the community. This request ranged from the need to better prepare kids aging out of foster care with basic health education and coping skills to the need for greater community education related to nutritition, obesity and diabetes prevention. The personal interviews put human faces on the health disparities that the Committee had been seeing on paper. This qualitative input will strongly influence the Committee's eventual plan to address the poor health outcomes identified in this CHNA. The specifics of that plan will be highlighted in a separate document—Mercy Medical Center's Community Benefit Implementation Strategy—that will be completed and approved by Mercy's Board of Directors by June 2013.

<u>Name</u>	Role/Title	Organization	Special Knowledge or Expertise	Interview
				<u>Date</u>
J. Kirby	President	Downtown	Runs non-profit focused on maintaining a vibrant and	12/11/2012,
Fowler		Partnership of	economically strong downtown. Operates a Clean & Safe team,	9 a.m.
		Baltimore	many of whom are ex-offenders. Corporate sponsors affected by	
			perception of crime, lack of cleanliness, and homelessness.	
			Serves on Board of American Diabetes Society.	
Cyrus J.	Medical Director	Metropolitan	Served as OB/GYN for 27 years. 95% of career focused on	12/13/2012,
Lawyer III,		OB/GYN Associates	underserved in City. Works in at least three different FQHCs. His	9 a.m.
M.D.			group delivers more than 1,000 babies at Mercy.	
Hon. William	City Councilman & Assoc	Baltimore City	Mercy's City Council representative. Former President of	12/14/2012,
Cole IV	V.P., Univ of Baltimore	Council	Otterbein Community Assoc. Lives, works, worships in CBSA.	1 p.m.
Olivia D.	Director, Mayor's Office	Mayor's Office of	Former Interim City Health Commissioner. Oversees homeless	12/14/2012,
Farrow	of Human Services	Human Services	shelter, re-entry, Head Start, and Community Action Centers.	3 pm
Molly	Director, Baltimore Dept	Baltimore City DSS	City resident and leader of State DSS Office in Baltimore City.	12/18/2012,
McGrath	of Social Services		Provides public assistance to more than 214,000 Baltimore	2 p.m.
			residents and more than 3,000 foster kids thru age 21.	
Rafael Lopez	Associate Director for	Annie E. Casey	Former head of the Family League of Baltimore. Former elected	12/20/2012,
	Talent Management and	Foundation	official in California. Advocate for effective systems to address	9 a.m.
	Leadership Development		needs of families and children.	
Dennis	Minister	Retired United	Retired minister. Retired Assitant Comptroller at Johns Hopkins	12/21/2012,
Dorsch		Methodist Church	Hospital. Homeless advocate.	9 a.m.
Kathy	President and CEO	HealthCare Access	One of most knowledgable leaders in State on providing access	1/2/2013,
Westcoat		Maryland	insurance to the uninsured.	2 p.m.
Kevin	President and CEO	Healthcare for the	Local and national leader on homelessness and health. Chair of	1/4/2013,
Lindamood		Homeless	Maryland Medicaid Advisory Committee. Serves on Board of Mid	1 p.m.
			Atlantic Association of Community Health Centers	
Rebecca	Asst Commissioner for	Baltimore City	Runs the B'more for Healthy Babies Campaign (BHB) and is a	1/4/2013,
Dineen	Maternal and Child Health	Health Department	passionate advocate for maternal and child health.	2:15 p.m.
Stephen Shen	Board Member	Mount Vernon-	Mr. Shen is a Mt. Vernon resident and officer within the MVBA.	1/23/2013,
		Belvedere Assoc	Architect by trade.	4 p.m.
Michael	Program Director for	Weinberg	Top expert on aging and older adult services in Baltimore region.	1/8/2013,
Marcus	Older Adult Services	Foundation		3 p.m.
Paula	CEO	Family Health	Chief Executive of FQHC in City with three clinic locations; Mercy	2/7/2013,
McLellan		Centers of Baltimore	Board member	1 pm

PRIORITIZATION OF NEED & IMPLEMENTATION STRATEGY

Mercy's location in the middle of a poor, urban City presents challenges and health disparities that are not evident in other parts of Maryland. The health needs and societal needs identified in our Community Health Profile and interviews of individuals representing the broad interests of the community are staggering; simply put, a hospital like Mercy cannot single-handedly move the needle on many of these key community metrics. Mercy intends to focus its limited resources on a defined number of health needs within the community, while putting tremendous thought and effort into executing our mission "to witness God's healing love for all people by providing excellent clinical and residential services within a community of compassionate care". In order to prioritize the multitude of health needs and disparities identified by the CHNA, the Community Benefits Committee intends to identify areas of opportunity where the mission and strengths of our institution intersect with 1) unmet public health needs that merit immediate attention, 2) feedback from community health leaders, and 3) the State Health Improvement Plan (SHIP) Framework. In essence, we are seeking to identify opportunities to align the Mercy's strengths with the needs identified by the City Health Department's Healthy Baltimore 2015 plan, the needs identified through our interview process, and the State's SHIP plan. In determining those health

needs that Mercy will not attempt to meet pursuant to this CHNA, focus will be placed on whether other organizations or governmental entities are better placed to respond to such health needs than Mercy.

As stated earlier, Mercy Medical Center's Community Benefit Implementation Strategy will be presented in a separate document. However, the Committee is currently reviewing opportunities to address the following needs in our community:

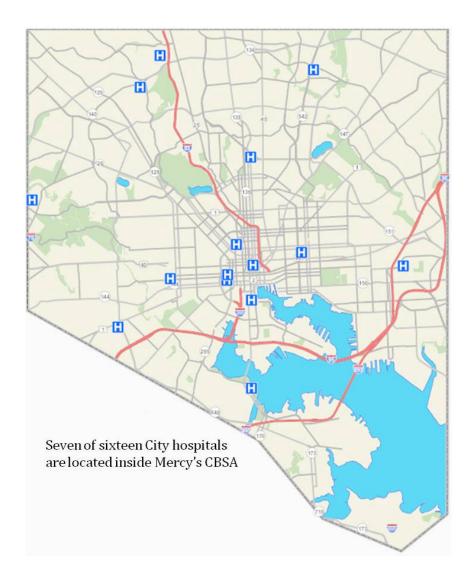
- Improving access to care and the frequency of care for our homeless neighbors.
- Identifying tactics and strategies to improve birth outcomes and pre-natal care for expectant mothers.
- Facilitating better care coordination with the City's Federally Qualified Health Centers.
- Providing support to victims of violence and addiction.
- Providing narrowly tailored health education to micro-targeted segments of the population within our community.

In contrast, at this time Mercy does not intend to create a new community based program focused solely on heart disease and cancer. It is our belief that considerable local and state resources are currently invested in these key causes of premature death. Furthermore, two large, high quality academic medical centers exist within walking distance of our downtown hospital. Our Committee believes that Johns Hopkins Medical System and the University of Maryland Medical System may be better suited to address these overarching community needs given the size and specific makeup of their cardiology and cancer programs. While Mercy does not plan to create new stand alone programs in these two high priority fields, we do plan to continue our efforts to reduce these top causes of premature death through our existing clinical programs and by improving care coordination and health education in the community setting.

EXISTING HEALTH CARE FACILITIES & OTHER COMMUNITY RESOURCES

Baltimore is fortunate to be home to some of the finest health care institutions and providers in the world. Seven of the sixteen acute care hospitals in Baltimore City are located within Mercy's Community Benefit Service Area. A list and a map of the Baltimore City Hospitals are located below.

