What follows is a working draft of the Integrated Population Health Plan:

- Pages 1-3 are the outline of the plan
- Blue text reflects sections that are still to be written.
- Sprinkled throughout are comments and edits from state partners.
- Page 62 contains notes on feedback gathered at SIM IPH public stakeholder workgroup meeting on 4/7/2016.

We welcome feedback on any and all parts of the plan. However, we have some specific focus areas for your input:

1. Provide feedback on models featured at the end of the plan, starting on page 56
2. Does the Population Health Philosophy starting on page 9 reflect our desired direction?
3. Are we missing important existing interventions in our health focus areas?
4. Do you know of any other evidence-based interventions we should look into?

Please email feedback either as notes, questions or track changes to Carol Raynaud Carol.Raynau@UMASSMed.edu.

We also welcome any articles or working papers you think we should review.
Population health outline

Pages 1-3 reflect the Draft Outline of Integrated Population Health Plan. Outline/outline texts are placeholders and will not be included in submission to CMS or part of public version of plan.

Blue reflects text that is TBD

1. **Executive summary** (including endorsements from state health officials and other stakeholders)

2. **Population health preamble**: where are we headed and why?

3. **Description of RI's overall SIM project** (be explicit about link between health care transformation and potential improvements in population health)
   a. Payment reform and quality measures
   b. Description of “the wheel”
   c. Barriers to the Triple Aim (link to social determinants). Delivery system and payment reform is not enough to improve population health. Must design interventions that address social determinants.
   d. Focuses on community engagement to achieve sustainable Transformation.

4. **Definition of Population health- adapted model** (See Figure 1)

5. **Population health plan philosophy**
   a. Population health approach refers to considering the “whole person” and whole community (not just what happens in clinical care)
   b. Healthcare delivery/payment system moving away from a fee-for-service approaches to value based approaches that focus on the quality of care and reducing the cost of care.
   c. Include a focus on behavioral health care as well as Behavioral health integration
   d. Social determinants of health and health equity and life course (see figure 1 where disparities are featured)
   e. Individuals, families and communities empowered with capacity to improve their own health
   f. Whole-person care providers are empowered for practice transformation
   g. Multi-sector/multi-agency collaborations required
   h. Usable/effective/timely surveillance systems that provide measures that are actionable

6. **Description of overall health burden in the state** (referencing morbidity, mortality and cost data as available) (Need state level mortality and life expectancy data and if available across multiple socio-demographic groups; these are the ultimate health endpoints and provide a good start for discussing “population health” and health disparities)
   a. Outline and mapping of the current health status of the population “aligned with the population health metrics document”
   b. Summary of results of most current Hospital Needs Assessments and relevant state health assessments/epidemiology reports. Present state epidemiological profile across health priority areas. **Methodology for presenting behavioral health profile (see Figure 4)**. For each health

DRAFT work in progress: Integrated Population Health Plan 04/12/2016
priority area determine protocol for selecting what measure to highlight: highest burden, highest cost, largest disparity)
c. Identification of communities that: (determine definition for “community”; is this a community that can be identified by a socio-demographic characteristic (e.g. race/ethnicity, age, socioeconomic status, sexual orientation), space/place, disability status,)
   i. May be experiencing health inequality/disparities
   ii. May account for a disproportionate % of health care costs (hot spots) AND high cost patients (See Truven Cost Report for BH data)
d. (See Table 1 for criteria for selecting health measures)

7. Current Status of efforts to address health focus areas
   a. RI’s population health priority areas- history (trends) of these outcomes and why they were chosen.
      i. Tobacco
      ii. Obesity
      iii. Heart disease/stroke
      iv. Diabetes
      v. BH – Truven Report Key Findings
   b. Description of current major initiatives to improve outcomes and risk factors related to the focus areas:
      i. Tobacco use (we need to determine specific outcomes for each (e.g. prevalence, incidence, screening, etc.))
      ii. Diabetes, heart disease and stroke
      iii. Obesity
      iv. Behavioral Health Morbidity –
         1. Redefining Medicaid
         2. Transition Age Youth MH and SUD Grants
         3. Certified Community Behavioral Health Centers Certification
   c. Description of DOH HEZ activities and how they relate to focus areas
   d. Description of other state planning efforts and workgroups related to reforming RI’s health care system
   e. Promising interventions that could be brought to scale.
   f. Description/assessment of state infrastructure / capacity to support those existing initiatives

8. Stakeholders- list of the internal and external stakeholders who helped develop the population health plan (including a description of the role each stakeholder played in the development and implementation of the plan)

9. Goals, objectives and new interventions/policies/system changes to improve health outcomes for each priority area. Interventions include efforts to transform delivery/payment system and create workforce development.
   i. Tobacco use
   ii. Diabetes
   iii. Obesity
   iv. Behavioral Health morbidity

Commented [SS1]: BH integration is relevant for I, ii, and iii; cite data on impact of BH for each
10. Implementation and governance plan for supporting these interventions must offer a guide for multi-sector, multiagency initiative implementation including (be prepared for how to link issues in this portion with population health planning)
   a. Policy and legislative framework
   b. Sustainability model for all interventions, including payment models/sources
   c. Plan to leverage and implement “interoperable” health IT, data infrastructure, data analysis and data sharing “to support the Test model that maps clearly to the state’s logic model” (get clarity on this language)
   d. Description of payment reform’s role in relevant intervention activities.
   e. Plan to align quality measures across health care and population health segments
   f. Description of infrastructure to monitor and report quality measures (including electronic quality reporting)
   g. Strategies to develop new population level data sets using new health IT resources
   h. Plans to help communities develop their capacity to:
      i. Conduct needs assessments
      ii. Certify, monitor and support community-based services
   i. Plans to help health care providers share information about community-based services
      i. Plans to ensure community-based service providers play a central role in coordinated care delivery Integrated Health Homes
      ii. Child Psychiatry Access Program
      iii. Certified Community BH Centers
   j. Plans to use health IT to improve care coordination across all entities involved in the interventions (including community-based providers). Examples include using IT to:
      i. Improve referral management
      ii. Offer better transitions of care
      iii. Improve referral feedback on patient outcomes
   k. Evaluation and monitoring plan that will:
      i. Determine progress towards goals
      ii. Allow for mid-course correction
      iii. Measure level of success in achieving goals/objectives
      iv. Highlight lessons learned

Commented [MH2]: Gus Mannochia: We need aligned incentives. Have to address fragmentation.
Commented [MH3]: We will evaluate how fragmentation is addressed in the operational plan. Specifically addressing fragmentation from perspective of provider and patient.
Commented [RT4]: Do we have policy/legislative levers for when a disease burden reaches a significant burden (how is this defined?) or a significant disparity is noted?
Commented [RT5]: Is the opioid task force a good model? Pulling in the criminal justice system
Commented [RT6]:
Commented [MH7]: ARW comment: Does this include Medicaid and HSRI activities?
Population Health Plan Outline Draft Text

1. Executive Summary
[insert text]

2. Population Health Preamble

Rhode Island aims to achieve measurable improvement in the health and productivity of all Rhode Islanders. To achieve this aim, the healthcare delivery, public health, community development, and social service sectors as well as the many academic, public, and private institutions in our state will work together to ensure that all Rhode Islanders are able to achieve their highest health potential, without system/structural barriers. This population health improvement effort requires multi-sector/multi-agency collaborations to help us transition from an uncoordinated, healthcare provider and payer-centric care focused health services environment to an environment where public health, social service, and healthcare delivery systems are well-integrated as well as outcomes-oriented and person-centric.

Our approach to population health improvement focuses on health across the life course (from birth to death) from the perspective of the “whole-person.” Thus, when we refer to “population health” this includes behavioral health, where behavioral health includes mental health and substance use disorders. Rhode Island’s population health plan includes a vision that behavioral health is “everyone’s business,” a vision founded on a common understanding that behavioral health and wellbeing play a critical role in creating a well-functioning, healthy, and productive community. It is a population health vision, with the following goals:

- To improve the behavioral health and wellbeing of all Rhode Islanders. That is, people, families and communities are knowledgeable and have the skills and resources to actively develop their own behavioral health wellbeing.
- To promote “any door as the right door” to identifying mental illness and substance use disorders early and providing the supports and interventions to enable people to recover rapidly.
- To create healthy, resilient inclusive communities throughout Rhode Island.
- To ensure that persons with behavioral health conditions, including severe and persistent mental illness and/or addictive disease, have access to evidence-based services that support recovery and full inclusion in their communities in the least restrictive setting possible

3. Background and Description of SIM Project

The cost of health care, including behavioral healthcare, in Rhode Island is…and represents XX% of the overall state budget. The cost of behavioral health treatment alone was $853 million in 2013, 1.6% of the gross domestic product (GDP), which is higher than the national average of 1.2%. In addition, it’s estimated that he indirect costs associated with behavioral health disorders cost Rhode Island $789 million in 2015, 9.5% of the state’s budget. This percent has been increasing at a rate of XX% each year, which is not sustainable; and if growth continues at this rate the cost of healthcare will begin to impact funding for other state functions. This problem is not unique to Rhode Island as many states, as well as the federal government recognize that the rate of growth in healthcare spending as well as the current way we pay for health care is not sustainable. To address this problem, the Centers for Medicare and Medicaid (CMS)...

Rhode Island received a $20 million dollar State Innovation Model (SIM) grant from the Centers for Medicare and Medicaid Studies (CMS) to redesign how the state’s health care system delivers and pays for health care, including behavioral health care (hereafter referred to as “whole person care”). The investment assumes that moving away from a fee for service payment model towards a system that rewards health care, including

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behavioral health, providers for quality and better outcomes will improve the overall health of the residents of Rhode Island and lower health care costs.

The Rhode Island State Innovation Model Test Grant (RI SIM) builds on a vibrant body of health reform efforts over the past decade in Rhode Island that have been described and analyzed by healthcare leaders and stakeholders participating in the following initiatives:

- R.I. Health Care Planning and Accountability Advisory Council, created by the Rhode Island General Assembly;
- Rhode Island Healthcare Reform Commission, created by Governor Lincoln Chafee and Chaired by Lt. Governor Elizabeth Roberts
- Rhode Island State Healthcare Innovation Plan (SHIP), led by Lt. Governor Elizabeth Roberts
- Health stakeholders convened by US Senator Sheldon Whitehouse and Rhode Island Foundation President & CEO Neil Steinberg
- Working Group for Healthcare Innovation, convened by Governor Gina Raimondo

While these initiatives focused on different aspects of the healthcare delivery system, a recurring theme in the recommendations from the culminating reports is the need for better coordination and alignment between stakeholders and these health reform initiatives across the state, as well as improved coordination across the various segments of the healthcare delivery system.

Rhode Island has the building blocks for a healthy population: including world-class healthcare providers; top medical, nursing, and social work schools; an environment with places to walk and play; a growing community committed to healthy, local food sources; and state leadership that understands the benefits of leveraging these building blocks to improve the health of Rhode Islanders. However, we also face difficult roadblocks to improving the health of our population such as unacceptable levels of health risks, including lead in our housing stock, high opioid addiction rates, consistently increasing rates of children facing behavioral health challenges, and a significant number of residents with preventable chronic diseases. Thus, even with the building blocks for a healthy populations, our “health care delivery system” lacks coordination among providers, rewards them with little or no regard to the quality of the care provided and struggles to meet the needs of all patients in terms of access to care when needed.

**Now in the time to make the changes we need.** Our SHIP plan laid the way with this call for real reforms: Given the current environment of change in health care, the window of opportunity to change the health care system is open wider than it has been in a generation. The implementation of federal reforms, coupled with market changes, the aging of the population and breakdown of the old business model create an impetus for change; and this change is further encouraged by an influx of the newly insured. It is during this time that is primed for change and innovation that Rhode Island seeks to take advantage of the opportunity to shape its health care system for the future. This new health care delivery system would have four main objectives: 1) lifelong support of health and wellness, 2) a focus on population health, 3) coordinated models of care and 4) payment transformation.

Our state leaders came together through the SHIP process and agreed to pursue a sustainable system of supports and services to attain and promote health, as defined above, for all of our residents. In doing so, these leaders recognized through creative partnerships and hard work, individuals and families can partner with payers, providers, and health-related community based organizations, to attain the vision of a new system of care.
Thanks to the support of the Centers for Medicare and Medicaid’s $20,000,000 investment in Rhode Island’s healthcare system, the SIM Steering Committee and state staff team is bringing the SHIP plan to fruition. SIM is committed to maintaining an energetic level of stakeholder engagement in reform that together, will help build a new, more sustainable healthcare system in the state, based on value-based payments for care rather than on volume, equally prioritizing physical and behavioral health, and focused on addressing the social and environmental determinants of health. The new system will support the health of Rhode Islanders, improve their experience and maintain a lower cost burden for them, government, employers and payers across the state – toward our vision of the Triple Aim.

**SIM Vision Statement – The Triple Aim:** Improving the patient experience of care (including quality and satisfaction); Improving the health of populations; and reducing the per capita cost of health care.

**SIM Mission Statement:** SIM is a multi-sectoral collaborative— with the patient in the center of our work. SIM is committed to an integrated approach to the physical and behavioral health needs of Rhode Islanders, carried out by moving from a fee-for-service health system to one based on value that addresses the social and environmental determinants of health. Our major activities will provide support to the healthcare providers and patients making their way through this new healthcare system so that it can be as effective as possible. Additionally, the new system is being built upon the philosophy that together - patients, consumers, payers, and policy makers – we are all accountable for maintaining and improving the health of Rhode Islanders.

**SIM Theory of Change:** Rhode Island’s payment system is change to focus more on value and less on volume. If SIM makes investments to support providers and empower patients to adapt to these changes, and we address the social and environmental determinants of health, then we will improve our population health and move toward our vision of the Triple Aim.

While providing high quality healthcare is the primary goal for the healthcare delivery system, the SIM project is also focused on helping individuals connect to disease prevention resources, increase early intervention to reduce late stage presentation for disease, and improve outcomes throughout care navigation for patients. As such, the SIM grant also requires Rhode Island to develop a plan for improving population health. A population health plan helps the state assess the health of all Rhode Islanders, determine the most significant needs, develop goals and strategies for addressing those needs, and implement the strategies to ensure all Rhode Islanders have the opportunity to achieve their highest health potential and have access to high quality health care throughout their lives. The SIM grant requires that the population health plan identify opportunities to:

- Advance population health as part of the state’s proposed health system transformation activities
- Maximize the impact of various state/local activities on population health, quality of healthcare and healthcare costs.

Specifically, the population health plan must offer a detailed strategy to reduce state rates of the following SIM Population Health Plan priority areas:

1. **Tobacco use;**
2. **Obesity;**
3. **Chronic disease such as diabetes, heart disease and stroke**
4. **Behavioral Health morbidity, with an initial focus on children with social and emotional disturbance, depression, serious mental illness and opiate use disorders/substance abuse.**
This population health plan will serve two purposes. First, the population health plan will describe the health of Rhode Islanders and the current landscape of population health improvement efforts in the state across the SIM Population Health Plan priority areas; and second, the population health plan will provide frameworks, strategies, and goals for population health improvement planning efforts for the state to follow to ensure sustainability in population health improvements.

4. Definition of population health

Health is not merely the absence of disease; health is the state of complete physical, mental and social well-being as well as the “ability to adapt and to self-manage, in the face of social, physical and emotional challenges.”¹ Health is considered a resource for everyday life (Ottawa Charter for Health Promotion) and is created where we live, learn, work, and play. These contexts are embedded in family/social networks, health care settings/practices, and the physical and social environment. (See Figure 1).² [add more text here: RTS]

Population health refers to the aggregation of health outcomes of a group of individuals selected based on a specific characteristics (such as geography, care setting, health status), including the distribution of such outcomes within and across groups.³ There are many factors that impede an individual’s ability to achieve his/her optimal health or to obtain the health care s/he needs. Thus, population health also includes a focus on the determinants of the health outcomes of interest (See Model 2 for some examples of determinants and health outcomes). The health of the population (or population health) is a shared responsibility⁴ of many interdependent sectors across the state.

