

ORAL HEALTH IN TEXAS

BRIDGING GAPS AND FILLING NEEDS



Texas
Health
Institute

A Report on the Burden of Oral Disease in Texas | 2018



Texas Health Institute

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Table of Contents

Executive Summary	2
Introduction	6
Oral Health and Overall Health: Where does Texas Stand?	7
What Factors Contribute to Texas' Oral Disease Burden?	10
Are Texans Accessing the Oral Health Care They Need?	14
Can Texas' Oral Health Workforce Meet Demand?	19
Key Findings and Discussion	22
Regional and County Data Profiles	26
North Central - Abilene	30
North Central - Wichita Falls	38
North - Dallas	44
North - Fort Worth	48
North - Plano/Sherman	54
North - Texarkana/Tyler	58
Southeast - Beaumont/Galveston	70
Southeast - Houston	78
Southeast - Brazos Valley	84
South - Corpus Christi/Gulf Coast	90
South - Laredo	98

South - Rio Grande Valley	102
South - San Antonio	106
West - El Paso	116
West - San Angelo	120
West - Midland/Big Bend	128
West - Panhandle	136
Central - Austin	154
Central - Round Rock/Hill Country	158
Central - Waco	164
Methodology and Data Sources	170
References	176
Appendix	188



Executive Summary

Oral health affects a person's physical, psychological, and social well-being, and is considered a window into the condition of the rest of the body.

Oral health problems also account for over \$1 billion dollars in state spending in Texas every year, not including costs related to absenteeism and diminished productivity at school and work. Often described as a "silent epidemic," oral health often struggles to command attention and urgency from public health leaders in proportion to its prevalence and cost burden.

Improving the oral health of Texans is within reach thanks to an abundance of safe, effective, and cost-containing measures within and beyond the dentist's chair. *Oral Health in Texas: Bridging Gaps and Filling Needs* provides a portrait of the oral disease burden in Texas and makes the case for a comprehensive public health approach to addressing oral health. The report unites a wealth of state, regional, and county-level data with supporting literature to empower public health leaders to better understand oral health strengths and challenges in their communities and across the state.

How this Report is Organized

A state-level overview of oral health is organized around four guiding questions with implications for public health leaders and policymakers across the state:

- Oral health and overall health: Where does Texas stand?
- What factors contribute to Texas' oral health burden?
- Are Texans accessing the oral health care they need?
- Can Texas' oral health workforce meet demand?

Each section describes the available scientific evidence and provides a thorough, impartial review of associated policy issues. Where possible, Texas' performance on measures of oral health, risk factors for disease, access to care, and workforce capacity are compared to national average and Healthy People 2020 targets.

Following the state-level data and supporting literature, regional and county data profiles for 20 regions and all 254 Texas counties are presented. These profiles display the most recent publicly available data on population and socioeconomic factors, oral health outcomes, risk factors for disease, clinical care, and Medicaid and CHIP enrollment and expenditures. Results are presented at the most granular level the data will allow to promote exploration of oral health on a local scale.

Data Sources & Technical Notes

Findings in this report are based on evidence from several national and state data sources, including but not limited to Behavioral Risk Factor Surveillance System, Youth Risk Behavior Surveillance System, National Survey of Children's Health, National Health and Nutrition Examination Survey, the Texas Department of State Health Services, and Texas Health and Human Services Commission. Refer to the Methodology and Data Sources section for a complete listing of data sources, indicator definitions, and years.

In this report, Texas' Regional Health Partnership (RHP) boundaries have been used to analyze and report oral health outcomes by region. RHP regional boundaries were selected after evaluating several existing statewide regional frameworks. RHPs permitted the most granular regional analysis possible while generally maintaining sufficient sample size to produce valid estimates on measures obtained from survey data.

Key Findings & Discussion

This report's key findings reflect high-level themes observed consistently within regions and throughout the state. While these key findings begin to tell a high-level story on oral health in Texas, they are not intended to be exhaustive or conclusive. Rather, they serve as examples of the type of inquiry the data support, and provide a launch point for conversations around tailored, evidence-informed solutions. The three key findings include:

1 While Texas is lagging in several oral health priorities, it has also shown capacity to lead.

Children in Texas experience tooth decay and dental problems at elevated rates compared to the rest of the nation. Rates of adult oral health problems in Texas more closely resemble national averages, but still reflect a great burden of chronic or severe oral health deterioration with age. More than half of Texans age 45-64 have had tooth loss due to oral disease, and about one in eight Texans age 65 and older have none of their natural teeth remaining.

There is also substantial reason for concern about Texans' ability to obtain and afford oral health care. Texas has the highest health uninsured rate in the nation (17%) and the dental uninsured rate, while not publicly tracked, is almost surely higher. Forty percent of the nation's dental care is financed out-of-pocket, yet one-third of Texas households earn incomes at or near the federal poverty level. Families who lack the resources to meet their basic needs are unlikely to be able to bear the full cost of dental services.

Despite challenges, Texas has achieved examples of success worth sustaining. The state performs well on measures of dental care access and utilization for children: 81% percent of Texas children ages 1-17 have made a dental visit in the past year. Approximately 69% of children in Texas' Medicaid and CHIP programs make annual dental visits, the highest rate of any state in the country. In seven of twenty Texas regions, fewer than 10% of adults have poor dental health. Common threads between leading regions include low rates of smoking and oral cancer, higher rates of health insurance coverage, and an adequate supply of oral health professionals.

2 Texas' oral health burden is most concentrated in its rural and border regions.

Texas' oral health burden splits unevenly across urban/rural and border/non-border regional divides. Rural and border regions are home to high proportions of low-income and food insecure populations, with adult health uninsured rates as high as 42% in the border regions.

The rural region containing Abilene has an estimated 28% of adults in poor dental health, a rate nearly four times higher than the top performing urban regions (between 7-8%). The rural regions containing Abilene and Wichita Falls also have some of the state's highest oral cancer rates. All seven rural regions have lower than average rates of past-year dental visits, and many rural and border regions lack an adequate supply of oral health providers.

Oral health problems co-occur with chronic diseases and are made worse by health risk behaviors like smoking. Chronic disease and smoking rates are excessive in rural regions. The rural region containing Abilene has nearly three times the estimated rate of diabetes as the Dallas region, and twice the rate of smoking as the San Antonio region. Diabetes rates are higher in most of Texas' border regions. Obesity appears to be a major problem statewide.

While rural regions and border regions both bear an outsized burden of oral disease, they differ in their use of the public health care safety net. In border regions, approximately 20-28% of the population is enrolled in Medicaid, compared to 13-17% in rural regions. Annual Medicaid costs per enrollee (both dental and non-dental) are among the state's highest in border regions despite a younger overall population, and among the lowest in rural regions despite an older population. Further analysis may be needed to explore underlying drivers of Medicaid enrollment and expenditure differences in rural and border areas.

3 Focusing narrowly on health care neglects other opportunities to improve oral health.

Evidence from this report suggests access to health care is necessary, but not sufficient, to achieve good oral health outcomes. Despite performing well on measures of access to dental care for children, the state's child oral health outcomes are poor. Ninety percent of Texas children have health insurance, with pediatric dental services nearly universally covered. Eighty percent of Texas children visit the dentist annually. However, Texas ranks third-worst in the nation (39th out of 41 ranked states) for the percentage of third graders who have experienced dental caries.

This phenomenon is also observed regionally. The Southeast Texas region containing Beaumont/Galveston performs equal to or better than the rest of the state on several measures of oral health care access, but ranks among the worst in the state for estimated rates of oral cancer mortality, poor adult dental health, and complete tooth loss among older adults. Put another way, oral health outcomes in the Beaumont/Galveston region are no better than regions with measurably greater access limitations.

These findings suggest other factors are undermining the protective effects of access to care, and this report identifies several potential contributors. The percent of Texans served by fluoridated drinking water has decreased from 79% in 2014 to 69% in 2017. Food insecurity, which affects 10% of Texans, is a source of risk for untreated dental caries and dental pain among children. And in regions with poor dental health outcomes – even those with better access to care – smoking, cardiovascular disease, and obesity rates are high.

Summary

This report confirms oral health problems are widespread among Texans of all ages and backgrounds. Oral disease is largely preventable, costs taxpayers millions of dollars in avoidable health care spending, and causes untold pain and suffering. Already a pervasive and expensive issue, demographic and chronic disease-related trends suggest oral health is poised to grow into an increasingly complex and urgent challenge for the state in the coming years.

Abundant opportunities exist within and beyond the context of clinical care to improve oral health. Indeed, there are exemplary areas of the state that achieve aspirational results, uniting clinical care with efforts to minimize adverse health risk behaviors, support chronic disease management, and community-based efforts to protect good oral health. By taking deliberate steps to promote and protect oral health, public health leaders in Texas are well-positioned to reduce the largely preventable consequences of oral disease and improve overall health and quality of life in their communities.



Introduction

The health of the mouth is inseparable from general health and essential for overall well-being at all life stages. Indeed, health care professionals consider oral health a window into the condition of the entire body. Ailing oral tissues often signal the first evidence of infectious disease, cancer, injuries, immune system disorders, or nutritional concerns affecting the rest of the body. Oral diseases also impact a person's functional, psychological, and social well-being. Simple actions people might take for granted like talking, smiling, and eating can be uncomfortable or impossible for those with oral health problems. People who experience embarrassment, bullying, or discrimination based on the appearance of an unhealthy or disfigured mouth may lose self-esteem and withdraw from social relationships.

Despite accounting for \$124 billion of nationwide health care costs in 2016, – including \$1.4 billion from Texas' Medicaid and Children's Health Insurance Programs (CHIP) – oral health struggles to command urgency from public health leaders in proportion to its prevalence and cost burden.^{1 2} Oral diseases also threaten to undermine the economic vitality of the state by contributing to school and workplace absenteeism, interfering with academic progress and diminishing worker productivity. For these reasons, oral health has been called a "silent epidemic," requiring a decisive, coordinated response from policymakers and professionals within and outside the health sector.³ Leaders in every community across the state must aspire to create conditions that help all Texans live free of oral disease and attain the highest possible standard of well-being.

How is oral health defined?

Oral health refers to the health of all parts of the mouth and throat, including the teeth, gums, tongue, lips, hard and soft palates, salivary glands, tissues, jaws, and surrounding bones, muscles, and nerves.

Improving the oral health of Texans is within reach thanks to an abundance of safe, effective, and cost-containing prevention measures and policy options. This report aims to convey the most current evidence on the state of oral health in Texas, including disease burden, risk factors, access to care, and information on policy options. Accompanying statewide and local data profiles are intended to stimulate dialogue, inform planning, and motivate leaders to action with the goal of improving oral health in their communities. By taking deliberate steps to promote and protect oral health, Texas is well-positioned to reduce the largely preventable consequences of oral disease in the state.



Oral Health and Overall Health: Where does Texas Stand?

Oral Disease in Texas

Tooth decay, gum disease, and other diseases of the mouth affect millions of Texans at every life stage: 7.5% of Texas children have fair or poor dental health, and 11.6% of Texas adults currently have poor dental health.^{4 5} Most problems with the teeth and gums fall into three major categories – dental caries, periodontitis, and oral cancer.

Tooth Decay & Periodontal Disease. Dental caries is a decay process caused by infectious, transmissible bacteria living in the mouth.⁶ These bacteria convert sugars and carbohydrates from the diet into acids, dissolving the mineral surfaces of teeth and eventually producing holes, or cavities, in the tooth enamel. When caries progresses beyond the enamel, infection progresses into the pulp of the tooth. Painful abscesses may result, in severe cases destroying bone and spreading infection to other body systems through the bloodstream.

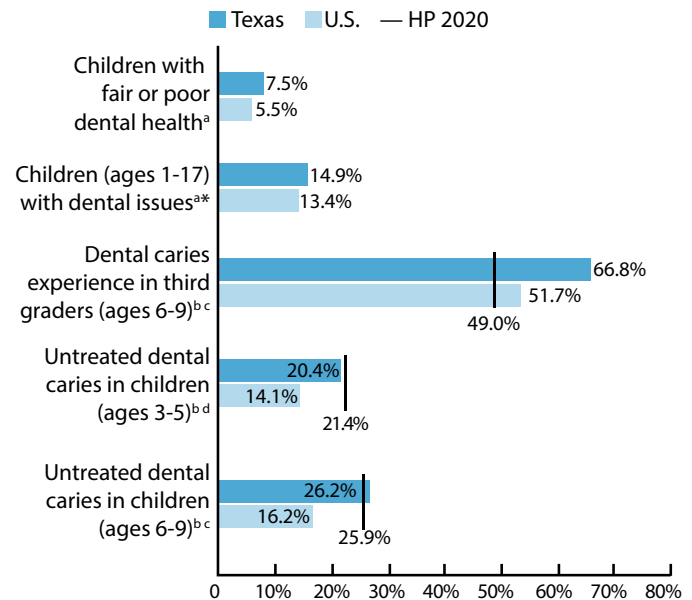
According to Centers for Disease Control and Prevention (CDC) estimates, more than one-third (37%) of children ages 2-8 have experienced dental caries in their primary teeth, and 58% of adolescents ages 12-19 have experienced dental caries in their permanent teeth.⁷ Approximately 14% of children ages 2-8 and 15% of adolescents ages 12-19 have untreated tooth decay.⁸

Out of 41 states reporting data to CDC between 2008 and 2013, Texas ranked third worst (39th) for the percent of third graders who have experienced dental caries and seventh worst (35th) for the percent with untreated dental caries.⁹ In both cases, Texas' rates of dental caries experience and untreated decay among third graders exceed national averages, indicating worse oral health status (Figure 1).

Periodontal disease, referring to disease of the gums (gingivitis) and tissue and bones surrounding the teeth (periodontitis), occurs when mouth bacteria colonize spaces between gums and teeth.¹⁰ Regular brushing, flossing, and dental care controls bacterial growth, but long periods of exposure to these bacteria can degrade gum tissue and bones stabilizing the teeth. As periodontal disease advances, teeth eventually become loose and infection

Figure 1

Oral Health Outcomes in Children



Sources:

^a National Survey of Children's Health, 2016

^b National Health and Nutrition Examination Survey, 2013-2014

^c Texas Basic Screening Survey, 2012-2013

^d Texas Basic Screening Survey, 2013-2014

*such as tooth ache, bleeding gums, and dental caries in the past 12 months

By the time American adults reach age 60, 91% will have had a history of tooth decay.

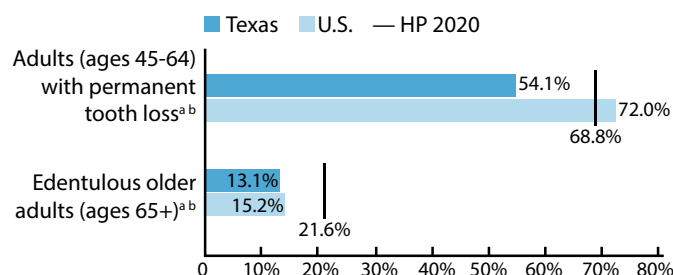
risk increases. Gingivitis can begin as early as adolescence, while periodontitis tends to begin in adulthood and is a leading cause of tooth loss among older adults.¹¹ Periodontitis affects about 65 million adults over age 30, or 46% of the U.S. adult population.¹² Periodontal disease prevalence is not publicly tracked at the state level.

A decline in national rates of tooth decay and periodontal disease over the last three decades amounts to a major public health success; however, not all groups have enjoyed equal oral health status improvements.¹³ Seven in ten Hispanic adults in the U.S. today

have periodontitis, compared to six in ten Blacks and four in ten Whites.¹⁴ And as dental problems accumulate with age, poor oral health remains a pervasive concern for older adults, especially older adults of color and those who are economically disadvantaged.¹⁵ By the time American adults reach age 60, 91% will have had a history of tooth decay.¹⁶ Nearly 70% of adults over age 65 have periodontitis, and those with severe periodontitis have an average of just 21 teeth remaining (out of 32).¹⁷ More than one out of every seven American adults age 65-74 are completely edentulous, meaning they no longer have any of their natural teeth (Figure 2).

Figure 2

Oral Health Outcomes in Middle Age and Older Adults



Sources:

^a Texas Behavioral Risk Factor Surveillance System, 2012, 2014, 2016 (edentulism data for age 65+ years)

^b National Health and Nutrition Examination Survey, 2013-2014 (edentulism data for age 65-74 years)

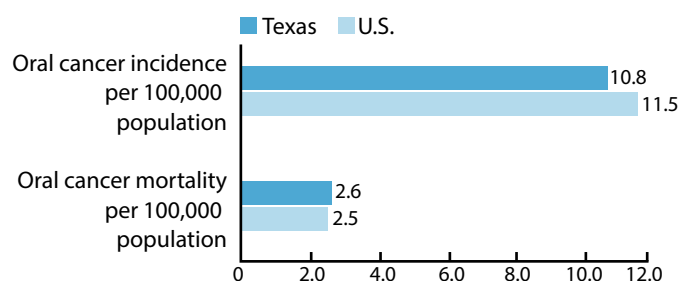
Currently, 54.1% of Texans age 45-64 have had at least one tooth extracted due to tooth decay or gum disease, better than the national rate of 72.0%. The rate of completely edentulous adults in Texas (13.1%) also falls slightly below the national rate of 15.2% (Figure 2). However, older adults in Texas are poised to bear a greater share of Texas' oral disease burden in coming decades. Adults over age 65 are the fastest growing age group in the state, with their numbers expected to more than triple in size from 2010 to 2050.¹⁸ In addition, life expectancies in Texas have consistently trended upward from 1989 to 2014.¹⁹ It appears more Texans will advance further into old age than ever before, and live more years of life during a period when the health of the mouth is naturally deteriorating.

Oral Cancer. Oral cancer is the eighth most common cancer worldwide, and includes cancers of the lip, mouth, and pharynx.²⁰ The American Cancer Society has estimated nearly 50,000 Americans will be diagnosed with oral cancer in 2018, and of those, 10,000 will ultimately die of the disease.²¹ Similar estimates from the year 2000 predicted 30,000 new oral cancer cases and 8,000 deaths.²² Accounting for population growth, these data suggest new cases of oral cancer are decreasing and survivorship has increased over the past two decades.