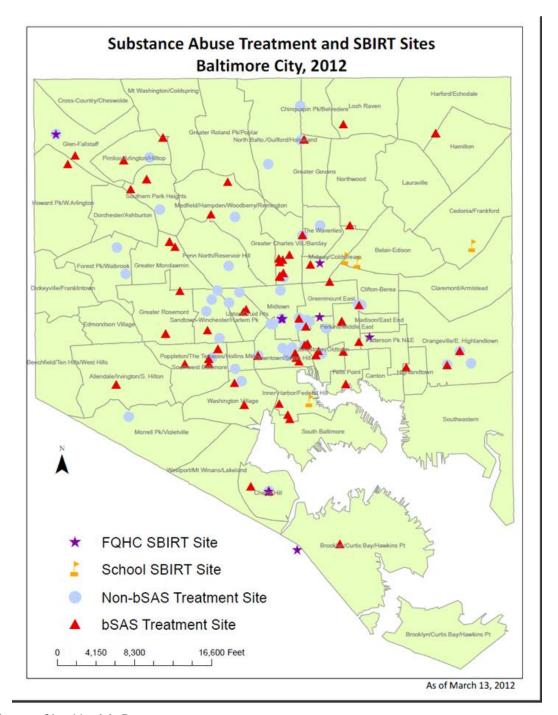
NAME	ADDRESS
John Hopkins Hospital	600 N. Wolfe St.
Maryland General Hospital	827 Linden Ave.
Bon Secours Hospital	2000 W. Baltimore St.
Sinai Hospital	2401 W. Belvedere Ave.
Harbor Hospital Center	3001 S. Hanover St.
St. Agnes Hospital	900 S. Caton Ave.
Union Memorial Hospital	201 E. University PW.
Good Samaritan Hospital	5601 Lockraven Bd.
John Hopkins Bayview Medical Center	4940 Eastern Ave.
Mercy Medical Center	345 St. Paul St.
University of Maryland Medical Center	22 S. Greene St.
VA Medical Center	10 N. Greene St
Kernan Hospital	2200 Kernan Dr
Mt. Washington Pediatric Hospital	1708 W Rogers Ave
University Specialty Hospital	611 S. Charles Street



In addition to hospitals, seven different federally qualified health centers (FQHCs) operate at least 15 different community health clinics inside or within walking distance of our community. A map of the statewide and city FQHCs can be found at the link below:

http://dhmh.maryland.gov/maps/services/fqhc 3-2-11.pdf

Furthermore, to address addiction and substance abuse, multiple providers have treatment centers and sites inside Mercy's community. The map below gives a sense for the location of treatment centers and SBIRT sites (**S**creening, **B**rief Advice, Brief Intervention, **R**eferral to Treatment, Brief **T**reatment) in the City. A concentration of these facilities is housed within our community.



Source: Baltimore City Health Department

EXISTING MERCY PROGRAMS & PARTNERSHIPS

Mercy's Supportive Housing Program: The Mercy Supportive Housing Program at Mercy Medical Center provides and coordinates services to homeless families, families in shelters, and families at risk of homelessness. The goal of the Mercy Supportive Housing Program (MSHP) is to house homeless families, prevent homelessness for families at risk of eviction and to provide supportive services. In 2012, MSHP served 164 adults with eviction prevention grants and counseling.

Mercy Family Violence Response Program—provides confidential services to patients who are victims of violence, as well as to employees and members of the larger community who are struggling with abuse issues. The program serves victims of child abuse and neglect, sexual assault and abuse, domestic violence and vulnerable adult abuse. Services include: crisis counseling intervention, safety planning, danger assessment, counseling/legal resource linkage, advocacy, documentation, and free short-term individual follow-up counseling regarding domestic violence. The program trains all Mercy employees and consults with physicians and staff to assist victims of abuse.

Sexual Assault Forensic Exam (SAFE) Program—SAFE is a program in which nurses provide examinations for male and female sexual assault victims as well as provides evidence collection for the homicide, rape, sex offense and child abuse units of law enforcement agencies. The Mercy SAFE program is the designated site for forensic patients in Baltimore City and the only comprehensive program of its kind in Maryland. In addition, the program's leadership and certified nursing staff provide community education about domestic violence and sexual assault to law enforcement, the legal community, community organizations and local high schools and colleges.

Healthcare for the Homeless—Mercy partners with the City of Baltimore in establishing a primary care site dedicated to providing healthcare to the homeless population. Allied health professionals include social workers, supportive housing staff, nurses, and pastoral care. The services include outreach and healthcare to homeless children and families in Baltimore City shelters. In partnership with Baltimore City and area shelter providers, the HCH Convalescent Care Program provides 24-hour shelter, routine nursing assessment, case management and recuperative care for individuals with medical conditions not severe enough for hospitalization.

Mercy's Substance Abuse and Medical Detoxification—Mercy offers one of two inpatient detoxification units in Baltimore City and cares for over 1,200 patients annually. Over 90% of patients are under or uninsured. Mercy provides physician subsidies for the professional component of these inpatient services. Of note, a number of diseases and medical conditions are over-represented in patients with substance abuse (e.g. Infectious Disease, Gastroenterology). Consultative and follow up care with appropriate specialists are also supported.

B'more for Healthy Babies (BHB)—a coalition of physicians among Baltimore City's major hospitals that addresses ways to reduce infant mortality, prematurity and low birth weight. Robert Atlas, M.D., Chairman of the Department of Obstetrics and Gynecology at Mercy and a recognized expert in at-risk pregnancy is a leader within BHB.

Mercy at Basilica Place—since 1981 Mercy has provided a nurse practitioner and an internist to serve this 200 unit HUD Section 8 senior housing apartment building sponsored by Associated Catholic Charities. More than 352 patients are seen by the nurse practictioner and 176 patients are seen by the physician each year.

MERCY'S COMMUNITY BENEFITS COMMITTEE

The following individuals devoted numerous hours on the Community Benefits Committee by helping develop Mercy Medical Center's Community Health Needs Assessment:

<u>Name</u>	Role/Title
Reverend Thomas R. Malia	Assistant to the President for Mission
Nicholas Koas	Senior Vice President for Institutional Advancement
Christopher Thomaskutty	Chief of Staff & Vice President for Corporate Affairs
Kathryn Pilkenton	Senior Director of Financial Planning
Catherine Kelly	Director of Community Outreach
Sally Ratcliffe	Director of Social Work
Kathryn Ault	Director of Pastoral Care
Mary Catherine Webb	Community member who is a Licensed Clinical Social Worker who led both a hospital Social Work and Pastoral Care department
Mary Louise Preis	Community member who is a former State Legislator, agency head, and corporate executive.

In addition to the Committee members named above, strategic advice and direction were provided to the Committee by the following individuals:

John Topper—Chief Financial Officer, Mercy Health Services

Dr. Robert Atlas—Chair, Department of Obstetrics and Gynecology

Dr. Stephen Schenkel—Chair,

Emergency Services Department

APPENDIX A

DATA SOURCES & TECHNICAL NOTES

Demographics and socioeconomics

The total population of the city does not include the incarcerated population. The analysis was done excluding the incarcerated population. Data for the Community Statistical Areas and the city as a whole are from the 2010 Census, the American Community Survey, or were provided by the Baltimore Neighborhood Indicators Alliance—Jacob France Institute (http://www.bniajfi.org/). The American Community Survey (ACS), administered to a representative sample by the US Census Bureau, replaced the long form of the decennial census. Annual data is updated through monthly samples across the United States. Five years of samples are required for small-area data (e.g. census tracts); one year and three year estimates are available for larger areas (e.g. county-level). The 2010 Census was the short form and for this report provided the information for the neighborhood population, age, gender, race and ethnicity, family poverty rate, and single-parent household. The definition of Unemployment from the US Census is as follows: all civilians 16 years old and over are classified as unemployed if they were neither "at work" nor "with a job but not at work" during the reference week (the calendar week preceding the date on which the respondents completed their questionnaires or were interviewed), were actively looking for work during the last 4 weeks, and were available to start a job. Also included as unemployed are civilians who did not work at all during the reference week, were waiting to be called back to a job from which they had been laid off, and were available for work except for temporary illness.