When “population health” is referenced here, the reference includes behavioral health, and behavioral health includes mental health and substance use disorders. “Behavioral Health” refers to a mental health and/or substance use disorder that meets diagnostic criteria.

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³ Kindig DA. Understanding population health terminology. Milbank Q 2007;85:139-161.
Figure 1. Multilevel framework of social/environmental determinants of health (adapted from Gary-Webb, et al 2013)

Commented [MH14]: James Rajotte: More information describing the elements of Figure 1.

Commented [RT15]: Include life stage age groupings in the “life course” arrow.
5. Population Health Plan Philosophy

Rhode Island has assembled a diverse group of stakeholders from across the state to build a comprehensive and inclusive population health plan. Our partners draw from state and local government, the private sector, academia and various community organizations that have expertise in both public health and clinical care. This process has been guided by seven over-arching principles: principles that together describe the overarching work of our SIM project:

SIM is a multi-sectoral collaborative, based on data – with the patient in the center of our work. SIM is committed to an integrated approach to the physical and behavioral health needs of Rhode Islanders, carried out by moving from a fee-for-service health system to one based on value that addresses the social and environmental determinants of health. Our major activities will provide support to the healthcare providers and patients making their way through this new healthcare system so that it can be as effective as possible.

1. **We begin with the patient, with a commitment to empowering individuals, families and communities to improve their own health.**

Any successful efforts to improve population health must include efforts to activate Rhode Islanders with the skills, knowledge and motivation they need to live healthy lives. In the Rhode Island population health plan, we are also committed to making it easier for local communities to be involved

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Commented [MH16]: James Rajotte: I think we should include incorporation of the changing environment or unexpected interruptions to routing functioning of a community into the population health model somewhere – perhaps a determinant.

Commented [RT17R16]: Perhaps we can discuss the uncertainty of one’s social and environmental context in the text, unless there are specific measures of “the changing environment or unexpected interruptions to routine functioning.” I like the idea of including an “allostatic load” type variable here that might capture wear and tear that results from over-stimulation of the stress response resulting from the “toxic stress” that has been mentioned as an important determinant by many stakeholders at our meetings. I will think about whether/how to include in the model or in the text.

Commented [MR18]: We had called this the vision – but it isn’t really a vision statement (more like a mission statement). I think we can just talk about describing our work until we figure out the right word.
in the development of goals, strategies and policies that improve conditions impacting their health. Workforce development is a key tool in these efforts. We aim to empower communities from within by helping residents with existing cultural and linguistic competence receive the training they need to take on new roles such as community health workers, clinicians, and behavioral health specialists.

2. **Reliance on multi-sector/multi-agency collaboration**

Improving population health and decreasing inequalities in health requires a multi-agency/multi-sector approach that includes expanding our current understanding of what creates health. The success of this population health plan will rely on significant collaboration among a range of partners, include those in mental health, substance use, primary care, education, public safety, social service, and faith-based communities. Strategic planning must be well coordinated to fully identify the impact of policies not only on overall population health, but also on health disparities. Such coordination will also help to prevent the duplication of efforts, to highlight gaps in service development, and to identify potential useful data linkages. The population health plan recognizes that policies related to transportation, housing, education, public safety, environmental protection will affect the health and well-being of residents as much as any policies specifically related to Rhode Island’s public health, medical and behavioral health system. This requires a “no wrong door” and “health in all policies” approach where the potential health impact is considered.

3. **Commitment to improve our ability to collect, share, and use data to drive action**

Assessment of whole-person health outcomes, risk factors/determinants, interventions, and policy effectiveness requires usable, sustainable, shared surveillance systems that produce timely measures for action and data. That data is also only truly useful if it is accessible across institutional/organizational boundaries. Rhode Island’s population health plan stresses the importance of strengthening our data sources and empowering our communities to use those sources effectively to better coordinate care as well as make informed decisions about their personal health and the overall health of the state.

4. **An integrated approach to the physical and behavioral needs of Rhode Islanders.**

The state of Rhode Island is committed to developing and implementing a population health plan that embraces the whole person and considers the physical and mental health needs of our residents. All recommendations and metrics in the population health plan reflect this integrated approach, which we will refer to as “whole person care”.

For example, although tobacco use, obesity, diabetes, stroke and heart disease are traditionally considered “physical” diseases, the plan acknowledges and addresses how these health conditions are intertwined with the mental health and substance abuse needs of the state’s population. In particular, the plan recognizes the significant role primary care practitioners play in addressing the interplay between patients’ physical and behavioral health needs throughout their lifespan. In so doing, a “whole person care” approach is the hallmark of population health improvement efforts in our plan.

5. **Commitment to transforming our health care delivery system, moving away from a fee for service**

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DRAFT work in progress: Integrated Population Health Plan 04/12/2016
based payment model to a value based approach.

Our plan embraces the evolving role of new models of health care delivery such as Patient Centered Medical Homes (PCMH), Accountable Care Organizations (ACOs) and Accountable Care Communities (ACCs) to improve population health. The plan also recognizes Collaborative Care approaches that integrate behavioral health care into primary care practice such as the IMPACT model⁷, TEAMCare⁸ and COINCIDE⁹.

Included in our approach is a recognition that physical and behavioral health approaches must transform from disease-focused treatment to care that focuses on prevention and early detection, and where appropriate/available evidence-based interventions. In all these cases, Rhode Island’s healthcare delivery systems will accept responsibility for managing care and improving the health of populations through multi-sector/multi-agency partnerships.

6. Awareness of the social and environmental determinants of health and health equity.

Health is created where we live, learn, work, and play. Therefore, Rhode Island’s population health plan focuses not only on improving clinical care, but influencing the various social, economic, and environmental factors, including exposure to trauma, that affect Rhode Islanders’ health outside of the medical and behavioral healthcare delivery systems. These considerations include examining strategies that promote resiliency and recovery, and reduce inequalities in factors that influence health across the diverse populations in our state.

Factors promoting and undermining the health of individuals and populations should not be confused with the social processes underlying their unequal distribution in the population.¹⁰ To ensure we capture both processes in Rhode Island, our population health plan examines not just statewide estimates for our specific health focus areas, but also disparities in those health outcomes across Rhode Island communities.

7. Consistent and reliable support for provider practice transformation

Rhode Island is committed to empowering healthcare (including Behavioral health care) providers to transform their practices “to improve the quality of care, the patient experience of care, the affordability of care, and the health of the populations they serve.”¹¹ Specifically, providing assistance to grow and strengthen the presence of ACOs, PCMHs and Community Behavioral Health Centers of Excellence. This empowerment includes not only support for changes in approach and infrastructure, but opportunities to actively participate in the state’s overall efforts to transform its delivery system. Workforce development also plays a role in these efforts, giving providers the skills and additional team members they need to provide comprehensive "whole person" care.

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8. Evaluating our work, with a focus on the patient.

Efforts in population health improvement attempt to “bridge” what happens in the healthcare delivery setting in the provider’s office, the clinic, or hospital bed to what happens in the places where people live their lives (e.g. home, workplace, school). The population health plan in Rhode Island will serve to guide efforts to improve the health of the entire population of residents, as well as guide efforts to address why some population groups are healthier than others. This approach requires a focus not only on the overall distribution of the specific SIM Population Health Plan priority areas in the state, but also differences between groups to highlight disparities in those health areas. Fundamental to population health improvement efforts, we begin with a focus on the patient, and end with this too. Our population health plan will need to be revisited and evaluated, to ensure that it is accomplishing our goals.

6. Description of overall health burden in the state

(Referencing morbidity, mortality and cost data as available) (Need state level mortality and life expectancy data and if available across multiple socio-demographic groups; these are the ultimate health endpoints and provide a good start for discussing “population health” and health disparities)

a. Outline and mapping of the current health status of the population “aligned with the population health metrics document”

The current health status of Rhode Island....

In 2009, Rhode Island women ranked 12th in the US in life expectancy (LE = 82.3 years) and Rhode Island men ranked 17th (LE = 77.2 years)(see Tables 2 and 3).

Behavioral Health Morbidity/Mortality

Morbidity

In order to impact the long-term health of Rhode Islanders, efforts must address the prevalence of mental health and substance use disorders in all age groups. Depression is the third most highly reported chronic condition among Rhode Islanders across the lifespan.15

Children

The presence of behavioral health disorders among children in Rhode Island is a serious concern. More than one in five children had one or more “emotional/behavioral conditions.”14 Children are exposed to a number of

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16 Utah 82.1
17 Arizona 82.1
18 Washington 82
19 Iowa
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23 Maine
24 Illinois
25 Virginia
26 New Mexico
27 Maryland
28 United States

Table 2. Life Expectancy at Birth (in years), by Gender (2009)

Commented [MH19]: James Rajotte: How does oral health and eye care fit into the picture given they are also payment-plan and Medicaid-dependent? Definitely needed for inclusion.

Commented [RT20R19]: We received some suggestions on how to include eye care in the diabetes section, so we plan to include data on eye care in that section. We can consider oral health in the tobacco use section by highlighting the impact of smoking on oral health and then expanding that section to include oral health more generally.

Commented [RT21]: Still working on filling this in

Commented [MH22]: Dacia Read: I think there may be more updated stats available through KidsCount on April 11. They release their new fact book that day.
risk factors that can lead to behavioral health disorders including high rates of poverty, living with mothers and/or fathers with behavioral health disorders, living in less positive home environments and exposure to trauma. The rates of children suffering from recurrent child abuse and neglect and abuse/neglect while in foster care placement exceed national standards. In addition, protective factors, such as enrollment in nursery school or preschool, are less prevalent among young children in Rhode Island than in the rest of the country. Children and adolescents in Rhode Island have high rates of depression, and the rates of ADHD diagnosis and use of marijuana and other illicit drugs exceeds the national average. The need for substance use disorder treatment among children and adolescents in facility placement almost tripled between 2009 and 2011.

Adults
Behavioral health disorders are a concern for adult Rhode Islanders as well. The rate of adults diagnosed with any mental illness is high. The rates of adults diagnosed with a serious mental illness and adults reporting a major depressive episode exceed national averages. The rate of binge drinking among Rhode Islanders exceeds the national average. More than one in five adults, ages 18 to 24 years old, reported alcohol and/or drug abuse/dependence; this rate increased for Rhode Islanders during the same time that the national rate decreased. Reported drug use in the past month among 25 – 64 year old Rhode Islanders is almost double the national average.

Older Adults
According to the 2015 Truven report, adults ages 50 yrs and older reported frequent mental distress at higher rates than the national average. However, this difference leveled out for adults 65 yrs and older.

Please see Appendix X for detailed prevalence rates of mental health and substance use disorders for Rhode Islanders by age group.

Mortality
Suicide
Suicide is a very real concern in Rhode Island. In 2011, the Rhode Island Child Death Review Team issued a brief on suicide that revealed that 77 young people between 13 and 24 died by suicide in Rhode Island between 2005-2010. Rhode Island Emergency Departments reported that during that same time period, about 500 youth were evaluated and treated each year as a result of attempted suicide. The suicide rate for adult Rhode Islanders age 34 to 65 years old increased by 69% between 1999 and 2010. One in sixty-seven Rhode Islanders attempt suicide.

<table>
<thead>
<tr>
<th>Location</th>
<th>Male</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Minnesota</td>
<td>78.7</td>
</tr>
<tr>
<td>2 Connecticut</td>
<td>78.6</td>
</tr>
<tr>
<td>3 Utah</td>
<td>78.3</td>
</tr>
<tr>
<td>4 California</td>
<td>78.3</td>
</tr>
<tr>
<td>5 Vermont</td>
<td>78.2</td>
</tr>
<tr>
<td>6 Massachusetts</td>
<td>78.1</td>
</tr>
<tr>
<td>7 New Hampshire</td>
<td>78</td>
</tr>
<tr>
<td>8 Hawaii</td>
<td>78</td>
</tr>
<tr>
<td>9 New York</td>
<td>77.9</td>
</tr>
<tr>
<td>10 Washington</td>
<td>77.8</td>
</tr>
<tr>
<td>11 New Jersey</td>
<td>77.8</td>
</tr>
<tr>
<td>12 Colorado</td>
<td>77.8</td>
</tr>
<tr>
<td>13 Nebraska</td>
<td>77.7</td>
</tr>
<tr>
<td>14 Wisconsin</td>
<td>77.5</td>
</tr>
<tr>
<td>15 Idaho</td>
<td>77.4</td>
</tr>
<tr>
<td>16 Iowa</td>
<td>77.3</td>
</tr>
<tr>
<td>17 Rhode Island</td>
<td>77.2</td>
</tr>
<tr>
<td>18 Oregon</td>
<td>77.2</td>
</tr>
<tr>
<td>19 Arizona</td>
<td>77.2</td>
</tr>
<tr>
<td>20 North Dakota</td>
<td>76.9</td>
</tr>
<tr>
<td>21 Maine</td>
<td>76.8</td>
</tr>
<tr>
<td>22 Virginia</td>
<td>76.6</td>
</tr>
<tr>
<td>23 South Dakota</td>
<td>76.6</td>
</tr>
<tr>
<td>24 Florida</td>
<td>76.6</td>
</tr>
<tr>
<td>25 Montana</td>
<td>76.4</td>
</tr>
<tr>
<td>26 Illinois</td>
<td>76.4</td>
</tr>
<tr>
<td>27 Kansas</td>
<td>76.3</td>
</tr>
<tr>
<td>28 Alaska</td>
<td>76.3</td>
</tr>
</tbody>
</table>

United States | 76.3 |
Overdose
The death rate for all ages attributed to narcotics and hallucinogens more than doubled between 2011 and 2013; 239 Rhode Islanders died as a result of a drug overdose in 2014. Rhode Islanders accounted for 12% of all drug overdose deaths reported nationally: Rhode Island is one of sixteen states in the country where the number of opioid related overdose deaths exceeds fatal motor vehicle deaths. The highest rates of drug-related deaths in Rhode Island are in:

- #1 Kent County
- #2 Providence County
- #3 Washington County
- #4 Newport
- #5 Bristol

Alcohol related motor vehicle deaths in Rhode Island also exceeded the national average.

Chronic conditions affect a substantial number of Rhode Islanders (See Table 4a). Hypertension, diabetes, and depression are the most common, affecting roughly 165,000; 83,000; and 66,000 insured Rhode Islanders respectively. Not surprisingly, hypertension and diabetes increase with age; approximately 65% of Rhode Island older adults have hypertension.

Table 4a. Total Number of Insured Rhode Islanders with select chronic conditions

<table>
<thead>
<tr>
<th>Condition</th>
<th>Commercial 2014</th>
<th>Medicaid 2013</th>
<th>2014 Commercial and Medicaid</th>
<th>2013 Medicare</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hypertension</td>
<td>46,443</td>
<td>8,944</td>
<td>55,387</td>
<td>71,888</td>
</tr>
<tr>
<td>Diabetes</td>
<td>33,368</td>
<td>27,859</td>
<td>61,227</td>
<td>40,227</td>
</tr>
<tr>
<td>GI Disorders, Minor</td>
<td>29,908</td>
<td>3,808</td>
<td>33,716</td>
<td>33,716</td>
</tr>
<tr>
<td>Asthma</td>
<td>20,968</td>
<td>14,795</td>
<td>35,763</td>
<td>25,404</td>
</tr>
<tr>
<td>Thyroid Disease</td>
<td>14,591</td>
<td>6,885</td>
<td>21,480</td>
<td>11,480</td>
</tr>
<tr>
<td>High Blood Pressure</td>
<td>12,194</td>
<td>7,231</td>
<td>19,425</td>
<td>19,425</td>
</tr>
<tr>
<td>Endocrine &amp; Metabolic Disorders</td>
<td>9,323</td>
<td>2,790</td>
<td>12,113</td>
<td>12,113</td>
</tr>
<tr>
<td>Joint &amp; Musculoskeletal Disorders</td>
<td>8,323</td>
<td>2,061</td>
<td>10,384</td>
<td>10,384</td>
</tr>
<tr>
<td>Certain Neurological Disorders</td>
<td>7,280</td>
<td>2,076</td>
<td>9,356</td>
<td>9,356</td>
</tr>
</tbody>
</table>

Heart disease, stroke, diabetes, and depression are among the most common, costly, and preventable of illnesses in Rhode Island (see Table 4b).