Oral cancer incidence in Texas decreased 9% over a nine-year period from 2000-2008, mirroring the direction of national trends during that time.²³ Adjusted for age, Texas currently has an annual oral cancer incidence rate of 10.8 new cases per 100,000 population, lower than the national rate of 11.5 cases per 100,000 population. Texas' oral cancer mortality rate is also similar to the national rate (Figure 3).

Figure 3

Oral Cancer Incidence and Mortality



Source:

Surveillance, Epidemiology, and End Results, 2010-2014

Craniofacial Conditions. Oral or facial injuries, genetic disorders such as cleft lip and palate, or severe malocclusion (misalignment of teeth) can impact both function and appearance of the mouth. In Texas, 15.1 oral clefts occurred per every 10,000 live births from 2010-2014.²⁴

Children bear a substantial burden of craniofacial injuries and disorders. While some children are born with abnormalities, children are also most vulnerable to acquiring craniofacial conditions through accidental injuries, sports injuries, motor vehicle accidents, and child abuse.²⁵

While uncommon, craniofacial conditions can have lifelong negative social and quality-of-life impacts.²⁶ Cleft lips and palates usually require multiple surgeries and can be extraordinarily expensive to treat. A child born with a craniofacial defect will likely incur a minimum of \$100,000 in treatment costs over a lifetime.²⁷

Health Conditions Beyond the Mouth

The U.S. Surgeon General's landmark report *Oral Health in America*, released in the year 2000, described the mouth as both "a portal of entry for infection" and "a mirror of health and disease." The report made explicit the mouth's major role in gatekeeping and signaling pathology, and ushered in further examination of the relationship between oral and systemic health in the years since its publication.²⁸ While current evidence does not confirm oral health problems directly cause chronic disease, or vice versa, it does support a bidirectional relationship where risks and symptoms of oral diseases and other diseases are made worse by co-occurring with one another.^{29 30}

Connections between oral health and cardiovascular disease, diabetes, hypertension, respiratory disease, obesity, AIDS, mental health and substance use disorders, and infectious disease are plentiful and thoroughly supported by research. As examples, inflammation associated with periodontal disease increases risk for stroke, cardiovascular disease, obesity, respiratory infection, and premature birth.^{31 32} ³³ Periodontitis is also a routine complication of diabetes, and makes blood sugar more difficult to control.³⁴ Pneumonia and other respiratory infections can result when bacteria from mouth are aspirated into the lower respiratory tract.^{35 36} While chronic obstructive pulmonary disease is largely attributable to smoking, bacteria from the mouth play a role in advancing the progression of the disease.³⁷

Medications and medical treatments are often an underlying reason for the association between oral health problems and chronic disease. For example, dry mouth – a common side effect of medication – decreases saliva flow, which has a protective effect on the mouth and teeth.³⁸

For these reasons, medically complex and immune-compromised individuals are especially susceptible to oral disease.

Between 7% and 15% of adults say oral problems have limited them from laughing, smiling, or conversing with others in the past year.

Beyond specific diseases and diagnoses, oral health has the potential to severely diminish overall quality of life, with negative psychological and social impacts.^{39 40} About one in five adults experience embarrassment in social interactions due to the appearance of their mouth, which can diminish self-esteem and lead to social withdrawal. Between 7% and 15% of adults say oral problems have limited them from laughing, smiling, or conversing with others in the past year, and one quarter of edentulous adults have avoided close relationships because of fear of rejection.^{41 42} Children with dental caries and gum disease have more frequent pain due to toothaches, increased school absenteeism due to dental problems, and report often feeling worried or upset about their mouths.^{43 44}

In older adults, oral disease accelerates physical decline and disability. In a large international survey of older adults, respondents said having eight or fewer teeth impacted quality of life more than having cancer.⁴⁵ Tooth loss can lead to nutrition deficiencies and weight loss as it becomes more difficult to chew and swallow food, sometimes termed the "anorexia of aging."⁴⁶ Softer and easily chewable foods tend to be high in fat, sugar, and starch content, putting those with heart disease or diabetes at increased risk of further complications.⁴⁷

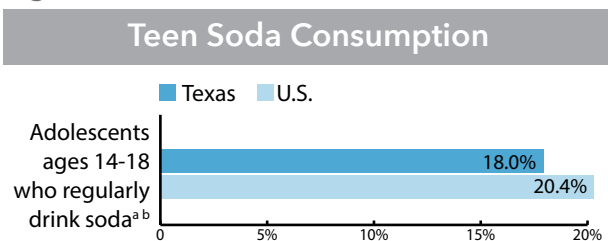
What Factors Contribute to Texas' Oral Disease Burden?

Sugary Beverage Consumption

Decreasing consumption of sugary beverages – especially among young people – is a key public health aspiration. Soda, sports drinks, energy drinks, and 100% fruit juice are the largest source of added sugar in the typical American diet, with approximately 50 gallons of sugary beverages consumed per person per year.⁴⁸ Currently, 18% of adolescents in Texas consume soda at least once per week, compared to 20.4% of teens nationally (Figure 4). Comparable soda consumption data for young children and adults in Texas are not available.

Sugar degrades the surface of tooth enamel by stimulating bacterial acid production. Risk for dental caries increases as sugary beverage intake increases. Children who begin drinking large quantities of sugary beverages when they are as young as 2 years old experience more dental caries by ages 4-7 than children with lower sugary beverage consumption.⁴⁹ Risk for dental caries among those with high sugary beverage intake remains consistent regardless of age, education, and use of fluoride toothpaste.⁵⁰

Figure 4



Sources:

^a Youth Risk Behavior Surveillance System, 2015

^b Texas Youth Risk Behavior Surveillance System, 2017

Public health and oral health leaders nationwide have explored policy interventions to limit sugary beverage consumption, a leading cause of dental caries. Restrictions on offering sugary beverages in schools, so-called “soda taxes,” or restrictions on supplemental nutrition assistance benefits for low-income populations have been considered or implemented in Texas and elsewhere.

Current sales tax levels – typically about 5-10% of purchase price – do not increase the price of sugary beverages enough to produce substantial behavior change.^{51 52} Eight urban U.S. cities and

counties have passed an excise tax on sugar-sweetened beverages, none located in Texas.⁵³ The most common tax, a penny per ounce, further increases the price of single units of soda 10-20%.⁵⁴ Evidence suggests these excise taxes have decreased consumption of soda and other sugary beverages.⁵⁵ However, municipal and local taxes may do more to displace sugary beverage purchases than decrease them, since consumers can buy sugary beverages in neighboring areas without such taxes.⁵⁶ Some evidence suggests taxes enacted across a larger geographic area are less susceptible to this problem and achieve closer to the desired effect. In 2013, Mexico passed the first nationwide excise tax on sugary drinks, and within the first year of implementation soda sales decreased by 12%, with the sharpest decline among low-income residents.⁵⁷ Aside from the potential public health benefits of discouraging soda consumption, sugary beverage taxes generate revenues that many municipalities have earmarked specifically to fund public health, health care, or education initiatives.⁵⁸

Public health advocacy groups have questioned allowing sugary beverages to be purchased through the federal Supplemental Nutrition Assistance Program (SNAP). Federal SNAP benefits can be used like cash at most grocery stores to purchase eligible foods. A 2016 United States Department of Agriculture (USDA) report finds nearly 10% of grocery dollars spent by SNAP beneficiaries are on sugary beverages.⁵⁹ The USDA has historically denied state requests to remove sugary beverages from the list of SNAP-eligible foods, preferring instead to encourage reduced sugary beverage consumption and increased intake of water through nutrition education and health promotion.

SNAP restrictions and sugary beverage taxes have been criticized for targeting the poor, with effects concentrated predominantly or exclusively in the low-income population. Proponents contend this reflects a proportional response to the unequal burden of disease affecting low-income populations, and taxes or SNAP benefit restrictions could have the biggest positive impact on low-income families whose risk for many types of oral disease is elevated.⁶⁰

Sugary beverage taxes and restrictions have not gained much traction in Texas' cities, counties, or the state legislature to date. Since 2011, the Texas legislature has considered six different bills taxing or restricting sugary beverages, but none have become law.⁶¹ The Texas Department of Agriculture, which administers nutritional funding and guidelines to Texas' public schools, enforced a strict ban on most soda sales in schools beginning in 2005, regulations that were later lifted in 2015.^{62 63}

Tobacco, Alcohol, and Drug Use

Currently, 14.3% of Texans age 18 or older smoke cigarettes, a behavior shown to increase susceptibility to oral disease.^{64 65} Additionally, 4.3% of adults in the state regularly use smokeless tobacco products like chewing, dipping, and snuffing tobacco, which are leading risk factors for oral cancers (Figure 5).⁶⁶ The toxic ingredients of cigarette smoke and smokeless tobacco products damage mouth tissues, triggering healthy cells to become cancerous.⁶⁷

Cigarette smokers fare worse than non-smokers on multiple oral health outcomes. Smokers have over twice the rate of edentulism (15%) as those who have never smoked (7%), and are less likely than non-smokers to have sought dental care in the past year.⁶⁸ Despite no differences in tooth brushing frequency, current smokers are significantly more likely than non-smokers to say they have sensitivity in their teeth, toothaches, oral pain, bad breath, or a social limitation because of their teeth.⁶⁹ Forty-four percent of smokers perceive their oral health as excellent or very good, compared to 60% of non-smokers.⁷⁰ Gingivitis and dental caries are significantly more common in smokers, and approximately half of the periodontitis risk observed in American adults is attributable to smoking.⁷¹

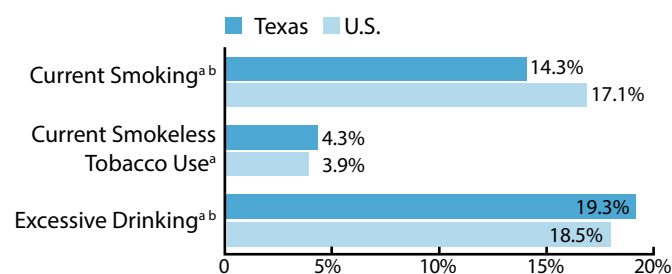
In Texas, 19.3% of adults consume excessive amounts of alcohol, which includes either episodic binge drinking or chronic heavy drinking (Figure 5). Excessive alcohol use is associated with a high risk of developing dental caries, periodontal disease, and edentulism.⁷² The acid and carbohydrate content of alcoholic beverages erodes tooth enamel similar to the effect of sugar-sweetened beverages.⁷³ Episodes of vomiting after binge drinking bring stomach

acids into contact with the mouth and teeth, which can also accelerate decay.⁷⁴ Chronic alcohol users are also less likely to brush and floss frequently or with proper technique, possibly as a direct result of being impaired.⁷⁵ In one study, people with alcohol use disorders showed significantly more damage to their teeth compared to people of the same age and sex who consumed little to no alcohol.⁷⁶

Several studies have found people who consume large amounts of alcohol also have a small but significantly higher risk of developing oral cancers. The connection between alcohol consumption and oral cancer risk is not well understood. It is possible the correlation can be explained by tobacco use, since alcohol and tobacco products are often used at the same time.^{77 78}

Figure 5

Oral Health Risk Behaviors in Adults



Sources:

^a Behavioral Risk Factor Surveillance System, 2016

^b Texas Behavioral Risk Factor Surveillance System, 2016

Oral health problems are some of the most common conditions to co-occur with substance use disorders, including addictions to Texas' most common illicit drugs, including methamphetamine, opioids, and cocaine.⁷⁹ Not only do people with substance use disorders have higher rates of tooth decay, gum disease, tooth loss, facial traumas, and oral cancers, they experience worse access to care and less commonly receive the restorative oral care they need.^{80 81 82}

Many people are prescribed legal opioids for pain after dental procedures. For some patients, an initial exposure to opioids prescribed for

dental pain becomes an addiction.⁸³ Texas has one of the lowest rates of opioids prescribed per capita of any state, a finding correlated strongly with low drug overdose mortality rates relative to other states in 2015.^{84 85} However, multiple studies find dentists are either the third or fourth most frequent prescribers of opioids among all types of physicians, and are the leading source of opioid prescriptions for children ages 10-19.^{86 87 88}

19.4 million Texas residents receive fluoridated water from their public water system, equal to 68.8% of the state's population.

Absence of Water Fluoridation

Fluoridated drinking water is considered one of the ten greatest public health achievements of the 20th century – on par with vaccinations and public sanitation – and has done more to avert tooth decay and disease than any other public health intervention. People living in areas with fluoridated drinking water experience 25% fewer cavities than those who do not.⁸⁹

Fluoridated drinking water deposits small amounts of fluoride onto the teeth when consumed, counteracting the effects of acid in the mouth by re-mineralizing tooth surfaces. The CDC recommends all public drinking water supplies contain low levels of fluoride to provide a barrier against tooth decay. As of 2017, 19.4 million Texas residents receive fluoridated water from their public water system, equal to 68.8% of the state's population. Fewer than half (44%) of the state's public water systems contain natural or added fluoride.⁹⁰

While fluoride is an ingredient in most toothpastes and can be supplemented clinically with fluoride varnishes, fluoridated drinking water remains the best method to maximize the number of people receiving a regular, sufficient dose of fluoride to prevent disease. Fluoridation does not require individuals to change their behavior and benefits all recipients similarly

regardless of income, education, race and ethnicity, or age. For people with limited or no access to dental care, fluoridated drinking water is an essential measure for averting tooth decay. In communities that have removed fluoride from their water, differences in rates of tooth decay between socioeconomically advantaged and disadvantaged populations widened after fluoride was removed.⁹¹

Water fluoridation is highly cost-efficient. The estimated annual installation cost of fluoridation ranges from \$0.71 to \$1.90 per person, with under \$0.35 per person in maintenance costs, but costs can go much lower in some communities.⁹² In Lufkin, Texas, for example, water fluoridation cost just \$0.095 per person per year, totaling less than \$8.00 per resident for a lifetime of community water fluoridation.⁹³ And in Austin, the cost of fluoridation is \$0.17 per person per year, totaling a lifetime cost of less than \$14.00 per resident.⁹⁴ The Texas Department of State Health Services supplies detailed cost analyses of water fluoridation to communities across Texas to inform local leaders of the exact costs associated with fluoridating their municipal water supply.

In return for every \$1 invested in water fluoridation, communities save about \$38 in averted dental treatment costs.⁹⁵ A Texas Department of State Health Services analysis predicted savings from water fluoridation of \$19 per child per year in dental expenditures from Texas' Medicaid program, a total savings of \$70 million annually.⁹⁶ To help communities maximize the full value of their investment in water fluoridation, the Texas Fluoridation Program financed through the Public Health and Health Services block grant provides technical assistance, training, engineering, inspections, monitoring, and promotion of fluoridated water across the state.

The number of Texans served by fluoridated drinking water has declined 13% since 2014, a major concern resulting in part from public skepticism toward water fluoridation.^{97 98} Organized campaigns disputing the safety of fluoride can be quite vocal and influential, but criticism is almost wholly grounded in unscientific claims. No credible research supports an

association between fluoride and other health problems, including cancer, heart disease, allergic reactions, or diminished intellectual functioning.⁹⁹ Other critics simply doubt the need to invest in fluoride, incorrectly perceiving water fluoridation to be unnecessary if people brush and floss regularly. The CDC affirms water fluoridation is unequivocally safe, and does not accumulate in the body at toxic levels if concentrations are kept within an optimal range.¹⁰⁰ Fluoride's protective effects cannot be effectively replicated by brushing and flossing alone.¹⁰¹

Food Insecurity

Food insecurity occurs when people have limited or unreliable availability of nutritious food to eat, either due to lack of ability to afford food or limited access to retail outlets selling nutritious food.¹⁰² Nearly one in ten Texans experiences food insecurity, and household food insecurity prevalence exceeds 60% in some lower-income neighborhoods and rural areas of the state.¹⁰³

¹⁰⁴ Food insecurity is associated with poor oral health in children and adults.¹⁰⁵ Children from food-insecure households have significantly higher rates of untreated dental caries and dental pain resulting from caries, and receive more restorative dental services, such as tooth extractions.^{106 107} Most significantly, food insecure families lacking money to pay for basic needs like food are unlikely to have enough money to afford dental or health care.

insecure households may live in food deserts, or neighborhoods where retail outlets are limited to convenience stores or fast-food restaurants with minimal selections of fresh vegetables and fruits, non-processed proteins, and dairy products. Third, people living in food insecure households may alter their eating habits in response to uncertainty of the source of their next meal; for example, eating smaller amounts more often to stave off hunger or consuming food in excess when it is available in anticipation of going hungry later. Frequent, constant, or excess exposure to sugary or starchy foods can increase risk for tooth decay.



Nearly one in ten Texans experiences food insecurity, and household food insecurity prevalence exceeds 60% in some lower-income neighborhoods and rural areas of the state.

The link between oral health and food insecurity has several possible explanations.¹⁰⁸ Food insecurity may force caregivers and children to buy foods that maximize quantity over quality, incentivizing inexpensive and widely available items high in sugar or starch. Second, food

Are Texans Accessing the Oral Health Care They Need?

Barriers to Accessing Care

Having access to oral health services when needed is a hallmark of an efficient, effective, and equitable health system. However, many barriers stand between Texans and the care they need. Some barriers are financial, while others are tied to location, attitudes, information, culture, and institutional practices. People with low incomes, disabilities, limited English proficiency, and complex health care needs are particularly susceptible to access barriers within the health care system.

Lack of Resources. Cost is a primary reason people delay or forego health care they need, regardless of whether they have health insurance coverage.¹¹⁰ In 2016, 18% of Texans did not see a doctor when they needed to because of cost, a rate nearly 50% higher than the national average.¹¹¹ Not having insurance often puts the cost of health care out of reach. Expenses other than the direct cost of services also factor into the decision to seek care, including lost wages, transit, or childcare.