Education

Kindergarten readiness data are from Baltimore City Public Schools for school years 2007-2008 and 2008-2009. School readiness was computed based on the Maryland Model for School Readiness Working Sampling System (WSS). Each year, teachers use seven domains of learning to assess students' readiness. The seven domains include: language and literacy, physical development, social studies, scientific thinking, mathematical thinking, the Arts, and social/personal development. School absenteeism and reading level data are from the Baltimore Neighborhood Indicators Alliance for school year 2008-2009. BNIA obtained their data from the Baltimore City School System. Adult educational attainment data are from the American Community Survey. Maryland School Assessments are scored using a three level system. "Proficient" is a realistic and rigorous level of achievement indicating proficiency in meeting the needs of students. "Advanced" is a highly challenging and exemplary level of achievement indicating outstanding accomplishment in meeting the needs of students. The reading levels of the students are based on where the students live, not the CSA where the students go to school.

Built and social environment

Vacant building and vacant lot data are from the Mayor's Office of Information Technology, updated December 2009. The Mayor's Office of Information Technology obtained the data on vacant buildings from the Baltimore City Housing Department and the data on vacant lots from the Real Property

Management Database. Liquor store data are from the City liquor Board and include only Class "A" licenses, updated May 2009. Tobacco data are from the City Comptroller, updated April 2009. The Comptroller maintains data on tax revenue, licensure, regulation, and other-related items related to alcohol and tobacco outlets. These data were geocoded by BCHD and used to calculate CSA-level densities. Data for juvenile arrests and domestic violence calls for service are from the Baltimore Neighborhood Indicator's Alliance (BNIA).BNIA obtained the data from the Baltimore City Police Department. BNIA calculated the rates for domestic violence and juvenile arrests based on population statistics from the 2000 US Census. The Baltimore City Health Department transformed the rates from BNIA back into counts using population statistics from the 2000 Census. We then calculated new rates for juvenile arrests and domestic violence based on newly available population statistics from the 2010 US Census. The juvenile arrest rate reflects the number of individuals who were arrested (e.g. apprehended, taken into custody or detention, held for investigation, arrested, charged with, indicted or tried for any offense). The arrest rate differs from the rate of conviction (not included here), which would reflect the number of persons found quilty and convicted of an offense.

Housing

Lead paint violation data are from the Mayor's Office of Information Technology, updated December 2009. Only lead paint violations for years 2000-2008 were used to calculate rates for this report. The Mayor's Office of Information Technology obtained the information from the Baltimore City Real Property Systems (BITs). Energy cutoff data are from Baltimore Gas and Electricity, as provided to BCHD from 9/1/2010 through 8/31/2010. Cutoffs were geocoded by BCHD and used to calculate CSA-level rates. These data include only unduplicated complaints made to or fulfilled by Baltimore Housing and Community Development and grouped under "Housing Code Enforcement," regardless of the outcome of the complaint (e.g. violation, citation, no action etc).

Food environment

Fast food and carryout data are from the BCHD open food facilities permit/license database, updated June 2009. These data were geocoded and used to calculate CSA-level densities. The Baltimore City Health Department identifies the establishments as a carryout and then separates the carryouts into chain fast food restaurants and carryouts. Fast food restaurants were categorized as the following: Blimpie, Burger King, California Tortilla, Chipotle, Dunkin' Donuts, Five Guys, KFC, Long John Silver's, McDonald's, Popeye's, Potbelly's, Quizno's, Subway, Taco Bell, and Wendy's. Carryout data in this report reflect establishments coded as a "carryout" in the database, as well as establishments that were not coded as a carryout but had "carryout" either 1) in their restaurant name, or 2) on their restaurant signage (verified via Google Street View). Corner store data are from the Center for a Livable Future and include corner stores, convenience stores, dollar stores, and gas stations with minimarts. These data were updated January 2011 and used as provided. The travel time to the nearest supermarket was calculated by Nicole Robinson. To calculate this time, the center of population was calculated for each CSA by identifying the Census Block Group with the highest population. The geographic center of the most highly populated Census Block Group (i.e. the center of population) was used as the starting point for each CSA. ArcMap was used to identify the closest supermarket to the center of population. Google Maps was then used to determine the time it takes to arrive at the nearest grocery store from the center of population. Google

Maps estimates travel time for multiple modes of transportation including walking, driving, and using public transportation (based on public transportation schedule). A food desert is an area that lacks access to healthy and affordable foods.

Life expectancy, years of potential life lost, avertable deaths, and mortality rates

Life expectancy, years of potential life lost, avertable deaths, and mortality rates were computed based on death records for 2005-2009 provided by the Vital Statistics Administration at the Maryland Department of Health and Mental Hygiene, and population denominators obtained from the Census 2010 Summary File 1 for Baltimore City, Maryland.

Maternal and child health

Lead poisoning: 2008 lead poisoning data were from the Maryland Department of the Environment, Lead Poisoning Prevention Program.

Birth outcomes: 2005-2009 Baltimore City birth outcomes were computed from birth records provided by the Vital Statistics Administration of the Maryland Department of Health and Mental Hygiene.

Limitations

Small numbers

Because neighborhoods can have small population sizes in certain age groups, there is the possibility that small differences could produce large differences in rates. We addressed this potential issue by grouping years together and thereby estimating rates using larger numbers. Despite this, there is some uncertainty associated with these estimates due to the small population sizes involved.

Data availability

These reports only contain data on a select set of indicators of health and the social determinants of health among many other possible indicators. Data were not included for smoking and healthcare-seeking behaviors, diet, exercise, the prevalence of chronic diseases, disability, drug addiction, and mental illness, air quality measures, stress, and a range of other individual- and community-level social determinants such as language ability, health literacy, social support, social capital, and social cohesion.

TECHNICAL NOTES

Estimated life expectancy at birth

Defined as the average number of years a person born today would live if he/she experienced the mortality rates observed in this report over the course of his/her life. The life expectancy estimate in this report reflects the mortality rates among people living in Midtown from 2005 to 2009. Babies born today in Midtown would only experience this life expectancy only if the current age-specific mortality rates remained constant over the course of their lives. Life expectancy was calculated using a life table

calculator for small area estimates developed by the South East Public Health Observatory in England (http://www.sepho.org.uk/viewResource.aspx?id=8943). The calculator uses an abridged life table methodology, with five-year age groups (except for under 5 and above 85 which were treated as under 1, 1-4 and above 85) and combines the Chiang and Silcocks methodologies. Some inaccuracy will result due to the use of age groups rather than single year age categories, as well as due to small numbers of deaths in certain age groups. For more information on this methodology, please refer to: Williams E, Dinsdale H, Eayres D, and Tahzib F. Technical Report – Calculating Life Expectancy in Small Areas. Oxford, England: Southeast England Public Health Observatory, 2005 (available at http://www.sepho.org.uk/Download/Public/9847/1/Life%20Expectancy%20Nov%2005.pdf).