Table 4b. Ten most costly chronic conditions among insured patients in Rhode Island

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Behavioral Health Cost Data

In 2013, Rhode Island spent $853 million attributed to the direct costs for behavioral health treatment; this represented 1.6% of the gross domestic product, greater than the national average of 1.2%. The average medical cost per person with a behavioral health disorder in Rhode Island was higher than any other state in New England.27

Of the total expenditures for behavioral healthcare, Rhode Island payers spend only about 10% on substance use disorder treatment, despite the fact that substance use disorders are associated with high personal costs to Rhode Island residents and budgetary costs to the state in indirect expenditures. Rhode Island payers spend almost 9 times the amount on mental health treatment as substance use disorder treatment. Medications and inpatient treatment account for slightly more than 50% of the total spend. Psychotropic medications accounted for 87% of BH prescription costs; the use of, and reimbursement for, medications to treat substance use disorders is increasing but still lags well behind.28

In addition to the direct costs, an estimated $789 million, 9.5% of the state’s 2015 budget, was attributed to indirect costs associated with behavioral health disorders, costs attributed to the Department of Children Youth and Families, the Department of Human Services, disability benefits, the Department of Corrections and public safety.29

b. Summary of results of most current Hospital Needs Assessments and relevant state health assessments/epidemiology reports. Present state epidemiological profile across health priority areas.

Community Health Needs Assessments

Rhode Island’s hospitals are currently preparing their 2016 Community Health Needs Assessments (CHNAs), which will build on the efforts and infrastructure created for the 2013 CHNAs reports.

In 2013, as in 2016, a majority of the state’s hospitals worked with the Hospital Association of Rhode Island (HARI) to conduct a statewide Community Health Needs Assessment. The report drew on data from the Behavioral Risk Factor Surveillance System (BRFSS) as well as secondary data on measures such as "mortality rates, cancer statistics, communicable disease data, and social determinants of health (poverty, crime, education, etc.)."1

27 Truven Cost Report
28 ibid
29 ibid
These data sources were later compiled on a HARI sponsored website, Rihealthcarematters.org, to make the information easily available to the public. The website features not only data measures but maps, resources, and tools for generating reports on a range of topics, from access to health insurance to the violent crime rate. When available, data can be broken down by census track, county and zip code. The site also compares Rhode Island data with Healthy People 2020 benchmarks to show where the state is at, below or above national standards and uses colors to show how the state or specific communities rank when compared to other parts of the country. Red indicates a poor rank, yellow indicates a fair performance and green indicates a good rank. An outside contractor manages Rihealthcarematters.org to ensure the website reflects the most updated version of each data source. So although the Hospital Association of Rhode Island is still completing its 2016 CHNA process, the RI Health Care Matters website provides a starting point for examining the most recent relevant surveillance data for the state.

The RI Health Care Matters features numerous healthcare related data, and here is a sample of some measures that are relevant to the SIM Population Health priority areas:

<table>
<thead>
<tr>
<th>Measure</th>
<th>Statewide</th>
<th>Data source</th>
<th>Disparity data?</th>
<th>Other geographies available?</th>
<th>Measurement period</th>
<th>Healthy People 2020 target</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Premature Death</strong> (years of potential life lost before age 75)</td>
<td>5,808 per 100,000 population</td>
<td>County health rankings</td>
<td>No</td>
<td>County</td>
<td>2010-2012</td>
<td>NA but “good” compared to other U.S. States</td>
</tr>
<tr>
<td><strong>Adults who smoke</strong></td>
<td>17.4%</td>
<td>BRFSS</td>
<td>Age, gender, Race/ethnicity</td>
<td>County</td>
<td>2013</td>
<td>Not met (12%)</td>
</tr>
<tr>
<td><strong>Adolescent cigarette usage</strong></td>
<td>8%</td>
<td>Youth Risk Behavior Surveillance System (YRBSS)</td>
<td>No</td>
<td>No</td>
<td>2013</td>
<td>NA</td>
</tr>
<tr>
<td><strong>Adults with Diabetes</strong></td>
<td>9.3%</td>
<td>BRFSS</td>
<td>Age, gender, Race/ethnicity</td>
<td>County</td>
<td>2013</td>
<td>NA but “good” compared to other U.S. States</td>
</tr>
<tr>
<td><strong>Adults who are obese</strong></td>
<td>27.3%</td>
<td>BRFSS</td>
<td>Age, gender, Race/ethnicity</td>
<td>County</td>
<td>2013</td>
<td>Met (30.5)</td>
</tr>
<tr>
<td><strong>Age adjusted</strong></td>
<td>27.9</td>
<td>Centers for</td>
<td>Gender</td>
<td>County</td>
<td>2012-2014</td>
<td>Met (34.8)</td>
</tr>
</tbody>
</table>
The Hospital Association of Rhode Island’s 2013 Community Health Needs Assessment also relied on a series of key informant surveys with 49 Rhode Islanders including “elected officials, healthcare providers, health and human services experts, long-term care providers, representatives from the business community, and educators.” When asked about the “three top health issues” they saw in their community, the three most cited issues were:

- Access to Health Care/Uninsured/Underinsured (mentioned by 82% of respondents)
- Mental Health/Suicide (mentioned by 47% of respondents)
- Overweight/Obesity (mentioned by 39% of respondents)

Substance abuse/alcohol abuse, Diabetes, and Maternal/Infant health were the next three most frequently mentioned health issues.

When asked about specific barriers to access to health care, respondents listed these top areas of concern (note that this work was completed before the full implementation of the Affordable Care Act and the expansion of Medicaid/availability of health insurance tax credits):

- Lack of Health Insurance Coverage
- Lack of Transportation
- Inability to Pay Out of Pocket Expenses

Survey respondents listed immigrants/refugees, the low-income/poor, the Hispanic/Latino population and Rhode Islanders with mental health needs as the most underserved populations in the state.

Two focus groups with a total of 21 local behavioral health care experts focused entirely on “mental health issues and resources within Rhode Island.” Participants listed these issues as their top behavioral health concerns:

- Increased substance abuse (especially among adolescents)
- Co-occurring mental illness and substance abuse
- Patients with complex conditions
- Relationship between mental and physical health.

The behavioral health experts listed adolescents, the elderly, the homeless and non-English speakers as the populations that are most underserved when it comes to mental health services.
Focus group participants also stressed the need to better integrate primary care and mental health, provide regular mental health screenings of patients with chronic conditions, and support existing partnerships with schools and community organizations. Participants advocated for a shift away from treatment plans that were led by payers to ones that are led by providers, noting that current restrictions prevent them from offering the best treatments for their patients.

When the Hospital Association combined this qualitative data with its various data sources about the health of Rhode Islanders, it noted that the research revealed a number of “overlapping health issues.” The CHNA report highlights these issues as the most prominent concerns for Rhode Island:

- **Access to Care**
  Stakeholders raised specific concerns about the ability of Rhode Island’s uninsured/underinsured residents to access care. They also highlighted difficulties accessing some types of specialty care and a lack of bilingual providers.

- **Alcohol Use**
  Data used in the CHNA report found a high density of liquor stores and higher reported rates of adult alcohol use when compared to national averages. Mental health professionals also discussed concerns about “co-occurring disorders with mental health issues and addiction.”

- **Asthma**
  Rhode Island’s rate of adults who ever received an asthma diagnosis and those who still struggle with asthma are higher than rates in other parts of the country. Children in Rhode Island also have elevated asthma rates.

- **Breast Cancer Incidence**
  Rhode Island has higher rates of breast cancer than other parts of the country, but death rates due to breast cancer are lower, indicating that patients might receive more effective treatment or earlier detection.

- **Mental Health Status**
  Rhode Islanders report a higher than average number of days in the past month when poor physical or mental health interfered with their ability to function. There is also an elevated rate of residents with a “depressive disorder.” Stakeholders also identified mental health as one of the state’s key health issues, specifically stressing a lack of treatment options, which results in patients using the emergency room instead of more appropriate sources of care.

- **Overweight and Obesity**
  At the time this report was written, 62.3% of Rhode Islanders were either overweight or obese. Data analyzed in the CHNA also indicates that Rhode Islanders exercise less than their peers in other states. Key stakeholders also voiced their concerns about the relationship between obesity and chronic diseases such as diabetes.
The Hospital Association of Rhode Island published these findings in one report to offer a statewide perspective on the health of the state, but it also generated reports for each of its member hospitals, focusing on data specific to the needs of each medical center’s service area.

Lifespan Hospitals (Rhode Island Hospital, Bradley Hospital, The Miriam, Hasbro Children’s Hospital and Newport Hospital) did not participate in the Hospital Association’s CHNA process. The Community Health Needs Assessments for Lifespan hospitals focused on data specific to the service areas and priorities of Lifespan’s medical centers.

For 2016, the Hospital Association is once again organizing a statewide assessment for its member hospitals. The new report includes findings from analyzing public health and utilization data. It also summarizes the results of “partner forums” with community partners and “focus groups” with health consumers. The final reports are scheduled to be approved by member hospitals this summer.4

Lifespan is also in the process of completing its data analysis and collection efforts for its 2016 CHNA report.

**Relevant state health assessments/epidemiology reports**

c. **Identification of communities that:** (determine definition for “community”; is this a community that can be identified by a socio-demographic characteristic (e.g. race/ethnicity, age, socioeconomic status, sexual orientation), space/place, disability status,)
   i. May be experiencing health inequality/disparities
   ii. May account for a disproportionate % of health care costs (hot spots) AND high cost patients (See Truven Cost Report for BH data)

**Access to Behavioral Healthcare**

To date, behavioral healthcare in Rhode Island has not been organized or driven on principles associated with a population health approach.

1) Behavioral health services are not well defined across state agencies and systems to comprehensively address the emergence and development of disorders, recognition of specific needs for treatment, and adoption of age-specific evidence-based practices across the life span

2) Population health approach reflects a comprehensive continuum of services that is effective to address problematic substance use and mental disorders. The services include health promotion, prevention, harm reduction, early identification, primary, secondary and tertiary long-term treatment and re-integration support. These services are not mutually exclusive and, taken together, form an integrated and evidence-based system of care.

Inadequate access to behavioral health treatment is a commonly expressed concern in Rhode Island. Community Health Needs Assessments conducted by the Hospital Association of Rhode Island30 and individual assessments conducted by Bradley and Hasbro Hospitals reported that “access to mental health services” was a significant health issue identified by respondents with members served by their hospitals.31

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Commented [MH24]: Need a reference for this. Does Joel have Lifespan timeline on paper anywhere?

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DRAFT work in progress: Integrated Population Health Plan 04/12/2016

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Pregnant Females
Pregnant females in Rhode Island engage in behaviors known to contribute to greater health risks for their unborn babies:

- 9.4% reported drinking alcohol within the last month of pregnancy
- 20% filled a prescription for opioid medication
- 10% smoked during the last 3 months of pregnancy

As more research emerges about the impact of alcohol use by pregnant women on their unborn children during any stage of pregnancy, there is a critical need for universal education about drinking and its effects on the wellbeing of unborn children.

Children
There are several indicators of the lack of access to behavioral health treatment for children in Rhode Island.

- 34% of children were not able to access mental health services when needed
  - Disparities in receipt of mental health services when needed were significant: 75% of African American and 74% of Hispanic children did not receive treatment when needed, as opposed to 17.2% of White children.

- In 2013, 282 children and adolescents “boarded” in Rhode Island emergency departments an average of two days due to the lack of access to needed mental health treatment/placement.

- DCYF out-of-state placements for children with behavioral health needs increased from 46 in 2012 to 87 in the first nine months of 2015.

- While Rhode Island has a high number of Pediatricians, there is a lack of Child Psychiatrists in the state.

- Only 8% of children/families served by the Maternal, Infant, Early Child Home Visiting Program, federally funded to provide evidence-based practices, resided outside of Rhode Island’s 4 Core Cities (Central Falls, Pawtucket, Providence and Woonsocket).

The behavioral health services that do exist for children are dispersed among multiple state agencies including the Departments of Health, Children, Youth and Families, Education and to a lesser degree the Department of Behavioral Health, Developmental Disabilities and Hospitals.

Adults
While not as pervasive as the overall lack of services for children in Rhode Island, there are indicators of the lack of availability of a full array of behavioral health services for adults as well. Adults in Rhode Island are more likely to report unmet need for treatment of mental and substance use disorders than residents in the other comparison states. Yet, the rate of psychiatric hospitalizations per 100,000 population is higher in
Rhode Island than any other New England state. Following cuts in behavioral health funding beginning in 2007, Community Mental Health Centers no longer provided many evidence-based practices such as Assertive Community Treatment teams, mobile crisis services and crisis beds, and trauma informed care... services that were effective in diverting individuals from unnecessary admissions to EDs and inpatient beds.

Rhode Islanders have lacked prompt access to the care coordination and recovery supports that can help to prevent homelessness and divert interface with high end medical services and the police. Enhanced care coordination is needed to ensure effective transitions from high end services such as inpatient, incarceration and homeless shelters/transitional housing. The Integrated Health Home initiative which is just being implemented and the potential for Certified Community Behavioral Health Centers may go a long way in addressing this need when fully operational. There is also limited access to Peer support and permanent supportive housing, evidence-based practices in promoting Recovery.

Finally, the Opiate Task Force established in 2015 estimates that 20,000 Rhode Islanders have a diagnosable opioid use disorder but are not receiving medication-assisted treatment, which when combined with therapy is effective in treating the disorder. About half of physicians certified to prescribe Buprenorphine are not serving their permitted capacity of 100 patients. While covered by Medicaid, Naloxone is not covered by all insurances in Rhode Island.

Older Adults
Older adults are not likely to seek specialty behavioral health services and often remain isolated as a result of undetected depression. Primary care practitioners may miss diagnosing BH disorders among older adults who are less likely to discuss their symptoms. When medication is prescribed, elders are less likely to take it according to directions. The Hospital Association of Rhode Island identified that elders with BH disorders typically do not receive adequate treatment in nursing facilities and when behaviors escalate, are taken to EDs and often prohibited from returning to the facility.

Special Populations
Populations that are most underserved due to the lack of trained providers and specialty targeted interventions include LGBTQ, non-english speaking, persons with IDD, autism, brain injuries and youth with substance use disorders.

Access to the Right Care
Not only is access to care an issue, but access to the right care is an issue as well. Behavioral health disorders manifest in different ways across different age groups. Age appropriate treatment and interventions are known to produce better results. For example, detecting trauma in young children often requires assessment and treatment by a trained Play Therapist, while older adolescents should be treated by a therapist certified in Dialectical Behavior Therapy.

Prescribing medications also requires age considerations across the lifespan. More children in Rhode Island are prescribed ADHD medications than the national average; most of these medications are prescribed by primary care physicians absent a psychiatric evaluation or consultation. There is speculation that children with cognitive disorders are being prescribed ADHD medications in lieu of cognitive behavior therapy, which may be more appropriate but is not covered by insurance. Over-diagnosis of and prescription of medications for ADHD also contributes to the diversion of these agents for non-medical use.

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37 Truven Cost Report
See Table X for examples of evidence-based practices that address age-appropriate interventions across the lifespan.

Lengthy wait times for mental health appointments, lack of evening and weekend appointments, lack of insurance coverage for certain treatments and high co-pays all contribute to the inappropriate use of EDs in lieu of more appropriate behavioral health services.

Human Resource Shortages

Rhode Island struggles with inadequate Human Resources to meet residents’ behavioral health needs, especially outside of the urban centers of Pawtucket, Providence and Winsocket. Rhode Island has a lower per capita number of substance abuse counselors and other behavioral health counselors than the national average. In addition, Rhode Island ranks lowest of all New England states for other behavioral health counselors and second lowest for substance abuse counselors. Community Health Centers in Newport City, Providence and Washington City are identified as having a shortage of Mental Health Professionals.

