

## **OVERVIEW: POPULATION HEALTH MEASURES OF INTEREST** (for discussion on July 18, 2017)

## 1. Self-Reported Health Status

(#9 on the State Health Assessment Indicator list)

Measure: Age-adjusted percent of adults with fair or poor self-reported general health

Source of data: Behavioral Risk Factor Surveillance System (BRFSS)

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: State, County, ACH

Importance: Self-assessed health status is a measure of how an individual perceives his or her health (excellent, very good, good, fair or poor). Self-reported health status is a widely used population health measure of general health and well-being and is considered an independent and strong predictor of mortality and morbidity. Poor health status has been found to be associated with both lower education and income levels, and can be an indicator of disparities within communities.

In 2015, Washington state's rate of self-reported fair or poor health (14.3%) is slightly **better** than the US median (16.4%).

The Washington State Common Measure Set currently includes a similar measure on Adult Mental Health Status (also from BRFSS).

## 2. Suicide

(#20 on the State Health Assessment Indicator list)

Measure: Age-adjusted suicide death rate per 100,000

Source of data: Washington State Vital Records

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: state, county (combined years), ACH (combined years)

Importance: Nationally, suicide rates are rising. Typically viewed as a problem impacting youth (teenagers) and the elderly, recent years have also seen a rise in the rate of suicide among middleaged Americans. The reasons for suicide are varied and complex, but include a host of factors including social isolation, health-related issues, substance abuse, changes in marital status, ease of acquiring firearms, financial stress and economic setbacks, increased competitiveness surrounding educational attainment and career advancement, and others. The extraordinary costs of suicide are both economic and emotional. Economically, suicide imposes a substantial financial burden on the families of decedents and results in lost productivity in the workforce (years of potential life lost). Emotionally, the pain and suffering endured by family, friends and communities are immeasurable.



In 2015, Washington state's age-adjusted suicide death rate (15.6 per 100,000 population) is **worse** than the US average (13.3%).

It is important to also note that the suicide death rate metric does not capture the economic and emotional burden for people who have self-inflicted injuries (that do not result in death) and the resulting hospitalizations, ER visits and care provided in primary care and other office-based settings.

Another option would be to consider self-inflicted injury hospitalizations. The Washington age adjusted self-inflicted injury hospitalization rate was 48.1 per 100,000 in 2015.

There are no measures related to Suicide currently included in the Washington State Common Measure Set.

## 3. Prenatal Care

(#50 on the State Health Assessment Indicator list)

Measure: Percentage of women who receive first trimester prenatal care

Source of data: Washington State Birth Certificates

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: State, county, ACH, potentially others.

Importance: Prenatal care is an important part of a healthy pregnancy. Early and regular prenatal care is an essential strategy to improve health outcomes of pregnancy for mothers and infants. Two of the most significant benefits of early and ongoing prenatal care are improved birth weights and decreased risk of preterm delivery. Nationally, the average cost of medical care for a premature or low birth weight baby for its first year of life can be approximately ten times that of a newborn without complications. Moreover, infants born to mothers who received no prenatal care have an infant mortality rate that is approximately five times that of mothers who received appropriate prenatal care in the first trimester. *(Source: HRSA)* 

In 2014, Washington state's rate of women who received prenatal care during the first trimester (73.0%) is **worse** than the US average (74.1%).

We would likely have the greatest impact on poor health outcomes by focusing on women who enter prenatal care in the 3<sup>rd</sup> trimester or do not get care at all. These women often have complex medical and social histories and are at risk for poor maternal and infant outcomes due to a restricted opportunity to intervene. In Washington, 6.5% of women received late or no prenatal care in 2014.

There are no measures related to prenatal care currently included in the Washington State Common Measure Set. Other pregnancy related measures do include "Unplanned Pregnancy" and "NTSV C-Section."



## 4. Diabetes

(#13 on the State Health Assessment Indicator list)

Measure: Age-adjusted percent of adults who have ever been told by a doctor they had diabetes

Source of data: BRFSS

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: State, County, ACH

Importance: People with diabetes do not always experience symptoms and diabetes may be severe before there are warning signs. Even so, individuals with type 2 diabetes are more likely to be overweight or obese and have high blood cholesterol and high blood pressure in addition to high blood sugar. All of these factors increase the risk of developing cardiovascular disease and other serious and expensive health conditions that, if discovered and managed early, can be controlled. Diabetes was the 7<sup>th</sup> leading cause of death in Washington in 2015. *(Source: WA State Department of Health)* 

In 2015, Washington state's rate of adults reporting that they have been told they have diabetes (8.4%) is **better** than the US median (9.9%).

The WA State Common Measure Set currently includes five diabetes-related measures, all NCQA HEDIS measures. This measure would be different in that it is generalizable to all Washington adults, not only the ones coming in for health care. It also reflects self-reported data from individuals about what they know about their health status.

### 5. Prediabetes

(#14 on the State Health Assessment Indicator list)

Measure: Age-adjusted percent of adults without diabetes who have ever been told they have prediabetes.