Avertable deaths

Avertable deaths are deaths that could have been avoided if all neighborhoods in Baltimore had the same opportunities at health. Data presented here are based on the assumption that the death rates experienced in the five communities with the highest median incomes are achievable in every community. Age-sex-specific mortality rates were calculated for ten-year age groups (except for under 5 and above 85 which were treated as under 1, 1-4 and above 85) for the five CSA's with the highest median household incomes. These age-sex-specific reference mortality rates were then applied to the populations of all 55 CSA's and Baltimore City as a whole to generate a projected number of deaths for each area. The avertable deaths thus represents an estimate of the percent of area deaths that would have been avoided if they had experienced the same mortality rates as the highest income communities for years 2005-2009. A negative percentage means that the area experienced a lower mortality rate than the top 5 neighborhoods.

Age-adjusted mortality

This represents the number of deaths per 10,000 people per year assuming that each neighborhood had the same age structure (number of people in each age group). Age adjustment is done so that a neighborhood with a proportionally large number of elderly people (who are more likely to die because of their age) does not show a higher mortality rate simply because of the older age of its inhabitants. Ageadjustment was based on 10-year age groups and the 2000 projected US population distribution #1 (from: Klein RJ, Schoenborn CA. Age-adjustment using the 2000 projected US population. Healthy People Statistical Notes, no. 20. Hyattsville, Maryland: National Center for Health Statistics. January 2001). Breast and prostate cancer mortality rates used the sex-specific 2000 projected US Population with the same age groups (from: Day, Jennifer Cheeseman, Population Projections of the United States by Age, Sex, Race, and Hispanic Origin: 1995 to 2050, US Bureau of the Census, Current Population Reports, P25-1130, US Government Printing Office, Washington, DC, 1996).

Years of potential life lost (YPLL)

The number of years of life lost due to death before age 75. For example, a person dying at age 74 accrues 1 YPLL, while a person dying at age 30 accrues 45 YPLL. YPLL provide a measure of the impact of premature mortality on a population. Deaths that occur earlier in life contribute more years of life lost than deaths later in life, capturing the value society places on young lives. At the neighborhood level, the

YPLL was based on the sum of years of life lost for all the Residents of that neighborhood who died in 2005-2009.

Cause of death

The top ten causes of death are those that accounted for the largest number of deaths in Baltimore in 2005-2009.

Built and social environment

Data for juvenile arrests and domestic violence are from the Baltimore Neighborhood Indicator's Alliance (BNIA). The rate was calculated using the rate provided by BNIA and was divided by 1,000 and then multiplied by the 2010 US Census data to get the raw values. The densities were then calculated based on 2010 US Census data.

Maternal and child health

Lead poisoning: lead poisoning is when a person has elevated lead in his/her body. This can be determined based on the amount of lead in the blood. The lead poisoning percentages represent the percentage of Baltimore City children age 0-6 years who had an elevated blood-lead level (10 g/dL) in 2008 out of all children who were tested. The elevated blood level was based on the highest venous or, in the absence of a venous test, the highest capillary test. Venous tests, which require a blood draw, are considered more reliable; however, in their absence, a capillary test (based on a finger stick) can indicate the presence of lead poisoning. In Baltimore City, children are required to receive a blood test for lead at 12 and 24 months of age, but, not all children present for testing.

Birth Outcomes: the birth rate is defined as the number of live births per 1,000 persons. The teen birth rate is the number of live births to females between 15-19 years of age per 1,000 females in the population in that age range. Adequate birth spacing is defined as spacing of births of greater than 27 months for women. Smoking during pregnancy was reported on the birth certificate. Preterm births are live births occurring before 37 weeks gestation. Low birth weight is defined as live births weighing less than 2500g (5 lbs 8oz) at delivery. Infant mortality rate: Number of infant deaths (babies less than 1 year of age) per 1,000 live births in a given year.

Aggregation to the Community Statistical Areas (CSAs): all data were aggregated first to the Census tract of residence. Since CSAs are groupings of census tracts, CSA data were obtained by aggregating Census tract-level data.

Prepared by:
Office of Epidemiology Services
Baltimore City Health Department
October 2012

Data Sources:

See citations and technical notes provided in electronic versions available at baltimorehealth.org.

Note:

Jonestown/Oldtown and Perkins/Middle East community statistical areas combined represent the new Harbor East/Little Italy and Oldtown/Middle East community statistical areas.

1. Demographics

<u> </u>		Percentage of Population by Race/Ethnicity					
CSA	Population	Black	White	Asian	Other	Two or More	Hispanic/ Latino
Canton	8,100	4.1	88.9	3.4	1.9	1.7	5.0
Clifton-Berea	9,874	96.9	1.2	0.3	0.5	1.2	1.0
Downtown/Seton Hill	6,446	37.5	41.8	16.0	1.5	3.1	4.5
Fells Point	9,039	8.0	76.7	4.6	7.3	3.3	15.1
Greater Rosemont	19,258	97.1	0.7	0.2	0.5	1.5	1.0
Greenmount East	9,262	94.3	3.6	0.3	0.7	1.1	1.2
Inner Harbor/Federal Hill	12,855	11.7	81.5	3.9	1.2	1.8	3.2
Jonestown/Oldtown*	10,841	75.7	17.7	2.7	2.1	1.8	4.3
Madison/East End	7,781	91.1	4.0	0.9	2.2	1.7	4.0
Midtown	15,685	34.3	53.4	7.6	1.4	3.3	3.8
Patterson Park North & East	14,549	38.7	44.1	2.0	11.8	3.4	21.1
Perkins/Middle East*	4,587	87.1	7.5	3.6	0.6	1.3	1.5
Poppleton/The Terraces/Hollins Market	5,086	83.5	13.2	1.0	0.9	1.4	1.7
Sandtown-Winchester/Harlem Park	14,801	96.9	1.2	0.3	0.3	1.2	0.7
South Baltimore	6,406	2.7	92.1	2.7	0.8	1.7	2.6
Southwest Baltimore	17,886	76.2	17.6	1.2	2.6	2.4	3.6
Upton/Druid Heights	9,755	94.3	3.1	0.5	0.6	1.5	1.4
Washington Village/Pigtown	5,503	49.7	40.7	5.3	1.6	2.7	3.4
Mercy Health Services Area Estimate	187,714	60.0	32.7	3.1	2.1	2.0	4.4
Baltimore City	620,961	63.6	29.7	2.4	2.2	2.1	4.2

1. Demographics (continued)

	Percentage of Population by Age (years)				Percentage of Population by Gender		
CSA	Under 18	18-24	25-44	45-64	65 and up	Male	Female
Canton	7.1	10.5	53.0	18.5	10.9	49.5	50.5
Clifton-Berea	25.5	10.5	22.5	26.1	15.5	45.3	54.7
Downtown/Seton Hill	8.0	20.6	50.7	16.9	3.8	49.1	50.9
Fells Point	9.7	11.3	51.7	19.5	7.7	51.0	49.0
Greater Rosemont	26.1	11.0	22.3	27.6	12.9	45.6	54.4
Greenmount East	23.0	11.2	24.1	30.7	11.1	50.6	49.4
Inner Harbor/Federal Hill	9.5	13.3	47.2	19.4	10.6	50.8	49.2
Jonestown/Oldtown*	24.0	11.2	32.5	23.5	8.8	48.1	51.9
Madison/East End	32.8	13.1	24.9	22.6	6.6	46.1	53.9
Midtown	6.4	22.2	39.0	19.6	12.7	48.5	51.5
Patterson Park North & East	22.2	11.6	41.2	18.7	6.2	50.1	49.9
Perkins/Middle East*	26.2	12.0	25.8	23.2	12.8	42.8	57.2
Poppleton/The Terraces/Hollins Market	25.5	10.5	28.7	25.9	9.3	47.2	52.8
Sandtown-Winchester/Harlem Park	25.8	11.5	23.9	26.9	11.8	45.7	54.3
South Baltimore	10.6	10.4	51.3	19.6	8.1	50.9	49.1
Southwest Baltimore	27.1	11.0	25.3	26.6	10.0	48.6	51.4
Upton/Druid Heights	30.0	12.0	23.7	24.4	10.0	44.7	55.3
Washington Village/Pigtown	21.0	11.3	37.6	22.0	8.1	49.8	50.2
Mercy Health Services Area Estimate	20.0	12.5	34.7	22.9	9.8	48.0	52.0
Baltimore City	21.6	12.5	28.8	25.2	11.8	46.7	53.3

