

Oral Health of Michigan Seniors

Michigan Oral Health Surveillance Brief

February 2015

Introduction:

In 1945, community water fluoridation began in Grand Rapids, Michigan in time to benefit many of Michigan's Baby Boomers (born between 1946 and 1964). Due to less decay, this population has more of their natural dentition than earlier generations, and the number of Michigan adults in need of oral care will only increase as the number of adults over 65 years of age increases to over 2 million by 2030. As this population continues to benefit from their natural dentition, there may be an increased cost associated with their oral healthcare delivery. It is important for Michigan policy makers to have a clear and sound understanding as it relates to the current oral health status of those 65 years of age and older to best tailor public health programs, workforce, and available funding to the healthcare system to appropriately provide the necessary preventive and oral health care.

Methods:

Michigan Behavioral Risk Factor Survey

The Michigan Behavioral Risk Factor Survey (MiBRFS) is an annual phone-based self-reported statewide survey. Questions related to dental care and demographics were included within the 2012 MiBRFS. These data were used to assess the prevalence of dental visits within the past year and cost-prevented dental care among Michigan adults. In addition, the prevalence of these indicators among demographic groups were analyzed in order to identify vulnerable subpopulations. The MiBRFS indicator for dental visits within the past year was calculated based on responses to the following question: "How long has it been since you last visited a dentist or a dental clinic for any reason?" Furthermore, the cost-prevented dental care indicator was constructed based on responses to the following question: "During the past 12 months, was there any time you needed dental care, but didn't get it because you couldn't afford it?"¹

Michigan Basic Screening Survey for Seniors

Between 2011 and 2014, the Michigan Oral Health Program funded an in-person open-mouth screening and survey of seniors in two Michigan Area Agencies on Aging regions in Michigan. The grant was conducted in the City of Detroit (Region 1a) and Jackson, Lenawee, and Hillsdale counties (Region 2). Adults 65 years and older received an open-mouth screening by a dental hygienist and completed a paper-based self-reported survey. Survey materials were adapted from the ASTDD Basic Screening Survey (BSS) for Older Adults.²

Results:

Michigan Behavioral Risk Factor Survey

In 2012, 71.7% of Michigan seniors reported they had been to a dentist in the past 12 months. Blacks were significantly less likely to have been to a dentist in the past year compared to whites (57.7% vs 73.4%, respectively). Seniors with higher education or higher household income were more likely to have been to a dentist in the past year than seniors with lower education or lower household incomes, Table 1. In 2012, 35.8% of Michigan seniors reported having lost 6 or more teeth. Half of black seniors had lost 6 or more teeth compared to 34.3% of white seniors (data not shown). In total, 86.7% of Michigan seniors in 2012 had 1 or more teeth.

Table 1. Dental Visit Within the Past Year among Michigan Seniors, 2012 Michigan BRFS

	%	95% CI
Total	71.7	(69.6-73.6)
Race		
White	73.4	(71.3-75.4)
Black	57.7	(49.9-65.1)
Other	62.1	(49.5-73.2)
Gender		
Male	69.5	(66.0-72.7)
Female	73.4	(70.9-75.7)
Education		
Less than high school	48.1	(40.7-55.6)
High school graduate	69.9	(66.8-72.8)
Some college	75.7	(72.4-78.8)
College graduate	87.7	(85.1-90.0)
Income		
<\$20,000	49.2	(43.3-55.1)
\$20,000-\$34,000	66.6	(62.8-70.2)
\$35,000-\$49,999	79.2	(74.4-83.2)
\$50,000-\$74,999	88.6	(83.3-92.3)
≥\$75,000	89.2	(84.7-92.5)

Results continued...

Michigan Basic Screening Survey for Seniors

The Michigan BSS reached 747 Michigan seniors of which 5.5% were in need of urgent treatment and 14.9% were in need of periodontal care. Each region had approximately 19% of seniors reporting they were edentulous, or had no natural teeth. The most prevalent poor oral health condition seen in both Regions 1a and 2 was oral debris, 22.0% and 19.1% respectively. Region 2 had lower prevalence of each of the poor oral health conditions than Region 1a, Figure 1.

