

Measuring What Matters

Access to Dental Care in Oregon

Marko Vujicic, PhD

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HSR Health Services Research

The Impact of Medicaid Reform on Children's Dental Care Utilization in Connecticut, Maryland, and Texas

Kamyar Nasseh and Marko Vujicic

Objective. To measure the impact of Medicaid reforms, in particular in Medicaid dental fees in Connecticut, Maryland, and Texas, on access to oral health care for Medicaid-eligible children.

Data. 2007 and 2011–2012 National Survey of Children's Health.

Study Design. To measure the impact of Medicaid reforms, in particular in Medicaid dental fees in Connecticut, Maryland, and Texas, on access to oral health care for Medicaid-eligible children.

Conclusion. The expansion of Medicaid dental coverage in Connecticut, Maryland, and Texas resulted in a significant increase in dental care utilization for Medicaid-eligible children. This increase was most pronounced in children who were previously uninsured or covered by private insurance.

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HEALTH ECONOMICS
Health Econ (2016)
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HEALTH ECONOMICS LETTER

THE RELATIONSHIP BETWEEN PERIODONTAL INTERVENTIONS AND HEALTHCARE COSTS AND UTILIZATION: EVIDENCE FROM AN INTEGRATED DENTAL, MEDICAL, AND PHARMACY COMMERCIAL CLAIMS DATABASE

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ABSTRACT
As poor glycemic control among individuals with type 2 diabetes. Using integrated claims from Tavon MarketCare Research Database, we implemented unique protocols to estimate a relationship between a periodontal intervention and healthcare costs. We found that individuals who received a periodontal intervention in 2012 had significantly lower total medical costs excluding pharmacy costs (−\$1577), and lower net (−\$400). © 2016 The Authors. Health Economics Published by John Wiley & Sons Ltd.

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ORAL HEALTH

By Kamyar Nasseh and Marko Vujicic

Health Reform in Massachusetts Increased Adult Dental Care Use, Particularly Among The Poor

Massachusetts expanded dental benefits to all adults ages 19–64 whose annual income was at or below 100 percent of the federal poverty level. We examined the impact of this reform and found that it led to an increase in dental care use among the Massachusetts adult population, driven by gains among poor adults. Compared to the prereform period, dental care use increased by 2.9 percentage points among all nonelderly adults in Massachusetts, relative to all nonelderly adults in eight control states. For poor Massachusetts adults, the effect was larger—an eleven-percentage-point increase in dental care use above the increase among the state's nonpoor residents. The Massachusetts experience provides evidence that providing dental benefits to poor adults through Medicaid can improve dental care access and use. Our results imply that the lack of expanded dental coverage for low-income adults under the Affordable Care Act is a missed opportunity to improve access to oral care.

Are We in a Medical Education Bubble Market?
David A. Asch, M.D., M.B.A., Sean Nicholson, Ph.D., and Marko Vujicic, Ph.D.
In November 1636, the prices of tulip bulbs in the Dutch market rose rapidly from their normal level to the point where a single bulb might sell for 10 times the annual earnings of a typical worker. Just as quickly, in May 1637, tulip-bulb prices returned to their previous values. The causes of this dramatic rise and fall remain in dispute. The event occurred during the Dutch Golden Age, when stock exchanges, central banking, and many of the fundamental structures that govern contemporary capital markets and the approaches deployed by MBAs today were developed.
One modern economic analysis suggests that the precipitous decline in tulip-bulb prices resulted from a February 1637 change in the way that futures contracts were enforced, which immediately reduced the value of those contracts by 97%. But this analysis doesn't explain why prices had shot up in the first place. Clearly, tulipmania was a bubble market fueled by speculation rather than intrinsic valuation. After all, why would people be willing to pay 10 times the average annual wage for a single tulip bulb unless they were confident that they could sell it to an even greater fool willing to pay even more?
Bubble markets are created when an asset trades for increasingly higher prices as it is bought by people who are hopeful about its future value and then sold to others with even more optimistic views of that value. Recent examples include the U.S. housing bubble, in which home prices rapidly rose until 2007, and, in which stocks rose until 2000, in which stocks rose until 2000, in which stocks rose until 2000.

Routine dental care is an important component of oral and general health.¹ As of 2010, gum disease affected nearly half of US adults.² Although the relationship is not well understood, gum disease is linked to chronic diseases such as cardiovascular disease and diabetes.³ Improved oral health has also been shown to have a positive effect on employment and wages.⁴
Poor adults, with poor dentition here as having self-reported household incomes at or below 100 percent of the federal poverty level,⁵ tend to face significant barriers to dental care.⁶ Dental care use decreased as the national level among poor adults from 2000 to 2010, in part as a result of Medicaid policies toward dental benefits for adults.⁷ States are urged to provide dental benefits for poor children through Medicaid or the Children's Health Insurance Program, but providing dental benefits for Medicaid-eligible adults is optional.⁸ In the past decade several states have scaled back dental benefits for such adults.⁹ For example, Missouri eliminated all adult dental Medicaid benefits in 2005, and California went from full adult dental Medicaid coverage to no coverage in July 2009. Washington State went from full adult dental Medicaid benefits in 2002 to limited coverage in 2003, reinstated full dental coverage in 2007, and ultimately eliminated all adult dental benefits in 2010.¹⁰
Several studies have analyzed the impact of expanding or eliminating dental benefits for adults covered by Medicaid. A national analysis showed that the expansion of Medicaid to include adult dental benefits resulted in a seven- to ten-percentage-point increase in the likelihood of a dental visit among adults with less than \$10,000 in annual household income.¹¹ After California eliminated adult Medicaid dental benefits in July 2009, the percentage of adult

The Effect of the Affordable Care Act's Expanded Coverage Policy on Access to Dental Care

Marko Vujicic, PhD, Cassandra Yarborough, MPP, and Kamyar Nasseh, PhD

Objective. The Affordable Care Act included a dependent policy that expands parents' or guardians' health insurance up to age 19–23. This policy does not apply to dental care. However, for various reasons it could still have an "upstream" effect if employers voluntarily expand dental in conjunction with medical coverage.
Methods. To assess the effect of the Affordable Care Act's dependent coverage policy on private dental benefits coverage, we

HSR Health Services Research

Early Impact of the Affordable Care Act's Medicaid Expansion on Dental Care Use

Kamyar Nasseh and Marko Vujicic

To examine the impact of the Affordable Care Act on dental care use by adults ages 21–64 in 2014.

0–2014 Gallup-Healthways Wellbeing Index Survey.

Among poor adults with income at or below 138% of the Federal Poverty Line.

Estimating Premium and Out-of-Pocket Outlays Under All Child Dental Coverage Options in the Federally Facilitated Marketplace
Marko Vujicic, PhD, and Cassandra Yarborough, MPP

Premium and out-of-pocket costs for child dental care services under various dental options within the federally facilitated marketplace.
Objective. Premium and out-of-pocket costs for child dental care services for 12 patient population care and spending. We did this for 1039 medical plans that include child dental plans that do not include child dental coverage, and 563 stand-alone dental plans that are based on plan data from the Center for Consumer Information and Insurance Oversight. We

most common chronic disease among children in the US.¹ Routine dental care is important in oral health. Child dental care coverage is mandatory in Medicaid and the Children's Health Insurance Act of 2009 (CHIP) but is not required in the Affordable Care Act (ACA). Still, disparities in dental care coverage exist, particularly for children in low-income households.
Methods. We analyzed data from the 2013 National Health and Medical Expenditure Survey (NHME) to estimate the cost of dental care for children under various dental coverage options. We found that the cost of dental care for children under various dental coverage options is generally higher than the cost of dental care for children under various dental coverage options. We found that the cost of dental care for children under various dental coverage options is generally higher than the cost of dental care for children under various dental coverage options.

ORIGINAL ARTICLES

Dental Care Presents The Highest Level Of Financial Barriers, Compared To Other Types Of Health Care Services

ABSTRACT The Affordable Care Act is improving access to and the affordability of a wide range of health care services. While dental care for children is part of the law's essential health benefits and state Medicaid programs must cover it, coverage of dental care for adults is not guaranteed. As a result, even with the recent health insurance expansion, many Americans face financial barriers to receiving dental care that lead to unmet oral health needs. Using data from the 2014 National Health Interview Survey, we analyzed financial barriers to a wide range of health care services. We found that, irrespective of age, income level, and type of insurance, more people reported financial barriers to receiving dental care, compared to any other type of health care. We discuss policy options to address financial barriers to dental care, particularly for adults.