2. Socioeconomic Characteristics

	Percentage of Population by Household Income						
CSA	<\$25,000	\$25-40,000	\$40-60,000	\$60-75,000	\$75,000+		
Canton	14.9	7.8	14.3	11.4	51.6		
Clifton-Berea	50.7	22.4	13.7	4.5	8.7		
Downtown/Seton Hill	36.3	18.1	18.4	9.3	18.0		
Fells Point	19.3	11.9	16.6	12.5	39.8		
Greater Rosemont	44.1	21.7	16.2	5.9	12.0		
Greenmount East	57.3	16.5	12.0	8.1	6.1		
Inner Harbor/Federal Hill	19.5	5.7	15.3	10.8	48.6		
Jonestown/Oldtown*	55.7	12.3	9.2	5.5	17.3		
Madison/East End	40.5	25.0	17.2	6.5	10.7		
Midtown	41.2	15.5	15.7	6.6	21.1		
Patterson Park North & East	30.7	15.8	16.4	10.7	26.3		
Perkins/Middle East*	56.7	12.1	10.3	6.5	14.3		
Poppleton/The Terraces/Hollins Market	49.8	11.1	11.5	7.2	20.3		
Sandtown-Winchester/Harlem Park	55.5	19.6	13.3	5.6	6.0		
South Baltimore	12.0	11.8	16.8	14.1	45.3		
Southwest Baltimore	45.3	22.7	15.2	5.1	11.7		
Upton/Druid Heights	67.1	12.5	12.0	3.3	5.1		
Washington Village/Pigtown	34.7	12.4	22.2	7.7	23.1		
Mercy Health Services Area Estimate	40.6	15.	14.8	7.9	21.5		
Baltimore City	33.3	18.1	17.1	9.1	22.5		

2. Socioeconomic Characteristics (continued)

CSA	% of population 16+ that is unemployed	% of families earning below poverty level
Canton	3.1	1.6
Clifton-Berea	20.0	18.4
Downtown/Seton Hill	4.8	21.8
Fells Point	3.8	10.6
Greater Rosemont	15.8	21.2
Greenmount East	19.7	37.7
Inner Harbor/Federal Hill	2.5	8.8
Jonestown/Oldtown*	14.7	26.6
Madison/East End	14.4	27.6
Midtown	5.7	11.2
Patterson Park North & East	11.3	16.1
Perkins/Middle East*	17.5	28.4
Poppleton/The Terraces/Hollins Market	10.6	19.2
Sandtown-Winchester/Harlem Park	21.0	30.9
South Baltimore	4.7	8.9
Southwest Baltimore	19.6	26.2
Upton/Druid Heights	17.5	48.8
Washington Village/Pigtown	12.3	20.8
Mercy Health Services Area Estimate	12.1	21.4
Baltimore City	11	15.2

3. Education

	% of Kindergarten Students "Fully Ready"	"proficient"	nts reading at or "advanced" evels	% of students	s missing 20 or m school	ng 20 or more days of chool	
CSA	to Learn	3rd Grade	8th Grade	Elementary	Middle	High	
Canton	47.8	79.2	75.7	9.9	14.7	33.3	
Clifton-Berea	71.0	65.0	42.8	12.7	18.6	45.4	
Downtown/Seton Hill	65.5	72.5	48.1	5.6	22.2	41.9	
Fells Point	74.3	78.2	52.3	6.3	19.4	31.9	
Greater Rosemont	56.0	74.2	51.0	9.9	19.3	47.0	
Greenmount East	43.3	72.4	44.4	14.2	21.3	45.3	
Inner Harbor/Federal Hill	55.0	81.8	67.2	8.2	14.9	41.2	
lonestown/Oldtown*	57.9	72.8	52.6	13.1	21.1	50.9	
Madison/East End	64.2	70.9	41.0	14.2	26.5	52.6	
Midtown	59.6	75.1	56.3	13.3	13.9	46.9	
Patterson Park North & East	60.1	62.1	43.6	13.4	23.7	46.3	
Perkins/Middle East*	44.7	73.8	45.7	17.1	27.0	47.2	
Poppleton/The Terraces/Hollins Market	76.6	84.1	43.4	11.3	26.7	49.6	
Sandtown-Winchester/Harlem Park	60.1	65.6	51.6	7.3	21.5	45.8	
South Baltimore	70.4	85.9	70.2	9.8	18.8	25.0	
Southwest Baltimore	61.2	73.2	45.9	11.8	27.6	48.0	
Jpton/Druid Heights	55.1	58.8	40.6	10.9	33.5	49.0	
Washington Village/Pigtown	69.3	70.9	53.0	6.5	23.8	41.3	
Mercy Health Services Area Estimate	60.7	73.1	51.4	10.9	21.9	43.8	
Baltimore City	65.0	77.6	58.6	10.1	16.3	39.2	

3. Education (continued)

O. Ladoution (continuou	% of adults 25+ attaining educational levels		
CSA	HS or less	BS/BA or more	
Canton	25.8	58.9	
Clifton-Berea	78.5	7.0	
Downtown/Seton Hill	29.7	58.7	
Fells Point	28.3	57.0	
Greater Rosemont	67.3	7.0	
Greenmount East	76.1	8.1	
Inner Harbor/Federal Hill	19.9	69.2	
Jonestown/Oldtown*	63.7	17.5	
Madison/East End	68.1	4.4	
Midtown	32.2	52.5	
Patterson Park North & East	59.9	21.6	
Perkins/Middle East*	66.4	17.3	
Poppleton/The Terraces/Hollins Market	58.4	14.7	
Sandtown-Winchester/Harlem Park	75.5	6.2	
South Baltimore	35.5	46.1	
Southwest Baltimore	70.2	9.5	
Upton/Druid Heights	72.2	10.6	
Washington Village/Pigtown	44.4	41.1	
Mercy Health Services Area Estimate	54.0	28.2	
Baltimore City	52.6	25.0	