While not a direct behavioral health human resource issue, Rhode Island’s shortage of Department of Children, Youth & Families (DCYF) case workers can have a significant impact on the identification and monitoring of children and families at risk, and in need of behavioral health treatment. With caseloads that are higher than the national best practices target, workers are less likely to insure behavioral health issues are being addressed for children and their families in their caseloads.

Spending per enrollee or per population on behavioral health treatment among Rhode Island residents with Medicaid, private insurance, and Medicare coverage generally is higher than spending in any other New England state. The high utilization of inpatient hospitalizations and greater spending on prescription drugs are consistent across payer types and likely contribute to the higher Rhode Island spending levels.

v. Treat criminal justice system as a specific community with health disparities

Rhode Island Department of Corrections identifies itself as the “behavioral health safety net” for Rhode Islanders. As state funding for behavioral health services as decreased, the number of persons interfacing with the criminal justice system has increased. The impact on Corrections is evidenced by:

- On any given day, jail and sentencing facilities are serving 3,200 adults with serious and persistent mental illness (SPMI), twice the number of individuals with SPMI served in acute care hospitals
- 15 – 17% of all inmates have a diagnosis that meets criteria for SPMI
- 33% of inmates are receiving psychotropic medications
- 45% of inmates incarcerated and in need of competency evaluation have an SPMI
- The Department of Corrections identified a group of 56 persons who are high users of its resources. These are persons who cycle between the homeless system and the Prison Intake Center. The persons identified have been arrested, on average, 18 times and incarcerated 13 times over their criminal history.

The annual costs for substance use disorders attributed to Corrections is $146.5M; combined with $26.7 in costs associated with mental health disorders, state Corrections’ behavioral health expenditures consume

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38 Truven Supply Report
39 Truven Supply Report
40 Rhode Island Department of Corrections Information Management System

Comment [SS26]: This is where I had originally thought the BH Pop Health Table would go but now that it is being merged with the chronic condition diagram I’m not sure?

Comment [RT27R26]: Once we have all of the tables/models determined for the final draft we can decide where to put the BH population table.

Comment [SS28]: Need to verify that this is still accurate...from Truven Report

Comment [SS29]: This seems to be out of place and should have carried forward under the BH expenditure subheading

Comment [SS30]: This information came from the DOC but BHDDH wants me to verify that the #s really reflect SPMI as opposed to any MH disorder
3.15% of the state budget. DOC funding is covering contracted BH services as well as RI DOC BH staff, BH medications including Mediation Assisted Treatment, neuro-psychiatric testing and training of Corrections Officers in working with individuals with BH disorders.

Treat homeless as a specific community with health disparities

Consistent with the national landscape, individuals who are homeless consume a disproportionate amount of Rhode Island’s resources. One-third of individuals seeking services at an emergency shelter or transitional housing setting in 2014 reported having a mental health issue, more than half were assessed as having problems with alcohol and one-quarter as having problems with illicit drugs. In addition to behavioral health disorders, individuals who are homeless often have untreated chronic medical conditions. These co-morbidities result in high costs associated with ambulance transports, emergency room admissions, inpatient hospitalizations including for mental health reasons and interactions with the police.41

7. Current Status of efforts to address health focus areas

a. RI’s population health priority areas- history (trends) of these outcomes and why they were chosen.

Rhode Island’s population health plan focuses its efforts on four major health areas:

1. Tobacco Use
2. Obesity
3. Chronic diseases: Diabetes, heart disease and stroke
4. Behavioral health morbidity, initially targeting children with social and emotional disturbance, depression, serious mental illness and opiate use disorders/substance use disorders.

The selection of the health priority areas of tobacco use, obesity, chronic diseases, and behavioral health morbidity was motivated by the significant prevalence and cost of these health areas to RI. Addressing the high prevalence and substantial cost is a high priority across our state. The state chose these topics because they were not only important to CMS, but critically important to RI. Our interagency leadership chose to expand the scope of diabetes to include two other major chronic illnesses because of input from the state department of health. We also added specific behavioral health morbidities because of the high priority the steering committee is placing on addressing behavioral health needs. Given more time, the team working on the population health plan will explore other interests of the steering committee including topics specifically related to children’s health.

Health Focus Area Trends:

A Position Statement on Health and Wellness for People with Serious Mental Illness issued by Mental Health America42 identified that nationally:

41 RI Homeless Management Information System, VI-SPDAT surveys
42 MHA Position Statement #16: Health and Wellness for People with Serious Mental Illness
People with Depression are 1.2 to 1.8 times more likely than the general public to be obese. People with Bipolar Disorder are 1.5 to 2.3 times more likely than the general public to be obese. People with Schizophrenia are 3.5 times more likely than the general public to be obese.

In addition, a number of study results have linked the use of antipsychotic medications with weight gain, diabetes, dyslipidemia, insulin resistance and the metabolic syndrome.43

### Tobacco Use Trends

According to the most recent results from the 2014 Behavioral Risk Factor Surveillance System (BRFSS), 9.3% Rhode Island adults self-report that they smoke every day. 4.2% self-report that they smoke some days, 33.6% say they are former smokers, and 53% say they’ve never smoked. The percentage of self-reported smokers has declined steadily over the past ten years. In 2011, BRFSS began including cell phone numbers for its telephone survey, so data before 2011 is not technically comparable to data collected in 2011 and beyond. With that caveat, the data between 2004 and 2014 shows a clear downward trend, especially among self-reported current smokers who smoke every day.

<table>
<thead>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Current Smoker,</td>
<td>15.6</td>
<td>14.2</td>
<td>12.9</td>
<td>11.8</td>
<td>11.7</td>
<td>10.5</td>
<td>10.7</td>
<td>11</td>
<td>10.3</td>
<td>9.3</td>
<td></td>
</tr>
<tr>
<td>Smokes Everyday</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Current Smoker,</td>
<td>5</td>
<td>4.1</td>
<td>4.1</td>
<td>4.4</td>
<td>3.7</td>
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<td>53</td>
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</tbody>
</table>

Smokers by subgroups

According to the most recent self reported data from the BRFSS, Black, Non-Hispanic Rhode Islanders are more likely to be smokers than any other racial/ethnic group in the state with a smoking rate of 19.4%. They are closely followed by Multi-racial, non-Hispanic Rhode Islanders who have a self-reported smoking rate of 18.5%.

But income, more than race/ethnicity, shows a more dramatic picture of smoking disparities. Rhode Islanders with an annual household income of less than $10,000 a year self report a smoking rate (28.8%) that is more than almost triple the self reported rate of smokers among Rhode Islanders that have an annual household income of more than $75,000. In general (except between Rhode Islanders that have an annual household income between $25,000-$35,000 and those with an annual household income of between $35,000-$50,000) smoking rates go down as income goes up.

43 Ibid

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**Commented [MH35]:** Note from DOH: Is the citation for 2011-2014 pooled data, or just 2014 data? 2014 RI data from CDC are different (i.e. current smoking among Black Non-Hispanic is 21.9% for 2014; this paragraph says 19.4%; smoke every day is 11.3% for 2014; here it says 9.3%). Are they using “current smoker” here? Need to clarify the variables and years. Best to be consistent with what is publicly available. 2011-2014 RI BRFSS data publicly available online: http://www.cdc.gov/brfss/data_tools.htm - population health team will look at data methods and talk to DOH directly about either adding caveats or switching this data with data already used by DOH

**Commented [MH36]:** DOH note: Add a row to the table that just shows current smoker – that would align better with our performance measures (i.e. 2014, 16.3%).

**Commented [MH37]:** James Rajotte: Finessing data transformation from tables to charts for better visualization.

**Commented [MH38]:** Note from DOH: Reggie expressed concerns in the meeting about state-level estimates for Black Non-Hispanic smokers. They may want to add a limitation that acknowledges the small n and add 95% CI.
Although smoking rates vary among these sub-populations, all have experienced a decline in smoking over the past 10 years.

<table>
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<td>8.3</td>
<td>7.9</td>
<td>7.6</td>
<td>7.7</td>
</tr>
</tbody>
</table>

Data notes: In 2001, the BRFSS stopped allowing respondents to describe themselves as “white, Hispanic,” “black, Hispanic,” and “other, Hispanic” replacing those options with “multi-racial, non-Hispanic” and “Hispanic.” In 2001, BRFSS also replaced “Asian/Pacific Islander” with “Native Hawaiian/Pacific Islander.” As mentioned in the section about overall smoking rates, BRFSS started including cell phones in its sample in 2011, so data collected before 2011 can’t be directly compared to data collected in 2011 or later.

There is significant data that indicates people with behavioral health needs have higher rates of smoking than the general public. A Position Statement on Health and Wellness for People with Serious Mental Illness issued by Mental Health America\(^4\) identified that nationally:

\(^4\) MHA Position Statement #16: Health and Wellness for People with Serious Mental Illness
• 44% of all cigarettes smoked in the U.S. are consumed by people with a mental illness.
• 56 to 88% of people with schizophrenia smoke compared to 25% of the general public.
• People with schizophrenia who smoke have a higher toxic exposure than other smokers: they smoke more cigarettes and consume more of each cigarette.
• Smoking is associated with increased insulin resistance.

**Obesity Trends**

According to the most recent results from the 2014 Behavioral Risk Factor Surveillance System (BRFSS), 37% of Rhode Islanders are overweight and 26.6% are obese. Over the past ten years, the percentage of overweight Rhode Islanders has fluctuated slightly, but not changed significantly, barely increasing from 36.3% in 2004. It is the rate of obese Rhode Islanders that has steadily increased over time. In 2004, only 19.5% of all Rhode Islanders could be classified as obese.

**Obesity among subgroups**

According to the most recent self reported data from the BRFSS, Rhode Islanders who identify as American Indian/Alaskan Natives have the highest rates of obesity at 40.7%. A caution with this rate: as the number of Rhode Islanders in this sub-group is small, the total obesity rate in 2014 might be affected by only a few outliers. Note that the obesity rate among American Indian/Alaskan Natives was 31.8% in 2013, a difference of nearly 9%. Black, non-Hispanic Rhode Islanders have the next highest rate of obesity at 35.8%. This rate has also fluctuated over the past several years, but not as dramatically. Only Rhode Islanders who identify as Asian, non-Hispanic show a significant drop in their rate of obesity. This group had an obesity rate of only 8.6% in 2014, down from 21.9% in 2004. It is important to note, however, that this population is also small and might be affected by outliers in any given year.

Disparities by income exist, but are not as dramatic as the data we see for smoking rates. Most income levels hover around an obesity rate of 30%, with a spike of 36.4% among Rhode Islanders with an annual household income between $15,000-$20,000 and a drop of 22% among Rhode Islanders with an annual household income of more than $75,000.

<table>
<thead>
<tr>
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<tbody>
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<td>22.3</td>
<td>23.1</td>
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<td>23.9</td>
<td>26</td>
<td>26.7</td>
</tr>
<tr>
<td>Black, Non-Hispanic</td>
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<td>30.4</td>
<td>32.6</td>
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<td>36.6</td>
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<td>32.9</td>
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<td>4.4</td>
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<td>16.7</td>
<td>28.6</td>
<td>40</td>
<td>40</td>
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<td>30</td>
<td>37.8</td>
<td>31.8</td>
</tr>
</tbody>
</table>

Comment [MH42]: Note from DOH: Several data points differ somewhat from results when Dora runs the data. This might be because whoever provided their data used a different race/ethnicity variable, combined years, etc. but just wanted to be sure that was documented somewhere. If this data is made public, we need to be able to say why the numbers in the report do not match numbers we may have used elsewhere. --- We have figured out the discrepancy and are currently re-analyzing the data for all the chronic disease tables in this draft.

Comment [MH43]: Note from DOH: A couple of data points (in particular, Native American & Asian rates) have extremely wide confidence intervals and are not generally reported for that reason. There is a caution provided regarding outliers effects, but national standards would recommend that some of these data points be suppressed altogether due to unreliability. At the very least, you might consider a stronger warning indicating that the estimate is highly unreliable, just in case any numbers are picked up from this report and used elsewhere, esp. if the implication is that this is DOH data. I'd suggest also leading this section with the more reliable data. --- See response to note above.
Data notes: In 2001, the BRFSS stopped allowing respondents to describe themselves as “white,” “Hispanic,” “black,” “Hispanic,” and “other, Hispanic” replacing these options with “multi-racial, non-Hispanic” and “Hispanic.” In 2001, BRFSS also replaced “Asian/Pacific Islander” with “Native Hawaiian/Pacific Islander.” As mentioned in the section about overall smoking rates, BRFSS started including cell phones in its sample in 2011, so data collected before 2011 can’t be directly compared to data collected in 2011 or later.

As with smoking rates, national data shows that people with behavioral health issues are also more likely to struggle with maintaining a healthy weight. According to Mental Health America:

- People with Depression are 1.2 to 1.8 times more likely than the general public to be obese.
- People with Bipolar Disorder are 1.5 to 2.3 times more likely than the general public to be obese.
- People with Schizophrenia are 3.5 times more likely than the general public to be obese.

In addition, a number of study results have linked the use of antipsychotic medications with weight gain, diabetes, dyslipidemia, insulin resistance and the metabolic syndrome.

Heart Disease and Stroke Trends

The Rhode Island version of the BRFSS poses this question “Has a nurse, doctor, or other healthcare professional ever told you that you had...” and allows respondents to select among a series of health

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45 MHA Position Statement #16: Health and Wellness for People with Serious Mental Illness

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DRAFT work in progress: Integrated Population Health Plan 04/12/2016
conditions. Three of those conditions are Heart Disease/Angina, heart attack/myocardial infarction and stroke. In 2014, 5.73% of Rhode Islanders reported being diagnosed with Heart Disease/Angina, 5.56% reported being told they’d have a heart attack/myocardial infarction and 3.14% reported being told they had a stroke. This data has not changed significantly since 2005.

<table>
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<th>Year</th>
<th>Male</th>
<th>Female</th>
<th>White, Non-Hispanic</th>
<th>Black, Non-Hispanic</th>
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<td>6.71</td>
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<tr>
<td>2007</td>
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<td>4.75</td>
<td>6.14</td>
<td>4.03</td>
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<td>2012</td>
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Hispanic  2.18  4.08  2.75  4.13  5.12  5.46  4.91  3.27  3.4  3.52
< 10K HH Income  4.43  13.87  10.71  10.06  10.48  17.06  8.08  7.46  8.45  9.49
10K - 15K HH Income  11.73  15.66  7.34  12.88  10.73  9.81  11.52  13.31  8.87  10.38
15K - 20K HH Income  9.47  8.61  8.64  9.41  10.6  9.24  8.59  11.04  9.54  8.6
20K - 25K HH Income  6.27  11.15  7.72  8.42  9.57  8.91  9.21  6.47  8.4  5.35
25K - 35K HH Income  8.66  6.28  6.19  8.23  6.26  7.5  7.82  6.9  7.91  8.33
35K - 50K HH Income  3.22  5.88  6.06  7.3  6.36  6.52  7.4  6.67  4.66  6.33
50K - 75K HH Income  3.29  3.95  5.42  6.1  3.85  3.53  3.62  4.01  4.1  4.59
> 75K HH Income  1.83  2.69  3.65  2.65  2.33  2.83  2.9  3.18  3.34  3.65

Heart attack (text TDB)

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Diabetes Trends - Text TBD

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for system action factors, Perhaps Hispanic mental income on paying behavior. Behavioral Income states. Hispanic Island is predominantly treating and prevention rates are behavioral health services, and the impact of substance disorders. Findings are significant. Perhaps most importantly, behavioral health services are disconnected from the rest of healthcare, are focused on treating disorders with little attention to preventing conditions, are limited in scope and availability and reimbursed in a manner that drives the provision of services as opposed to the attainment of results. If Rhode Island is going to impact sustained health improvements for its residents, transforming the behavioral health system to a responsive, comprehensive, integrated system that promotes whole-person health is essential.

### Behavioral Health Trends Truven Report Key Findings

The high rates of behavioral health disorders and their human and economic costs require the state to take action in order to impact the long-term health of Rhode Islanders. Children in Rhode Island are at higher risk for developing behavioral health disorders and chronic health conditions than children in other New England states and the nation as a result of exposure to trauma, and the lack of services that enhance protective factors, prevent disorders, promote early identification and provide evidence-based interventions.