The Affordable Care Act (ACA) is having a significant impact on the US health care system. Early evidence shows that the number of Americans without health insurance has declined and that the percentage of Americans with health insurance has improved.¹ However, the percentage of Americans without dental insurance has always been higher than the percentage without health insurance, and there are large differences in dental coverage rates between children and adults. In 2013, 12 percent of children and 13 percent of nonelderly adults had no dental insurance, compared to 1 percent of children and 20 percent of nonelderly adults who lacked health insurance.²
The higher rate of dental coverage for children, compared to nonelderly adults and seniors, is partly explained by the fact that dental services are a mandatory benefit within Medicaid for children. For child Medicaid beneficiaries, dental services are part of a comprehensive set of benefits provided through the Early and Periodic Screening, Diagnostic, and Treatment Program. Under the program, "dental services for children must initially include: relief of pain and infection, restoration of teeth, (and) maintenance of dental health," and "all services must be provided if determined medically necessary."³ In contrast, dental care for adults is not covered by Medicare and is an optional benefit in Medicaid, with no minimum standards. According to the most recent data available, over eight million adults are enrolled in Medicaid in the twenty-two states whose Medicaid programs do not provide adult dental benefits beyond emergency services.⁴
The ACA's essential health benefits package perpetuates the long-standing division between dental and other health care services by excluding dental coverage for adults. It requires dental coverage for children, although implementing these provisions has posed challenges. For example, because dental benefits are offered primarily as stand-alone products, not as part of a medical plan, the purchase of dental benefits cannot be enforced, and dental benefits are excluded from premium tax credit calculations.⁵ Even though the ACA does not have specific provisions that address adult dental care, it is likely that the law has modestly increased dental coverage through two channels. First, one provision

The ADA Health Policy Institute



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Stopped flossing? Teeth still vital to overall health

By Susan Scutti and Carina Storms, CNN
Updated 3:46 PM ET, Wed August 3, 2016

Story highlights

Periodontal disease could complicate the management of diabetes and heart disease

One-third of adults in the United States have no dental coverage

Studies show dental insurance provides improvements in overall health and cost savings

(CNN) — Your teeth are more than just something to chew and smile with. Research is increasingly showing that they can have an effect on your overall health.

Many Americans think their poor oral health is holding them back. In a 2015 survey by the American Dental Association, 20% of low-income adults said their mouths and teeth were in bad condition, and 20% of all adults said their unhealthy mouths caused them anxiety, according to Marko Vujcic, chief economist for the

FOX NEWS

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The main reason people avoid the dentist isn't fear

The biggest reason people skip out on going to the dentist isn't fear or inconvenience; it's cost, KIDY reports. A study published this month in *Health Affairs* found people are more likely to forego dental health because of cost than any other type of health care.

In fact, cost is the main reason for not seeing a dentist even among people who have private dental insurance. Study author Marko Vujcic points to maximum benefit limits and high co-pays in most dental coverage as the culprit.

"Anything beyond checkups, like getting a cavity filled or a root canal and a crown, you're looking right away at 20% to 50% coinsurance," he says.



Education Doesn't Solve the Gender Pay Gap

For women in professions that require advanced degrees, such as dentists and physicians, discrepancies in pay are becoming harder to explain.

BOURREE LAM | 3:44 PM ET | BUSINESS



TEXT SIZE



Forbes

Why Some Millennials Aren't Smiling: Bad Teeth Hinder 28% In Job Search



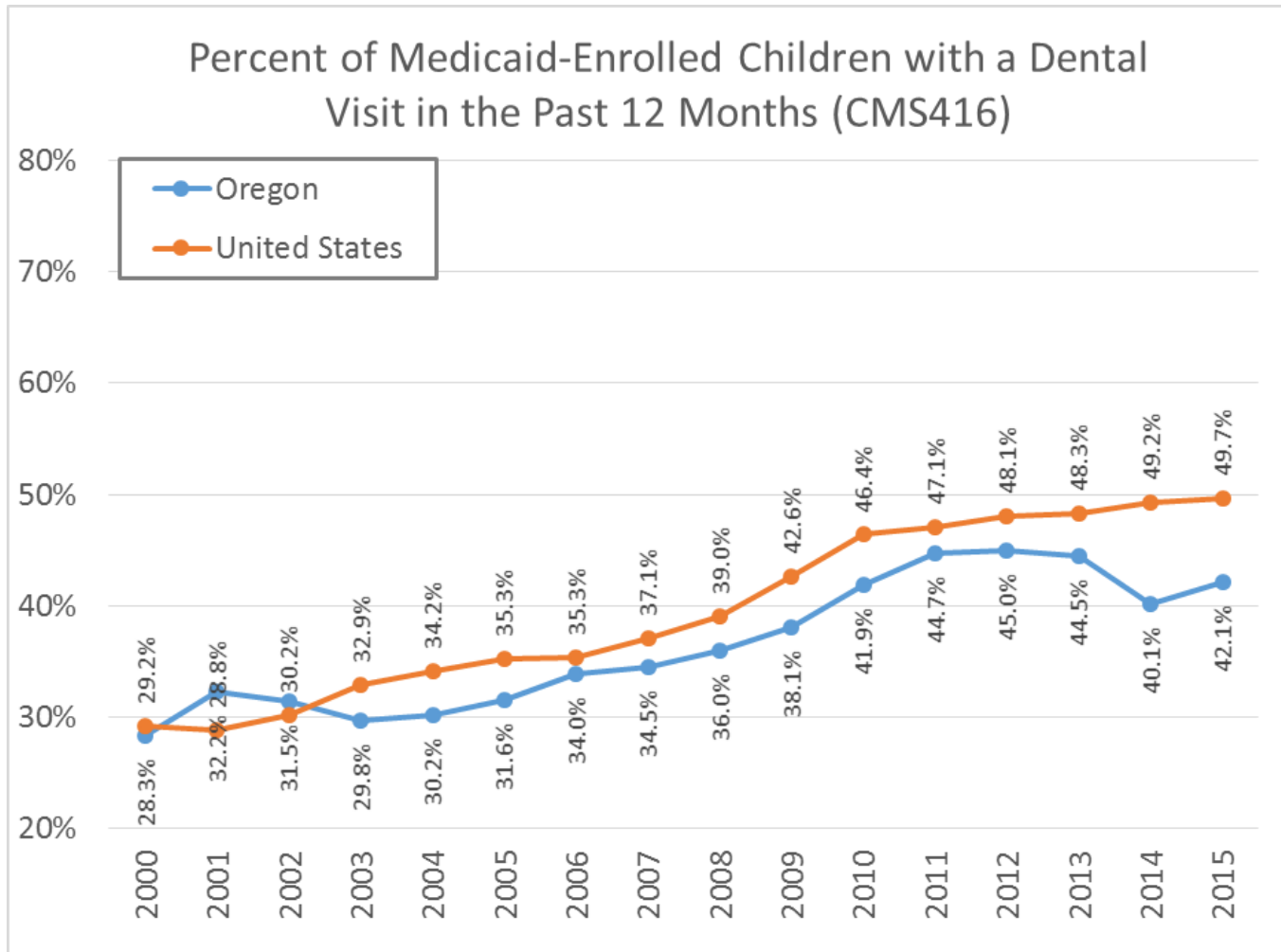
If some millennials aren't smiling, there's good reason. A recent study by the American Dental Association's (ADA's) research arm found they're in a world of hurt – from tooth pain and anxiety about the poor condition of their teeth.

Decaying teeth and gum problems make one in three young adults aged 18 to 34 (33%) reluctant to smile, the ADA found. About one in five have cut back on socializing as a result of dental problems. And 28% say the appearance of their teeth and mouth undermines their ability to interview for a job.

Today

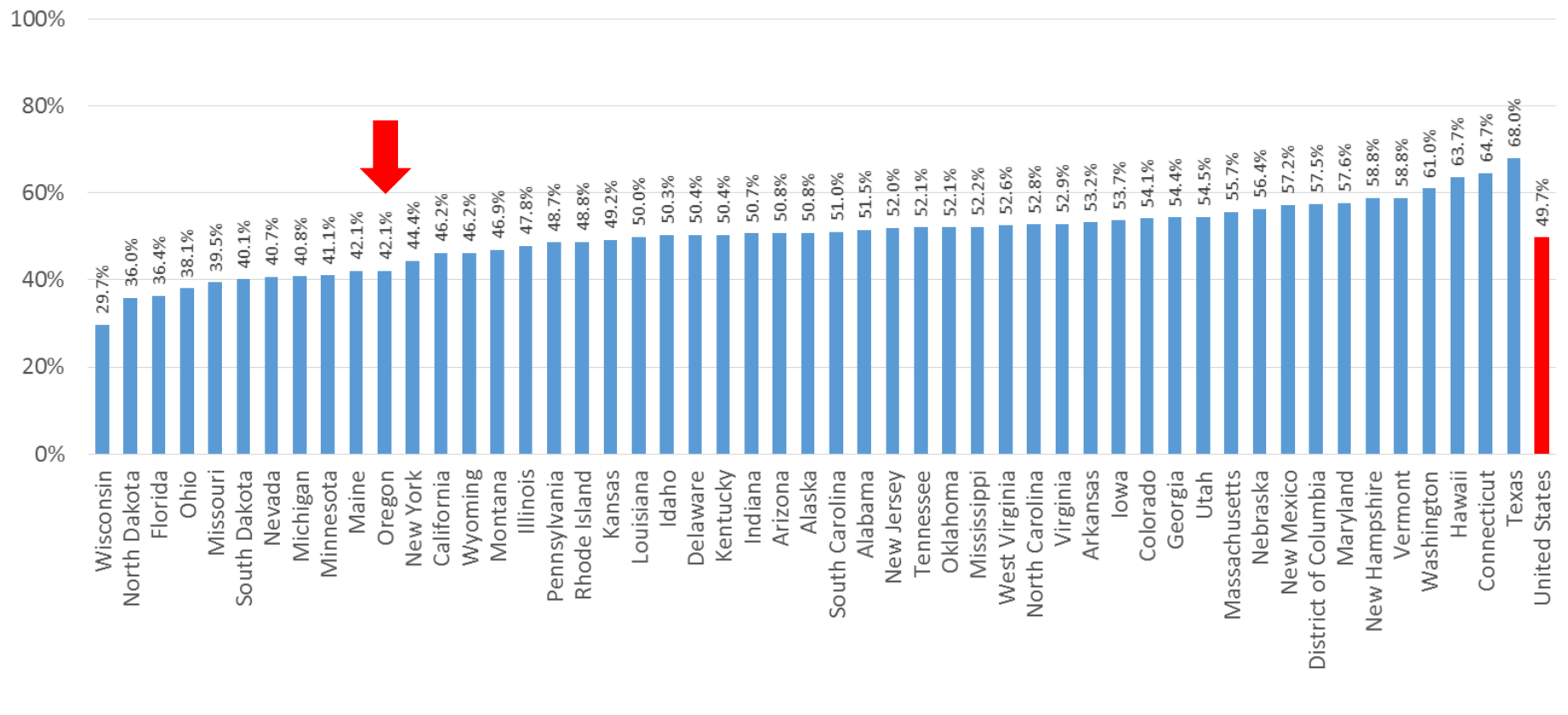
1. Review key oral health outcomes in Oregon compared to other states
2. Present new analysis on access to dental care in Oregon
3. Give you my takeaways on where policy makers should be putting more focus