4. Community Built and Social Environment

CSA	Alcohol Store Density per 10,000 Residents	Tobacco Store Density per 10,000 Residents	Juvenile Arrests per 1,000 10-17 Year Olds	Domestic Violence Incidents Reported per 1,000 Res.	Non-Fatal Shootings per 10,000 Residents
Canton	4.9	23.5	179.3	18.7	2.5
Clifton-Berea	8.1	49.6	326.5	58.2	126.6
Downtown/Seton Hill	20.2	130.3	906.7	45.5	69.8
Fells Point	6.6	50.9	129.4	21.7	13.3
Greater Rosemont	7.8	36.9	182.1	56.8	95.0
Greenmount East	9.7	49.7	280.3	53.2	115.5
Inner Harbor/Federal Hill	4.7	38.1	264.7	14.5	6.2
Jonestown/Oldtown*	5.5	25.8	187.5	46.6	76.6
Madison/East End	5.1	50.1	280.2	66.2	169.6
Midtown	8.3	28.7	249.1	19.1	22.3
Patterson Park North & East	2.7	32.3	205.4	42.6	49.5
Perkins/Middle East*	6.5	50.1	337.1	59.7	117.7
Poppleton/The Terraces/Hollins Market	9.8	43.3	155.6	57.1	72.7
Sandtown-Winchester/Harlem Park	8.1	56.1	252.3	68.1	91.2
South Baltimore	3.1	18.7	102.1	15.9	1.6
Southwest Baltimore	11.2	51.4	250.0	66.3	117.4
Upton/Druid Heights	6.2	39.0	340.0	55.0	108.7
Washington Village/Pigtown	7.3	50.9	204.5	46.1	50.9
Mercy Health Services Area Estimate	7.6	45.9	268.5	45.1	72.6
Baltimore City	4.6	21.8	145.09	40.6	46.5

5. Housing

CSA	Lead Paint Violations per 10,000 Households (annually)	Energy Cutoffs per 10,000 Households (monthly)	Vacant Buildings per 10,000 Housing Units	Vacant Lots per 10,000 Housing Units
Canton	1.3	7.2	94.5	110.6
Clifton-Berea	63.6	61.2	2,722.8	1,297.3
Downtown/Seton Hill	0.9	4.1	127.2	459.8
Fells Point	3.3	5.7	92.9	210.3
Greater Rosemont	24.7	77.0	1,243.5	508.5
Greenmount East	64.6	59.9	3,515.7	2,720.7
Inner Harbor/Federal Hill	2.1	3.3	49.2	289.9
Jonestown/Oldtown*	1.1	11.9	172.0	677.3
Madison/East End	90.3	89.8	2,697.1	459.7
Midtown	1.5	7.4	178.0	166.3
Patterson Park North & East	34.0	51.2	688.4	215.5
Perkins/Middle East*	24.9	32.2	2,265.3	2,166.3
Poppleton/The Terraces/Hollins Market	8.7	31.3	945.7	2,266.2
Sandtown-Winchester/Harlem Park	39.8	86.9	2,411.5	1,507.1
South Baltimore	1.4	8.0	103.7	493.9
Southwest Baltimore	43.5	79.6	2,081.5	1,090.7
Upton/Druid Heights	21.6	45.2	1,380.5	1,550.6
Washington Village/Pigtown	13.7	45.8	1,028.7	792.9
Mercy Health Services Area Estimate	24.5	39.3	1,211.0	943.5
Baltimore City	11.8	39.1	567.2	593.1

6. Food Environment

CSA	Fast Food Restaurants per 10,000 Residents	Carry-out Restaurants per 10,000 Residents	Corner Stores per 10,000 Residents
Canton	2.5	12.3	2.5
Clifton-Berea	3.0	13.2	17.2
Downtown/Seton Hill	35.7	96.2	23.3
Fells Point	3.3	14.4	15.5
Greater Rosemont	0.0	14.5	15.1
Greenmount East	0.0	10.8	28.1
Inner Harbor/Federal Hill	5.4	21.0	4.7
Jonestown/Oldtown*	0.9	22.1	7.4
Madison/East End	1.3	24.4	25.7
Midtown	3.8	14.7	6.4
Patterson Park North & East	0.7	14.4	19.9
Perkins/Middle East*	10.9	34.9	10.9
Poppleton/The Terraces/Hollins Market	2.0	21.6	13.8
Sandtown-Winchester/Harlem Park	0.0	14.2	19.6
South Baltimore	6.2	9.4	10.9
Southwest Baltimore	2.2	24.0	25.7
Upton/Druid Heights	2.1	16.4	12.3
Washington Village/Pigtown	3.6	20.0	14.5
Mercy Health Services Area Estimate	4.7	22.1	15.2
Baltimore City	2.4	12.7	9.0

7. Health Outcomes

CSA	Age-adjusted Deaths per 10,000 Residents, All Causes	Total Annual YPLL, per 10,000 Residents	% of Deaths Potentially Avertable
Canton	86.7	506.7	15.9
Clifton-Berea	141.9	2,423.5	45.8
Downtown/Seton Hill	238.2	1,511.9	69.9
Fells Point	110.6	806.9	35.0
Greater Rosemont	140.0	1,902.1	46.7
Greenmount East	144.9	2,241.6	54.1
Inner Harbor/Federal Hill	83.5	624.7	15.6
Jonestown/Oldtown*	113.2	1,431.0	42.9
Madison/East End	157.9	2,264.0	64.0
Midtown	90.6	875.0	18.2
Patterson Park North & East	133.9	1,312.8	50.4
Perkins/Middle East*	128.9	1,852.6	48.5
Poppleton/The Terraces/Hollins Market	171.7	2,366.5	64.0
Sandtown-Winchester/Harlem Park	144.5	2,323.1	50.8
South Baltimore	122.3	782.4	40.6
Southwest Baltimore	157.8	2,250.4	57.3
Upton/Druid Heights	175.8	2,494.5	63.2
Washington Village/Pigtown	145.9	1,482.8	55.3
Mercy Health Services Area Estimate	128.0	1,636.3	46.6
Baltimore City	110.8	1,377.4	36.2

	Adult Deaths per 10,000 Residents by Age Group (years)				
CSA	25-44	45-64	65-84	85+	
Canton	4.7	80.2	370.6	1,605.3	
Clifton-Berea	73.1	208.2	441.1	1,159.4	
Downtown/Seton Hill	23.9	240.1	931.5	2,230.8	
Fells Point	13.7	83.9	481.1	1,955.6	
Greater Rosemont	62.4	147.3	529.1	1,510.9	
Greenmount East	62.8	180.3	472.0	1,579.8	
Inner Harbor/Federal Hill	8.9	83.3	354.9	1,284.8	
Jonestown/Oldtown*	27.8	129.6	410.3	1,434.3	
Madison/East End	69.2	174.0	495.8	1,578.9	
Midtown	18.3	113.0	342.1	1,078.1	
Patterson Park North & East	25.3	126.5	531.1	1,803.3	
Perkins/Middle East*	55.8	187.6	386.6	1,372.5	
Poppleton/The Terraces/Hollins Market	64.3	202.0	578.6	2,055.6	
Sandtown-Winchester/Harlem Park	64.9	184.0	489.3	1,352.0	
South Baltimore	9.1	100.5	593.4	1,761.2	
Southwest Baltimore	61.3	191.0	628.5	1,240.2	
Upton/Druid Heights	80.5	204.2	540.9	2,273.7	
Washington Village/Pigtown	33.9	150.5	597.0	1,688.9	
Mercy Health Services Area Estimate	42.2	154.8	509.7	1,609.2	
Baltimore City	33.1	121.1	423.4	1,350.3	