Many Texans do not have the flexibility to take time away from work or caregiving to attend appointments, and securing transportation to and from medical offices can be a challenge. In rural areas, these barriers are further amplified by the lack of oral health care facilities and transportation infrastructure. In a 2017 analysis, Texas ranked 44th for rural access to dental care and 46th for rural access to primary care out of 47 states with rural counties.¹¹²

Low Health Literacy. The degree to which individuals have the capacity to obtain, process, and understand basic health information and services needed to make appropriate health decisions is defined as health literacy.¹¹³ Skills in reading, writing, numeracy, listening and speaking are components of health literacy, with lower health literacy associated with the reduced ability to manage medication correctly and interpret health information and labels.¹¹⁴ ¹¹⁵ Overcoming obstacles of insufficient health literacy requires broad health promotion and education efforts to ensure people (1) have accurate information on health, and (2) know how to act on that information.¹¹⁶ Poor oral health literacy can make the process of accessing care

less efficient, and potentially worsen disease. For example, many older adults who no longer have teeth mistakenly believe they do not need to visit a dentist, while in fact dental visits for edentulous adults are essential to monitor the health of the tongue, gums, and other tissues. Lack of public awareness of the relationship between oral and overall health is another effect of low oral health literacy, and leads people to skip dental visits or prioritize other health care needs over the health of their mouth.¹¹⁷

What is Access to Care?

Seamless access to care can be achieved when health care is:

- 1 Approachable.** People can identify they have a health care need and know what to do next.
- 2 Acceptable.** People are confident seeking health care is good for them to do, and believe they will be treated with dignity and respect.
- 3 Available.** People can physically reach services in a timely manner.
- 4 Affordable.** People have a means to pay for care they need.
- 5 Appropriate.** People receive a quality service suitable for their medical circumstances.

Source: Levesque, J., Harris, M. F., and Russell, G. (2013). Patient-centred access to health care: Conceptualising access at the interface of systems and populations. *International Journal for Equity in Health*, 12(18), 1-9.

Perceptions, Beliefs, and Experiences.

Attitudes, past experiences, and cultural beliefs can all affect willingness to seek care.¹¹⁸ Many people are afraid of dental procedures, while others are worried oral health providers will make them feel ashamed for the condition of their teeth and mouth. Comfort with mainstream American medical care can vary based on one's cultural background, and research documents experiences of people who have been treated poorly in health care and oral health settings due to their race or ethnicity, immigration status, ability to pay, and other characteristics.¹¹⁹

¹²⁰ ¹²¹ People may also avoid seeking care if their past care experiences were ineffective or caused unintended harm.¹²² Delivering care in an inclusive, patient-centered, culturally and linguistically competent manner forms the foundation of a healing relationship between clinician and patient, and ultimately results in better patient outcomes.¹²³

How Texans are Paying for Oral Health Care

Having health and dental insurance increases access to oral health care. On the private market, dental insurance is sold separately from health insurance and many public health insurance programs offer few or no dental benefits. Though separate health and dental care systems are an established feature of health care delivery, it unfortunately reinforces a perception that the mouth is detached from or less important than other body systems.

Out of Pocket Spending. Data on the nation's health care expenditures show consumers are bearing a much greater share of dental costs out of pocket than other health care costs. In 2016, 40% of the nation's dental costs were paid out of pocket, 46% by private insurance, and 12% by federal programs (Medicare, Medicaid, and CHIP). In contrast, just 11% of overall health care expenditures were paid out of pocket, 34% by private insurance and 38% by federal programs.¹²⁴ Corresponding dental expenditures data for Texas are not publicly available.

Paying for the full cost of health and dental care out of pocket can become prohibitively expensive after just a few procedures, and even those enrolled in health and dental insurance

must still be able to afford their plan's out-of-pocket cost sharing requirements. Between 37-47% of U.S. households do not have enough liquid assets at any given time to be able to pay a \$2,000 health insurance deductible.¹²⁵

Approximately 62% of Texas' 4.5 million remaining uninsured are Hispanic, and 56% live in households with incomes less than \$50,000 per year.

Health Insurance. Health insurance that excludes dental care is still crucial for good oral health, as it permits access to care with direct positive impacts on oral health, such as primary care, support for tobacco cessation, pain and infection care, and cancer treatment. As of 2016, 16.6% of Texans had no health insurance of any kind, the highest rate of any state in the nation.¹²⁶ Of those with health insurance, about three-quarters have private insurance (usually provided through an employer or purchased on the individual market).¹²⁷ The remaining one-quarter are covered under public health insurance programs including Medicare, Medicaid, CHIP, and U.S. Department of Veterans Affairs (VA) health benefits.¹²⁸

The Affordable Care Act (ACA), passed in 2010, has coincided with historic reductions in uninsured rates in Texas and the nation. In 2017, between 8 and 9 million Americans – including 1.1 million Texans – obtained private coverage through public health insurance marketplaces.¹²⁹ An additional 11 million people nationwide are now covered by Medicaid due in part to 33 states expanding their eligibility limit to 138% of the federal poverty level for low-income adults (about \$16,750 per year for an individual and \$34,630 for a family of four in 2018).¹³⁰ Texas is among 19 states that have not expanded Medicaid eligibility and has some of the most restrictive Medicaid eligibility criteria in the nation.¹³¹

Disparities in health insurance coverage by race, ethnicity, and income have narrowed since 2013, but still persist.¹³² ¹³³ In Texas, over 90% of

Whites and Asians and 84% of Blacks have health insurance, compared to just 59% of Hispanics. Approximately 62% of Texas' 4.5 million remaining uninsured are Hispanic, and 56% live in households with incomes less than \$50,000 per year.¹³⁴ Texans living on lower incomes also tend to cycle frequently or "churn" between different types of public and private coverage as they experience fluctuations in income or employment, or housing instability, leading to potential disruptions in care.¹³⁵

Dental Insurance. Dental insurance coverage rates have grown steadily over time, but still trail rates of health insurance coverage nationally. Between 2010 and 2016 when the ACA's major health insurance expansions took effect, the proportion of Americans with dental coverage rose from 57% to 77%.¹³⁶ Estimates of the number of Texans with dental coverage are not publicly available.

Gains in the national dental insured rate may be attributable to the sale of stand-alone dental plans on the ACA marketplaces, inclusion of pediatric dental care among the ten essential health benefits all insurers must cover, and expansion of dependent coverage allowing children to remain on a parent's dental plan until age 26. About 16% of people without insurance made a dental visit within the past year, compared to 53-64% of Texans with dental insurance, indicating (1) having dental coverage is strongly predictive of receiving routine dental treatment, and (2) barely half of Texans with dental insurance are using it, highlighting a broad opportunity to move the remainder from coverage into care.^{137 138}

Despite recent progress, the estimated dental uninsured rate is still about three times higher than the health uninsured rate nationwide.^{139 140} The gap between the nation's health and dental uninsured rates can in part be explained by the absence of dental benefits in several public health insurance programs. Medicare does not provide dental benefits, Medicaid covers only emergency dental care for adults (except pregnant women) in many states including Texas, and few veterans receiving health benefits from the VA are eligible for dental care.^{141 142 143 144}

Medicaid & CHIP in Texas. Medicaid dental benefits are administered to children, teens, and young adults under age 21 through the Texas Health Steps (THSteps) program, ensuring enrollees Early and Periodic Screening, Diagnostic, and Treatment (EPSDT) services required under federal law.¹⁴⁵ Several of Texas' Medicaid managed care plans also cover dental services for pregnant women.¹⁴⁶ Covered services include initial and routine dental examinations, cleanings, oral health education, topical fluoride, and sealants for most enrollees, as well as restorative interventions and oral surgery for children who need it.¹⁴⁷ Texas' CHIP program has included dental benefits since 2006, and covers lower-income children from households with incomes above the threshold to qualify for Medicaid. Together, CHIP and THSteps cover about 3.6 million children – about 46% of all children in Texas – and 2016 data reveal 69.2% of children enrolled make an annual dental visit, the highest rate of any state.^{148 149}

Medicaid's low reimbursement rates relative to private coverage discourage many providers from accepting patients enrolled in Medicaid, a potential threat to timely availability of care for beneficiaries. In a 2009 survey of pediatricians, three-fourths thought the lack of dentists who accept Medicaid presented a "moderate to severe" barrier for young children enrolled.¹⁵⁰ Based on current provider acceptance rates and utilization data, it is not clear this perception entirely reflects reality for dental care in Texas. In 2014, 48% of Texas dentists participated in Medicaid, exceeding the national average of 42%.¹⁵¹ Texas is also one of two states with a "reverse gap" in use of dental services, wherein children enrolled in Medicaid and CHIP make dental visits at higher rates than children enrolled in private insurance.¹⁵²

As of 2016, Texas' Medicaid program reimburses for child dental services at about 72.1% the rate of private insurance, compared to the national average of 61.8%.¹⁵³ Optimizing reimbursement rates for dentists has been a balancing act for Texas lawmakers. Texas enacted major Medicaid reforms increasing fee-for-service reimbursement rates for pediatric dental procedures by 33.8% between 2003 and 2013, placing Texas among states with the highest such rates in the nation.¹⁵⁴

These reforms led to increases in preventive dental care utilization and reductions in unmet dental need among Medicaid eligible children, a promising finding given downstream cost savings of several million dollars per year to the state when children receive preventive dental care.¹⁵⁵ However, immediate budgetary pressures and concerns about costly waste, fraud, and abuse by some Medicaid dental providers may move lawmakers to consider reducing reimbursement rates to more closely align with other states' and national averages.

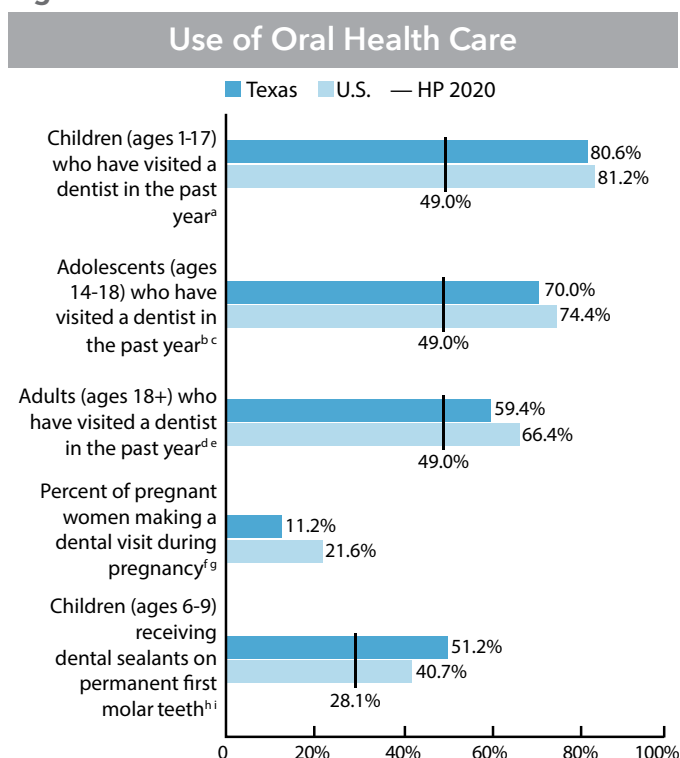
Oral Health Care Utilization

Preventive and Routine Care. People who visit the dentist throughout life report better overall oral health status, lower rates of tooth decay and tooth loss, and fewer cavities in adulthood.¹⁵⁷ Texas' children are accessing and using dental care on par with national averages and well in excess of Healthy People 2020 targets. Among all Texas children ages 1-17, 80.6% have made a dental visit in the past year, as well as 70.0% of adolescents ages 14-18. Adults in the state have a lower rate of past year dental visits than children and teens, with 59.4% making a past year dental visit. While this rate exceeds the Healthy People 2020 target of 49.0%, it falls short of the national average of 66.4% (Figure 6).

Women are at high risk for developing periodontal disease while pregnant due to hormonal changes, making dental visits during pregnancy an essential component of prenatal care. However, on this measure Texas lags; just 11.2% of pregnant women made a dental visit, about half the national average rate (Figure 6).

Since the 1980s, the number of people making an annual dental visit has steadily increased for nearly all populations. However, rates of receiving regular dental care vary by race and ethnicity, geography, education, and household income.¹⁵⁸ Past-year dental visit rates have historically been higher among Texans than the national rate for all race and ethnic groups, though visit rates for Whites are approximately 20% higher than Blacks and 25% higher than Hispanics. College-educated Texans historically visit the dentist at about 25% higher rates than high school graduates and about 50% higher rates than those with less than a high school education.¹⁶¹

Figure 6



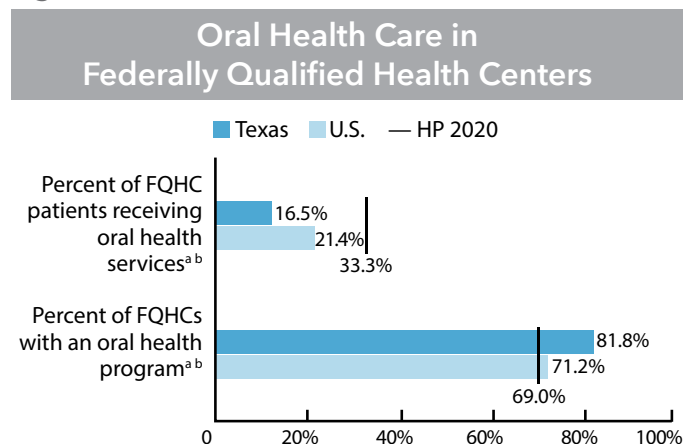
Sources:

- ^a National Survey of Children's Health, 2016
- ^b Youth Risk Behavior Surveillance System, 2015
- ^c Texas Youth Risk Behavior Surveillance System, 2017
- ^d Texas Behavioral Risk Factor Surveillance System, 2016
- ^e Behavioral Risk Factor Surveillance System, 2016
- ^f Texas Pregnancy Risk Assessment Monitoring System, 2015
- ^g Pregnancy Risk Assessment Monitoring System, 2011
- ^h National Health and Nutrition Examination Survey, 2013-2014
- ⁱ Texas Basic Screening Survey, 2012-2013

Texas' oral health safety net is comprised of 73 federally qualified health centers (FQHCs), three FQHC look-alikes, 60 non-FQHC community health centers, three schools of dentistry, 64 state and local health departments, 70 public and non-profit hospitals, and 90 school-based health centers.¹⁶² Despite an apparent breadth of options, the oral health safety net is diffuse, under-resourced, and strains to meet demand. Even when care is deeply discounted, some patients still remain burdened by out-of-pocket costs and other accessibility issues impeding their ability to connect with care they need.

About four in five FQHCs in Texas have an oral health program, a higher rate than the national average, though oral health services are delivered to just 16.5% of FQHC patients in those settings, a lower than average rate compared to the nation (Figure 7).

Figure 7



Sources:

^a Uniform Data System, 2015

^b Uniform Data System, 2016 (Texas)

A core function of Texas' dental care system – especially in the safety net – is administering long-acting preventive care like sealants. Sealants are plastic coatings applied to molars, creating a barrier on the tooth's pits and fissures to prevent caries from forming. Sealants are extremely effective at preventing tooth decay, reducing pain and suffering, decreasing expensive hospital dental treatments, and saving taxpayer dollars by averting the cost of restorative care.^{163 164} A 2012 analysis estimated the state of Texas would save \$29 million by providing sealants to every child in the state.¹⁶⁵ Currently, 51.0% of Texas children age 6-9 have sealants on their permanent first molars, better than the national rate of 40.7% (Figure 6).

The American Academy of Pediatric Dentistry has published new guidelines recommending silver diamine fluoride for arresting and managing existing caries in children.¹⁶⁶ Silver diamine fluoride treatment has shown encouraging results in trials of populations who often receive care in safety net settings, including children, older adults, people with intellectual and

developmental disabilities, and others who may have functional limitations preventing them from tolerating dental intervention or maintaining oral hygiene without assistance.^{167 168} As of September 2017, silver diamine fluoride was not a covered benefit under Texas Medicaid.¹⁶⁹ The use of silver diamine fluoride is relatively new, but may proliferate in safety-net settings and state Medicaid programs as new evidence emerges.

Emergency Care. Oral health problems contribute heavily to avoidable use of expensive emergency care. Approximately one person every 15 seconds visits a hospital emergency department for a dental condition, a rate cumulating in 2.18 million total dental emergency visits nationwide in 2012.¹⁷⁰ Some oral health-related emergency department use results when people who cannot or do not use oral health care regularly have minor, treatable issues that worsen into serious, acute, or even life-threatening conditions.^{171 172} Not all oral health-related emergency care is for severe issues; many people choose emergency departments as their usual source of care because it is more convenient, or because it is the only care setting where they cannot be turned away.¹⁷³

Approximately one person every 15 seconds visits a hospital emergency department for a dental condition.

In Texas, 7.2% of teens age 14-18 say they have visited the emergency room for dental problems.¹⁷⁴ Comparable data are not available for adults or young children. For people of all ages, most dental visits to emergency departments are for preventable, non-traumatic problems requiring pain management or infection treatment. An estimated 80% of these visits could be handled effectively in a community setting.¹⁷⁵ Odds of dental emergency visits being non-traumatic have increased 16% from 2009-2015, with uninsured patients as much as two times more likely to make a non-traumatic dental visit to the emergency room.¹⁷⁶

Can Texas' Oral Health Workforce Meet Demand?

Oral Health Workforce Capacity

Current Size & Distribution. Workforce size and geographic distribution influence whether the state's oral health system has sufficient capacity to meet existing demand. The oral health workforce in Texas currently consists of over 300,000 licensed health care professionals, providing services ranging from routine prevention to intervention for oral health emergencies. Dentists, oral surgeons, and orthodontists perform preventive, diagnostic, and treatment services specifically on the mouth and face, with dental hygienists and dental assistants in support.¹⁷⁷ Often, front-line providers such as primary care physicians, nurse practitioners, physician assistants, and emergency physicians serve as essential members of the oral health workforce, detecting and treating oral health problems in patients who do not receive regular dental care.