Dental Care Use



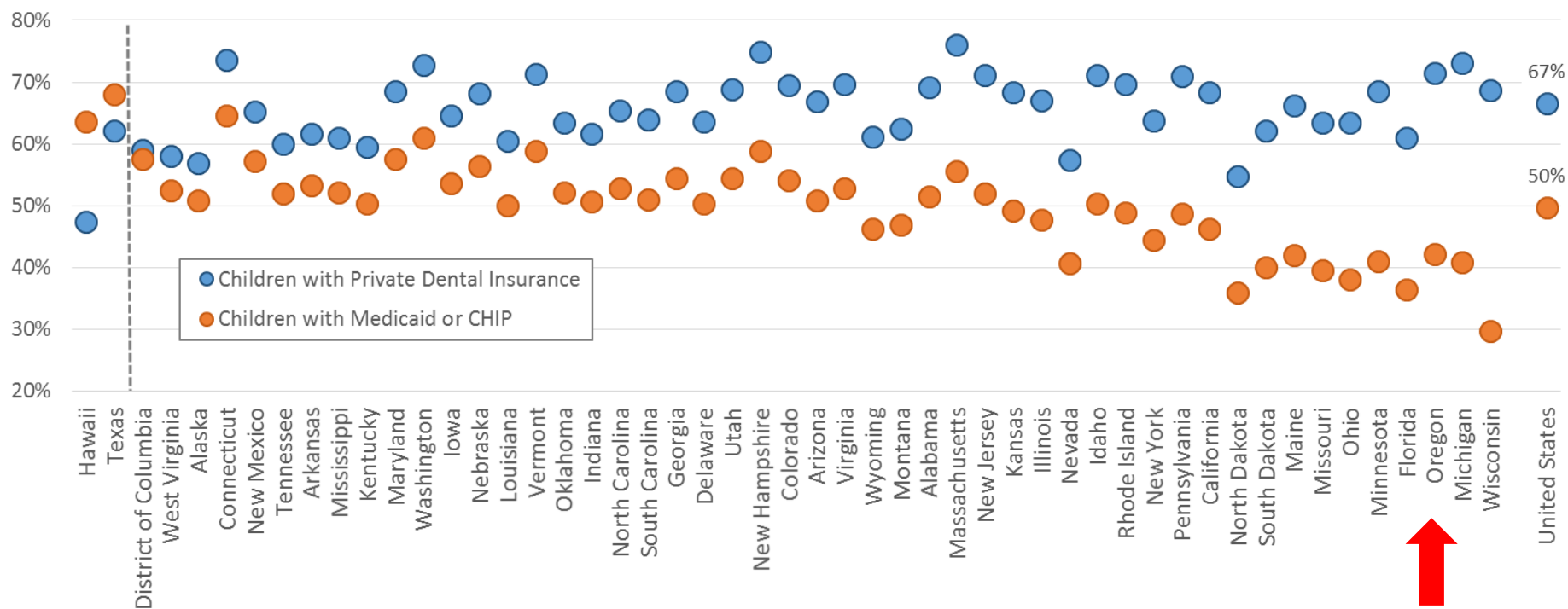
Dental Care Use

Percent of Medicaid- or CHIP-Enrolled Children With a Dental Visit in the Past 12 Months, 2015 (from CMS416)



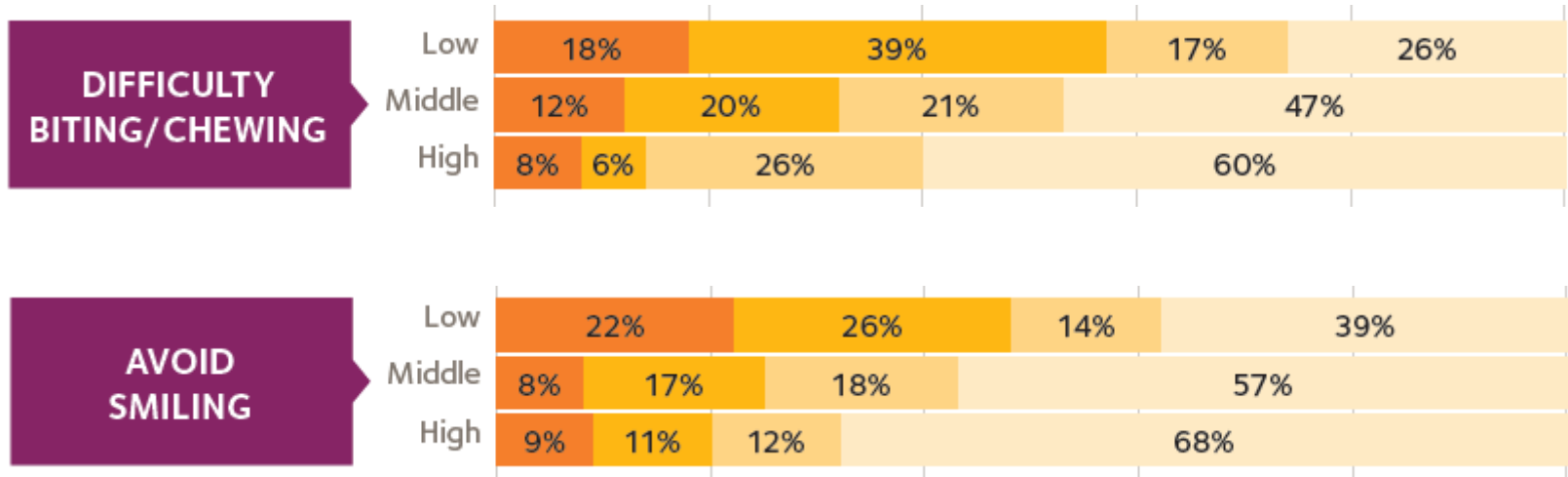
Dental Care Use

Percent of Children With a Dental Visit in the Past 12 Months, 2015



Oral Health & Well-Being for Adults

■ VERY OFTEN
 ■ OCCASIONALLY
 ■ RARELY
 ■ NEVER

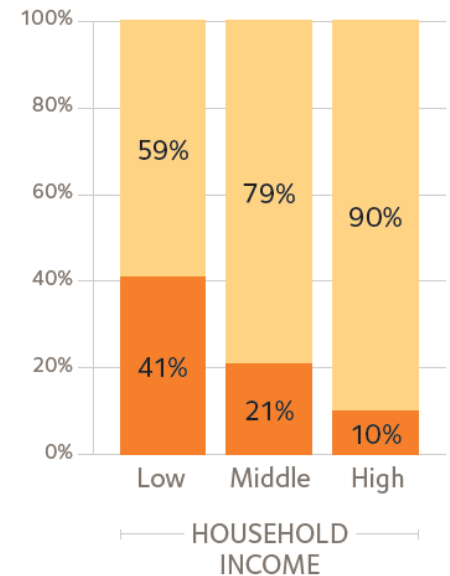
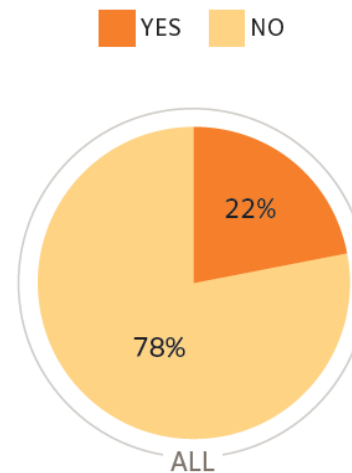


Oral Health & Well-Being for Adults



33% of low income adults reduce participation in social activities due to the condition of their mouth and teeth.