7. Health Outcomes (continued)

	Deaths per 10,000 Residents, by Cause of Death				
CSA	Heart Disease	Cancer (All)	Lung Cancer	Stroke	HIV/AIDS
Canton	22.8	25.1	6.5	3.5	+
Clifton-Berea	30.7	31.3	7.9	7.3	7.2
Downtown/Seton Hill	71.0	47.2	16.1	11.7	10.4
Fells Point	28.3	25.9	9.8	4.9	+
Greater Rosemont	35.8	28.8	7.4	6.9	6.5
Greenmount East	37.4	26.3	7.7	6.9	8.2
Inner Harbor/Federal Hill	23.5	16.1	5.5	3.3	1.3
Jonestown/Oldtown*	28.5	24.3	7.7	5.1	5.6
Madison/East End	35.2	28.6	9.3	8.4	5.9
Midtown	26.7	18.6	5.8	3.9	6.7
Patterson Park North & East	38.2	27.8	7.2	5.4	3.7
Perkins/Middle East*	32.2	22.9	5.8	4.3	9.3
Poppleton/The Terraces/Hollins Market	32.6	27.4	10.2	8.2	11.8
Sandtown-Winchester/Harlem Park	36.4	28.0	7.7	6.2	6.8
South Baltimore	35.0	33.3	12.1	2.9	+
Southwest Baltimore	42.3	32.7	11.5	5.9	5.8
Upton/Druid Heights	47.9	30.3	9.1	6.9	12.4
Washington Village/Pigtown	42.5	32.5	11.6	4.9	3.7
Mercy Health Services Area Estimate	33.6	26.6	8.2	5.6	5.2
Baltimore City	28.5	23.1	6.9	5.2	3.9

+Rate not calculated - fewer than 5 deaths

	Age-adjusted Deaths per 10,000 Residents by Cause of Death				
CSA	Chronic Lower Respiratory Disease	Homicide	Drug-Induced Deaths	Diabetes	Septicemia
Canton	4.5	+	+	3.2	2.2
Clifton-Berea	2.3	8.5	6.5	3.7	4.4
Downtown/Seton Hill	8.2	3.4	4.0	5.5	6.2
Fells Point	6.7	1.4	4.0	2.7	3.5
Greater Rosemont	4.3	8.2	5.4	3.2	4.5
Greenmount East	3.7	6.7	6.7	5.9	4.0
Inner Harbor/Federal Hill	7.7	+	1.4	2.9	2.7
Jonestown/Oldtown*	5.1	3.7	3.1	3.4	2.0
Madison/East End	6.2	10.6	6.3	5.1	4.7
Midtown	2.0	1.2	2.0	3.7	1.3
Patterson Park North & East	5.0	3.4	3.3	3.6	3.2
Perkins/Middle East*	3.0	6.1	3.9	4.1	4.8
Poppleton/The Terraces/Hollins Market	8.4	6.3	10.0	5.5	7.3
Sandtown-Winchester/Harlem Park	3.4	8.6	7.6	4.3	5.0
South Baltimore	8.3	+	2.6	3.9	2.1
Southwest Baltimore	4.5	6.3	7.8	5.3	5.0
Upton/Druid Heights	2.3	7.5	8.5	7.7	6.4
Washington Village/Pigtown	9.3	2.4	3.4	5.3	6.9
Mercy Health Services Area Estimate	4.4	4.4	4.3	4.2	3.8
Baltimore City	3.9	3.5	3.7	3.5	3.5

	% of All Deaths, by Cause of Death				
CSA	Heart Disease	Cancer (AII)	Lung Cancer	Stroke	HIV/AIDS
Canton	27.0	27.0	7.2	4.5	+
Clifton-Berea	22.6	23.2	6.0	5.3	4.2
Downtown/Seton Hill	24.4	21.4	6.2	2.6	8.8
Fells Point	24.2	22.8	8.3	4.6	+
Greater Rosemont	26.6	20.4	5.3	5.1	4.3
Greenmount East	25.3	18.6	5.9	4.8	6.6
Inner Harbor/Federal Hill	27.3	20.0	6.7	3.8	1.6
Jonestown/Oldtown*	23.7	20.6	6.3	4.1	6.5
Madison/East End	20.4	17.5	5.6	4.1	4.9
Midtown	30.3	20.7	6.5	4.4	6.5
Patterson Park North & East	25.8	20.4	5.6	3.6	3.9
Perkins/Middle East*	24.5	18.1	5.0	3.5	7.1
Poppleton/The Terraces/Hollins Market	17.4	16.0	6.4	4.7	8.0
Sandtown-Winchester/Harlem Park	25.5	19.6	5.4	4.3	4.4
South Baltimore	27.7	26.3	9.7	2.2	+
Southwest Baltimore	26.4	20.2	7.0	3.6	4.0
Upton/Druid Heights	26.5	17.4	5.5	3.6	7.4
Washington Village/Pigtown	26.6	21.8	8.9	3.8	3.4
Mercy Health Services Area Estimate	25.1	20.7	6.5	4.1	4.7
Baltimore City	25.8	20.8	6.3	4.7	3.5

⁺ Rate not calculated - fewer than five deaths

7. Health Outcomes (continued)

	% of All Deaths, by Cause of Death				
CSA	Chronic Lower Respiratory Disease	Homicide	Diabetes	Septicemia	Drug-Induced Deaths
Canton	5.1	+	3.6	2.4	+
Clifton-Berea	1.7	5.0	2.9	2.9	3.8
Downtown/Seton Hill	2.6	3.6	2.9	2.6	3.6
Fells Point	5.4	2.0	2.3	2.8	5.1
Greater Rosemont	3.1	5.2	2.5	3.4	3.2
Greenmount East	2.4	4.7	4.2	2.9	4.8
Inner Harbor/Federal Hill	8.9	+	3.3	3.3	2.4
Jonestown/Oldtown*	4.3	4.3	2.9	1.6	3.5
Madison/East End	2.9	10.9	2.4	2.7	5.1
Midtown	2.2	1.3	4.0	1.5	2.1
Patterson Park North & East	3.0	4.6	2.5	2.3	3.9
Perkins/Middle East*	2.5	5.3	3.5	3.9	2.5
Poppleton/The Terraces/Hollins Market	4.4	4.7	3.0	4.1	6.4
Sandtown-Winchester/Harlem Park	2.4	5.6	3.0	3.5	4.9
South Baltimore	6.5	+	2.9	1.8	2.9
Southwest Baltimore	2.6	4.4	3.3	3.1	5.4
Upton/Druid Heights	1.4	5.1	4.4	3.6	4.8
Washington Village/Pigtown	5.5	3.1	3.4	4.1	3.1
Mercy Health Services Area Estimate	4.2	3.4	3.2	2.9	3.3
Baltimore City	3.4	3.4	3.1	3.1	3.2

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⁺ Rate not calculated - fewer than five deaths

•	% of Years of Potential Life Lost by Cause of Deaths				
CSA	Heart Disease	Cancer (AII)	Lung Cancer	Stroke	HIV/AIDS
Canton	18.2	20.6	3.8	3.9	+
Clifton-Berea	15.1	14.7	3.4	3.1	7.8
Downtown/Seton Hill	14.8	17.4	4.0	0.0	15.3
Fells Point	12.1	15.4	3.6	3.8	+
Greater Rosemont	15.2	13.6	3.5	2.1	8.6
Greenmount East	14.3	14.7	4.7	3.1	10.7
Inner Harbor/Federal Hill	19.8	15.4	2.7	2.7	5.6
Jonestown/Oldtown*	14.0	12.4	2.8	2.8	10.4
Madison/East End	13.0	10.2	3.5	1.9	6.9
Midtown	20.0	14.0	3.9	1.9	15.7
Patterson Park North & East	12.5	16.2	4.2	2.2	7.5
Perkins/Middle East*	15.0	12.0	3.0	2.4	11.4
Poppleton/The Terraces/Hollins Market	9.9	9.6	4.1	3.4	12.5
Sandtown-Winchester/Harlem Park	14.1	13.4	3.2	2.1	7.3
South Baltimore	15.5	18.0	6.7	1.1	+
Southwest Baltimore	17.0	13.3	4.2	2.1	7.5
Upton/Druid Heights	16.8	10.6	2.8	1.7	12.8
Washington Village/Pigtown	15.8	14.8	8.2	3.9	6.3
Mercy Health Services Area Estimate	15.1	14.3	4.0	2.5	8.6
Baltimore City	15.4	14.7	4.2	2.6	7.6