No state has added more dentists since 2013 than Texas, over 100 more than California, the state with the second-largest number of new dentists.¹⁷⁸ However, the dental workforce is disproportionately concentrated in urban areas: while 15% of Texas' population resides in rural areas, just 7% of dentists practice outside of the state's urban centers.¹⁷⁹ ¹⁸⁰ Many of Texas' rural counties lack a population center large enough to support a dental health care facility, leaving these areas short of providers. More than 4 million Texans live in dental health professional shortage areas (DHPSAs); that is, areas where there is less than one practicing dentist for every 5,000 residents (or 4,000 residents in higher need areas).¹⁸¹

Lower-income working adults and families who reside in rural areas comprise most of the dentally underserved population.¹⁸² Dental problems are more common among people living at or near the poverty level, who have lower rates of dental insurance coverage and rely more on public programs to pay for care.¹⁸³ These trends suggest Texans bearing the highest burden of oral disease are living in areas least equipped to serve them.

Workforce Trends. The disproportionate concentration of health care providers in cities is largely attributable to recent demographic

and economic transitions. More than one-third of dentists in the state are now over age 55, and 41% of the dentist workforce will be at or past retirement age within a decade.¹⁸⁴ As dentists retire and leave the workforce, it will be important to monitor whether the number and distribution of new dentists in the state is adequate to sustain capacity vacated by those who leave. Currently, Texas' urban areas have a net migration rate 25 times larger and growth rate three times larger than the state's rural areas, potentially impacting which areas of the state deliver the most promising opportunities for dental practice.¹⁸⁵

Federal and state programs have been established to incentivize early-career dental professionals to practice in underserved areas of Texas while relieving student debt pressure. The National Health Service Corps (NHSC) offers a \$50,000 initial award in exchange for two years of practice in a federally designated health professional shortage area (HPSA) for physicians, or DHPSA for dentists, while the Texas Higher Education Coordinating Board offered \$10,000 in loan repayment for a 12-month commitment to practice pediatric or general dentistry in a DHPSA, and up to \$160,000 in loan repayment over four years for physicians practicing in a HPSA.¹⁸⁶ Participating dentists and physicians were required to accept Medicaid and could not turn away patients based on ability to pay. Due to budgetary constraints, state funding for the Texas Dental Loan Repayment Program was not appropriated in the 85th legislative session.¹⁸⁷ ¹⁸⁸

While loan repayment assistance programs do ease debt, it is unclear how strongly they influence new dentists' decision to practice in underserved areas. Studies show dentists say loan repayment is minimally important compared to other factors in their choice of practice location, suggesting practitioners in underserved areas might have chosen those areas with or without the program.¹⁸⁹ Furthermore, critics of loan repayment programs have pointed out the potential for misuse and abuse by dentists seeking opportunities to advance their portfolio for specialty practice rather than providing underserved patients with the full spectrum of care.



In Central Texas, a private foundation has partnered with the state to fund loan repayments, an example of a local initiative to address oral health workforce gaps. Through December 31, 2017, The St. David's Foundation awarded nearly \$1.5 million in loan repayments through the Texas Higher Education Coordinating Board for physicians, physician assistants, dentists, and nurse practitioners who practice in safety net settings in the foundation's five-county greater Austin service area.^{190 191} Foundation funding for the program has been renewed for 2018, but no state funds have been appropriated for the current biennium. While the St. David's Foundation program has shown promise with the foundation's limited resources, philanthropic engagement at the regional level does not release the state from its responsibility and stake in growing the workforce in all under-resourced communities. Private-public collaborations modeled after the St. David's Foundation program may be better sustained and replicated with state investment.

Workforce Diversity

Cultivating cultural and linguistic diversity in the health workforce has emerged as a strategy to reduce health disparities observed among people of color and limited English proficient populations. Racial and ethnic diversity in the health professions is associated with higher patient satisfaction among patients of color, improved patient-provider communication, and indirectly, promotes responsiveness to social circumstances and cultural beliefs that influence patients' health.^{192 193 194} Despite shifting racial

and ethnic demographics, the oral health workforce – especially doctors and dentists – remains overwhelmingly White. The number of Black dentists in the U.S. would have to increase four times, Hispanic dentists five times, and American Indian/Alaska Native dentists nearly eight times to reach parity with their respective shares of the U.S. population.^{195 196} Currently, there are not enough Hispanics in the nation's pipeline of new dentists to bring their proportion level with the Hispanic population, especially in regions of the country experiencing rapid Hispanic population growth.¹⁹⁷ Because Texas is among the states with the largest and fastest growing Hispanic populations, preventing excessive discordance between the state's share of Hispanic dentists and population overall could be a challenge in years to come.¹⁹⁸

Research shows clinicians of color disproportionately bear the responsibility of care for underserved populations. Black, Hispanic, and American Indian/Alaska Native dentists and physicians are more likely than White dentists and physicians to practice in underserved communities, treat more patients of color, and more patients with lower incomes or who are covered by public insurance.^{199 200} They also bear significantly higher than average levels of student debt.²⁰¹ Some loan repayment programs, like NHSC, intentionally recruit physicians and dentists from diverse socioeconomic, racial, and ethnic backgrounds in an effort to increase workforce diversity and representativeness in underserved communities. The proportion of African Americans and Hispanics in its clinician cohort is four to five times higher than the national rate.²⁰² ²⁰³ NHSC has also steadily augmented the health workforce in underserved areas, with nearly 90% remaining in underserved communities at least one year beyond their commitment period and 55% remaining after ten years.²⁰⁴ While loan repayment incentives and other social and cultural factors may increase the likelihood clinicians will elect to anchor their practice in underserved communities long-term, oral health professionals of color ought not bear an outsized responsibility for lower-compensated safety-net care.²⁰⁵ Rather, different incentives are needed to fairly and equitably align oral health needs with Texas' highly skilled and growing workforce.

Resolving Workforce Shortages

Telehealth. Telemedicine and teledentistry have the potential to bridge gaps in rural oral health care access by allowing dental consultation to occur remotely via videoconference between providers and patients. In Texas, Medicaid has reimbursed telemedicine services for the past two decades, and use of telemedicine among Medicaid providers and patients continues to increase.²⁰⁶ Teledentistry services are not included in Texas law authorizing telemedicine, and no laws have been passed encouraging or requiring teledentistry benefits in Medicaid and/or commercial plans (as states like Arkansas, Tennessee, California, and Washington have done).²⁰⁷ Evaluations of teledentistry programs consistently show encouraging results; patients tend to rate their experience positively, outcomes improve, and most efforts have resulted in at least some cost savings to health systems.²⁰⁸ Telehealth services can be part of a broad strategy to address shortages of oral health care in the most depopulated and under-resourced areas of the state, especially as a screening and diagnostic tool.²⁰⁹ However, access barriers to conventional oral health interventions may remain.²¹⁰

Assuming steady dental care utilization patterns, Texas will experience a shortage of nearly 500 fewer dentists than needed to meet statewide demand by 2025, but will have a surplus of over 3,300 dental hygienists by the same year.

Scope of Practice. Assuming steady dental care utilization patterns, Texas will experience a shortage of nearly 500 fewer dentists than needed to meet statewide demand by 2025, but will have a surplus of over 3,300 dental hygienists by the same year.^{211 212} Though the overall supply of dentists in Texas is projected to continue rising, consideration should be given to the value

of conducting a comprehensive assessment of the state's dental workforce capacity to meet needs especially in different geographic settings.²¹³ In the recent past there has been a growing demand both at the community level and the Texas legislature to consider the state's mid-level providers workforce a potential source of capacity to address localized provider shortages.²¹⁴ Laws expanding scope of practice for existing mid-level providers or establishing new mid-level provider categories with expanded functions have been passed in Minnesota and Maine, and discussed in approximately a dozen other states.²¹⁵

Opponents of expanding scope of practice have raised safety concerns about delegating dental procedures to providers with less extensive training, while proponents cite estimates that dental hygienists can safely perform approximately 50-80% of routine dental services delivered in community clinics and safety-net dental clinics.^{216 217} Advocates have also raised concerns that positioning mid-level providers to fill workforce shortages in higher-need communities could result in an inequitable standard of care, with poor consumers more likely to be treated by those with less education or experience.²¹⁸

Overall, there is a need for more research to examine whether scope of practice expansions produce comparable outcomes to conventional dental care. The current literature contains results from promising pilot initiatives, but there are currently limited studies directly comparing these delivery models to conventional oral health care provided by a dentist, and no rigorous longitudinal studies showing long-term effectiveness at this time.

Moving forward, it will be important for all stakeholders to collaborate on identifying and addressing systemic gaps, and to strengthen the dental infrastructure to ensure efficient, quality-focused dental care for every Texan.

Key Findings & Discussion

This report's key findings reflect high-level themes observed consistently within regions and throughout the state. While these key findings begin to tell a high-level story on oral health in Texas, they are not intended to be exhaustive or conclusive. Rather, they serve as examples of the type of inquiry the data support, and provide a starting point for conversations around tailored, evidence-informed solutions.

1 While Texas is lagging in several oral health priorities, it has also shown capacity to lead.

Data and literature presented in this report confirm Texas has many opportunities to improve oral health across the state. Children in Texas experience tooth decay and dental problems at elevated rates: two-thirds (66.8%) of third graders in the state have had dental caries, compared to just over half (51.7%) of third graders nationally.^{219 220} Among third graders who have had caries, one quarter of those in Texas (26.2%) have not received treatment, compared to 16.2% nationally.^{221 222} Rates of adult oral health problems in Texas more closely resemble national averages, but still reflect a great burden of chronic or severe oral health deterioration with age. More than half (54.1%) of Texas adults age 45-64 have had tooth loss due to dental caries or periodontal disease, and 13.1% of Texas adults age 65 and older are edentulous, with none of their natural teeth remaining.²²³ Only 11.2% of Texas women – half the national average – make recommended dental visits during pregnancy, a time of increased susceptibility to oral disease.²²⁴

Gaps in health insurance coverage and the high relative share of dental costs borne out of pocket provide ample reason for concern about Texans' ability to obtain and afford oral health care they need. Nearly 17% of Texans have no health insurance, the highest rate of any state in the nation.²²⁵ While the exact dental uninsured rate in Texas is not publicly tracked, the U.S. dental uninsured rate is estimated to be about three times higher than the overall uninsured rate.²²⁶ In addition, 40% of the nation's dental costs are borne out of pocket by consumers, compared to 11% of overall health care costs paid out of pocket.²²⁷ Yet, over one-third of Texas' population lived in a low-income household²²⁸ in 2016, and food insecurity affected 9.6% of Texans.²²⁹ Families who have difficulty affording basic needs are unlikely to have disposable resources to

spend on oral health care, especially services not covered by insurance.

Despite the state's oral health challenges, this report also provides evidence that Texas has achieved examples of success worth sustaining. For example, most of Texas' children and adolescents are obtaining oral health care regularly and children in Texas' Medicaid and CHIP programs are receiving dental care at some of the highest rates in the country. Eighty-one percent of children ages 1-17 have made a dental visit in the past year, as well as 70.0% of adolescents age 14-18.^{230 231} Approximately 69.2% of children enrolled in Texas' Medicaid and CHIP programs visit the dentist annually, well in excess of the U.S. average of 50.4% for this population.¹⁴⁹ Several urban and suburban regions serve as proof points of what can be achieved when threats to good oral health are minimized. Regions containing Austin, Round Rock/Hill Country, Dallas, Plano/Sherman, Houston, San Antonio, and the Brazos Valley have fewer than 10% of adults in poor dental health (defined as having had six or more teeth extracted due to dental caries or periodontal disease). Common threads between these regions include low smoking rates and oral cancer incidence, a greater supply of oral health professionals per capita, and higher rates of health insurance coverage. Notably, some of these regions achieve the state's best dental outcomes despite high proportions of low-income and food insecure residents, suggesting there may be protective factors or effective safety net initiatives in those regions to explore or potentially replicate elsewhere.

2 Texas' oral health burden is most concentrated in its rural and border regions.

Texas' oral health burden is stratified across distinct urban/rural and border/non-border divides, a pattern observed consistently across demographic, risk behaviors, chronic disease, clinical care, and oral health outcome measures. Rural regions are home to an older population with high rates of partial or complete tooth loss, prevalent chronic disease and health risk behaviors, and greater incidence of oral cancer. The border regions, while home to a younger population, have high rates of uninsured people living at or near the poverty level, with tremendous need for oral health services in under-resourced safety net care settings. Rural and border regions experience common oral health care access barriers, including profound provider shortages and low rates of adults who currently use regular dental care. In the border regions, adult health uninsured rates range from 29.5 to 41.6%.²³²

The rural region containing Abilene has an estimated 27.6% of adults in poor dental health. This rate is nearly four times higher than the top performing urban regions (each with rates of 7.2-7.9%), and still approximately double the rate in other rural regions with similar age structures.²³³ The rural regions containing Abilene and Wichita Falls also have some of the state's highest oral cancer incidence rates.

Chronic disease prevalence and rates of health risk behaviors are excessive in rural regions. The rural region containing Abilene has nearly three times the estimated rate of diabetes as the Dallas region (22.1% vs. 8.2%), and twice the rate of smoking as the San Antonio region (20.9% vs. 11.5%).²³⁴ Border regions are not consistently represented among those with the highest rates of smoking, cardiovascular disease, or excessive drinking. Because estimates are not age-adjusted, differences in underlying age structure of the state's rural/urban and border/non-border populations may at least partially explain differences. In general, rural counties in Texas tend to have older median ages, and border counties tend to have younger median ages.

All seven rural regions fall below the state average (59.4%) for the estimated percent of adults making a dental visit in the past year.²³⁵ There appears to be strong overlap between regions with the lowest rates of adults with past-year dental visits and the supply of oral health providers in the region. While the urban, non-border regions containing Houston, Dallas, Austin, Fort Worth, and San Antonio all have at least one dentist for every 3,000 residents, four rural and all three border regions have no more than one dentist for every 4,000 residents. The Plano/Sherman region, which has the highest dental supply in the state, has quadruple the rate of dentists per capita as the Laredo region (2,084 to 1 in the Plano/Sherman region versus 9,012 to 1 in the Laredo region).²³⁶ Similar trends are observed for dental hygienists, dental assistants, and primary care physicians.

A key distinction between rural and border regions appears to be use of the public health care safety net. In all seven rural regions, a relatively low proportion of the population (20% or below) is enrolled in Medicaid coverage. In contrast, the top three regions with the highest proportion of residents enrolled in Medicaid are all border regions, with between 20-29% of the population enrolled.²³⁷ Annual Medicaid costs per enrollee (both dental and non-dental) are among the state's highest in border regions, and among the lowest in rural regions.²³⁸ While it is unclear what underlying health needs may explain these differences, it does suggest a trend worthy of further analysis: border regions with younger populations have higher costs per enrollee in Medicaid, whereas in rural regions with older populations, costs per enrollee are low. This finding somewhat corroborates previous research that has uncovered pockets of abnormally high Medicare spending in parts of the Rio Grande Valley, patterns which were potentially explained by high post-acute care costs and poor care coordination.²³⁹

3 Focusing narrowly on health care neglects other opportunities to improve oral health.

Data and literature presented in this report suggest access to health care is necessary, but not sufficient, to achieve good oral health outcomes. Perhaps nowhere is this finding more clearly illustrated than by comparing Texas' strong position on child access to oral health care alongside its poor performance in oral health outcomes for Texas children.

This report finds evidence of several conditions promoting good access to care for Texas children. Approximately 90.0% of Texas children have health insurance, and for those with private plans, pediatric dental care is a required essential health benefit under the ACA.²⁴⁰ Texas' Medicaid and CHIP programs, which today cover nearly half of Texas' children, have included dental benefits since 2006. Reimbursements for child dental services in Medicaid increased 33.8% from 2003-2013, boosting the number of participating providers.²⁴¹ Higher reimbursements in Texas were found to increase the number of children receiving preventive care and decreased unmet dental need.²⁴² Today, eight out of ten Texas children age 0-17 have made a dental visit in the past year, and about 25% more Texas children receive sealants than the national average, decreasing the likelihood of dental caries.

Many of the conditions that currently promote widespread children's access to care in Texas have been in place for a decade or more. However, child oral health outcomes in Texas continue to lag: 7.5% of Texas parents say their child's oral health is fair or poor (compared to 5.5% nationally), and 14.9% say their child has had dental problems like toothaches and bleeding gums.²⁴³ And while Texas ranks 1st in the nation for the percent of Medicaid-enrolled children making dental visits, Texas ranks 39th out of 41 ranked states for the percentage of third graders who have experienced dental caries.^{244 245}

This phenomenon was also observed regionally. Despite performing at or above the state average on several measures of oral health care access, such as oral health care provider supply and past-year dental visit rates, the Beaumont/Galveston region in Southeast Texas ranks among the worst in the state for oral cancer mortality, rates of poor adult dental health, and edentulism among older adults. Put another way, oral health outcomes in the Beaumont/Galveston region are no better than regions with measurably greater access limitations.

Other factors appear to be undermining the protective effects of access to oral health care for Texans, and this report identifies several potential contributors. The percent of Texans served by fluoridated drinking water has decreased from 79.0% in 2014 to 68.8% in 2018.^{246 247} Food insecurity, which affects a greater proportion of Texas' rural population than urban, is a source of risk for untreated dental caries and dental pain among children. And, in the Beaumont/Galveston example above, the region's smoking, cardiovascular disease, and obesity rates rank among some of the highest in the state.