Rhode Island spends more of its state budget on direct and indirect behavioral healthcare than most other states. However, state funding for mental health services declined from $60 million in 2007 to $38 million in 2014. State funding for substance abuse services dropped from about $15.5 million to $5 million. While Medicaid, Medicare and private insurance are the main payers for behavioral health services, these sources are paying predominantly for inpatient treatment and medications...high end, high cost services that cannot stand alone as adequate treatment, or in supporting resiliency in children and their families and Recovery from mental health or substance use disorders in adults.

Perhaps most importantly, behavioral health services are disconnected from the rest of healthcare, are focused on treating disorders with little attention to preventing conditions, are limited in scope and availability and reimbursed in a manner that drives the provision of services as opposed to the attainment of results. If Rhode Island is going to impact sustained health improvements for its residents, transforming the behavioral health system to a responsive, comprehensive, integrated system that promotes whole-person health is essential.

#### Truven Final Report
b. Description of current major initiatives to improve outcomes and risk factors related to the focus areas:

For this entire section: descriptions of ongoing projects will be vetted by subject matter experts before submission. Please send any corrections or suggestions to Megan@themhcgroup.com

**Tobacco**

Rhode Island’s Department of Health has an extensive tobacco control plan that sets both short term and long-term initiatives for decreasing tobacco use in the state. The plan consists of four major goals as well as a mass reach communication plan, surveillance and evaluation plan and an infrastructure, administrative and management plan.

**Goal 1:** The Department of Health (DOH) aims to “prevent [tobacco use] initiation among youth and young adults” by decreasing tobacco use among “high school aged youth” to 21% and increasing the number of cities and towns with “strong policies that require local tobacco retail licenses” by March of 2020.

DOH has ongoing activities that contribute to these long term goals, including a real time surveillance system of community readiness for tobacco related policy change that tracks cities and towns with proposals regulating tobacco retail licenses, banning flavored tobacco or cracking down on discounts for tobacco products. The Department of Health also offers community based trainings in how to conduct surveillance activities in tobacco retail environments. The STARS (Standardized Tobacco Assessment for Retail Settings) program works with local substance abuse councils and youth groups to measure and collect data about tobacco retailers in more than 13 communities. These activities offer useful data about local retailers and also empower community members to think critically about how tobacco is sold and advertised in their neighborhoods.

The Department of Health also partners with the statewide advocacy group “Tobacco Free RI” to push for policy changes and community education activities. By 2017, DOH aims to “mobilize and train 30 youth leaders to implement the RI Tobacco Free Youth campaign for point-of-sale policy change” as well as “organize 3 large-scale tobacco awareness events... related to nationally-recognized tobacco control days to mobilize network partners and advocates.”

**Goal 2:** The Department of Health also has major initiatives devoted to “eliminating nonsmokers’ exposure to secondhand smoke.” By March of 2020, it aims to “reduce the percentage of RI non-smoker adults exposed to second hand smoke in the home to 5%.” The Department of Health does this by advocating for and monitoring the expansion of policies that create tobacco free campuses for schools/universities/colleges, smoke-smoke free multi-unit housing, and tobacco free public places. It is also a priority to establish a tobacco free policy for all state campuses. To better educate stakeholders and decision makers, the department of health offers information sessions about evidence based methods for reducing access to second hand smoke.

**Goal 3:** The Department of Health aims to promote “quitting among youth and young adults” by “decreasing the percentage of Rhode Island adults who currently smoke cigarettes to 12%” and “increasing the percentage of Rhode Island adult smokers who make a quit attempt to 80%” by March of 2020. The state already has a well-established Quit Line that provides counseling and support for Rhode Islanders who want to stop smoking. Rhode Islanders might learn about the quit line through direct advertising or they may receive a referral from their doctor.
To expand the reach of the Quit Line, the Department of Health hopes to increase its network of providers who use the referral system. Currently, the number of participating doctors is limited. It is possible to embed a Quit Line referral into a provider’s electronic health record system and the Department of Health is already working with Lifespan to integrate this method into the hospital system’s electronic medical records. A push to encourage all ACOs, PCMHs and other care collaboratives to follow this approach would greatly expand the link between the clinical care setting and this community resource. A partnership with local dentists could also increase the reach of the Quit Line. The Department of Health is currently working on an oral health grant proposal that would expand its Quit Line referral program to 400 dental offices in the state.8

To increase the sustainability of the Quit Line and offer expanded services, the Department of Health is exploring ways to share the cost of the Quit Line with local health insurance companies. It currently offers educational presentations to carriers about this possibility, and aims to do more of this work in the coming years.

The Department of Health also pioneered an innovative program called “Text to be an Ex” which used a combination of automated messages and trained tobacco counselors to offer smoking cessation counseling though text messages to young people. The six-month pilot program collected valuable data about the success of this method, but the Department of Health needs a strong partnership with an academic institution to fully analyze its findings and bring the program to scale. The Department of Health is developing an academic center for fostering these sorts of collaborations. (See section XXX of this plan for a fuller description of the DOH academic center initiative).6

Efforts at smoking cessation also rely on workforce development, especially in settings where smokers are most likely to be receiving other services. Currently, there are only 15 behavioral health professionals in the state that have completed the Certified Tobacco Treatment Specialist training (CTTS). The Department of Health aims to increase this number so more Rhode Islanders with behavioral health needs can also participate in evidence based smoking cessation counseling where they already receive other treatment. The Department of Health is also exploring methods to help community health workers and “health coaches” gain certification in smoking cessation methods so they can offer culturally and linguistically appropriate support in neighborhoods that might be otherwise difficult to reach (see a more detailed description of efforts to grow community health workers and coaches in section XX of this plan).

The Department of Health has also begun conversations with Rhode Island’s Medicaid program about how to remove barriers to smoking cessation services. Although cessation services are covered under Medicaid, sometimes recipients do not receive the services they need if the order or types of treatments prescribed by their doctors don’t align with pre-approved treatment plans.

**Goal 4:** In all of the above initiatives, the Department of Health is committed to addressing health disparities relates to tobacco use. Although it is difficult to compile local data that offers a comprehensive picture of tobacco use disparities because existing data sources offer only state-wide prevalence, The Centers for Disease Control and prevention instructs states to prioritize efforts that reach Rhode Islanders who are:

- Adults earning less than $25,000 a year or 200% of the Federal Poverty Level
- African Americans
- Disabled
- Experience chronic disease(s)

The Department of Health also focuses particular attention on young people who are:
Lesbian, Gay, Bi-sexual or Transgender
• Have disabilities
• Native American

Data sources: In most cases, the Rhode Island Department of Health relies on annual results from the Behavioral Risk Factor Surveillance System (BRFSS) to track state level data on self reported smoking prevalence and exposure to second hand smoke among adults. The Youth Risk Behavior Surveillance System (YRBS) offers state data on smoking among Rhode Islanders in high school. The Pregnancy Risk Assessment Monitoring System (PRAMS) measures tobacco use before, during, and after pregnancy among RI women. An internal surveillance system that relies on a survey of key informant stakeholders tracks changes in state and local policies related to tobacco retailers and reductions in exposure to second hand smoke.

For now, data collected by the Standardized Tobacco Assessment for Retail Settings (STARS) program offers interesting local snapshots of local tobacco retailers but collection methods vary across communities, and don’t take place in every city and town, so any data compiled or analyzed isn’t reliable enough to offer a comprehensive data set. The Department of Health hopes to grow this resource into a reliable data source in the near future. Evaluation data from the Quit Line and geospatial data are also potential new data sources.5 By March of 2017, the Department of Health hopes to develop at least one more population-based survey to “provide state-level estimates for tobacco control indicators.” In that same year, it also plans to publish a “comprehensive adult tobacco burden document” with updated state data from 2011-2014.

Behavioral Health Interventions
In addition to DOH’s above goals, the prevalence of tobacco use by individuals with behavioral health disorders requires targeted interventions. Clinicians should focus on tobacco use as part of their treatment plans. The use of Wellness Recovery Action Plans and Motivational Interviewing are strategies for engaging individuals with behavioral health disorders in tobacco cessation efforts.

Obesity

Rhode Island’s Department of Health (RIDOH) draws inspiration from the state’s successful tobacco control efforts in its approach to helping Rhode Islanders maintain a healthy weight. In the same way that tobacco control advocates created policies and regulations to increase the cost of cigarettes, make it more difficult to smoke in public and reign in aggressive tobacco marketing, state obesity experts aim to “create environments that better support healthy decisions.”

The state’s 2010-2015 action plan calls for obesity prevention strategies in 7 focus areas:

• Built environment
• Childcare
• Communities
• Healthcare and Insurance
• Schools
• Worksites
• Infrastructure

Commented [MR61]: This is something to deal with throughout – but wherever we have a lack of data, we should flag that in some clear way, so that it shows where SIM should make it a priority to try to get that data. Could be thru regulatory levers, or paying for it, or something .... You flag it down in obesity too.

Maybe there’s a summary at the end of each section called Missing Data or something like that?
For the **built environment**, RIDOH focuses on both infrastructure improvements and measureable changes in the type of food that is available to local residents. RIDOH works with local communities to make improvements in walkability, safety, access to recreation and access to healthy foods.

In **childcare communities**, RIDOH works to increase the percentage of childcare providers that offer meals and snacks that comply with the “Dietary Guidelines for Americans.”

For **community programs**, RIDOH encourages community based agencies to implement evidence based nutrition and physical activity programs such as “We Can!” and “5-2-1-0.”

In the realm of **Healthcare and insurance**, RIDOH advocates for including obesity prevention efforts into routine care. This includes proper screening and identification of obese patients or those at risk of obesity, counseling, referral to healthcare providers such as dieticians or behavioral health providers, and referral to community programs.

In the **school environment**, RIDOH works to enhance the quality and availability of physical education programs, encourages schools to require recess time that meets national requirements, and pushes to guarantee that all foods at school and school events contribute to healthy eating patterns.

In **workplaces**, RIDOH works with employers to implement policy and environmental changes that help their employees increase their physical activity and eat healthy foods. RIDOH also advocates for workplace changes that support breast-feeding mothers.

RIDOH also advocates for a strong **state infrastructure** to support and fund the initiatives in its action plan. 7

**Other obesity partnerships:**

RIDOH also partners with a range of contractors and community organizations to encourage healthy eating and more physical activities. The RIDOH Health Equity Zones (described in further detail in part X of this plan) are key partners in these efforts.

RIDOH is also working with an outside consultant to implement nutrition guidelines for food and vending options at Providence’s Dunkin Donuts Center. The plan improves increasing the availability of healthy options and developing a marketing campaign to encourage spectators to purchase those options. 8

**Barriers to obesity prevention/surveillance**

RIDOH’s obesity prevention experts list a number of barriers that make it difficult to move the needle on obesity in the state. Among them is a lack of reliable data about childhood obesity. Currently, RIDOH has no comprehensive source for the Body Mass Index (BMI) of Rhode Island’s children. Data analysts only have access to measures describing a “propensity for obesity” among two to four year olds in the state’s Women Infants Children (WIC) food program. A national survey of children’s health only samples 800-900 Rhode Island children ages 10-17 years old. 9 RIdOH’s Obesity team says pediatricians collect information on their patient’s weight and height (the two measures used to calculate BMI) but that data is not available in the state’s Kidsnet data warehouse.
In general, RIDOH’s obesity team cites a need for better data. Current data sources rely on self reported accounts of BMI, which are typically inaccurate. Also, sample sizes are too small or lack the geographic specificity to generate usable estimates of disparities.\(^9\)

The obesity team says in general, childhood obesity is extremely undiagnosed, perhaps in part because pediatricians lack referral options once they identify a patient who needs help managing their weight. The team proposed integrating BMI into the Kidsnet data system and linking providers with an obesity referral system to address this issue.\(^9\)

The RIDOH obesity team also points to Rhode Island’s physical education standards as an area for improvement. Current state wide policies demand the presence of physical education, but those standards are weak and interpretation of the policies vary by school district. In some cases, health classes can stand in for courses that actually force students to move their bodies. RIDOH raised the possibility of partnering with the Rhode Island Department of Education (RIDE) to create a full time position devoted to working on physical activity in schools.

The obesity team also noted that many Rhode Islanders who struggle to maintain a healthy weight are trying to manage an undercurrent of mental distress. A report from the Canadian Obesity Network indicates that people with mental health issues have a two- to three-times higher risk of obesity, and people with obesity have a 30% higher risk of mental health issues. Also, for someone with a diagnosis of major mental illness, the risk of dying from an obesity-related illness can increase by up to 38%, which means that life expectancy declines by 15 to 20 years. \(^{46}\) According to the report, individuals with depression have higher levels of cortisol; in people with obesity, fat tissue is linked to producing higher levels of cortisol. The connection between a chemical introduced by fat tissue that, in high amounts, is linked to depression has significant implications for integrated treatment. There is also a link between some medications used to treat mental illness and increased risk of weight gain.\(^{47}\)

**Diabetes/Heart Disease/Stroke (Text TBD)**

**Behavioral Health**

Implemented in January 2016, RI Integrated Health Homes (IHH) for persons with serious and persistent mental illness are responsible for coordinating and ensuring the delivery of person-centered care; providing timely post discharge follow-up, and improving client health outcomes by addressing primary medical, specialist and behavioral health care through direct provision, or through contractual or collaborative arrangements with appropriate service providers of comprehensive, integrated services. Emphasis is placed on the monitoring of chronic conditions, and preventative and education services focused on self care, wellness and recovery. Clients’ medical and behavioral benefits are administered by the same managed care organizations, intended to facilitate clinical integration across the continuum of care in order to achieve substantial clinical improvement. IHH programs are accountable for impacting preventable hospital admissions/readmissions and avoidable emergency room visits, thereby reducing health care costs. IHHs are an important step forward in transforming the CMHCs’ role in promoting population health.

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CMHCs have been most challenged by two elements of the model. First, Centers have had to modify existing, or purchase new, data systems to meet requirements for data collection and reporting, billing and information exchange for patient care. Second, there is a proposed ten percent payment withhold which CMHCs can earn as incentive payments after achieving performance targets. Withholding funding from the Centers, which have lost more than $30 M in state revenue in recent years, could impede their ability to invest in service and administrative improvements necessary to elevate their delivery of care. Performance-based payment is the right direction, however, it may be more effective to fully fund the Centers for the first year to establish the necessary service array and infrastructure before tying withheld payment to performance.

Transition Age Youth MH, SUD Planning and CABHI Grants

Rhode Island is in various stages of implementation of a number of federal grants intended to impact behavioral health morbidities among target populations. Each of the grants is intended to develop cross-agency strategies in order to better address the needs of target populations.

“Healthy Transitions RI” is targeted to serve youth and young adults ages 16-25 with Serious Emotional Disturbance (SED), Severe Mental Illness (SMI) and/or Co-Occurring Disorders (COD) in two Rhode Island communities. The purpose of the grant is to bridge the division of responsibility for these young people between state agencies, service providers, families and others by developing a shared “locus of responsibility” for their successful care. The project involves administrative innovation through an interdepartmental Transition Team, advised by a Statewide Advisory Council composed of young adults, families, advocacy groups, state departments and service providers; and community collaboration within Warwick and Woonsocket, building on existing partnerships between youth and family representatives, local service provider agencies, educational, recreational, church and other community stakeholders. Each community has built a local advisory structure to guide the local development of the project, make the communities aware of the needs of their youth/young adults, collaborate to help identify, engage and screen those at risk for developing, SMI and/or COD and, through the cities’ two Community Mental Health Centers, provide specialized intensive services to those who are experiencing SMI/COD. These services will involve a number of Evidence Based Practices delivered within the Coordinated Specialty Care (CSC) model.