Appearance of Mouth and Teeth Affects Ability to Interview for a Job

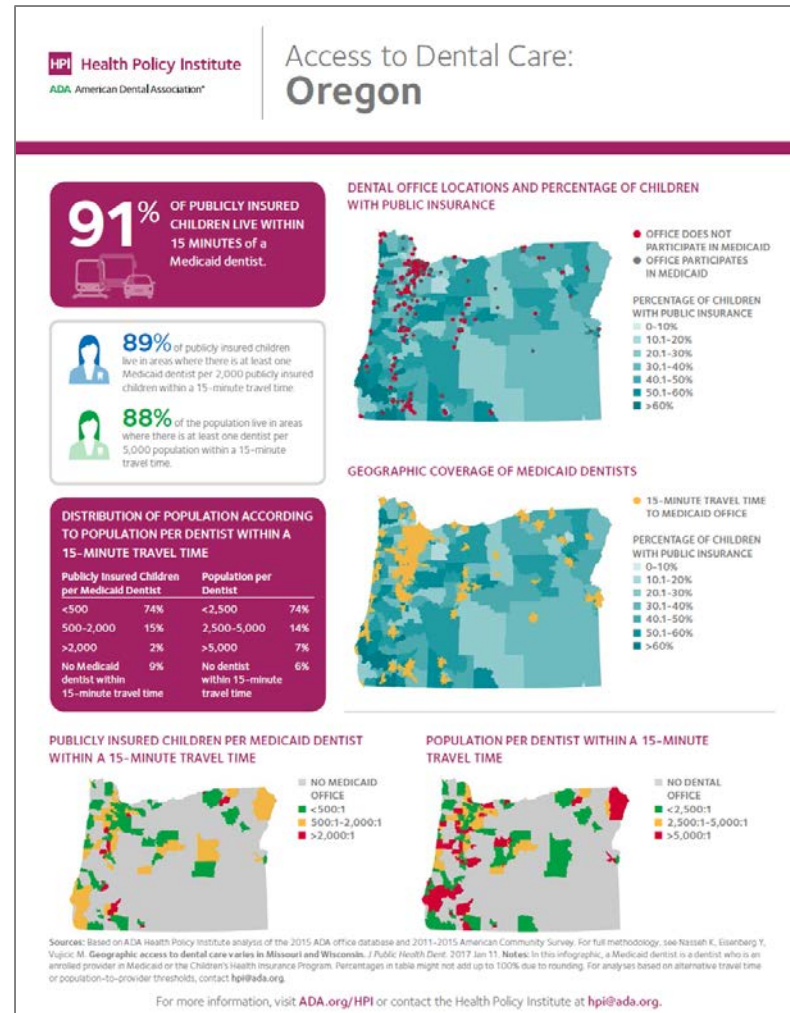
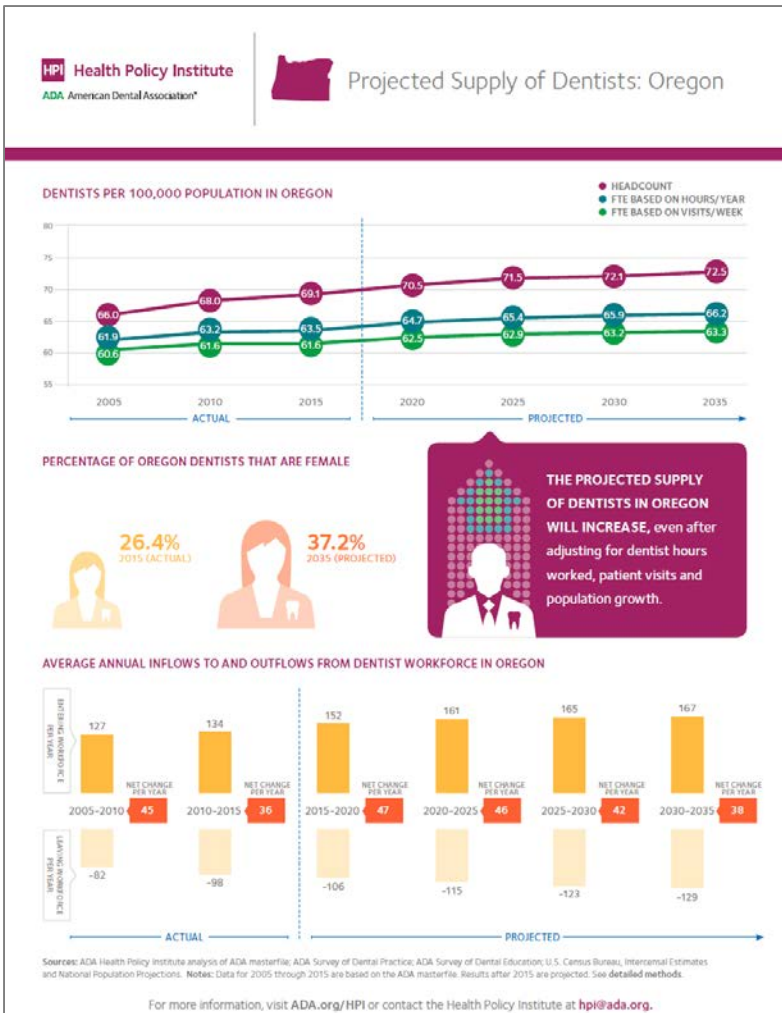


Barriers to Dental Care for Adults

Reasons for Not Visiting the Dentist More Frequently,
Among Those Without a Visit in the Last 12 Months