⁺ Rate not calculated - fewer than five deaths

7. Health Outcomes (continued)

	% of Years of Potential Life Lost by Cause of Deaths				
CSA	Chronic Lower Respiratory Disease	Homicide	Diabetes	Septicemia	Drug-Induced Deaths
Canton	2.3	+	2.9	3.0	+
Clifton-Berea	0.9	16.3	1.1	2.5	7.7
Downtown/Seton Hill	0.8	7.7	3.7	2.3	6.7
Fells Point	1.4	8.3	1.6	1.1	15.9
Greater Rosemont	1.5	17.6	1.0	2.3	7.8
Greenmount East	1.9	12.6	2.8	3.2	8.6
Inner Harbor/Federal Hill	2.1	+	3.6	4.2	10.1
Jonestown/Oldtown*	3.0	12.9	1.5	0.6	5.7
Madison/East End	1.6	24.2	0.5	2.0	7.1
Midtown	0.6	4.5	3.2	0.5	6.8
Patterson Park North & East	0.6	13.6	1.3	1.5	9.4
Perkins/Middle East*	0.9	15.7	2.6	4.4	4.7
Poppleton/The Terraces/Hollins Market	1.6	13.0	1.2	2.9	11.1
Sandtown-Winchester/Harlem Park	1.3	16.4	1.2	2.4	9.1
South Baltimore	3.8	+	0.0	1.8	10.5
Southwest Baltimore	1.4	13.0	2.0	2.2	10.0
Upton/Druid Heights	0.8	14.6	1.9	2.9	8.4
Washington Village/Pigtown	1.6	9.7	1.4	2.6	6.2
Mercy Health Services Area Estimate	1.6	11.4	1.9	2.4	7.2
Baltimore City	1.6	12.5	2.0	2.1	7.8

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⁺ Rate not calculated - fewer than five deaths

7. Health Outcomes (Maternal and Child Health)

<u> </u>				
CSA	Live Births per 1,000 Persons	Teen Birth Rate per 1,000 Persons 15-19 Years Old	% of Live Births with Inadequate Birth Spacing (<12 months)	% of Women Receiving Prenatal Care in the 1st Trimester
Canton	12.0	51.2	2.3	75.0
Clifton-Berea	18.1	123.9	5.5	51.2
Downtown/Seton Hill	9.8	58.7	2.2	63.8
Fells Point	15.4	168.9	2.2	61.3
Greater Rosemont	18.1	113.9	6.3	54.9
Greenmount East	17.9	114.7	6.5	56.2
Inner Harbor/Federal Hill	12.3	68.0	4.2	72.4
Jonestown/Oldtown*	16.6	89.6	5.7	54.7
Madison/East End	24.6	128.1	5.9	50.2
Midtown	6.7	10.7	2.1	66.1
Patterson Park North & East	20.3	122.9	4.4	53.5
Perkins/Middle East*	19.9	142.5	4.6	52.4
Poppleton/The Terraces/Hollins Market	18.1	94.0	7.4	58.0
Sandtown-Winchester/Harlem Park	18.5	116.0	5.2	52.8
South Baltimore	14.2	55.4	2.6	75.0
Southwest Baltimore	20.6	117.9	7.2	57.4
Upton/Druid Heights	21.9	116.9	5.1	55.3
Washington Village/Pigtown	14.5	82.6	4.3	65.3
Mercy Health Services Area Estimate	16.6	98.7	4.7	59.8
Baltimore City	15.5	65.4	4.7	59.5
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7. Health Outcomes (Maternal and Child Health continued)

CSA	% of Births to Mothers who Reported Smoking During Pregnancy	% of Live Births Occurring Preterm (<37 weeks)	% of Births Classified as Low Birth Weight (<5 lb. 8 oz.)	Infant Mortality Rate per 1,000 Live Births
Canton	3.1	10.3	6.6	+
Clifton-Berea	15.2	19.3	15.3	16.8
Downtown/Seton Hill	6.0	13.0	10.2	+
Fells Point	3.9	13.5	7.9	7.1
Greater Rosemont	12.2	16.4	14.8	13.8
Greenmount East	13.4	18.7	18.6	15.7
Inner Harbor/Federal Hill	3.9	10.6	7.2	+
Jonestown/Oldtown*	10.5	17.0	12.4	12.1
Madison/East End	13.5	19.3	16.3	16.7
Midtown	7.1	12.1	12.5	11.5
Patterson Park North & East	9.6	15.4	10.5	8.8
Perkins/Middle East*	11.6	19.1	14.3	+
Poppleton/The Terraces/Hollins Market	10.7	19.1	15.4	13.0
Sandtown-Winchester/Harlem Park	14.8	17.9	16.0	21.2
South Baltimore	7.7	10.5	6.1	8.8
Southwest Baltimore	17.3	18.3	15.2	13.6
Upton/Druid Heights	12.3	19.0	15.2	15.0
Washington Village/Pigtown	19.8	17.1	14.1	12.6
Mercy Health Services Area Estimate	10.7	15.9	12.7	12.0
Baltimore City	10.2	16.0	13.0	12.1

⁺ Rate not calculated - fewer than five deaths

APPENDIX C

Name:

Date:

QUESTIONS/CONVERSATION:

- 1. Introduction: a) Assessment Project b) Define Mercy's CBSA
- 2. How has your career and life experience given you exposure to the community health needs of Baltimore City?
- 3. With respect to the built and social environment, Mercy's neighborhood health profile revealed the following:
 - o Alcohol store density is higher than City average (7.6 vs 4.6 per 10,000 residents)
 - o Tobacco store density is much higher than City avg (45.9 vs 21.8 per 10,000 residents)
 - o Juvenile arrests are dramatically higher than City avg (268 vs 145 per 1,000 teens)
 - o Domestic violence incidents reported are higher than avg (45.1 vs 40.6 per 1,000)
 - o Non-fatal shootings are higher than City average (72.6 vs 46.5 per 10,000 residents)
 - o A recent Point-In-Time census revealed that the homeless population in the City swelled from 2,681 in 2005 to 4,088 in 2011, which equates to a 52% increase during that time. (The geography covered during the recent homeless census significantly aligns with the footprint of Mercy's CBSA.)

How do you think these findings impact the health of your community?

- 4. Mercy's neighborhood health profile revealed that heart disease, cancer, and homicides were the three most important contributors to the % of years of potential life lost (YPLL) in our community. As a leader in our community, what is your reaction to this data?
- 5. With respect to Maternal and Child Health, Mercy's health profile data shows that the teen birth rate is more than twice the City average in significant portions of Mercy's service area. Also, the prevalence of low birth weight babies in neighborhoods throughout Mercy's service area far exceeds the City wide average. How important are these beginning of life indicators to the health of your community?
- 6. What other healthcare issues do you think impact the quality of life of residents in our community?
- 7. What role, if any, does your organization currently play in addressing any of the health needs we have discussed today?
- **8.** What opportunities do you think exist for individuals/organizations to partner with a hospital like Mercy to address the health needs of our community?