Source of data: BRFSS

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: State, County, ACH

Importance: Prediabetes means that a person's blood sugar level is higher than normal but not yet high enough to be classified as type 2 diabetes. Prediabetes, which can affect children as well as adults, is the red flag waving to tell a person that they are on the path toward diabetes. If action is taken at this stage, a person may potentially alter the course of their health and avoid having diabetes and the many complications of diabetes. Unfortunately, the vast majority of people with prediabetes are not aware that they have it. The risk factors for prediabetes are being overweight, sedentary lifestyle, high blood pressure, a history of diabetes during pregnancy (gestational), low good cholesterol (HDL), having a parent or sibling with diabetes, of being African-American, Hispanic/Latino, American Indian, Asian-American or Pacific Islander. For many, eating healthy



foods, incorporating physical activity into daily living and maintaining a healthy weight can help bring blood sugar levels back to normal.

In 2014, 8.2% of Washington adults reported that they have been told they have prediabetes, less than the US median (9.3%).

## 6. Youth Tobacco

(not included on the State Health Assessment Indicator list)

Measure: Percent of youth who report smoking cigarettes during the past 30 days

Source of data: Washington State Healthy Youth Survey (HYS)

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: State, county, ACH

Importance: Cigarette smoking remains the single most preventable cause of disease and death in Washington. Nearly all tobacco use begins during youth (9 out of 10 smokers start by age 18). According to data from the 2016 HYS for Washington state:

- about 3% of 8<sup>th</sup> graders, 6% of 10<sup>th</sup> graders, and 11% of 12<sup>th</sup> graders reported smoking in the past month; and,
- about 28,000 youth ages 11-17 statewide smoked cigarettes in the past month and about 2,800 youth under age 18 become new daily smokers each year.

In 2016, 6% of 10<sup>th</sup> graders in Washington state reported smoking cigarettes

The Washington State Common Measure Set currently includes a measure on Adult Tobacco Use, but not a measure on Youth Tobacco Use.

### 7. Hospitalizations

(#5 and #6 on the State Health Assessment Indicator list)

Measure #5: Leading causes of hospitalization

Measure #6: Age-adjusted hospitalization rate per 100,000

Source of data: Washington State Hospital Discharges (CHARS)

Responsibility for Reporting/Producing Results: WA State Department of Health

Likely Unit(s) of Analysis for Public Reporting: State, county, ACH

Importance: Hospital inpatient care constitutes approximately one-third of all health care expenditures in the U.S. With increasing out-of-pocket financial obligations associated with most health insurance plans, hospitalizations now represent a major financial burden to patients as well as payers and purchasers. While it is true that inpatient stays per 1,000 are lower in Washington state than in many other parts of the country, hospitalizations still represent an important opportunity for improved health and significant cost reduction.



Alternatively, we may choose to focus specifically on the hospital rate for one or more specific diseases/conditions, for example those that are called "ambulatory-sensitive conditions;" these are conditions where appropriate ambulatory care prevents or reduces the need for admission to a hospital. These conditions include such things as asthma, COPD, diabetes, heart failure and pulmonary edema, and hypertension

In Washington (2014), the leading causes of hospitalization (excluding childbirth) based on the first nine discharge diagnoses included (in order):

- Diabetes (105,913)
- Coronary Heart Disease (77,659)
- Chronic Lower Lung Disease (52,053)
- Drug Abuse and Dependence (42,338)
- Asthma (41,688)
- Pneumonia/Influenza (41,195)
- Stroke (34,714)
- Falls (27,737)
- Affective Psychoses (26,780)
- Alcohol Abuse and Dependence (26,099)
- Viral Hepatitis (11,352)
- Motor Vehicle Accidents (4,517)
- Suicide (4,061)

Note that these causes are not mutually exclusive and a patient could have a diagnosis of diabetes and coronary heart disease, etc.

Based on NCQA Quality Compass data, inpatient discharges per 1,000 population are as follows (for CY 2016). WA State performs **better** than the national average for both the Medicaid-insured and commercially-insured populations.

	WA State Average	National Average
Medicaid Insured (in member months)	5.31	8.70
Commercially Insured (in member years)	38.61	44.65

The Washington State Common Measure Set currently includes a measure on 30-day all cause hospital readmissions.



# Measure Selection Criteria

	High Disease Burden	High Cost Burden	WA Worse Compared to National	Worsening Trend within WA	Disparities within WA	High Potential for Improvement w/in 5 yrs	Readily Available Data Source for Reporting in 2018	Measure Produces N Appropriate for Public Reporting
1. Self-Reported Health Status (Fair/Poor)	NA	??	No	??	Yes	??	Yes	Need to aggregate data years for county reporting
2. Suicide Death Rate per 100,000	No	Yes	Yes	Yes	Yes	??	Yes	Need to aggregate data years for county reporting
3. % of Women Receiving Late or No Prenatal Care	Yes	Yes	??	No	Yes	??	Yes	Yes



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4. Diabetes: Self-Reported	Yes	Yes	No	No	Yes	Yes	Yes	Need to aggregate data years for county reporting
5. Prediabetes: Self-Reported	Yes	Yes	No	Yes	Yes	Yes	Yes	Need to aggregate data years for county reporting
6. Youth Tobacco Use	Yes	Yes	No	No	Yes	Yes	Yes	Need to aggregate data years for county reporting
7. Hospitalizations – Leading Causes	Yes	Yes	??	??	Yes	No	Yes	Yes
8. Hospitalizations – Discharges per 1,000	Yes	Yes	No	??	Yes	??	Yes	Yes