The Rhode Island Youth Treatment Planning project is targeted to serve youth ages 12-25 with substance use disorders and/or co-occurring substance use disorders and mental health conditions by creating a unified, recovery focused service approach. The current mental health and substance use disorder “systems” for children/adolescents and adults are fragmented and operate in silos. The Children’s Cabinet serves as the interagency council overseeing this grant, which will be key to addressing gaps and barriers in the systems at the highest level of State Government; and to developing policies (from programmatic reform to health insurance parity), fiscal supports, and the workforce capacity necessary to carry out the goals and objectives. The strategies are intended to support the State departments in leveraging collective resources, ensuring that individuals served and their families have meaningful input into the development of policies and practice and facilitating exploration of a necessary and appropriate statutory response.

The Rhode Island Coalition for the Homeless has been able to decrease the overall numbers of homelessness by targeting available affordable housing units for veterans, persons experiencing chronic homelessness and families being diverted from the shelter system. Through a recently awarded Cooperative Agreement to Benefit Homeless Individuals (CABHI) grant, RI is looking to expand this success via a statewide effort to serve veterans and other persons experiencing chronic homelessness with substance use disorders, serious mental

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illness, or co-occurring mental health and substance use disorders. The project will also serve persons who may experience chronic homelessness upon release from the State’s Prison In-Take Center.

Certified Community Behavioral Health Centers (CCBHC)

Rhode Island recognizes that the behavioral health system which was once vibrant and delivered innovative and high quality care, has been decimated by millions of dollars in funding cuts. The current system that remains requires significant transformation in order to promote the population health of Rhode Islanders. In 2015 Rhode Island applied for, and was one of 24 states awarded, a CCBHC Planning Grant. The Planning grant provided RI with funding to plan for and begin transforming CMHCs to become “centers of excellence” of behavioral health treatment.

Certification is intended to expand and elevate the ability of the CMHCs to better respond to the needs of the communities they serve. Desired outcomes include fully accessible services, including services outside the walls of the Centers, person-centered care, the provision of evidence-based care including integrated primary and substance use disorder care, enhanced quality of care, enhanced data collection and reporting and establishment of a value-based payment structure. Aligned with a population health approach, certified CCBHCs will be responsible for the behavioral health needs of all residents within their catchment areas and not just the individuals who come to their doors for service. Responsibilities will include working with communities to promote behavioral health and well-being, prevention, early identification of disorders to stem further progression and stratification of the population with age-appropriate, targeted interventions across the lifespan.

Rhode Island is competing for further selection to receive one of eight CCBHC implementation grants. The state is looking for the demonstration award to fund a number of important aspects of CCBH Certification that will serve as key drivers of transformation of the behavioral health system to a population health approach. If awarded the Demonstration grant, CCBHCs will be required to:

- Shift focus from strictly treating disease to promoting the behavioral health of residents within each catchment area;
- Activating patients to be involved in their behavioral healthcare, learning more about their disorders and treatments in order to make better-informed choices and decisions;
- Re-think service delivery to create timely access through team-based care, extended hours of care and provision of services at off-site locations;
- Responsibility for whole-person care, through direct services or formalized arrangements that include primary care; and
- Use of data to drive quality improvement, at both the individual and population care levels.

Certification also requires states to change their approach to payment for care in recognition that there is a cost associated with higher standards of care. RI is proposing to move from FFS payment to a monthly payment, adjusted for the age-related, evidence-based and best practices associated with the course of treatment for targeted conditions. This approach establishes sufficient reimbursement as a foundation for the provision of high quality care. In addition, in order to prevent CCBHCs from under-serving high-need/high cost patients, incentive payments are available when state-identified quality measures are met.

c. Description of DOH HEZ activities and how they relate to focus areas

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Health Equity Zones are contiguous geographic areas that have measurable and documented health disparities, poor health outcomes, and identifiable social and environmental conditions to be improved. Health Equity Zones (HEZs) are designed to achieve health equity by eliminating health disparities using place-based strategies to promote healthy communities. The 11 HEZ Collaborative are funded with State and Federal dollars in partnership with the Rhode Island Department of Health. The HEZs support innovative approaches to prevent chronic diseases, improve birth outcomes, and improve the social and environmental conditions of neighborhoods across five counties statewide. Each Health Equity Zone (HEZ) Collaborative work plan will be implemented over a three or four year period starting in 2015. All HEZ Collaboratives conducted community needs assessments in Year one. Health Equity Zone work plans, written from the needs assessment findings in year one, focus on the communities that each Health Equity Zone serves. Work Plans will be implemented moving forward into year 2. The work plans:

- Use community-based and evidence-based strategies and programs
- Focus on maternal child health/chronic disease/health promotion
- Address health inequities and inequalities

The HEZ Collaborative is built on meaningful and true engagement of multi-sector key stakeholders working together, and include municipal leaders, residents, businesses, transportation, faith leaders, community planners and partners, law enforcement, education systems and health systems, among others. These Collaboratives look at the factors that drive poor health outcomes, and engage in action plans based on strategies that have been shown to be successful. The HEZ Collaboratives are in the process of completing their annual reports for year one of their work plan. Once RIDOH receives those reports (expected in late April) this plan will offer a more detailed description of their work and how it relates to achieving health equity for all and building stronger and healthier communities across the state.

The HEZ grantees are in the process of completing their annual reports for year one of their work plan. Once RIDOH receives those reports (expected in late April) this plan will offer a more detailed description of their work and how it relates to the health focus areas.

d. Description of other state planning efforts and workgroups related to reforming RI’s health care system

In recent years, the state of Rhode Island has commissioned several investigations into the current health of populations in Rhode Island, the performance of health reform efforts, and the remaining challenges. While these analyses and reports focus on different aspects of the healthcare delivery system, a recurring theme in the recommendations is the need for coordination and alignment between stakeholders, initiatives, and segments of the delivery system. A summary of these reports and their respective recommendations for policy is provided here.

In February 2015, Governor Raimondo established the Working Group for Reinventing Medicaid with the duty to review the current Medicaid program and recommend specific quality improvement and cost containment measures for redesigning Medicaid[10]. The group identified many shortcomings of the current program, including misaligned incentives across the delivery system, fragmented and non-coordinated service delivery, and an inability to address social determinants of health, that ultimately result in high costs and less than favorable outcomes. The Working Group’s final report includes ten goals based on four principles: 1) Pay for...
value, not for volume; 2) Coordinate physical, behavioral, and long-term healthcare; 3) Rebalance the delivery system away from high-cost settings; and 4) Promote efficiency, transparency, and flexibility. The report suggests leveraging the role of SIM to define desired population health outcomes as well as a set of aligned measures that can be drawn upon to evaluate the success of the Reinventing Medicaid interventions. In order to achieve the goals set out in the report, the Working Group recommends robust stakeholder engagement and coordination between public and private healthcare reform efforts.

Building on the successes of Reinventing Medicaid, the Governor’s Working Group for Healthcare Innovation was established in July 2015 and charged with making recommendations to establish a global healthcare spending cap, tie payments to quality, create a statewide performance management framework for achieving population health goals, and develop a coordinated health information technology system11. With the triple aim as the ultimate goal in mind, the Working Group articulated four major recommendations: 1) Create an Office of Health Policy to set statewide health policy goals and oversee effective implementation; 2) Hold the system accountable for cost and quality, and increase transparency through a spending target; 3) Expand the state’s healthcare analytic capabilities to drive improved quality at sustainable costs; 4) Align policies around alternative payment models, population health, health information technology, and other priorities. Under the first recommendation, the Working Group calls for the creation of a comprehensive state population health plan, which would best served by ongoing SIM processes that should combine existing state health planning documents and include details on quality metrics, capacity and needs planning, workforce development, and performance management.

In late 2015 RIDOH, in consultation with the Health Care Planning and Accountability Advisory Council (HCPAAC), conducted a statewide healthcare utilization and capacity study as required by the Rhode Island Access to Medical Technology Innovation Act of 2014 (RI Gen. Laws § 23-93-5(b))12. The study collected data on the location, distribution, and nature of healthcare resources in healthcare settings across the state. Detailed surveys were completed by providers in primary care settings, outpatient specialty practices, behavioral health settings, hospitals, nursing facilities, assisted living residences, adult day care programs, home health settings, MRI imaging centers, ambulatory surgery centers, and dialysis centers.

A patient and community survey was also administered. A study of this magnitude had not been completed in Rhode Island since the 1980’s. Results indicated an overall shortage of primary care providers, limited data on patient race, ethnicity, and primary language and lack of interpreter services, limited availability of assisted living residences for Medicaid patients, and persisting financial barriers to care. RIDOH recommends exploring strategies for recruitment and retention of primary care providers, implementing uniform data collection of demographic information and identification of cost barriers, and improving access to community-based care. Data collection and analysis will be repeated annually, and the data collected will be used to establish and maintain a statewide health plan; similar to the Governor’s working groups, the report suggests drawing on the work of SIM in the creation of a population health plan.

Around the same time, Truven Health Analytics was contracted by EOHHS, BHDDH, RIDOH and OHIC to conduct detailed analyses and develop a report evaluating current statewide demand, spending, and supply for the full continuum of behavioral health services in Rhode Island13. The analysis, published in September 2015, applied a population health approach by organizing population groups and evaluating need, prevention, and treatment services by lifespan stage. Key findings indicated that children in Rhode Island face higher risks for developing mental health and substance use disorders compared to other New England states, Rhode Island spends more on behavioral health than other states, and reporting and service delivery systems are fragmented. The report articulates three recommendations: 1) place greater investment in efficacious preventive services for children and families, 2) shift financing from high cost, intensive, and reactive services to evidence based services that
promote patient-centered, outcome focused, coordinated care, 3) enhance infrastructure to promote population health based approach to behavioral healthcare.

The Rhode Island Commission for Health Advocacy and Equity, a group established by statute in 2011 (RI Gen. Laws §23-64.1) and supported by RIDOH, submitted a report to the General Assembly in January 2015, detailing a study of health disparities in six key health areas: maternal and child health, asthma, obesity, diabetes, heart disease, and oral health. The report focused heavily on the social determinants of health and disparities between groups of Rhode Islanders with regard educational attainment, disability status, race and ethnicity, and income. In addition to specific health topic area recommendations, the report gives global recommendations for improving health equity. These include: adopting a health in all policies approach, improving systems for collecting health disparities data, strengthening Rhode Island’s capacity to address health inequities, expanding partnerships, and coordinating efforts for action.

The opiate epidemic, and increase in related deaths due to overdose, in Rhode Island spurred Governor Raimondo to issue Executive Order 15-14. The Order established creation of a broadly representative Task Force charged with developing a strategic plan for impacting opiate use disorders in Rhode Island. Co-chaired by the Directors of the DBHDD and DOH, the Task Force sought expert advisors who reviewed the existing literature on addiction and overdose; conducted over 50 interviews with local, national, and international stakeholders and experts; collected input from the Rhode Island community; and hosted two public forums with expert and community panels. These efforts culminated in “Rhode Island’s Strategic Plan for Addiction and Overdose,” which established the long-term goal of reducing overdose related deaths by one-third within the next three years. The Task Force issued a report of recommendations intended to move Rhode Island forward in meeting this goal, including; a “no-wrong door approach to accessing medication assisted treatment; increasing access to evidence-based treatment and recovery supports for opiate abuse/dependence; requiring training for physicians and law enforcement personnel; reducing administrative barriers that limit access to opioid use disorder treatment; and requiring data collection and reporting on measure that will assess the impact of the proposed interventions.

A final series of reports offers a perspective outside the sphere of state government. HealthRight, a healthcare reform advocacy group, issued a series of 3 reports in 2015 to provide an overview of Rhode Island’s healthcare delivery system, discuss issues around access to care, and evaluate cost containment strategies. The brief overview details the current state health work groups and reform efforts, and recommends stronger alignment and collaboration between them, while also improving access through investment in primary care and moving toward integration of primary and behavioral healthcare. HealthRight’s study on access to care concluded that while Rhode Island performs above average with regard to insurance coverage post-ACA, care is still not affordable for many and gaps and inefficiencies remain in care coordination. The evaluation of cost containment efforts in Rhode Island and other states led to the conclusion that the strategies most likely to impact costs are payment reform, investment in infrastructure, strong regulatory oversight, and consolidation of purchasing power.

In addition to broad analyses of the state of Rhode Island’s health and healthcare system, several reports have been issued that are focused on specific health issues. Summaries of a selection of four state reports on SIM health focus areas are given in the table below.

Rhode Island Reports on Specific Health Topic Areas:

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50 Rhode Island’s Strategic Plan on Addiction and Overdose, 2015
<table>
<thead>
<tr>
<th>Name of Report</th>
<th>Publishing Entity</th>
<th>Year</th>
<th>Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rhode Island’s Strategic Plan on Addiction and Overdose</td>
<td>RI Governor’s Overdose Prevention and Intervention Task Force</td>
<td>2015</td>
<td>The goal of the plan is to reduce opioid overdose deaths by one-third within three years. The Strategic Plan has four key strategies aimed at treatment, overdose rescue, prevention, and recovery.</td>
</tr>
<tr>
<td>Rhode Island State Plan on Diabetes</td>
<td>RI Diabetes Prevention and Control Program, RI Department of Health</td>
<td>2010</td>
<td>The purpose is to help diabetes stakeholders in RI provide a coordinated approach to the goal of reducing the burden of diabetes in the state over the next five years, with a particular focus on reducing disparities related to diabetes.</td>
</tr>
<tr>
<td>The Burden of Overweight and Obesity in Rhode Island</td>
<td>Initiative for a Healthy Weight, RI Department of Health</td>
<td>2011</td>
<td>This report illustrates the impact of overweight and obesity in Rhode Island including risk factors, trends, disparities, and comparisons between the state and the rest of the country. This report will support the efforts of the IHW program and its partners to develop and implement evidence-based programs, policies, and projects that will decrease obesity and related chronic diseases.</td>
</tr>
<tr>
<td>Adult Tobacco Use in Rhode Island</td>
<td>Division of Community, Family Health, and Equity, RI Department of Health</td>
<td>2013</td>
<td>The purpose of this report is twofold: (1) to share population-based data on adult tobacco use in Rhode Island, and (2) to describe the Tobacco Control Program’s investment in reducing the burden of tobacco use with tobacco control stakeholders across the state.</td>
</tr>
</tbody>
</table>

**e. Promising interventions that could be brought to scale**

**Professionalizing community health workers**

Community Health Workers are frontline public health workers who serve as a liaison between health/social services and the community to facilitate access to services and improve the quality and cultural responsiveness of service delivery. Typically, community health workers are non-licensed, gain expertise from life experience and some community / health education. This lack of health professional licensing makes it difficult for Community Health Workers to receive reimbursement for the valuable role they play in improving the health of their community and working with a health team.

The Home Asthma Response Program (HARP) offers an example of the potential power of Community Health Workers. RIDOH partnered with St. Joseph’s Hospital and Hasbro Children’s Hospital Community Asthma program to offer home based asthma education and interventions for families who couldn’t attend existing
clinics or classes. Families of children who had recently gone to the emergency department for asthma related health issues received three visits - one with a certified asthma educator and a community health worker for an initial assessment and asthma trigger reduction plan and two with just the community health worker who offered follow up support.  

In year two of the project, asthma related costs from the 41 cases with claims that could be analyzed dropped by 53.4% for all project participants and 80% for high utilizers. The claims also show a 92% reduction in asthma related hospital and emergency department costs. Although this intervention is not directly related to the population health plan’s health focus areas, the model could be replicated for any team-based approach to tobacco use, diabetes, heart disease, stroke, or even some behavioral health interventions.  

The Rhode Island Department of Health (RIDOH) is well-underway in developing a community health worker certification process to strengthen and grow this important workforce. In addition to certification, there are several CHW infrastructure building project in the planning stage that involves a partnership with Rhode Island College to offer the CHW core competency training, supporting CHW employers and provide additional opportunities for specialization in focus areas such as behavioral health.

**Chronic Conditions Integrated Work Force System**
The Rhode Island Department of Health (RIDOH) has created a coordinated system to provide evidence based and best practice education to activate patients and improve patient skills necessary to self-manage their chronic condition(s). This system is comprised of the Community Health Network which is a partnership between multiple evidence-based programs based at RIDOH and within organizations outside of RIDOH that work on chronic disease management. The Community Health Network is building a skilled workforce of expertly trained staff both professional and community health workers who provide disease/self-management programs, chronic disease management programs, and patient navigation.