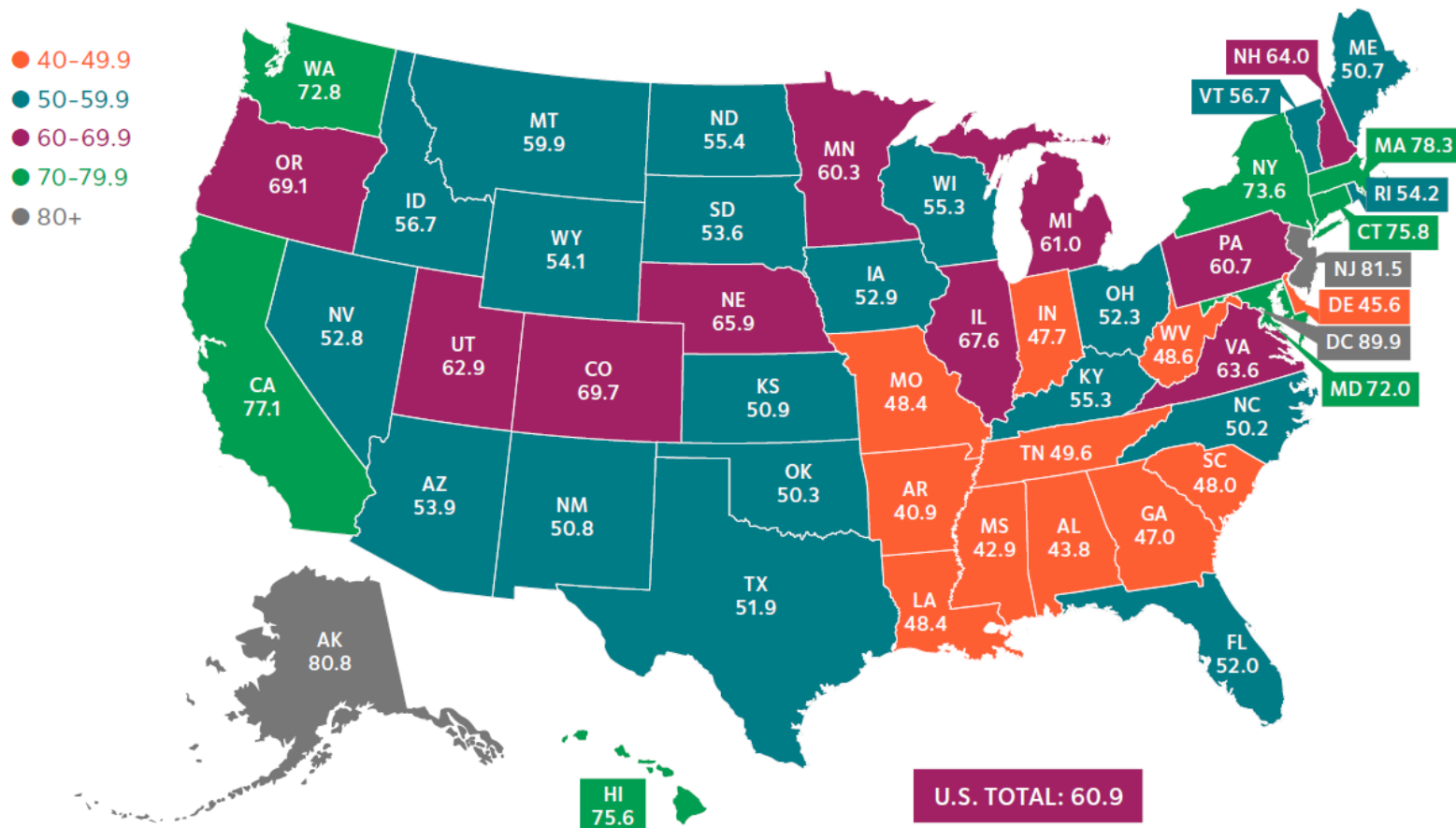
New Data-Driven Insights



Supply of Dentists

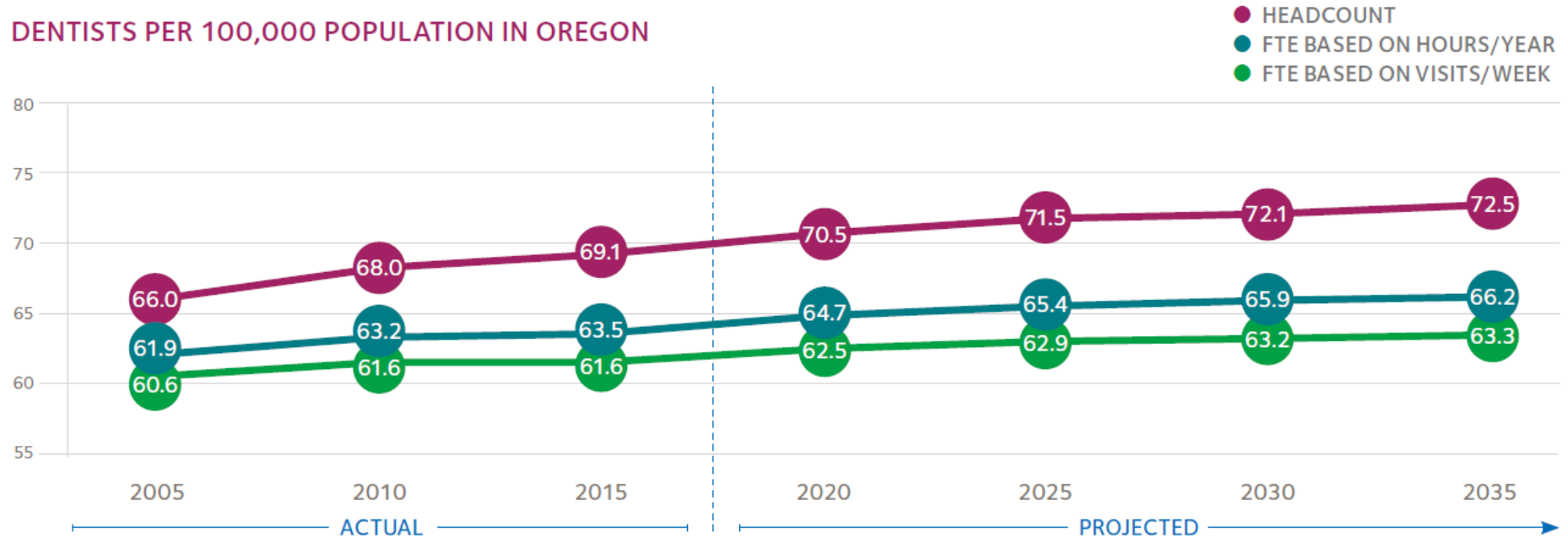
DENTIST-TO-POPULATION RATIOS VARY ACROSS STATES

The number of dentists per 100,000 population in the United States was 60.9 in 2015 and varied across states. The District of Columbia (89.9), New Jersey (81.5) and Alaska (80.8) had the highest ratios in the nation.



Supply of Dentists

DENTISTS PER 100,000 POPULATION IN OREGON



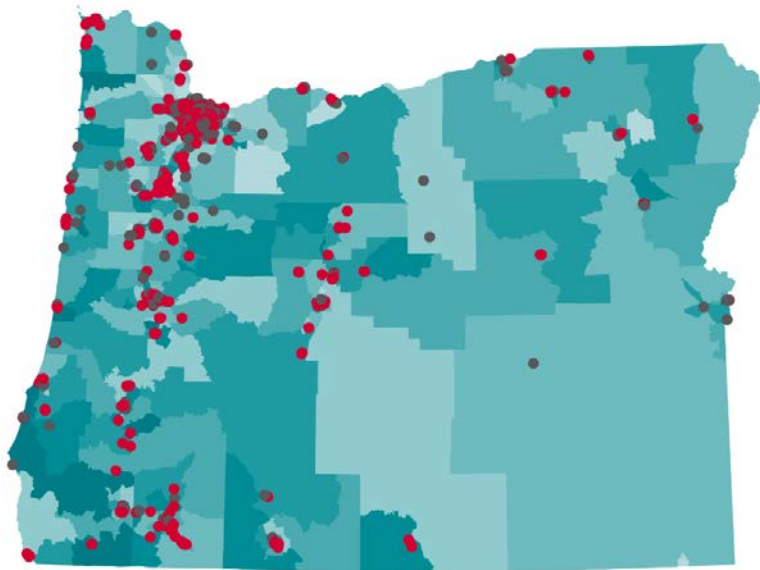
Geographic Access

Dental Offices

- Office Does Not Participate in Medicaid
- Office Participates in Medicaid

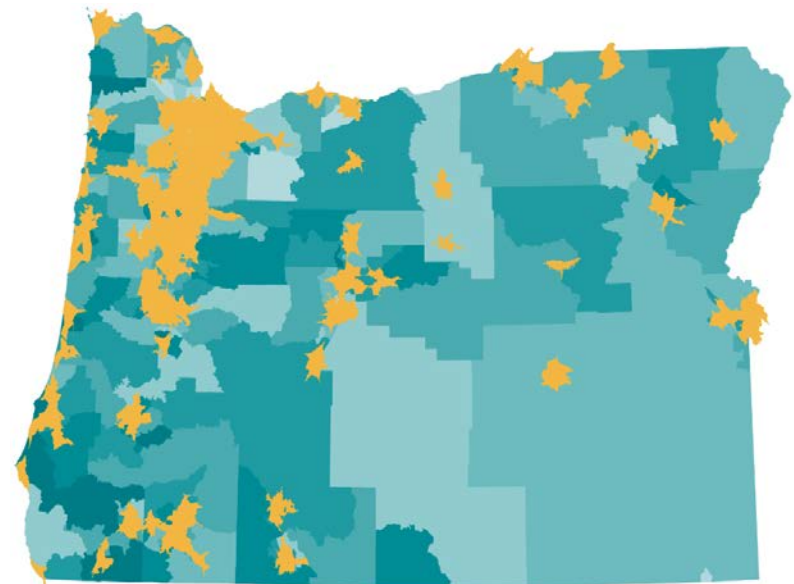
Percentage of Children with Public Insurance

- 0-10%
- 10.1-20%
- 20.1-30%
- 30.1-40%
- 40.1-50%
- 50.1-60%
- >60%



15 Minute Travel Time to Medicaid Office Percentage of Children with Public Insurance

- 0-10%
- 10.1-20%
- 20.1-30%
- 30.1-40%
- 40.1-50%
- 50.1-60%
- >60%



Geographic Access

91%

**OF PUBLICLY INSURED
CHILDREN LIVE WITHIN
15 MINUTES of a
Medicaid dentist.**



Geographic Access

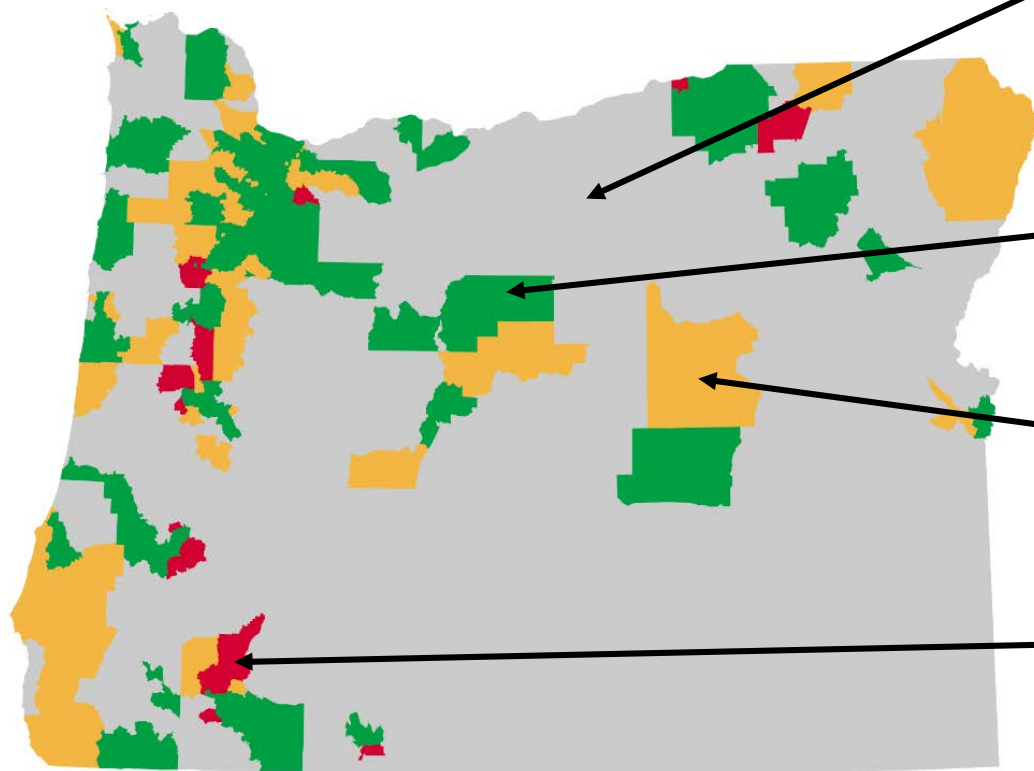
Publicly Insured Children Per Medicaid Dentist Within a 15-Minute Boundary

■ No Medicaid Office

■ <500:1

■ 500:1-2000:1

■ >2000:1



9% of publicly insured children do not have a Medicaid or CHIP dentist within a 15 minute travel time