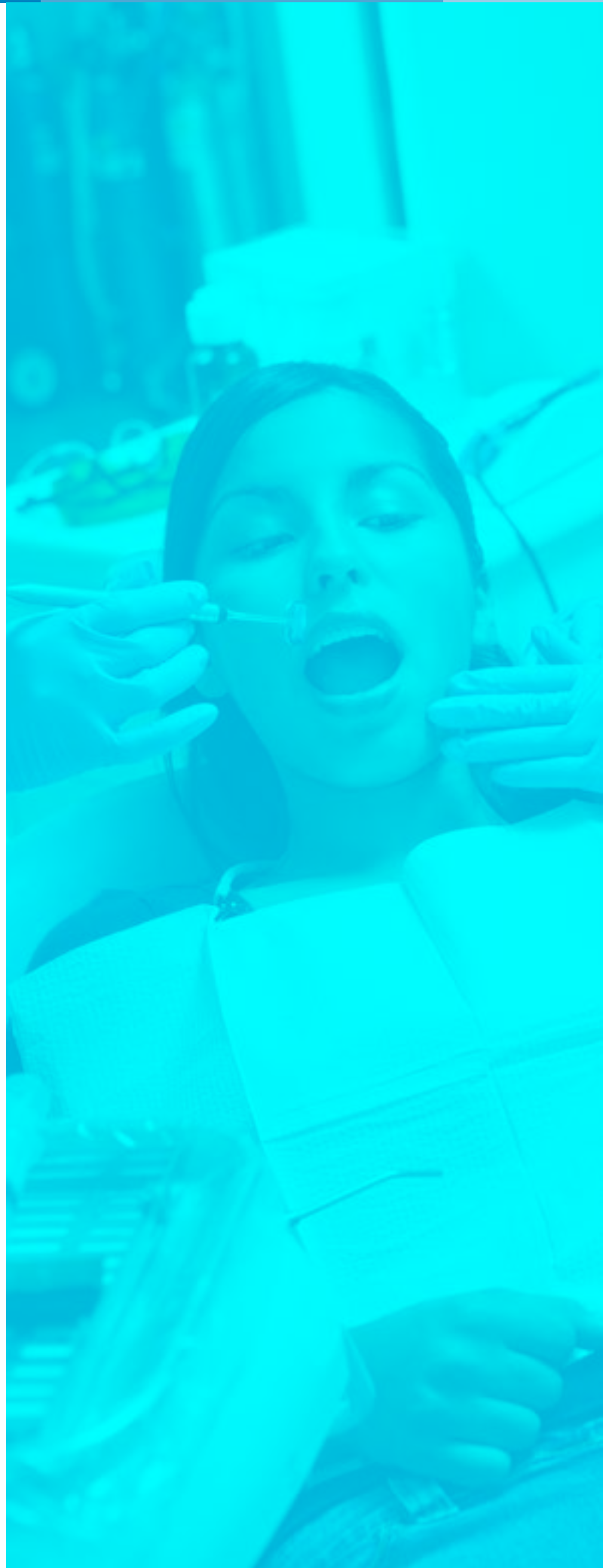


Summary

The wealth of data and supporting literature presented in this report aims to empower public health leaders to better understand oral health strengths and challenges across Texas. The report's three key findings reflect themes that emerged from state, regional, and local analyses, while also providing examples of how data can stimulate inquiry, inform decision-makers, and help establish oral health priorities.

The report confirms oral health problems are widespread among Texans of all ages and backgrounds. These problems contribute to a largely preventable burden of disease, cost taxpayers millions of dollars in avoidable health care spending, and cause untold pain and suffering. Already a pervasive and expensive issue, oral health is poised to grow into an increasingly complex and urgent challenge for the state. Texas has one of the nation's youngest populations, but life expectancies remain high, the state's chronic disease burden is on the rise, and the population is forecast to continue to grow and age.²⁴⁸ These trends suggest more Texans will begin to live more years of their life affected by oral health issues, which already burden Texas children from an early age and usually do not resolve themselves over time without access to appropriate and timely care.

Texas public health leaders should consider opportunities within and beyond the context of clinical care to improve oral health. As evidence from this report shows, focusing narrowly on one or two elements is insufficient; a thorough approach must address risk factors, co-occurring diseases, insurance coverage, care, and health-related social determinant needs.



Regional and County Profiles

Selection of Regional Boundaries

This report aims to facilitate regional and local analysis of oral health indicators. Historically, geographic vastness coupled with lack of data availability and reliability at smaller geographic levels has constrained efforts to pursue local oral health improvement efforts in Texas. To address these barriers and provide reliable baseline measures for future trend analysis, this report provides stratified data for several oral health indicators at regional and county levels.

Texas' existing Regional Health Partnership (RHP) boundaries have been used to analyze and report oral health outcomes by region. In 2012, the Texas Health and Human Services Commission (HHSC) divided the state's 254 counties into 20 RHP regions under the state's Medicaid 1115 waiver. The RHPs operating in each region are local collaborations of hospitals, government partners, academic health science centers, county medical associations, regional public health directors, and safety-net care facilities, whose purpose is to plan, implement, and fund local Medicaid waiver activities.

The selection of RHP regional boundaries was made after evaluating several existing statewide regional frameworks, including the eleven Texas Department of State Health Services Public Health Regions and 28 Texas Workforce Development Board Areas. RHPs were ultimately selected because they permitted the most granular regional analysis possible while generally maintaining sufficient sample size to produce valid estimates on measures obtained from survey data. The report itself is not directly tied to state Medicaid waiver activities or any individual RHPs. However, the selection of RHPs was also informed by a perceived alignment between the purpose of RHPs and the intent of this report: to facilitate the planning of local, tailored activities addressing health care needs.

Region Names and Classification

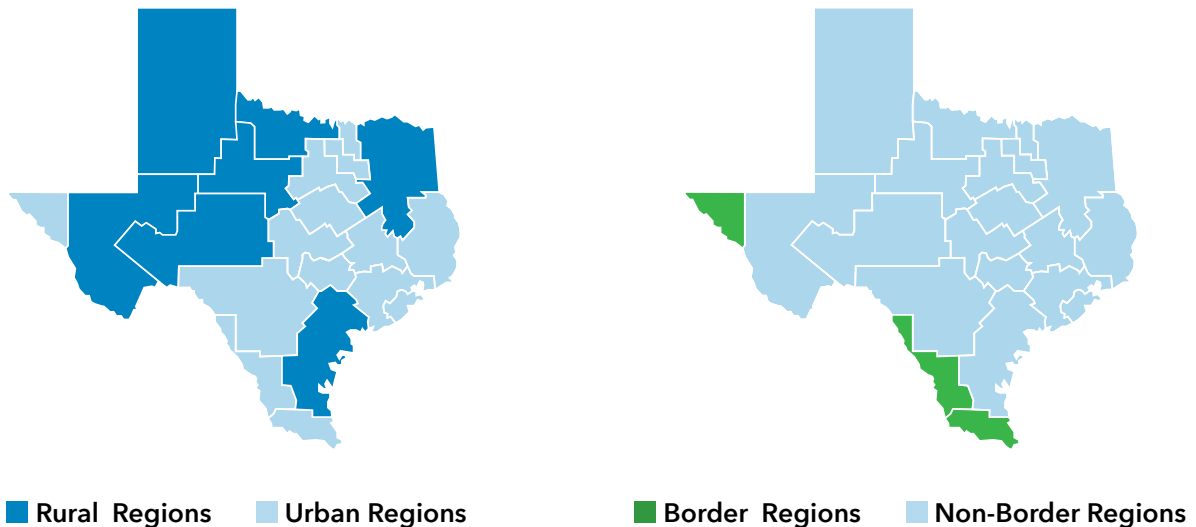
HHSC differentiates RHP regions with an assigned number (1-20). To aid in communicating regional findings, the report team developed and assigned geographic labels to each region to replace the RHP number. The 20 RHPs were clustered into six geographic areas of Texas: North Central, North, Southeast, South, West, and Central. The two to four regions comprising each cluster were named by either the most populous metropolitan area(s) in that region or a commonly accepted regional descriptor (Table 1).

Rural/Urban and Border/Non-Border Designations

This report also communicates findings based on two regional patterns of interest: rural/urban and border/non-border. In this report, a region was defined as rural if more than 25% of its residents live in rural counties.²⁴⁹ Out of twenty total regions, seven were classified as rural and thirteen were urban. Border regions were defined as those with over 50% of the population living in counties along the Texas-Mexico border.²⁵⁰ Three regions were classified as border regions, and seventeen were classified as non-border. A total of three regions containing at least one border county did not meet criteria for border region classification because border counties comprised no more than 12.5% of their total population.

Table 1. Assigned Regional Names and Classifications

Existing RHP Number	Assigned Geographic Area	Assigned Region Name	Rural/Urban	Border/ Non-Border
11	North Central	North Central - Abilene	Rural	Non-Border
19	North Central	North Central - Wichita Falls	Rural	Non-Border
9	North	North - Dallas	Urban	Non-Border
10	North	North - Fort Worth	Urban	Non-Border
18	North	North - Plano/Sherman	Urban	Non-Border
1	North	North - Texarkana/Tyler	Rural	Non-Border
2	Southeast	Southeast - Beaumont/Galveston	Urban	Non-Border
3	Southeast	Southeast - Houston	Urban	Non-Border
17	Southeast	Southeast - Brazos Valley	Urban	Non-Border
4	South	South - Corpus Christi/Gulf Coast	Rural	Non-Border
20	South	South - Laredo	Urban	Border
5	South	South - Rio Grande Valley	Urban	Border
6	South	South - San Antonio	Urban	Non-Border
15	West	West - El Paso	Urban	Border
13	West	West - San Angelo	Rural	Non-Border
14	West	West - Midland/Big Bend	Rural	Non-Border
12	West	West - Panhandle	Rural	Non-Border
7	Central	Central - Austin	Urban	Non-Border
8	Central	Central - Round Rock/Hill Country	Urban	Non-Border
16	Central	Central - Waco	Urban	Non-Border



Region and County Indicators

Data profiles for all 20 regions and 254 counties are presented in the following section. Oral health indicators for which data was available at the sub-state level have been grouped across five domains: Population and Socioeconomic Factors, Oral Health Outcomes, Clinical Care, Risk Factors,

and Medicaid and CHIP. Indicators reported at each level vary based on data availability, with more indicators able to be reported at the regional level than county level (Table 2).

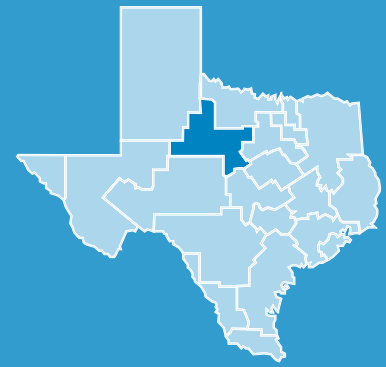
Please refer to the Methodology and Data Sources section and Appendix A for indicator definitions, data sources, and years.

Table 2. Oral Health Indicator Availability by Region and County (X indicates available data)

Domain	Indicator	Region	County
Population and Socioeconomic Factors	Population	X	X
	Low-Income Population	X	X
	Food Insecurity	X	X
	Uninsured Children (0-19 years)	X	X
	Uninsured Adults (18-64 years)	X	X
Oral Health Outcomes	Poor Dental Health (18+ years)	X	
	Edentulous Older Adults (65+ years)	X	
	Oral Clefts Rate per 10,000 Live Births	X	X
	Oral Cancer Incidence Rate per 100,000 Population	X	X
	Oral Cancer Mortality Rate per 100,000 Population	X	X
Clinical Care	Past-year Dental Visits (18+ years)	X	
	Population to General Dentist Ratio	X	X
	Population to Specialized Dentist Ratio	X	X
	Child Population to Pediatric Dentist Ratio	X	X
	Population to Dental Hygienist Ratio	X	X
	Population to Dental Assistant Ratio	X	X
	Population to Primary Care Physician Ratio	X	X
	Population to Nurse Practitioner Ratio	X	X
	FQHCs per 100,000 Population	X	X
Risk Factors (18+ years)	Obesity	X	
	Diabetes	X	
	Excessive Drinking	X	
	Smoking	X	
	Cardiovascular Disease	X	
Medicaid and CHIP	Total Population Enrolled in Medicaid	X	X
	Total Population Enrolled in Medicaid Dental	X	X
	Total Children Enrolled in CHIP	X	X
	Medicaid Non-dental Annual Expenses per Enrollee	X	X
	Medicaid Dental Annual Expenses per Enrollee	X	X
	CHIP Non-dental Annual Expenses per Enrollee	X	X
	CHIP Dental Annual Expenses per Enrollee	X	X



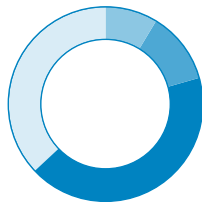
North Central - Abilene



15 counties: Brown, Callahan, Comanche, Eastland, Fisher, Haskell, Jones, Knox, Mitchell, Nolan, Palo Pinto, Shackelford, Stephens, Stonewall, Taylor

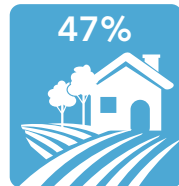
Population 318,210

County Populations

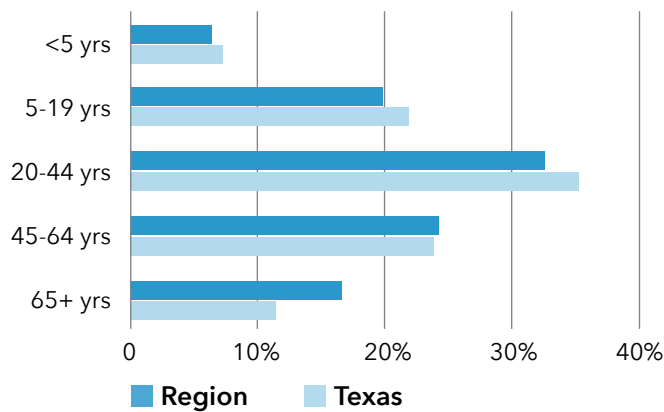


■ Taylor ■ Brown
■ Palo Pinto ■ Others

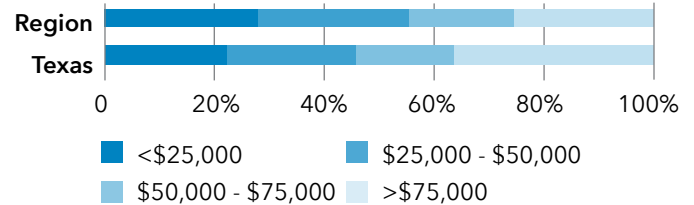
Rural Population



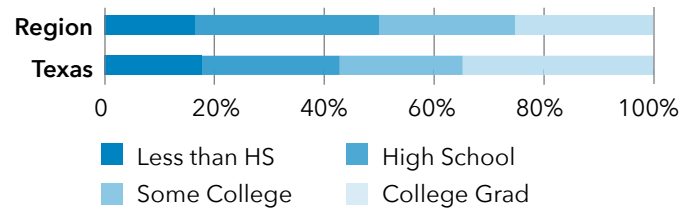
Age



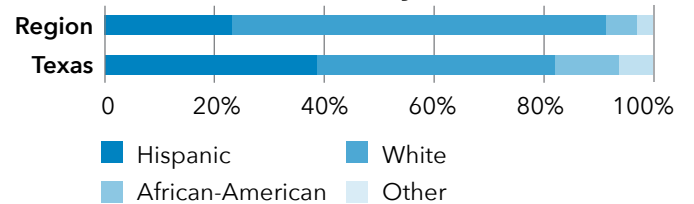
Income



Education



Race and Ethnicity

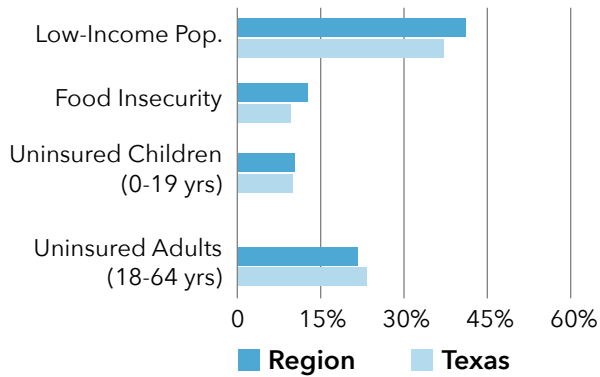


Key Points

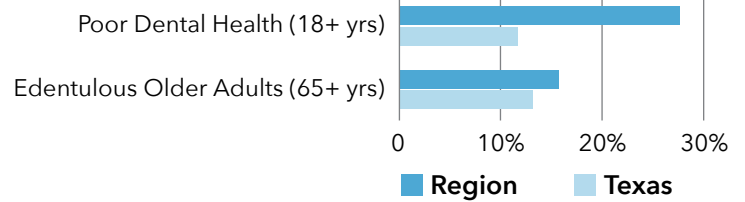
- In this region, an estimated 27.6% of adults are in poor dental health and 15.7% of older adults are edentulous, some of the highest rates in the state.
- This region has the lowest estimated rate of adult past-year dental visits in the state (45.4%)
- 47.0% of the region's population lives in a rural county.
- Taylor County is the most populous in the region and performs similar to or better than the state average on measures of access to clinical care.