The Community Health Network (CHN) supports Rhode Island’s health care movement towards integrated health care and patient centered medical homes. The 2011 Patient Centered Medical Home NCQA standards require patient self care support and access to community resources. The CHN workforce provides a resource to providers, patients and payers which links to the practice team and leads to productive interactions between the patient and the practice team.

Components of the system include a centralized referral system with secure fax and email to RIDOH; follow up with the patient to assist with access to the CHN resources, and communication back to the practice concerning the patient experience. Evidence Based Programs include:

- Certified Diabetes Outpatient Educators (CDOE)
- Cardiovascular Disease Outpatient Educators (CVDOE)
- Chronic disease self-management
- Diabetes self-management
- EnhanceFitness
- LIVESTRONG RI
- Quitworks
- Chronic Pain Self-Management
- Peer Resource Specialists / Peer Navigators
- A Matter of Balance: Managing Concerns About Falls
- Certified Asthma Educators (AE-C)
- Arthritis Foundation Walk with Ease
• Arthritis Foundation Exercise Program
• YMCA’s Diabetes Prevention Program
• The Home Asthma Response Program (HARP)
• National Diabetes Prevention Program

Behavioral Health Interventions

There are numerous examples of behavioral health best practices and innovations occurring in Rhode Island; the key to behavioral health system transformation is to bring them to scale. Examples of initiatives and programs that are being provided in limited parts of Rhode Island that merit consideration for expansion include the following:

• Women and Infants Hospital’s initiative to address postpartum depression in new mothers
• Evidence-based home visiting practices (e.g., Healthy Families America, Nurse-Family Partnership, and Parents as Teachers; First Connections; Positive Parenting Program, Common Sense Parenting) are federally funded and predominantly serving the 4 Core Cities
• Children’s Intensive Services are only available in Pawtucket, Barrington and Warwick
• South County Hospital’s Mental Health First Aid Initiative is providing training and education to stakeholders and touch points throughout the community in order to reduce stigma, increase opportunities for early identification of mental health disorders and establishing pathways for addressing disorders when they are identified.
• Bradley Hospitals Patient Centered Medical Home for Children with Autism
• Thundermist’s “Trans” Health Access Team
• CharterCARE has opened a new Integrated Behavioral Health Center in Providence. The Center is staffed by a multi-disciplinary treatment team including physicians, nurses, and therapists, and led by certified Suboxone physicians. The program offers same day appointments for outpatient evaluation/intake for co-occurring disorders and/or co-morbid behavioral health and medical conditions, short and long term counseling, individual counseling, Suboxone treatment from induction phase to maintenance, a Partial Hospital Program and an Intensive Outpatient Program. CharterCARE reports working closely with the state of Rhode Island to become a center of excellence in Suboxone outpatient treatment.
• The ANCHOR Emergency Department Recovery Program, with 83% of Recovery Coaches consultation resulting in confirmed linkage to substance use disorder treatment within 48 hours
• Naloxone training for all West Warwick police officers and for the public was one of the first initiatives carried out by the Thundermist HEZ, resulting in saved lives and more residents gaining access to resources for recovery.
• The Women’s Resource Center is supporting a mural art program as part of a strategy to increase social interaction, intended to improve the physical and mental health of children and their families based on research which suggests that increased community connectedness is correlated with decreases in violence, substance abuse, obesity, and myriad other social problems.

f. Description/assessment of state infrastructure / capacity to support those existing initiatives

Population health writers will work with staff to pull from operational plan and then add specific budget details for health focus areas.
9. Stakeholders - list of the internal and external stakeholders who helped develop the population health plan (including a description of the role each stakeholder played in the development and implementation of the plan)

Team will pull from stakeholder description in the operational plan.

10. Goals, objectives and interventions/policies/system changes to improve health outcomes for each priority area. Interventions include efforts to transform delivery/payment system and create workforce development.

Tobacco use/Diabetes/Obesity, heart disease and stroke text TBD

Examples of evidence based strategies from "improving population health planning in Ohio SIM report": 24

Obesity

- Multi-component school-based obesity prevention interventions
- Worksite obesity prevention interventions
- Screen time interventions for children
- Multi-component obesity prevention interventions
- Technology-supported multi-component coaching or counseling interventions

Tobacco use

- Cell phone-based tobacco cessation interventions
- Health care provider reminder systems: tobacco cessation
- Increase funding for a comprehensive statewide tobacco program
- Increase the price of tobacco
- Mass media campaigns: tobacco use/Mass-reach health communication interventions*
- Proactive tobacco quitlines
- Reduce cost for tobacco cessation therapy
- Smoke-free policies: indoor areas
- Technology-based tobacco cessation interventions
- Education to reduce home exposure to secondhand smoke
- Restrict minor access to tobacco
- Restrict tobacco marketing
- Comprehensive tobacco control programs
- Incentives and competitions to increase smoking cessation among workers (when combined with additional interventions)
- Community mobilization with additional interventions

Diabetes

- Culturally adapted health care
- Telemedicine
- Chronic disease self-management (CDSM) programs

Commented [MR72]: I think we talked about whether these should be more toward the beginning – and yes, I think they should. They could get lost back here.

And let’s remember that there’s a whole stakeholder plan that will be included in the Ops plan – so we can refer to that too.

Commented [MR73]: When we get to the new interventions, let’s find a way to flag the ones that we’re actually going to pay for in SIM and then the other ones that you’re suggesting that we do.

Again, if we’d done this the opposite way, you’d have recommended a bunch and we would have chosen from there … but as long as we did it the opposite way, I hope that the ones we’re doing are indeed recommended.
Combined diet and physical activity promotion programs to prevent type 2 diabetes among people at increased risk
Case management interventions to improve glycemic control
Disease management programs (healthcare delivery)
Self-management education: in community gathering places, adults with type 2 diabetes
Self-management education: in the home, children and adolescents with type 1 diabetes

Heart Disease

- Smoke-free policies: indoor areas
- Telemedicine
- Chronic disease self-management (CDSM) programs
- Text message-based health interventions
- Flexible scheduling
- Clinical Decision-Support Systems (CDSS)**
- Interventions engaging community health workers**
- Reducing out-of-pocket costs for CVD preventive services for patients with high blood pressure and high cholesterol
- Team-based care to improve blood pressure control
- Self-measured blood pressure monitoring interventions for improved blood pressure control, when used alone
- Self-measured blood pressure monitoring interventions for improved blood pressure control, when combined with additional support

Behavioral Health

**Strengthening the “Children’s Behavioral Health System” in Rhode Island**

*Text for this section TBD*

Recognizing the Role of Trauma

Based on the world-renowned Adverse Childhood Experiences (ACEs) study51, and subsequent follow-up studies, there is a strong correlation between the impact of childhood trauma and adult health and well-being. ACEs include verbal, physical, or sexual abuse, as well as indicators of family dysfunction including an incarcerated, mentally ill, or substance-abusing family member; domestic violence; or absence of a parent because of divorce or separation.

Significant findings from ACEs studies are that ACEs are prevalent among the general population; there is a strong and graded relationship between the number of categories of childhood exposure and the risk for physical and behavioral health problems in adult life; and respondents with the lowest educational attainment were significantly more likely to report five or more ACEs compared with those with higher education levels.52 Conditions found to correlate with higher ACEs scores include Depression, Alcoholism and alcohol abuse, Illicit drug use, Suicide attempts, Early initiation of sexual activity, Unintended pregnancies, Sexually transmitted

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51 http://www.ajpmonline.org/article/S0749-3797(98)00017-8/abstract
52 http://www.cdc.gov/mmwr/preview/mmwrhtml/mm5949a1.htm
diseases (STDs), smoking, Chronic obstructive pulmonary disease (COPD), Ischemic heart disease (IHD), Liver disease, and fetal death.

If Rhode Island is going to impact the long-term health of its residents, exposure to childhood trauma must be addressed. In 2012, children were present in 31% of domestic violence incidents reported in Rhode Island. The Department of Children, Youth and Families Initial CANS assessment results reported for the 3rd and 4th Quarters, FY 2015, indicate that 41%, 25% and 7% of children assessed were determined to have mild, moderate and severe problems with Adjustment to Trauma. High rates of poverty, unemployment and untreated substance use disorders increase the likelihood of ACEs in Rhode Island’s Core Cities.

Addressing Social Determinants of Health

Housing

Affordable housing is a big concern of Rhode Island residents, especially for individuals with disabilities. In its 2014 Priced Out Report, the Technical Assistance Collaborative illustrated the financial burden of housing for the 21,375 Rhode Islanders receiving Supplemental Security Income (SSI). The monthly SSI payment in Rhode Island is $761. The average rent for a one-bedroom apartment in Rhode Island would exceed that amount by 3%. Even an efficiency apartment would consume 92% of monthly SSI income for rent alone. To be considered “affordable,” rent burden should account for about 30% of an individual’s income.

There is a growing body of research that supports the lack of stable housing contributes significantly to high medical costs and poor health outcomes. Permanent Supportive Housing is an evidence-based practice that impacts both for people with serious behavioral health conditions, including individuals who are chronically homeless. In an evaluation of a RI-based Housing First pilot project, individuals who were homeless served in PSH had a 400% reduction in inpatient days, 24-hr behavioral health care, ED visits, jail and prison stays and overnight stays in shelters. While past calculations indicated the rate of homelessness among those served by the Rhode Island mental health system as higher than the national average (5% versus 3.3%), only 2.6 percent of individuals with serious mental illness served by the Rhode Island mental health system received supportive housing.

Individuals with HIV/Aids also benefit from PSH. Two programs for persons living with HIV/AIDS in Rhode Island were awarded several million dollars in funding grants, offered through the U.S. Department of Housing and Urban Development’s (HUD) Housing Opportunities for Persons with AIDS Program (HOPWA) that provided service-enriched homes for dozens of families, allowing them to manage their illnesses while receiving critically-needed treatment and support services. Federal grants are not a sustaining funding resource, however, and eventually require at least some level of state support to continue programs. In addition, Rhode Island’s grants targeted housing for families and were not accessible to individuals with HIV/AIDS.

Rhode Island needs a state strategy for expanding the availability of PSH. Mainstream housing resources exist, such as Housing Choice Vouchers. Rhode Island should build on efforts which have proven to be successful in

References:
14 2014 Rhode Island Kids Count Factbook
14 http://www.dcyf.ri.gov/docs/reports/CANS_Data_Overall_AgeBreakOut_Q3-Q4_20151015.pdf
14 http://www.tacinc.org/media/51752/Table%202.pdf
14 Eric Hirsch & Irene Glaser, Rhode Island’s Housing First Program Evaluation, November 2010
14 Truven demand report
other states to insure greater access to those vouchers for individuals with BH disorders. Ensuring a readily available, comprehensive array of BH services and supports is effective in increasing access to mainstream housing for individuals with significant BH challenges.

Employment Strategy

In addition to housing, unemployment is highly associated with higher healthcare costs and poorer health outcomes. Rhode Island has the 4th highest rate of unemployment in the nation.59

According to the Rhode Island Department of Labor and Training (DLT) the state has a higher percentage of individuals with disabilities than any other New England state. Among Rhode Islanders who have disabilities and are of working age (21 to 64), 40% are un-employed.60 To address this concern, the DLT applied for and was awarded a Disability Employment Initiative (DEI) grant from the US Department of Labor. The funding is intended to synchronize and enhance programs that promote employment possibilities, provide employment-related tools and supports for jobseekers and workers with disabilities, and improve their effective and meaningful participation in the workplace. The project is targeted for adult jobseekers with disabilities, with a special emphasis on individuals with developmental and behavioral health disabilities, veterans with brain injuries, TANF (RIWorks), SSI and / or SSDI recipients.

Similar to housing, accessing mainstream resources for individuals with BH disorders is a good strategy. However, the “Workforce Investment Act (WIA) and Wagner-Peyser (W-P) Act Final Negotiated Performance Goals Summary Program Year (PY) 2014 Rhode Island” does not report data specifically for adults with behavioral health disabilities which makes it difficult to determine the impact of these resources for the BH population.

Individual Placement and Support (IPS) is an evidence-based approach to Supported Employment for individuals with serious mental health disorders. IPS SE was readily available through the CMHCs prior to the loss of funding beginning in 2007, but presently there is very limited opportunity. SE services in Rhode Island are not currently focused on individuals with behavioral health disorders: the State and the City of Providence have entered into an Interim Settlement Agreement with the Department of Justice to increase SE opportunities for individuals with intellectual and developmental disabilities (I/DD). RI is directing its resources toward SE services in order to meet this Agreement.

The prevalence of BH disorders among those interfacing with RI’s Corrections system underscores why access to treatment and diversion from incarceration are important strategies to improve employment, and subsequently healthcare, outcomes. Over 14,000 people were released from Rhode Island prisons in FY2012 and over 25,000 were on parole and probation.61 Nationally, the Society for Human Resource Management reports that 80% of employers conduct criminal background checks on their employees. While having a criminal record does not automatically limit employment, DLT points out that in an economy with many more workers than jobs, a criminal record presents a significant additional barrier for potential workers in Rhode Island. Keeping people out of the criminal justice system will help increase their employment potential.

- Education Strategy – Hold Pending Interviews with DCYF and DOE
  Seventy-four percent of those receiving public assistance in RI hold a high school credential

59 2013 Bradley Hospital Needs Assessment
60 http://www.dlt.ri.gov/wio/IntegratedPlan.htm
61 Rhode Island Department of Corrections data, September 2012
or less.62

**Diversion from Criminal Justice**

As previously stated, there is a high prevalence of BH disorders among RIs who interface with the criminal justice system, resulting in high costs and poor outcomes. Costs will continue to rise unless the cycle of untreated illness, incarceration, poor treatment adherence upon re-entry and re-incarceration is disrupted. There are multiple opportunities to intervene along the course of this trajectory, based on the Intercept Model. Developed by Drs. Mark Munetz and Patricia Griffin, the Sequential Intercept Model (SIM) identifies five conceptual points at which standard criminal processing can be interrupted to offer community-based alternatives: (1) law enforcement/emergency services; (2) initial detention/initial court hearings; (3) jails/courts; (4) re-entry; and (5) community corrections/support63.

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**Figure 1. Basic Phases of Diversion**

If awarded a CCBHC Demonstration grant, the 90/10 Federal Medical Assistance Percentage will support development of the Centers as designated points of accountability, and development of services and supports found to be effective at each of the point of intercept, thereby reducing further progression through the justice system.

Rhode Island has years of experience with court diversion. Family Court has years of experience with referring youth to Juvenile Drug Court pre-adjudication. Rhode Island Superior Court has been operating an Adult Drug Court for more than 10 years. Expanding opportunities through potential CCBHC funding would be viewed as building on the successes achieved to date. This will require collaboration across multiple agencies and the judiciary.

**Human Resource Strategies**

While funding for behavioral health services will go a long way to enhancing the service system, and improving behavioral health outcomes, funding will have a limited impact unless human resource issues are tackled as well. As with states across the nation, RI does not have adequate behavioral health staff resources to meet the
level of service needs. Given that certain professions are in extreme short supply, such as child psychiatrists, a multi-pronged strategy is critical.

CHWs

If Rhode Island embraces the idea that behavioral health really is everyone’s business, then healthcare delivery must reflect that reality. Community health teams and Community health workers (CHWs) can go a long way in helping to provide earlier detection of BH disorders and as a result, earlier treatment. CHWs will meet with individuals and families in their homes which creates a more realistic assessment of the resources families have and the challenges they face in participating in their health and wellness. Training in behavioral health conditions will enhance the CHWs’ ability to identify when a BH disorder is present and when the disorder is serious enough to warrant referral to specialty BH care. A “warm hand-off” approach is essential in that it assures a connection is made and it assures the individual and/or family knows the connection has been made.