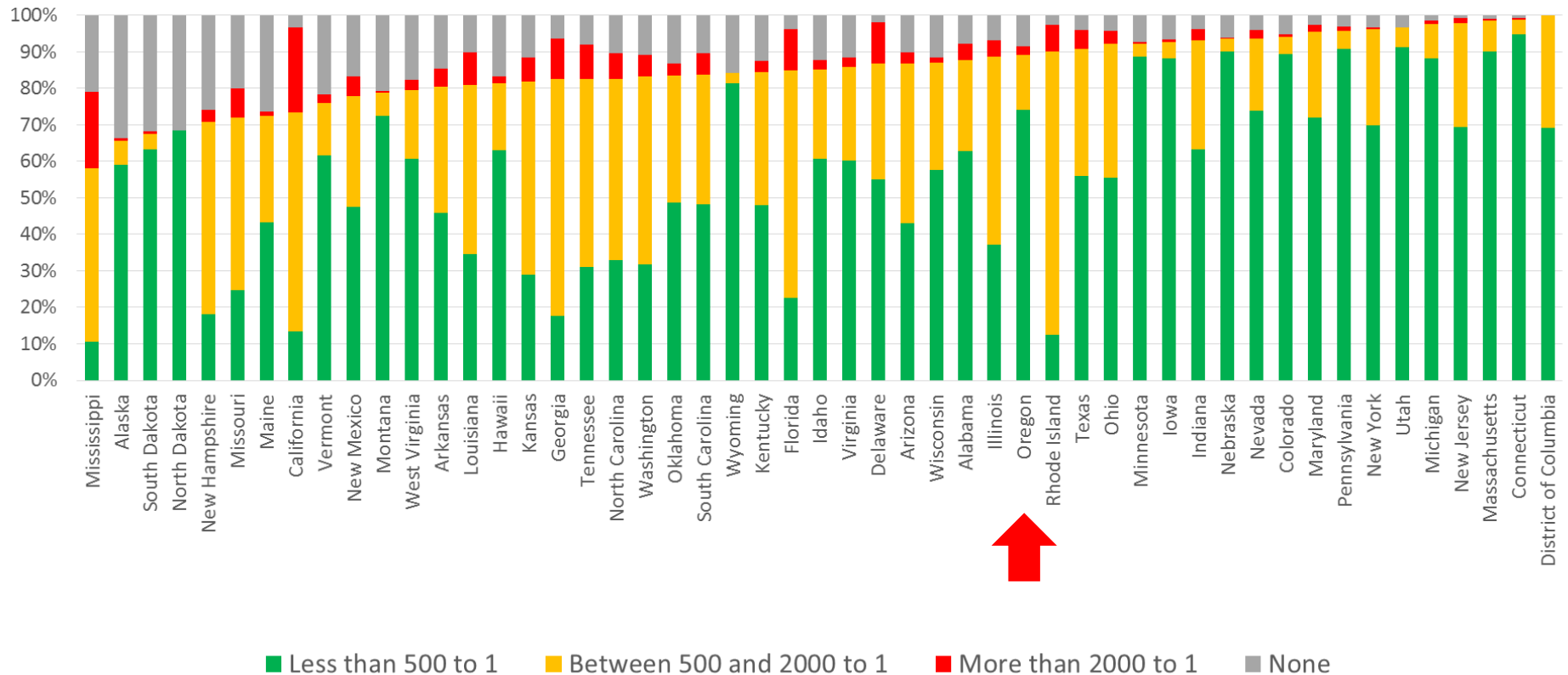
74% of publicly insured children live in areas with more than one Medicaid or CHIP dentist within a 15 minute travel time for every 500 publicly insured children

15% of publicly insured children live in areas with one Medicaid or CHIP dentist within a 15 minute travel time for every 500 to 2,000 publicly insured children

2% of publicly insured children live in areas with less than one Medicaid or CHIP dentist within a 15 minute travel time for every 2,000 publicly insured children

Geographic Access

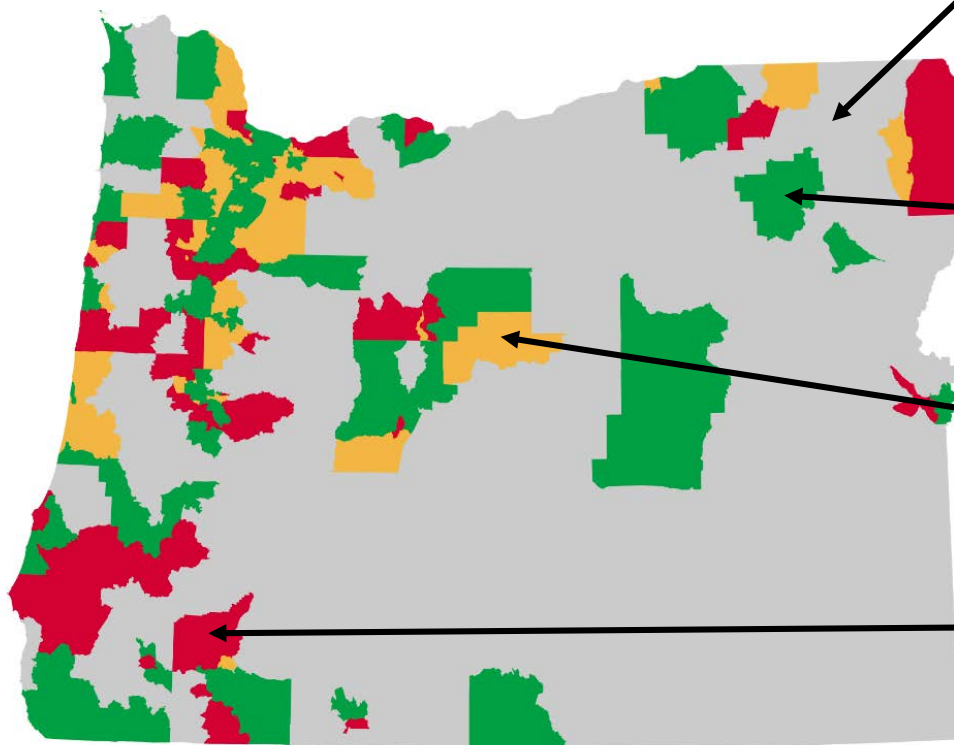
Breakdown of Publicly Insured Children per Medicaid or CHIP Dentist Within 15 Minute Travel Time



Geographic Access

Population Per Dentist Within a 15-Minute Boundary

- No Dental Office
- <2500:1
- 2500:1-5000:1
- >5000:1



6% of the population do not have a dentist within a 15 minute travel time

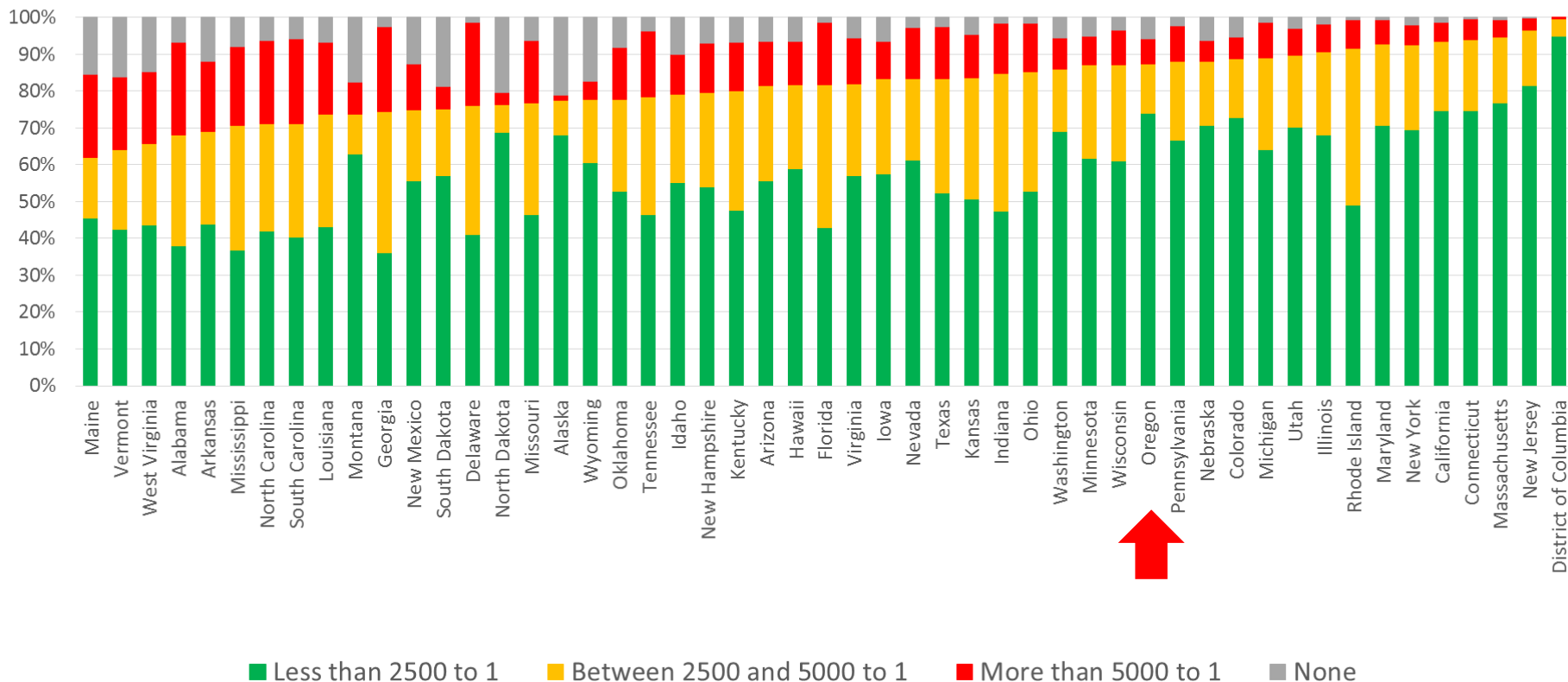
74% of the population live in areas with more than one dentist within a 15 minute travel time for every 2,500 people

14% of the population live in areas with one dentist within a 15 minute travel time for every 2,500 to 5,000 people

7% of the population live in areas with less than one dentist within a 15 minute travel time for every 5,000 people

Geographic Access

Breakdown of Population per Dentist Within 15 Minute Travel Time



Reimbursement in Medicaid

HPI Health Policy Institute

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Research Brief

Medicaid Fee-For-Service Reimbursement Rates for Child and Adult Dental Care Services for all States, 2016

Authors: Niodita Gupta, M.D., M.P.H., Ph.D.; Cassandra Yarbrough, M.P.P.; Marko Vujicic, Ph.D.; Andrew Blatz, M.S.; Brittany Harrison, M.A.