Region 1a, City of Detroit, had 43.2% of seniors who reporting needing dental care in the past year but due to cost could not receive it. Of those, 51.0% reported having routine dental insurance, Figure 2. One-third reported ever being checked for oral cancer.

Cost was reported as the number one reason screened seniors had not been to a dentist in the past year (44.4% by Region 1a and 47.8% by Region 2) followed by no reason to go and fear or apprehension (data not shown).

Discussion:

Due to an increase in access to oral health care, oral health education, and community water fluoridation, it can no longer be assumed that seniors are without natural teeth. In fact, results show that 86.7% of Michigan seniors had natural dentition, to some extent, which means that they will have a continued need for access to affordable dental care throughout their Golden Years. Results show that associated costs are a significant reason that seniors do not see a dentist.

It is important to note that seniors are at a higher risk of experiencing dental decay as a result of dry mouth, and also for healthcare emergencies, such as aspiration pneumonia and choking. In addition, it is suggested that poor oral health can increase the occurrence of heart disease, diabetes, and stroke.³

A complete statewide survey is needed to provide additional data on the oral health status of the aging population in Michigan in order to initiate policy recommendations that can provide additional and necessary oral health care resources to seniors. Additional surveys will occur as funding allows.

Figure 1. Prevalence of Poor Oral Health Conditions among Screened Seniors in Regions 1a and 2, Michigan Senior Smile Survey

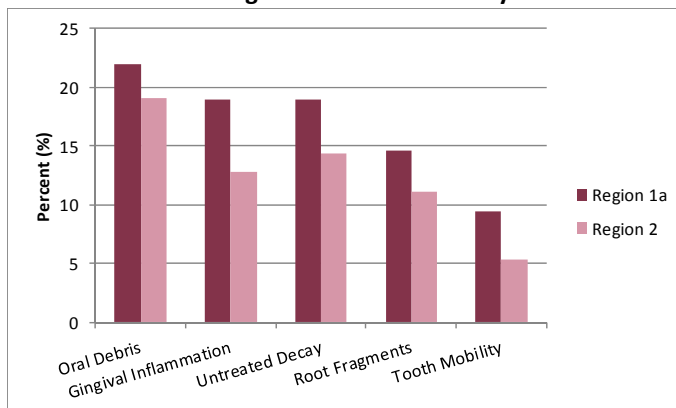
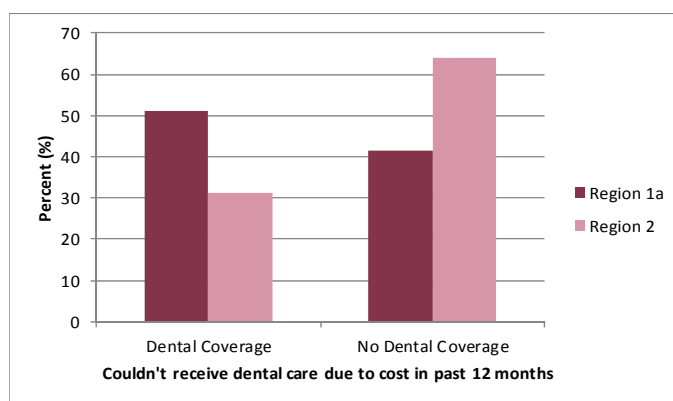


Figure 2. Prevalence of Dental Insurance Coverage among Seniors that Reported Needing Dental Care in past 12 Months but didn't Receive Due to Cost, Michigan Senior Smiles Survey



References:

1. Michigan Department of Community Health. Michigan Behavioral Risk Factor Survey: www.michigan.gov/BRFS
2. Association of State and Territorial Dental Directors Basic Screening Survey for Older Adults: <http://www.astdd.org/basic-screening-survey-tool/#adults>
3. Oral Health America: http://oralhealthamerica.org/wp-content/uploads/2003_StateofDecayFinal.pdf

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