Child Psychiatry Access Program

Based on the is increasing access to psychiatric capacity by expanding the scope of behavioral health diagnostic and treatment practice for children and building primary care practitioners’ behavioral health competencies. The CPC program provides pediatricians and family practice physicians a formal process to call or email an on-call psychiatrist for advice and expertise on how to diagnose and/or treat a child who presents with signs or symptoms of a behavioral health disorder. The psychiatrist responds within 15 minutes to a phone call, and within at least 24 hours to an email. Since the program began in February, 24 clinics with 145 providers in Milwaukee County have signed up. Access to timely consultation with a child psychiatrist allows the PCP to provide prompt treatment for the child as opposed to placing the child on a several-month waiting list to see a specialist. Early identification and treatment of mental health disorders in children/adolescents can prevent progression to more serious, lifelong disabilities.

Grand Rounds

Similarly, “Grand rounds,” or case consultations led by psychiatrists with groups of primary care providers, have proven effective for treating adults with behavioral health needs. An example is Project ECHO out of New Mexico.64 Although originally developed to address shortages of medical specialists, the approach has been successfully adapted in states across the country to shoring up PCPs’ expertise in diagnosing and treating behavioral health disorders.

Telepsychiatry

Telehealth has emerged as a cost-effective alternative to traditional face-to-face consultations or examinations between provider and patient. There are approximately 220 psychiatrists practicing in Rhode Island. Telepsychiatry can expand the reach of those resources to underserved areas and underserved populations, such as aging adults, as well as a means to reduce costs and complexities in accessing care for patients.

Commented [SS74]: Need to access data identifying concentrations

http://echo.unm.edu/about-echo/
Forty-eight states and the District of Columbia provide some form of Medicaid reimbursement for telehealth services... Rhode Island does not. In addition, 32 states and the District of Columbia have policies impacting private payer coverage of telehealth.65

Learning Collaboratives

RI DOH is helping to address the capacity of the primary care workforce through the Chronic Care Workforce Collaborative. Clinicians are being trained, share successes and challenges with each other and have access to healthcare resources such as the “Living Well RI Chronic Disease Self-management Program.” As a result, more than 1,000 people with chronic medical conditions including heart disease, lung disease, stroke (conditions with high rates of BH comorbidities) are seeing significant improvements in exercise, cognitive symptom management, communications with their physician, and their levels of health distress, fatigue and disability. This Collaborative could be expanded to include a greater focus on BH co-morbidities and effective strategies to address them.

Likewise, the Learning Collaborative should be expanded to include BH professionals and clinicians. BH staff also need training and resources in better addressing PH co-morbidities for individuals they are serving. Virginia is funding a BH Learning Collaborative via their SIM initiative.

MHPSAs

Clinicians may earn up to $50,000 in loan repayment for making a two-year service commitment at a National Health Services Corp (NHSC) site. A facility may be eligible to become an NHSC-approved site if it:

- Is located in a Health Professional Shortage Area (HPSA)
- Provides primary care medical, dental, or mental and behavioral health services
- Provides services regardless of a patient’s ability to pay
- Offers discounted fees to patients who qualify
- Accepts patients covered by Medicare, Medicaid, and Children’s Health Insurance Program (CHIP)

Given that a number of Health Centers in Rhode Island qualify as Mental Health Professional Shortage Areas, applying to become an NHSC could be a viable option for those Centers in recruiting additional BH expertise.

Anti-depressant Medication Adherence

- Patients with at least 1 follow-up aftercare visit were more likely to be compliant with Medications
- Patients receiving follow-up care from MH providers were 22% more likely to comply

10. Implementation and governance plan for supporting these interventions must offer a guide for multi-sector, multiagency initiative implementation including: (Be prepared for how to link issues in this portion with population health planning.) Text TBD

65 http://www.ncsl.org/research/health/state-coverage-for-telehealth-services.aspx

DRAFT work in progress: Integrated Population Health Plan 04/12/2016
Additional frameworks/models that will be used as the population health planning sections are written:

Table 1. Criteria for prioritization of population health measure (adapted from the Ohio population health planning document)

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Description</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Describe the issue</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Magnitude of the issue (high burden)</td>
<td>High prevalence of health outcome (number or percent of Rhode Islanders or population of interest affected)</td>
<td></td>
</tr>
<tr>
<td>Severity of the issue</td>
<td>Risk of morbidity or mortality associated with the issue</td>
<td></td>
</tr>
<tr>
<td>Magnitude of health disparities and impact on vulnerable population</td>
<td>Size of the disparity between socio-demographic groups; Differential impact on children, families living in poverty, individuals with disabilities</td>
<td></td>
</tr>
<tr>
<td>Comparison with benchmarks (national, other states)</td>
<td>Compared to US overall, other states similar in demographic profile</td>
<td></td>
</tr>
<tr>
<td>Trends</td>
<td>Extent to which issue has been getting worse in recent years</td>
<td></td>
</tr>
<tr>
<td><strong>Impact on healthcare costs and employment/productivity</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Impact on healthcare costs—total costs</td>
<td>Contribution of the health issue to healthcare costs for all payers—total costs</td>
<td></td>
</tr>
<tr>
<td>Impact on employment and productivity</td>
<td>Impact of health issue on person’s ability to and keep employment</td>
<td></td>
</tr>
<tr>
<td><strong>Potential for impact</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Preventability of health issue</td>
<td>Research evidence suggests that health issue largely caused by health behaviors, community environment and/or other potentially modifiable factors (other than genetic or biological characteristics) that can be addressed by programs, policies, and/or interventions.</td>
<td></td>
</tr>
<tr>
<td>Availability of evidence-based strategies</td>
<td>Evidence of population based strategies e.g. Community Guide; What works for health; stakeholder expertise and local existing programs that have been shown to be effective</td>
<td></td>
</tr>
<tr>
<td>Ability to track progress</td>
<td>Data systems available (or will be available) to track issue and impact of strategies implemented</td>
<td></td>
</tr>
<tr>
<td>---------------------------</td>
<td>----------------------------------------------------------------------------------------------------------------</td>
<td></td>
</tr>
<tr>
<td><strong>Opportunity for community-clinical linkages</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Alignment with other SIM measures</td>
<td>Related/similar to other “core measures” from SIM measures alignment</td>
<td></td>
</tr>
<tr>
<td>Strategies available to link “whole-person” care providers with community-based prevention efforts</td>
<td>Evidenced based strategies/tools/models are available for “whole-person” care providers to connect patients with community-based prevention/intervention programs</td>
<td></td>
</tr>
</tbody>
</table>

### Table for Measures selected

<table>
<thead>
<tr>
<th>Measures Selected</th>
<th>SIM Aligned Measures set</th>
<th>Measured in RI DOH or BHDDH data set</th>
<th>Measured in other RI Agency data source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Example measure</td>
<td>Measure in the SIM aligned measures set (yes/no)</td>
<td>Measure used in a RI DOH or BHDDH data set (yes/no)</td>
<td>Measure used in other RI agency (e.g. dept. of education data collection effort) (yes/no)</td>
</tr>
</tbody>
</table>
Chronic disease continuum/Population health models

Draft 1

Draft 2

Commented [RT78]: I prefer draft 1 to draft 2 (we can continue to discuss and get additional feedback). Do we want to use the “universal, selective prevention” framework or the “primary, secondary, tertiary” framework?

Commented [RT78]: James Rajotte: Do you feel we have an identified causal pathway that describes the relationship/interplay between behavioral health and physical health? Does one exist in general terms? Can we drum up something?

Table (from Population health metrics, IOM report)

<table>
<thead>
<tr>
<th>Step</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>RBA Step 1:</td>
<td><strong>Population:</strong> Identify the population you will be discussing</td>
</tr>
<tr>
<td>RBA Step 2:</td>
<td><strong>Result:</strong> Identify the specific result</td>
</tr>
<tr>
<td>RBA Step 3:</td>
<td><strong>Indicator:</strong> Identify data points that will measure your progress</td>
</tr>
<tr>
<td>RBA Step 4:</td>
<td><strong>The Story Behind the Trend:</strong> Identify what the indicators say, what the cause and forces are that affect these indicators</td>
</tr>
<tr>
<td>RBA Step 5:</td>
<td><strong>Key Partnerships:</strong> Identify partners with a role to play in turning the curve</td>
</tr>
<tr>
<td>RBA Step 6a:</td>
<td><strong>Steps Toward Action:</strong> Identify the 5 best ideas for Turning the Curve and improving the results</td>
</tr>
<tr>
<td>RBA Step 6b:</td>
<td><strong>Strategies:</strong> Identify which strategies are best suited to turning the curve in the areas identified above</td>
</tr>
</tbody>
</table>
## Behavioral Health Population Health Methodology

<table>
<thead>
<tr>
<th>Age Group</th>
<th>% Receiving Services &amp; Current Type/ Amount of Services &amp; Service Source &amp; Estimated Unmet Need &amp; Current Direct/Indirect Costs</th>
</tr>
</thead>
<tbody>
<tr>
<td>0–4 Toddlers</td>
<td></td>
</tr>
<tr>
<td>5–12 Primary/Middle School Children</td>
<td></td>
</tr>
<tr>
<td>13–25 Adolescence/Transitional Youth/ Young Adults</td>
<td></td>
</tr>
<tr>
<td>25–65 Adults</td>
<td></td>
</tr>
<tr>
<td>65+ Older Adults</td>
<td></td>
</tr>
</tbody>
</table>

### Ages-Specific Severity Levels

- Universal Prevention
- Selective Prevention
- Indicative Prevention
- Mild Disorder
- Moderate Disorder
- Severe Disorder
- SPMI

### System Capacity?

- Age Specific best practices/resources
- System capacity?

### Commented [SS81]:

So my concern here is will we have the data to populate the third row of boxes, starting with “# receiving services, etc.” We can generate estimate of unmet need but what about direct and indirect costs? The indirect cost figure I have is a statewide total for all levels of disorder. If this is in the outline that gets submitted we will have to do it.
Adverse Childhood Experiences Framework from CDC
### The Four Quadrant Clinical Integration Model

<table>
<thead>
<tr>
<th>Quadrant II</th>
<th>Quadrant IV</th>
</tr>
</thead>
<tbody>
<tr>
<td>BH – Hi PH - Lo</td>
<td>BH – Hi PH - Hi</td>
</tr>
<tr>
<td><strong>Behavioral Health Risk/Complexity</strong></td>
<td><strong>Behavioral Health Risk/Complexity</strong></td>
</tr>
<tr>
<td><strong>Hi</strong></td>
<td><strong>Hi</strong></td>
</tr>
<tr>
<td>• Behavioral health clinician/case manager w/ responsibility for coordination w/ PCP</td>
<td>• PCP (with standard screening tools and guidelines)</td>
</tr>
<tr>
<td>• PCP (with standard screening tools and guidelines)</td>
<td>• Out-stationed medical nurse practitioner/physician at behavioral health site</td>
</tr>
<tr>
<td>• Out-stationed medical nurse practitioner/physician at behavioral health site</td>
<td>• Nurse care manager at behavioral health site</td>
</tr>
<tr>
<td>• Specialty behavioral health</td>
<td>• Behavioral health clinician/case manager</td>
</tr>
<tr>
<td>• Residential behavioral health</td>
<td>• External care manager</td>
</tr>
<tr>
<td>• Crisis/ED</td>
<td>• Specialty medical/surgical</td>
</tr>
<tr>
<td>• Behavioral health inpatient</td>
<td>• Specialty behavioral health</td>
</tr>
<tr>
<td>• Other community supports</td>
<td>• Residential behavioral health</td>
</tr>
<tr>
<td></td>
<td>• Crisis/ED</td>
</tr>
<tr>
<td></td>
<td>• Behavioral health and medical/surgical inpatient</td>
</tr>
<tr>
<td></td>
<td>• Other community supports</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Quadrant I</th>
<th>Quadrant III</th>
</tr>
</thead>
<tbody>
<tr>
<td>BH – Lo PH - Lo</td>
<td>BH – Lo PH - Hi</td>
</tr>
<tr>
<td><strong>Behavioral Health Risk/Complexity</strong></td>
<td><strong>Behavioral Health Risk/Complexity</strong></td>
</tr>
<tr>
<td><strong>Lo</strong></td>
<td><strong>Lo</strong></td>
</tr>
<tr>
<td>• PCP (with standard screening tools and behavioral health practice guidelines)</td>
<td>• PCP (with standard screening tools and behavioral health practice guidelines)</td>
</tr>
<tr>
<td>• PCP-based behavioral health consultant/care manager</td>
<td>• PCP-based behavioral health consultant/care manager (or in specific specialties)</td>
</tr>
<tr>
<td>• Psychiatric consultation</td>
<td>• Specialty medical/surgical</td>
</tr>
<tr>
<td></td>
<td>• Psychiatric consultation</td>
</tr>
<tr>
<td></td>
<td>• ED</td>
</tr>
<tr>
<td></td>
<td>• Medical/surgical inpatient</td>
</tr>
<tr>
<td></td>
<td>• Nursing home/home based care</td>
</tr>
<tr>
<td></td>
<td>• Other community supports</td>
</tr>
</tbody>
</table>

**Low** Physical Health Risk/Complexity **High**

Persons with serious mental illnesses could be served in all settings. Plan for and deliver services based upon the needs of the individual, personal choice and the specifics of the community and collaboration.

---

**Commented [MH82]:** This will be an iterative figure to include: types of clinical settings/resources, example of population served from physical and behavioral health perspective, health information technology utilization, etc.

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**66** Behavioral Health / Primary Care Integration and the Person-Centered Healthcare Home, the National Council for Community Behavioral Healthcare, 2009.
Figure. Co-morbidity vs. multimorbidity⁶⁷

Comorbidity: Disease Centered

Multimorbidity: Patient Centered

Integrated Population Health Plan Draft – Work Group Feedback

1. Overall comment – This is a “population health” plan, but focus areas are disease specific. Can we change our language to reflect a focus on wellness/health promotion? The areas of focus are for purposes of measuring impact on chronic health conditions, but the plan will continue to focus on improving health and wellness to include education/health promotion, prevention and health literacy.

2. Pg 2 - #9, Goals, objectives, etc... Behavioral Health Morbidity Focus Area Priorities – Are these the right ones? Some concern about Trauma...How to measure? Would need to target, suggestions included youth in foster care, juvenile justice, Veterans.*This has not yet been decided, more discussion needed.

3. Access to Primary Care – How to promote family health via Financing Strategies

4. Metrics – System is experiencing “Measures Overload.” Request establishing existing metrics across all payers.

5. Pg 13 – Community Health Needs Assessment Currently includes discussion of hospital process...while it hasn’t happened yet, the CCBHC process also requires so one will be done by each center for its catchment area

6. Pg 18 – Dacia Reed’s question re: lack of child psychiatrists Will see if we can geo map where they are

7. Pgs 21 and 23 – National data on obesity/health conditions and tobacco use Have data on health conds and tobacco use from BHDDH data (BHOLD). High number of unknown responses for tobacco utilization which will be captured in recommendation under CCBHCs Need to get Brown U. SYNAR Report?

8. Pg 38 – Description of other state planning efforts... KidsCount is a report so it may not fit here but it is a tremendous effort with substantive useful data. Also CTC BH work

9. Pgs 42-3, Promising BH Interventions to bring to scale... Need to add Opiate HHs, IHHs/ACT in early implementation that will merge into CCBHCs PCMH Kids RI PIN Family Navigators

10. #10, beginning pg. 43

DRAFT work in progress: Integrated Population Health Plan 04/12/2016
Need to add more detailed overview of how CCBHC aligns with SIM efforts to promote population health, value-based payment...systems transformation

11. Pg 49 – HPSAs
Add RI budget contains $900,000 for state funded loan re-payment

12. Pg 54 – PH/BH Intervention Framework
Suggest the Age-specific interventions be captured...vary across the lifespan

13. Sections 9 and 10 – Do we focus on bringing the latest and greatest new things to RI or work with what is already being done though maybe very limited/being tried/piloted?

14. New Interventions/policies/etc.
   - Add geo-mapping of trauma–related incidents such as murders, drug ODs, Dom Violence incidents, children placed into DCYF custody as well as high rates of poverty, etc to identify hot spots for Prevention/Community Resiliency
   - Data sharing across agencies: persons served, services, expenditures so we can really determine how much is being spent on what and for whom?