Key Messages

- Wisconsin, Washington and California had the lowest Medicaid reimbursement rates for both adult and child dental care services among states that provide dental services via fee-for-service.
- There is considerable variation across states in Medicaid fee-for-service reimbursement rates.

Introduction

Low-income children and adults are subject to different dental safety nets. States are required to provide dental benefits to children, who are covered by Medicaid and the Children's Health Insurance Program (CHIP), but providing adult dental benefits is optional.¹ Increased enrollment in Medicaid and CHIP led to a historic low of 11 percent of children lacking dental benefits in 2014, the most recent year data are available.² There has also been a steady increase in dental care utilization among children enrolled in Medicaid and CHIP over the past fifteen years.³ Low-income adults have not experienced similar gains. In 2014, the latest year for which we have data since Medicaid expansion under the Affordable Care Act, 54 percent of Medicaid-enrolled adults lived in states that provide adult dental benefits in their Medicaid programs.² However, 35.2 percent of adults in the U.S. do not have any form of dental coverage.²

A key issue for Medicaid is having a sufficient number of providers willing to participate. Research shows that a variety of factors limit the number of dentists that accept Medicaid, including high rates of cancelled appointments among Medicaid enrollees, low

The Health Policy Institute (HPI) is a thought leader and trusted source for policy knowledge on critical issues affecting the U.S. dental care system. HPI strives to generate, synthesize, and disseminate innovative research for policy makers, oral health advocates, and dental care providers.

Who We Are

HPI's interdisciplinary team of health economists, statisticians, and analysts has extensive expertise in health systems policy research. HPI staff routinely collaborates with researchers in academia and policy think tanks.

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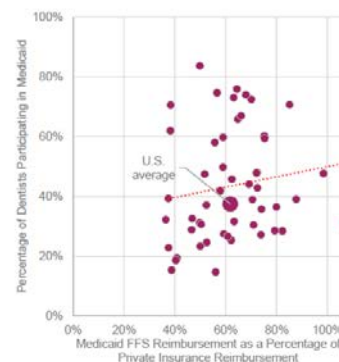
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April 2017

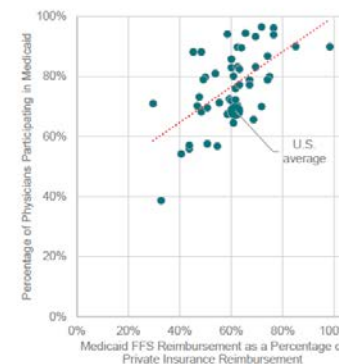
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Medicaid Fee-for-Service (FFS) Reimbursement and Provider Participation for Dentists and Physicians in Every State

REIMBURSEMENT AND PROVIDER PARTICIPATION IN MEDICAID FOR DENTISTS IN EVERY STATE



REIMBURSEMENT AND PROVIDER PARTICIPATION IN MEDICAID FOR PHYSICIANS IN EVERY STATE



PERCENTAGE OF PROVIDERS PARTICIPATING IN MEDICAID

37.5% DENTISTS 68.9% PHYSICIANS

MEDICAID FFS REIMBURSEMENT AS A PERCENTAGE OF PRIVATE INSURANCE REIMBURSEMENT

61.8% DENTISTS 60.1% PHYSICIANS

Source: Medicaid reimbursement for dentists is calculated from here. Medicaid reimbursement for physicians is calculated from here and here. Medicaid participation for dentists can be found here and for physicians here. Note: While fee-for-service (FFS) reimbursement rates are an important policy lever within Medicaid, they may not be representative of actual payment rates to providers in all states, depending on the extent of managed care programs. However, excluding managed care states based on classification found here does not change main conclusions. Analysis for dentists is based on reimbursement and participation in Medicaid for child dental care services. Physician participation is for office-based physicians and reimbursement is for primary care services. Data are for 2016 except for physician participation in Medicaid, which is for 2013. However, analysis suggests physician participation has not changed substantively since then.

Reimbursement in Medicaid

Figure 1: Medicaid Fee-For-Service Reimbursement as a Percentage of Fees Charged by Dentists, Child Dental Services, 2016

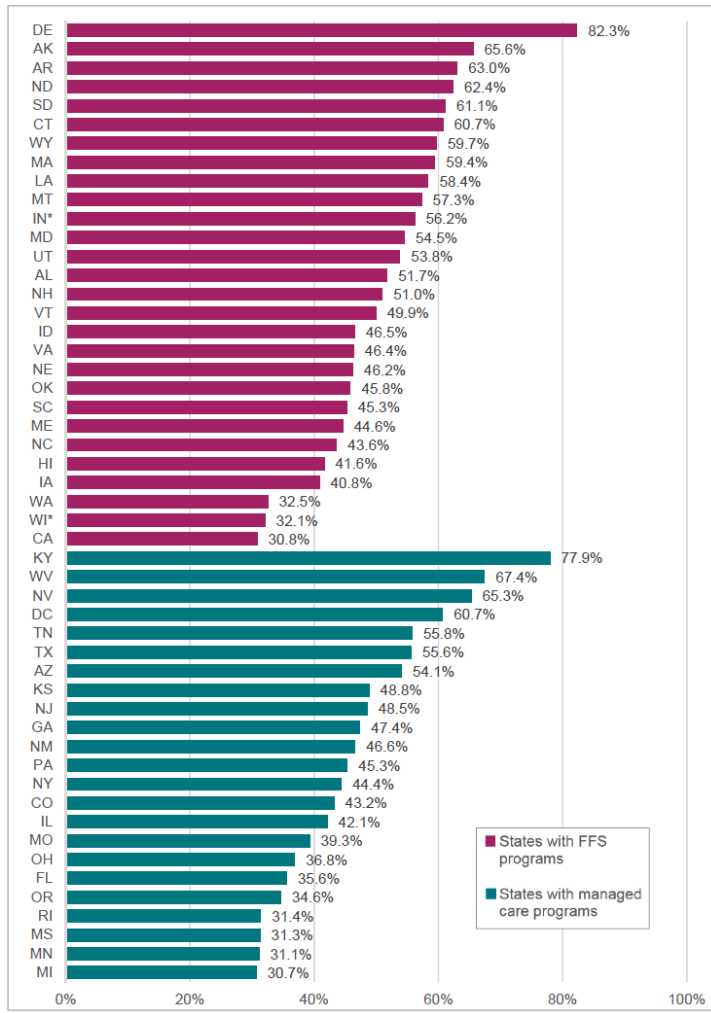
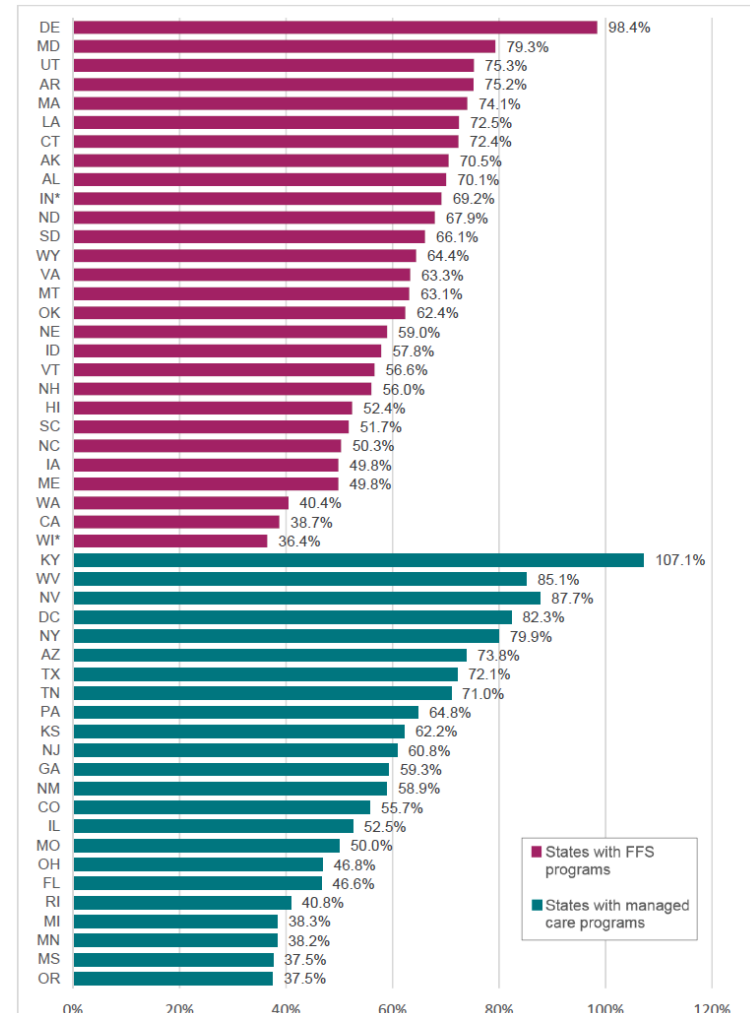


Figure 2: Medicaid Fee-For-Service Reimbursement as a Percentage of Private Dental Insurance Reimbursement, Child Dental Services, 2016