North Central - Abilene

Socioeconomic Factors



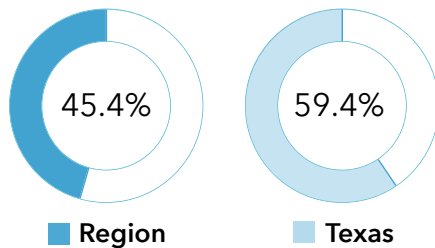
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	21	15.8
Oral Cancer Incidence rate per 100,000 Pop.	12.3	10.8
Oral Cancer Mortality rate per 100,00 Pop.	3.8	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

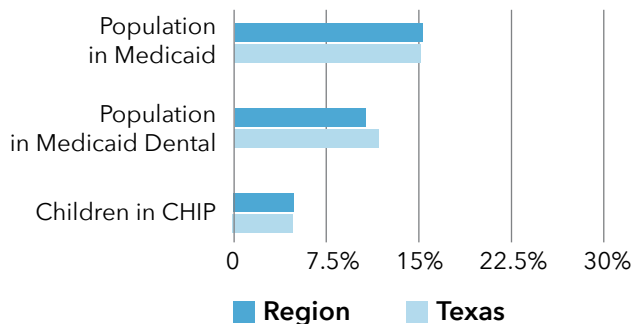


Population to Provider Ratio

	Region	Texas
General Dentist	4204: 1	2970: 1
Pediatric Dentist	23875: 1	9411: 1
Specialized Dentist	27674: 1	14291: 1
Dental Hygienist	2355: 1	2220: 1
Dental Assistant	858: 1	805: 1
Primary Care Physician	1597: 1	1362: 1
Nurse Practitioner	1815: 1	1961: 1
FQHCs per 100,000 pop.	2.2	1.5

Medicaid and CHIP

Enrollment (% of total population)

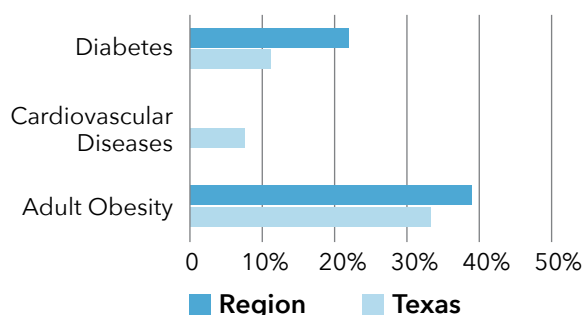


Annual Expenses Per Enrollee

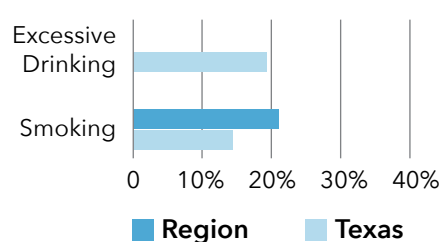
	Region	Texas
Medicaid Non-Dental	\$5,517	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,307	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

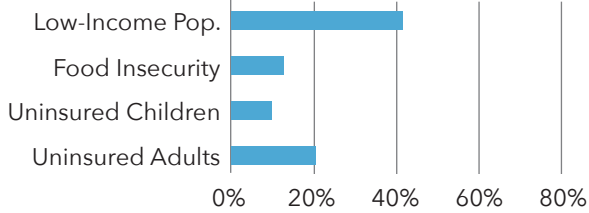


Behaviors



Brown County Population 37,935

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9
Oral Cancer Mortality Rate per 100,000 pop.	3

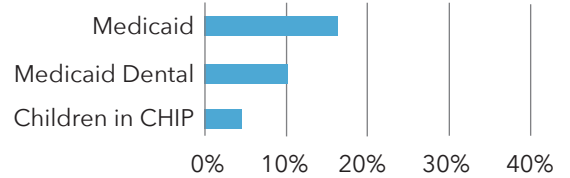
Clinical Care

Pop. to Provider Ratio

General Dentist	4999:1
Pediatric Dentist	-
Specialized Dentist	39995:1
Dental Hygienist	2666:1
Dental Assistant	976:1
Primary Care Physician	1481:1
Nurse Practitioner	3077:1
FQHCs per 100,000 pop.	5.3

Medicaid & CHIP

Enrollment (% of total population)

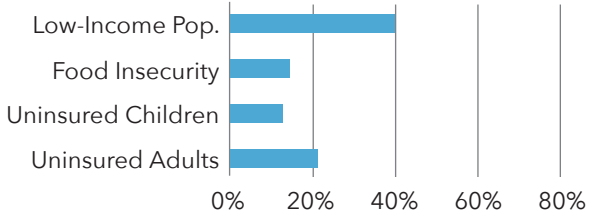


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,996
Medicaid Dental	\$419
CHIP Non- Dental	\$1,304
CHIP Dental	\$287

Callahan County Population 13,596

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	20.7
Oral Cancer Mortality Rate per 100,000 pop.	3

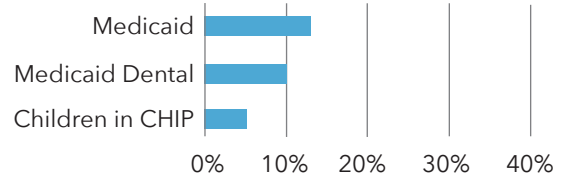
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3588:1
Dental Assistant	1435:1
Primary Care Physician	7176:1
Nurse Practitioner	4784:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

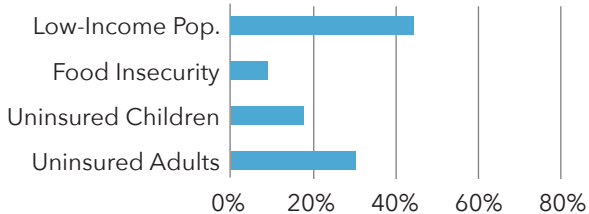


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,252
Medicaid Dental	\$421
CHIP Non- Dental	\$1,308
CHIP Dental	\$282

Comanche County Population 13,506

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	1.6

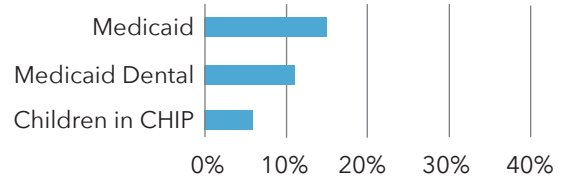
Clinical Care

Pop. to Provider Ratio

General Dentist	4859:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2430:1
Dental Assistant	1215:1
Primary Care Physician	1822:1
Nurse Practitioner	2430:1
FQHCs per 100,000 pop.	7.4

Medicaid & CHIP

Enrollment (% of total population)

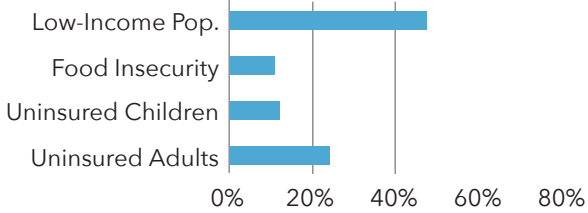


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,691
Medicaid Dental	\$415
CHIP Non- Dental	\$1,310
CHIP Dental	\$286

Eastland County Population 18,252

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.4
Oral Cancer Mortality Rate per 100,000 pop.	1.4

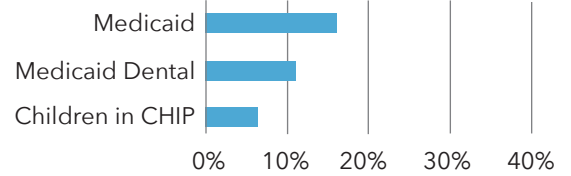
Clinical Care

Pop. to Provider Ratio

General Dentist	6504:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4878:1
Dental Assistant	1148:1
Primary Care Physician	2439:1
Nurse Practitioner	3902:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

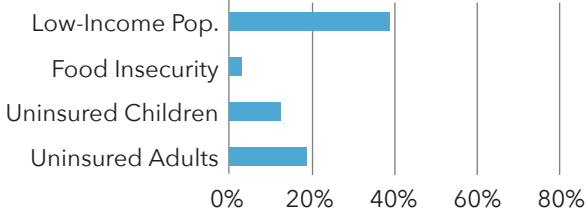


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,738
Medicaid Dental	\$419
CHIP Non- Dental	\$1,312
CHIP Dental	\$285

Fisher County Population 3,847

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.6
Oral Cancer Mortality Rate per 100,000 pop.	0

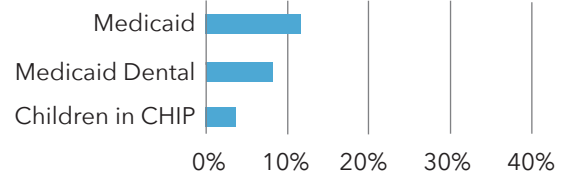
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3931:1
Dental Assistant	1310:1
Primary Care Physician	3931:1
Nurse Practitioner	983:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

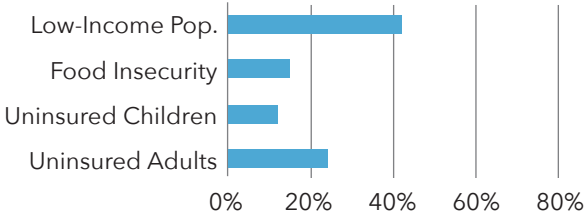


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,537
Medicaid Dental	\$419
CHIP Non- Dental	\$1,284
CHIP Dental	\$293

Haskell County Population 5,812

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.7
Oral Cancer Mortality Rate per 100,000 pop.	4.8

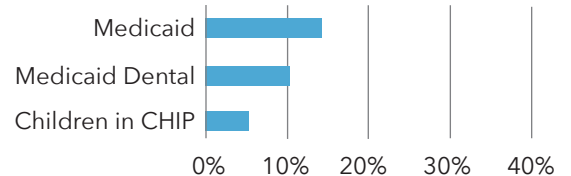
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5996:1
Dental Assistant	1199:1
Primary Care Physician	2998:1
Nurse Practitioner	5996:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

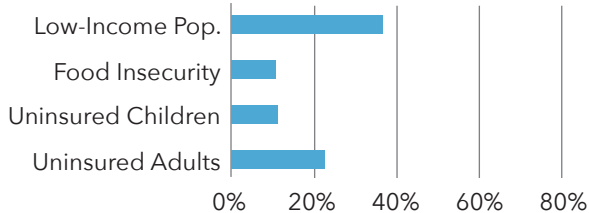


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,432
Medicaid Dental	\$426
CHIP Non- Dental	\$1,298
CHIP Dental	\$293

Jones County Population 19,944

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	5.2
Oral Cancer Mortality Rate per 100,000 pop.	4.3

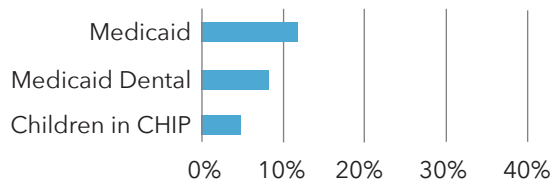
Clinical Care

Pop. to Provider Ratio

General Dentist	21647:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5412:1
Dental Assistant	2405:1
Primary Care Physician	2405:1
Nurse Practitioner	1804:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

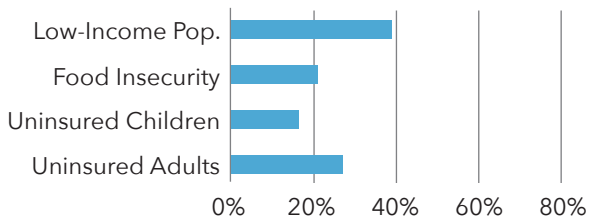


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,324
Medicaid Dental	\$421
CHIP Non- Dental	\$1,305
CHIP Dental	\$281

Knox County Population 3,807

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	15.6
Oral Cancer Mortality Rate per 100,000 pop.	0

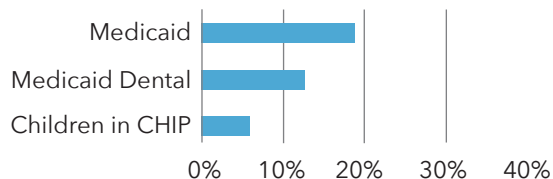
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	3757:1
Primary Care Physician	1879:1
Nurse Practitioner	751:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

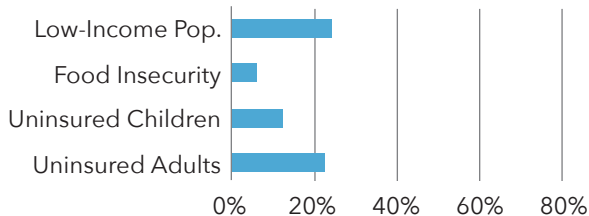


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,698
Medicaid Dental	\$424
CHIP Non- Dental	\$1,322
CHIP Dental	\$286

Mitchell County Population 8,995

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	8.1
Oral Cancer Mortality Rate per 100,000 pop.	2.5

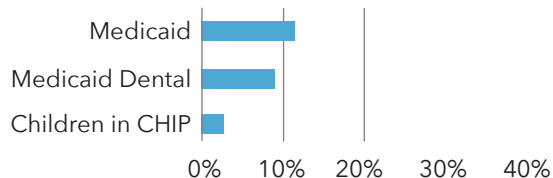
Clinical Care

Pop. to Provider Ratio

General Dentist	9853:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2463:1
Dental Assistant	1408:1
Primary Care Physician	3284:1
Nurse Practitioner	3284:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

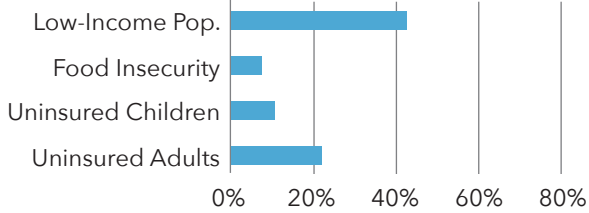


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,379
Medicaid Dental	\$420
CHIP Non- Dental	\$1,301
CHIP Dental	\$289

Nolan County Population 15,017

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.2
Oral Cancer Mortality Rate per 100,000 pop.	6.5

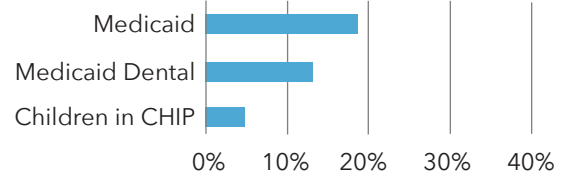
Clinical Care

Pop. to Provider Ratio

General Dentist	3971:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2269:1
Dental Assistant	1588:1
Primary Care Physician	2269:1
Nurse Practitioner	3177:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

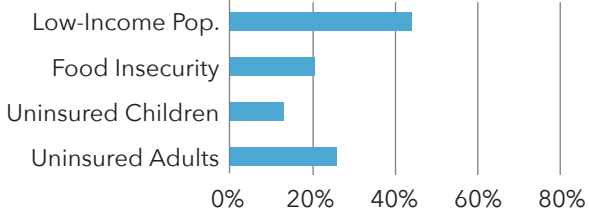


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,518
Medicaid Dental	\$421
CHIP Non- Dental	\$1,305
CHIP Dental	\$287

Palo Pinto County Population 27,922

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.8
Oral Cancer Mortality Rate per 100,000 pop.	6.2

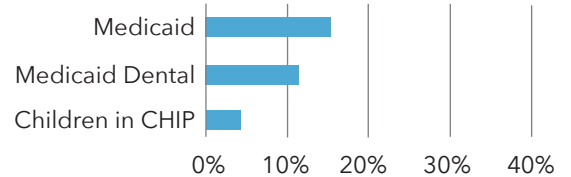
Clinical Care

Pop. to Provider Ratio

General Dentist	5106:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3404:1
Dental Assistant	806:1
Primary Care Physician	1802:1
Nurse Practitioner	3064:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

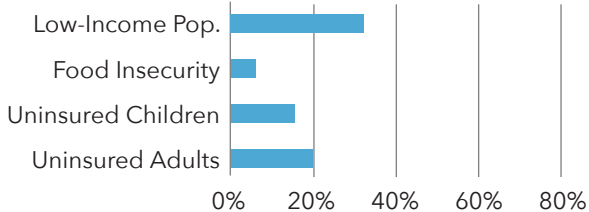


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,233
Medicaid Dental	\$418
CHIP Non- Dental	\$1,313
CHIP Dental	\$283

Shackelford County Population 3,323

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	3.6
Oral Cancer Mortality Rate per 100,000 pop.	3.6

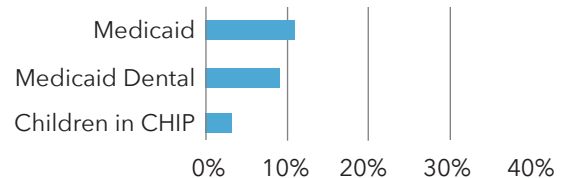
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1811:1
Dental Assistant	905:1
Primary Care Physician	3621:1
Nurse Practitioner	1207:1
FQHCs per 100,000 pop.	30.1

Medicaid & CHIP

Enrollment (% of total population)

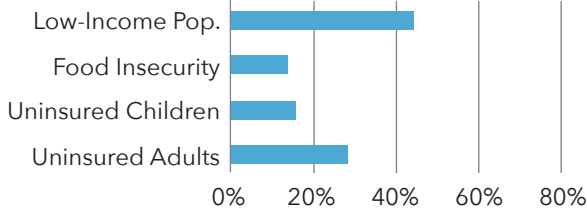


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,965
Medicaid Dental	\$417
CHIP Non- Dental	\$1,309
CHIP Dental	\$287

Stephens County Population 9,787

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	15.8
Oral Cancer Mortality Rate per 100,000 pop.	0

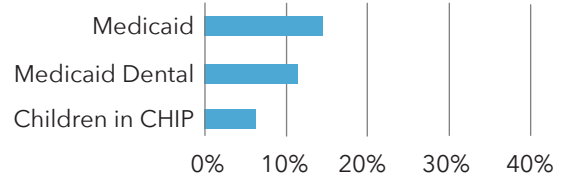
Clinical Care

Pop. to Provider Ratio

General Dentist	5047:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5047:1
Dental Assistant	1442:1
Primary Care Physician	1682:1
Nurse Practitioner	3365:1
FQHCs per 100,000 pop.	10.2

Medicaid & CHIP

Enrollment (% of total population)

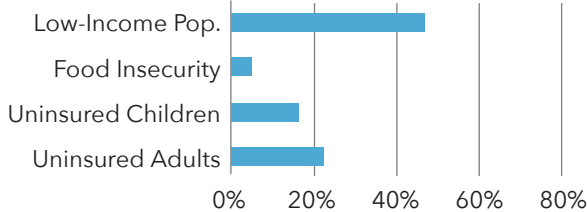


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,233
Medicaid Dental	\$417
CHIP Non- Dental	\$1,306
CHIP Dental	\$289

Stonewall County Population 1,233

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

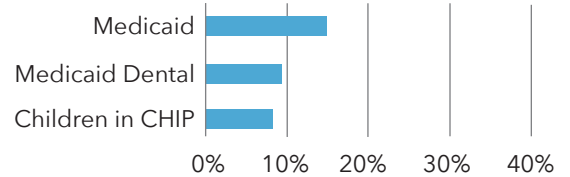
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1506:1
Dental Assistant	-
Primary Care Physician	1506:1
Nurse Practitioner	753:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

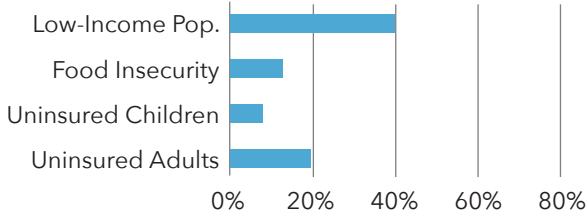


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,778
Medicaid Dental	\$406
CHIP Non- Dental	\$1,316
CHIP Dental	\$268