Reimbursement in Medicaid

Figure 4: Medicaid Fee-For-Service Reimbursement as a Percentage of Fees Charged by Dentists, Adult Dental Services, 2016

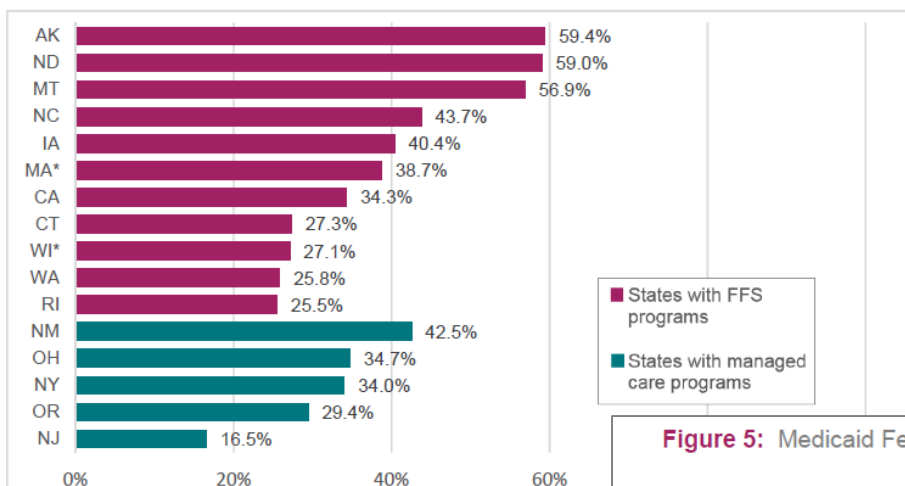
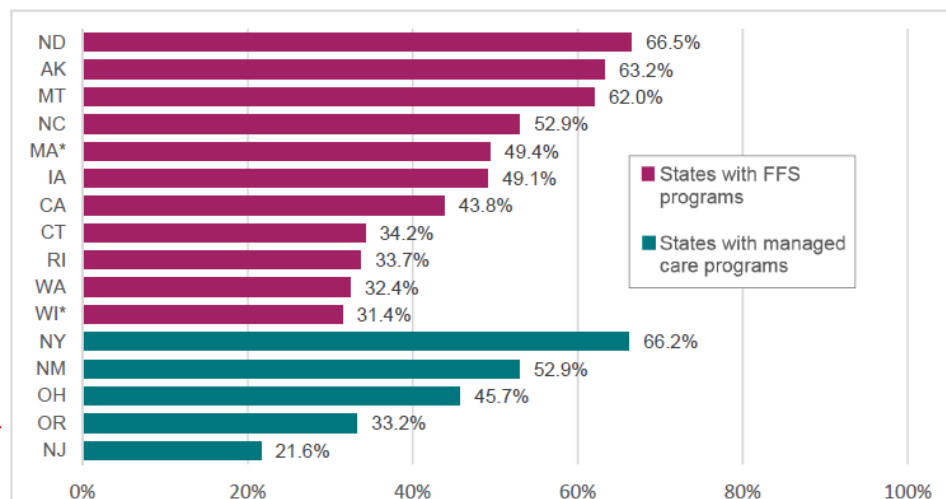
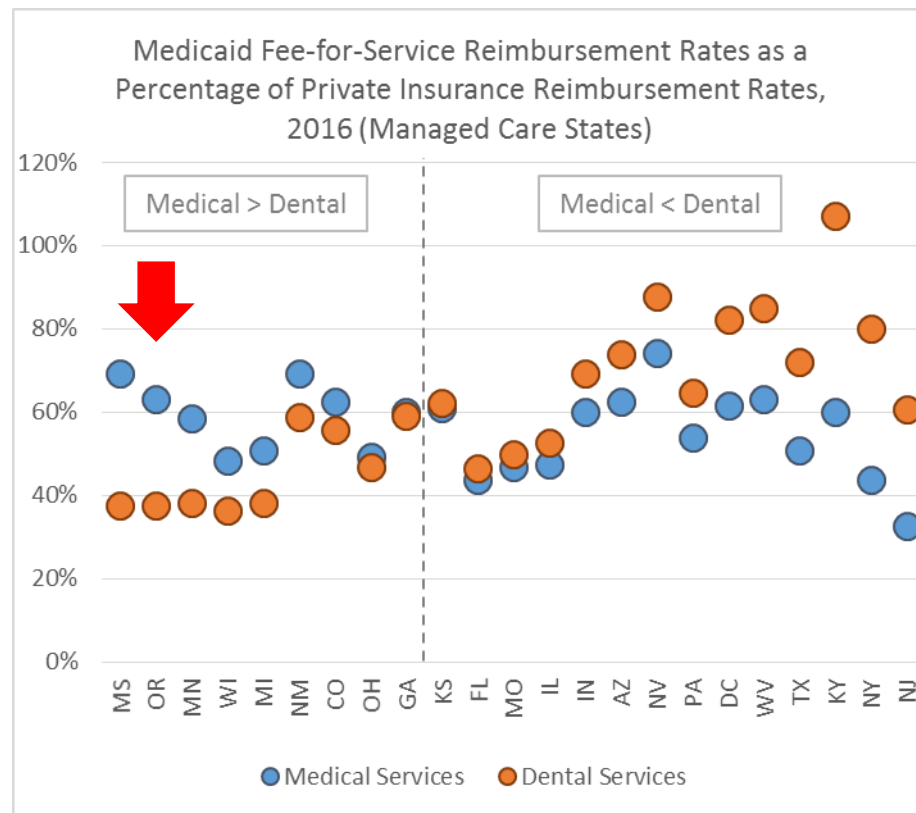
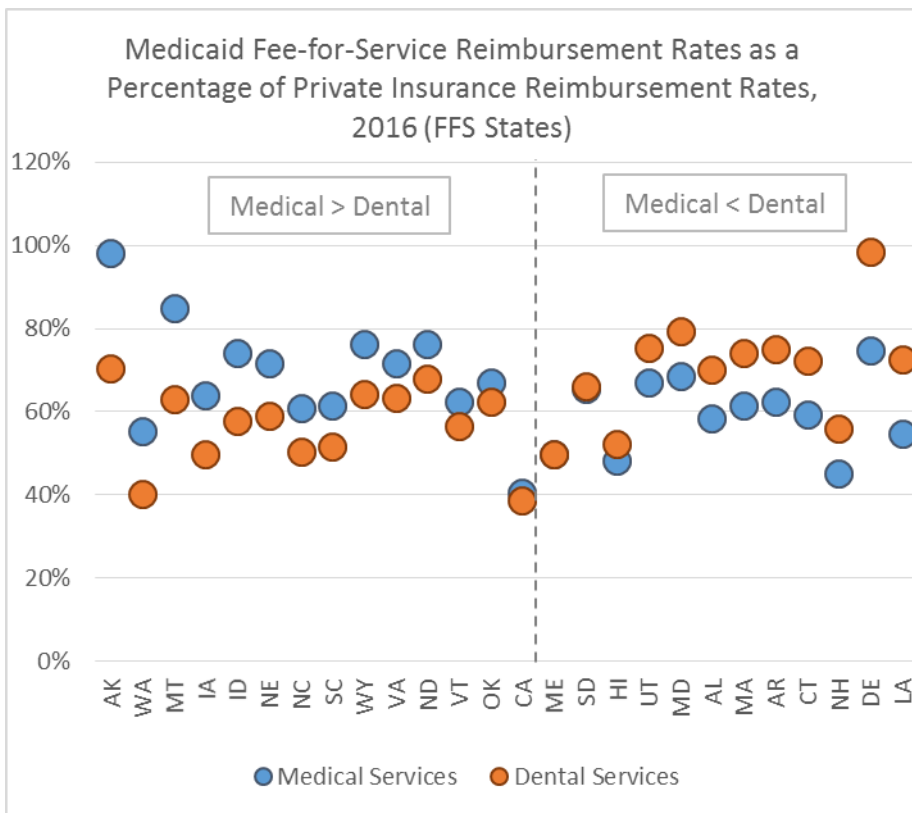


Figure 5: Medicaid Fee-For-Service Reimbursement as a Percentage of Private Dental Insurance Reimbursement, Adult Dental Services, 2016



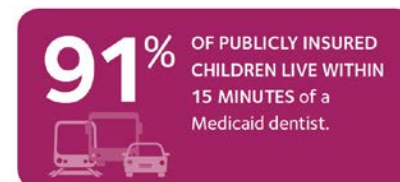
Reimbursement in Medicaid



Key Takeaways

What We Learned...

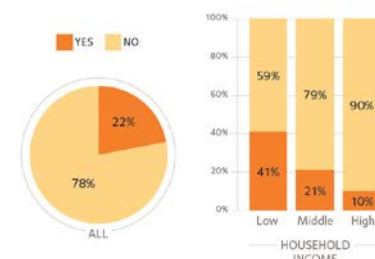
- Geographic coverage of dental care providers is quite extensive
- The supply of dentists is expected to grow steadily in the coming years
- Dental care use is low among publicly insured children
- Main barriers to dental care among adults relate to cost and fear, not lack of providers



What This Means...

- Need to focus less on “supply” interventions, more on “navigation” interventions (e.g. connecting members to a dental home, nudging diabetics into routine dental care)
- Need to re-examine adult dental benefit design so that it focuses much more on oral health outcomes
- Need to accelerate innovations in payment and care delivery models that focus on outcomes

Appearance of Mouth and Teeth Affects Ability to Interview for a Job



Thank You!



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