Taylor County Population 135,234

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	8.1
Oral Cancer Incidence Rate per 100,000 pop.	13.9
Oral Cancer Mortality Rate per 100,000 pop.	3.5

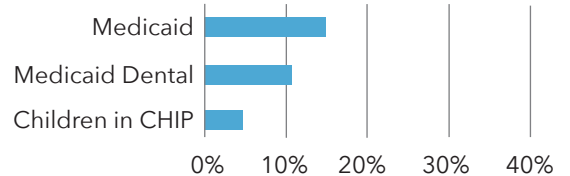
Clinical Care

Pop. to Provider Ratio

General Dentist	2681:1
Pediatric Dentist	10797:1
Specialized Dentist	12430:1
Dental Hygienist	1688:1
Dental Assistant	613:1
Primary Care Physician	1199:1
Nurse Practitioner	1266:1
FQHCs per 100,000 pop.	1.5

Medicaid & CHIP

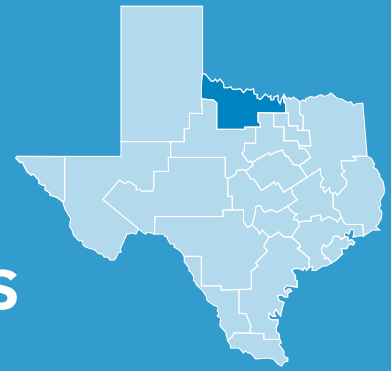
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,462
Medicaid Dental	\$417
CHIP Non- Dental	\$1,305
CHIP Dental	\$284

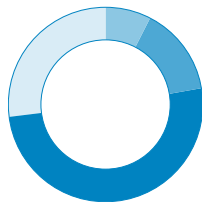
North Central - Wichita Falls



12 counties: Archer, Baylor, Clay, Cooke, Foard, Hardeman, Jack, Montague, Throckmorton, Wichita, Wilbarger, Young

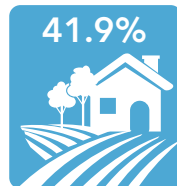
Population 260,160

County Populations

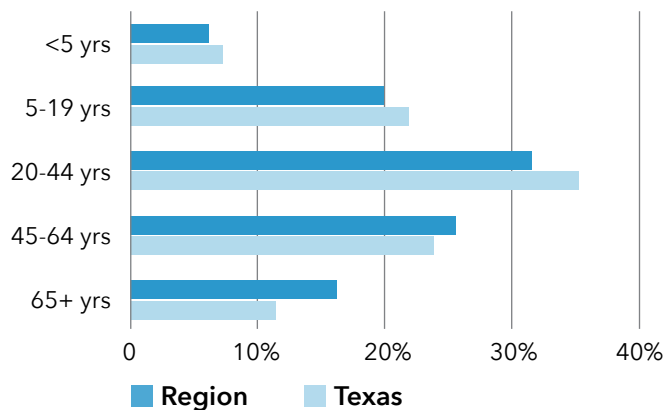


Wichita Cooke
Montague Others

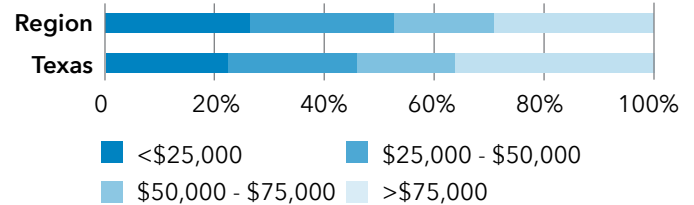
Rural Population



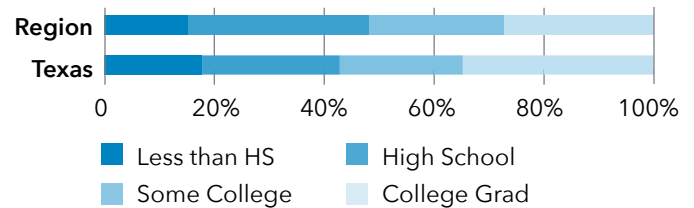
Age



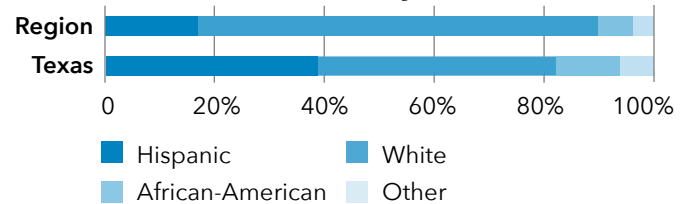
Income



Education



Race and Ethnicity

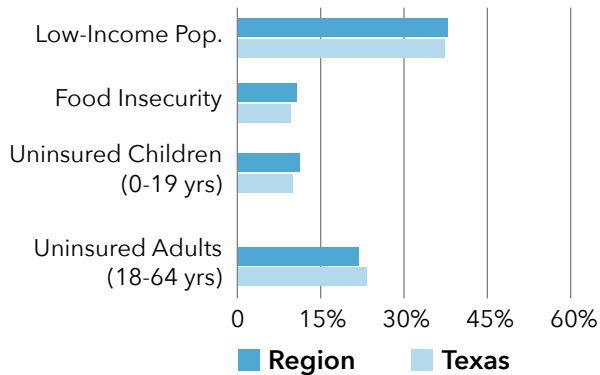


Key Points

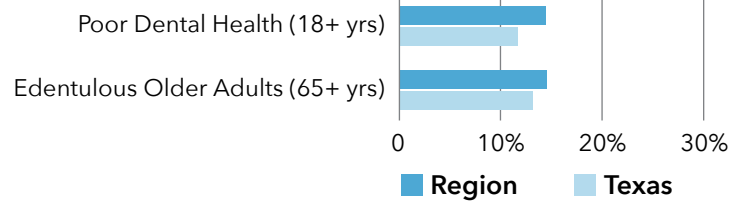
- The region's estimated rate of adults in poor dental health (14.3%) is worse than the state average, but about half the estimated rate in the neighboring North Central - Abilene region.
- Annual oral cancer incidence (13.3 cases per 100,000 population) is higher in this region than any other.
- This region has the 2nd highest supply of dental hygienists per capita in the state. Provider supply is better than the state average in Wichita, Young, and Cooke County which together constitute about 72% of the region's population.
- 41.9% of the region's population lives in rural counties. Six of the 12 counties in this region have a population of less than 10,000.

North Central - Wichita Falls

Socioeconomic Factors



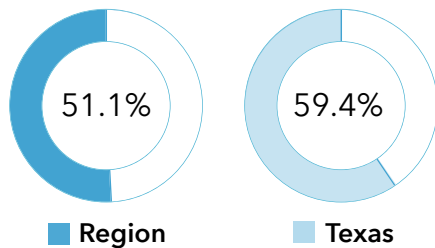
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	16	15.8
Oral Cancer Incidence rate per 100,000 Pop.	13.3	10.8
Oral Cancer Mortality rate per 100,00 Pop.	1.1	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

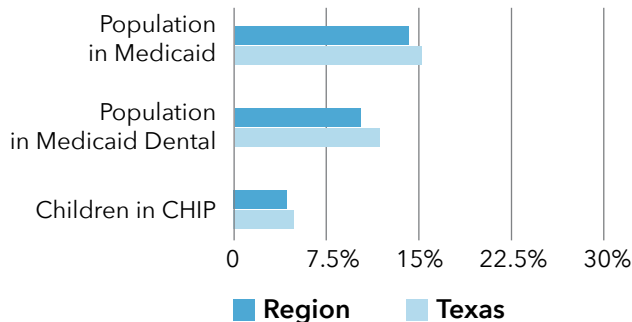


Population to Provider Ratio

	Region	Texas
General Dentist	3252: 1	2970: 1
Pediatric Dentist	19518: 1	9411: 1
Specialized Dentist	15880: 1	14291: 1
Dental Hygienist	1646: 1	2220: 1
Dental Assistant	1000: 1	805: 1
Primary Care Physician	1491: 1	1362: 1
Nurse Practitioner	1915: 1	1961: 1
FQHCs per 100,000 pop.	1.2	1.5

Medicaid and CHIP

Enrollment (% of total population)

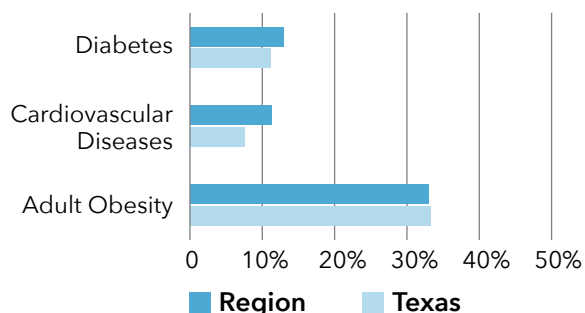


Annual Expenses Per Enrollee

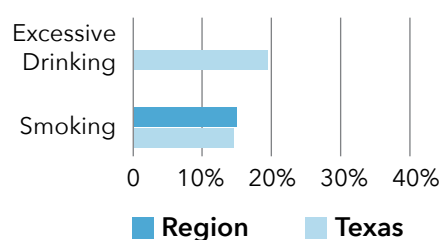
	Region	Texas
Medicaid Non-Dental	\$5,520	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,308	\$1,527
CHIP Dental	\$283	\$285

Risk Factors

Chronic Conditions

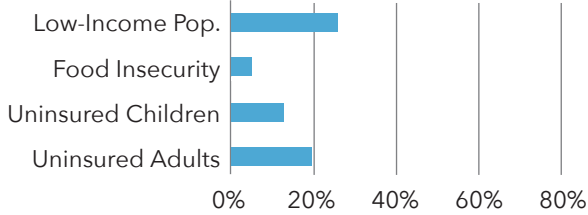


Behaviors



Archer County Population 8,750

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.9
Oral Cancer Mortality Rate per 100,000 pop.	1.6

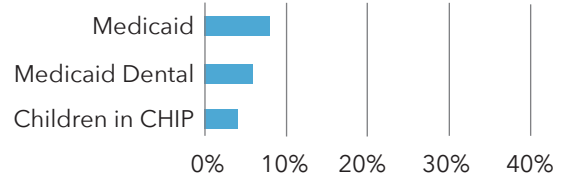
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4821:1
Dental Assistant	964:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

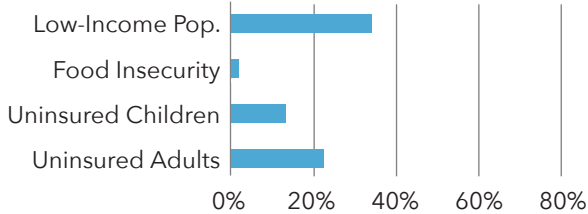


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,329
Medicaid Dental	\$417
CHIP Non- Dental	\$1,306
CHIP Dental	\$287

Baylor County Population 3,639

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	19.8
Oral Cancer Mortality Rate per 100,000 pop.	3.7

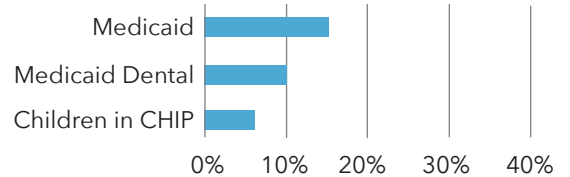
Clinical Care

Pop. to Provider Ratio

General Dentist	3709:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1855:1
Primary Care Physician	742:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

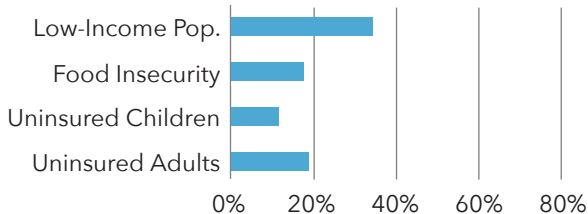


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,242
Medicaid Dental	\$421
CHIP Non- Dental	\$1,307
CHIP Dental	\$284

Clay County Population 10,367

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	2.4

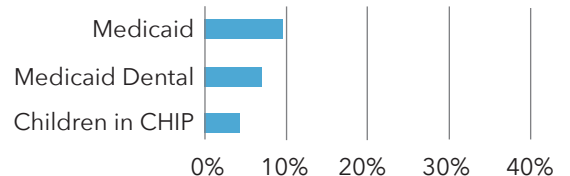
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3796:1
Dental Assistant	876:1
Primary Care Physician	2278:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

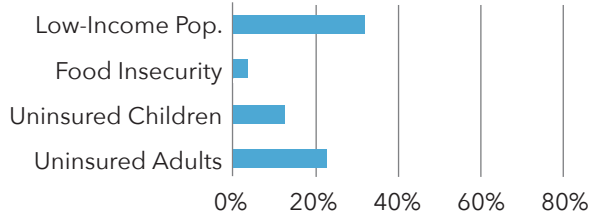


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,568
Medicaid Dental	\$420
CHIP Non- Dental	\$1,295
CHIP Dental	\$288

Cooke County Population 38,878

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.5
Oral Cancer Mortality Rate per 100,000 pop.	1.5

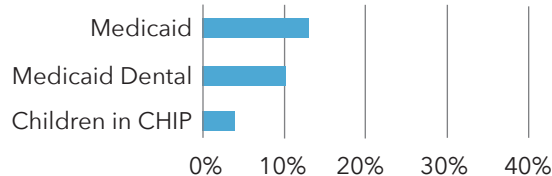
Clinical Care

Pop. to Provider Ratio

General Dentist	2909:1
Pediatric Dentist	9069:1
Specialized Dentist	20363:1
Dental Hygienist	1358:1
Dental Assistant	885:1
Primary Care Physician	2036:1
Nurse Practitioner	1939:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

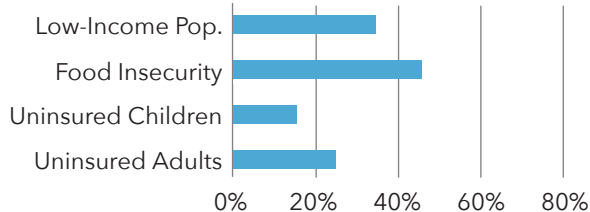


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,989
Medicaid Dental	\$414
CHIP Non- Dental	\$1,305
CHIP Dental	\$282

Foard County Population 1,320

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	8.1
Oral Cancer Mortality Rate per 100,000 pop.	12.1

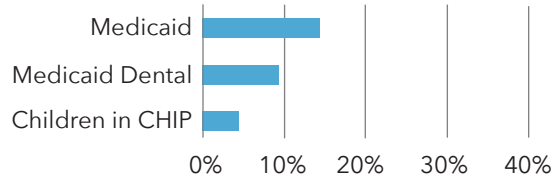
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	1364:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

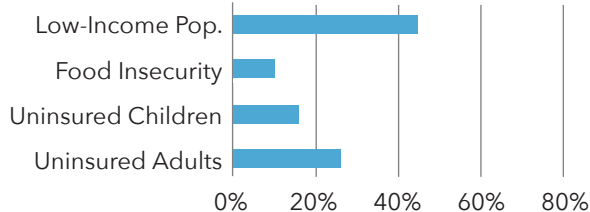


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,134
Medicaid Dental	\$434
CHIP Non- Dental	\$1,300
CHIP Dental	\$286

Hardeman County Population 3,952

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	6.5
Oral Cancer Mortality Rate per 100,000 pop.	6.4

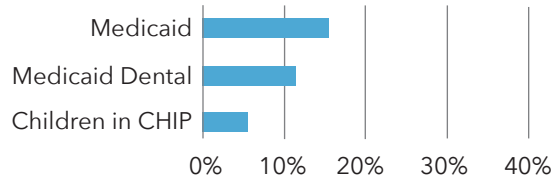
Clinical Care

Pop. to Provider Ratio

General Dentist	1455:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1455:1
Dental Assistant	2183:1
Primary Care Physician	1455:1
Nurse Practitioner	1455:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

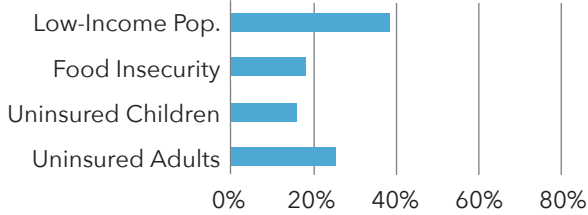


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,205
Medicaid Dental	\$421
CHIP Non- Dental	\$1,308
CHIP Dental	\$290

Jack County Population 8,866

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	18.5
Oral Cancer Mortality Rate per 100,000 pop.	5.9

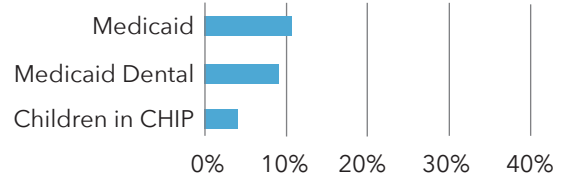
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	3167:1
Primary Care Physician	1900:1
Nurse Practitioner	3167:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

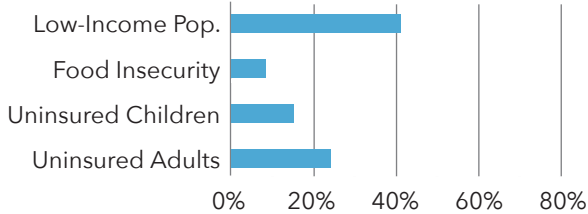


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,518
Medicaid Dental	\$414
CHIP Non- Dental	\$1,286
CHIP Dental	\$288

Montague County Population 19,384

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	3.9

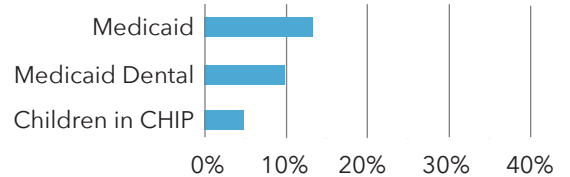
Clinical Care

Pop. to Provider Ratio

General Dentist	3492:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3492:1
Dental Assistant	1905:1
Primary Care Physician	2619:1
Nurse Practitioner	6983:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

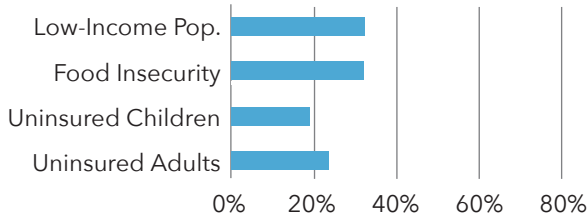


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,642
Medicaid Dental	\$420
CHIP Non- Dental	\$1,318
CHIP Dental	\$283

Throckmorton County Population 1,520

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	20.9
Oral Cancer Mortality Rate per 100,000 pop.	6.6

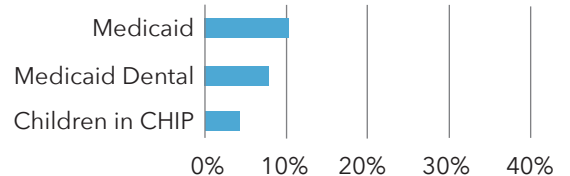
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	1655:1
Nurse Practitioner	1655:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

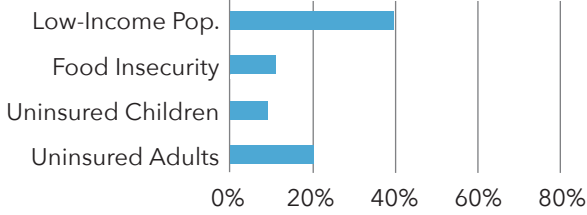


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,009
Medicaid Dental	\$415
CHIP Non- Dental	\$1,296
CHIP Dental	\$274

Wichita County Population 132,148

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.4
Oral Cancer Mortality Rate per 100,000 pop.	3.9

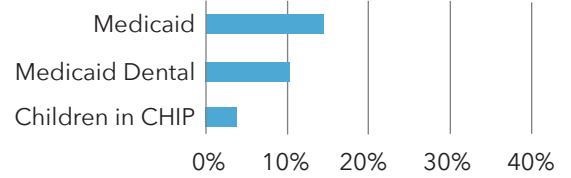
Clinical Care

Pop. to Provider Ratio

General Dentist	2884:1
Pediatric Dentist	14714:1
Specialized Dentist	10206:1
Dental Hygienist	1314:1
Dental Assistant	840:1
Primary Care Physician	1195:1
Nurse Practitioner	1491:1
FQHCs per 100,000 pop.	2.3

Medicaid & CHIP

Enrollment (% of total population)

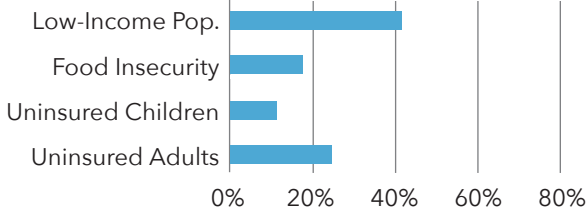


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,746
Medicaid Dental	\$418
CHIP Non- Dental	\$1,310
CHIP Dental	\$283

Wilbarger County Population 13,061

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	8.7
Oral Cancer Mortality Rate per 100,000 pop.	2.8

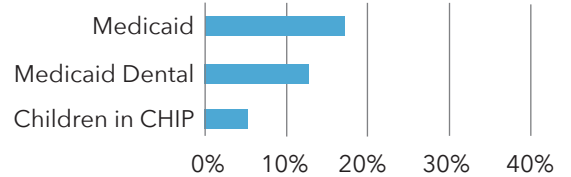
Clinical Care

Pop. to Provider Ratio

General Dentist	4832:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2899:1
Dental Assistant	2416:1
Primary Care Physician	1812:1
Nurse Practitioner	1611:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

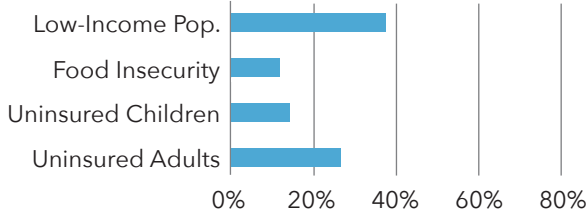


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,296
Medicaid Dental	\$420
CHIP Non- Dental	\$1,310
CHIP Dental	\$280

Young County Population 18,275

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.9
Oral Cancer Mortality Rate per 100,000 pop.	2

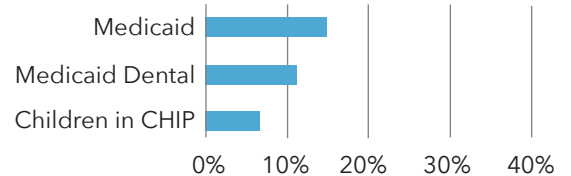
Clinical Care

Pop. to Provider Ratio

General Dentist	1948:1
Pediatric Dentist	-
Specialized Dentist	9742:1
Dental Hygienist	1392:1
Dental Assistant	1025:1
Primary Care Physician	1299:1
Nurse Practitioner	1771:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

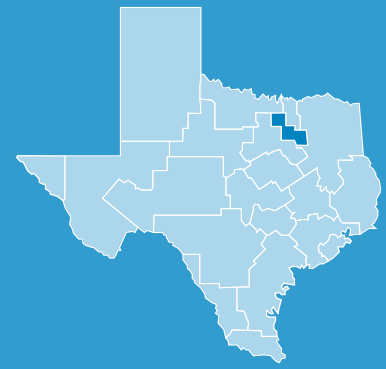


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,333
Medicaid Dental	\$422
CHIP Non- Dental	\$1,308
CHIP Dental	\$284

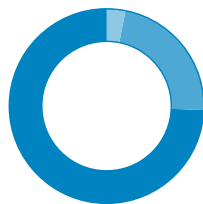
North - Dallas

3 counties: Dallas, Denton, Kaufman



Population 3,379,534

County Populations

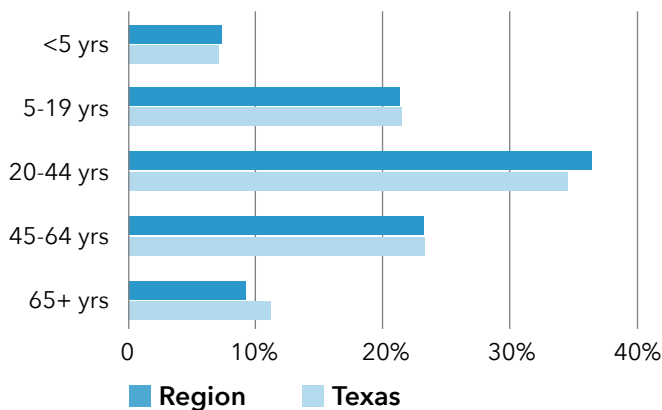


■ Dallas
■ Denton
■ Kaufman

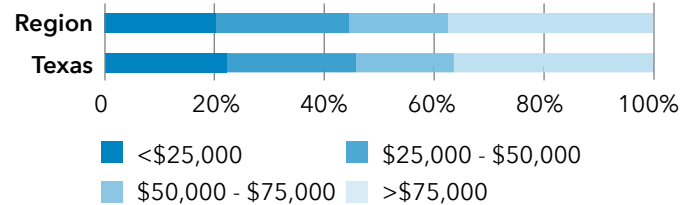
Rural Population



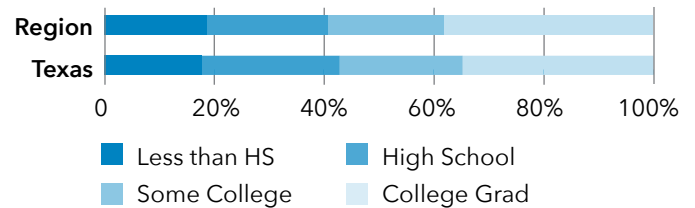
Age



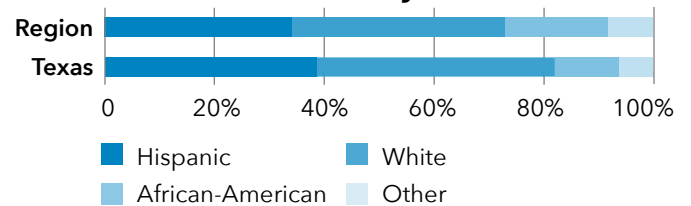
Income



Education



Race and Ethnicity

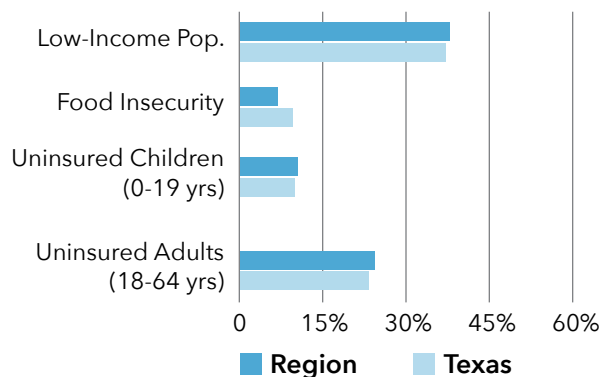


Key Points

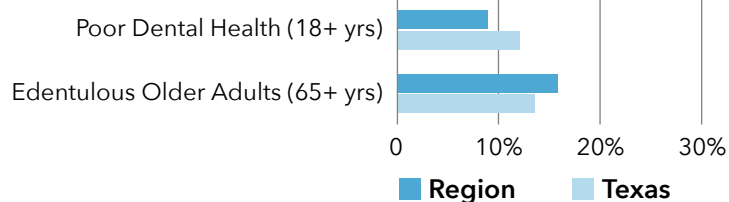
- In this region, two in three adults (66.6%) are estimated to have visited the dentist in the past year, the second highest rate of any region.
- The region's supply of dentists and primary care physicians is high compared to the state overall, with the exception of Kaufmann County.
- The estimated percentage of edentulous older adults (15.3%) is higher than the state average and similar to many of the state's rural regions.
- Dallas County has a high proportion of low-income residents (42.6%) and more than one-quarter of adults are uninsured (27.4%).

North - Dallas

Socioeconomic Factors



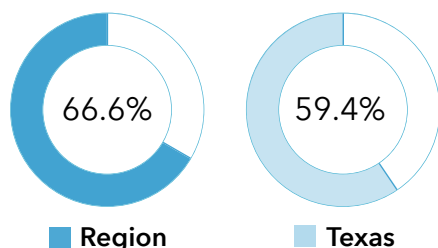
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	16.2	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11	10.8
Oral Cancer Mortality rate per 100,00 Pop.	0	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

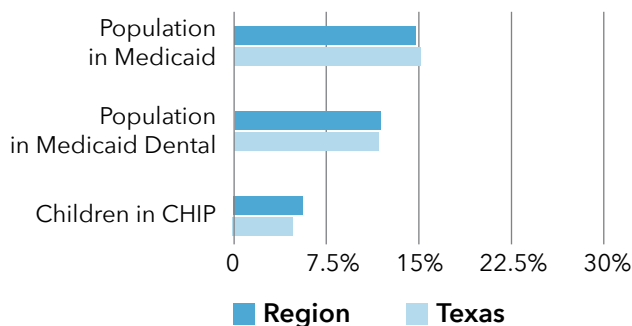


Population to Provider Ratio

	Region	Texas
General Dentist	2480: 1	2970: 1
Pediatric Dentist	8954: 1	9411: 1
Specialized Dentist	11700: 1	14291: 1
Dental Hygienist	2197: 1	2220: 1
Dental Assistant	777: 1	805: 1
Primary Care Physician	1230: 1	1362: 1
Nurse Practitioner	1697: 1	1961: 1
FQHCs per 100,000 pop.	0.4	1.5

Medicaid and CHIP

Enrollment (% of total population)

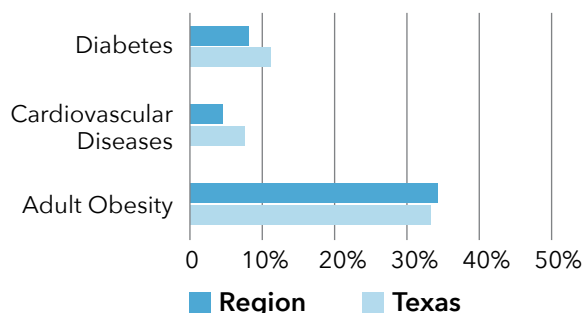


Annual Expenses Per Enrollee

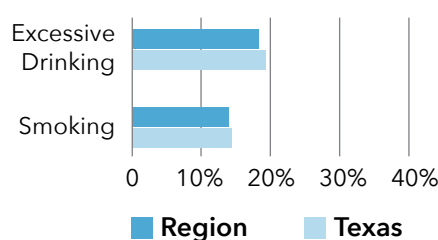
	Region	Texas
Medicaid Non-Dental	\$4,795	\$5,224
Medicaid Dental	\$419	\$419
CHIP Non-Dental	\$1,586	\$1,527
CHIP Dental	\$286	\$285

Risk Factors

Chronic Conditions

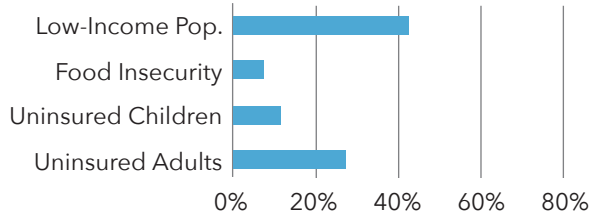


Behaviors



Dallas County Population 2,513,054

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	9.6
Oral Cancer Incidence Rate per 100,000 pop.	11.2
Oral Cancer Mortality Rate per 100,000 pop.	2.8

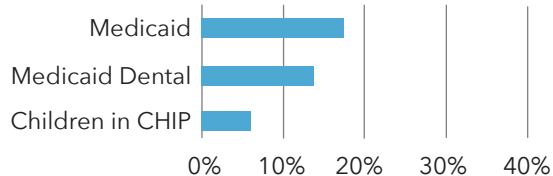
Clinical Care

Pop. to Provider Ratio

General Dentist	2302:1
Pediatric Dentist	9182:1
Specialized Dentist	10772:1
Dental Hygienist	2298:1
Dental Assistant	768:1
Primary Care Physician	1082:1
Nurse Practitioner	1471:1
FQHCs per 100,000 pop.	0.4

Medicaid & CHIP

Enrollment (% of total population)

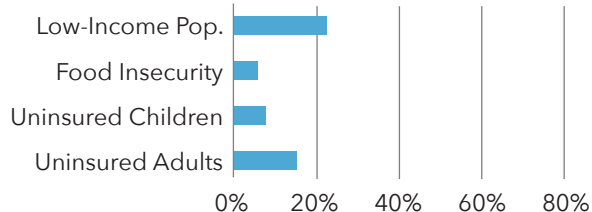


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,779
Medicaid Dental	\$420
CHIP Non- Dental	\$1,585
CHIP Dental	\$286

Denton County Population 754,650

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	15.6
Oral Cancer Incidence Rate per 100,000 pop.	10
Oral Cancer Mortality Rate per 100,000 pop.	1.9

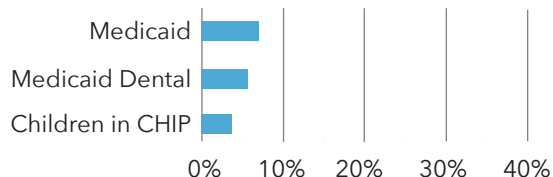
Clinical Care

Pop. to Provider Ratio

General Dentist	2981:1
Pediatric Dentist	7778:1
Specialized Dentist	13657:1
Dental Hygienist	5623:1
Dental Assistant	864:1
Primary Care Physician	1805:1
Nurse Practitioner	2749:1
FQHCs per 100,000 pop.	0.5

Medicaid & CHIP

Enrollment (% of total population)

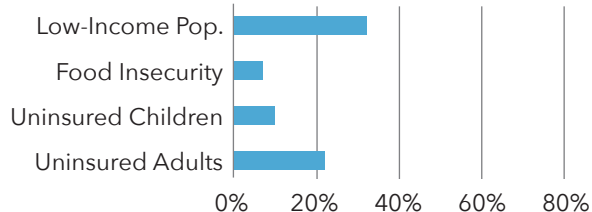


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,845
Medicaid Dental	\$415
CHIP Non- Dental	\$1,590
CHIP Dental	\$284

Kaufman County Population 111,830

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.3
Oral Cancer Mortality Rate per 100,000 pop.	2.4

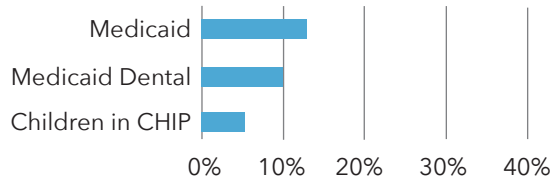
Clinical Care

Pop. to Provider Ratio

General Dentist	4177:1
Pediatric Dentist	15325:1
Specialized Dentist	44551:1
Dental Hygienist	2673:1
Dental Assistant	546:1
Primary Care Physician	3108:1
Nurse Practitioner	3517:1
FQHCs per 100,000 pop.	0.9

Medicaid & CHIP

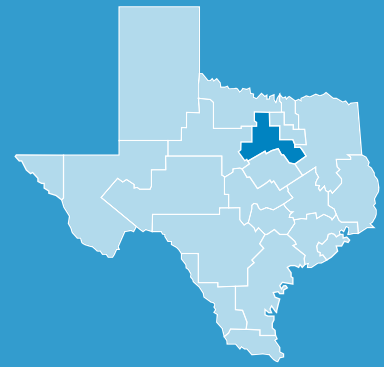
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,075
Medicaid Dental	\$421
CHIP Non- Dental	\$1,588
CHIP Dental	\$285

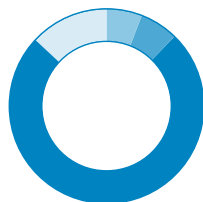
North - Fort Worth



9 counties: Ellis, Erath, Hood, Johnson, Navarro, Parker, Somervell, Tarrant, Wise

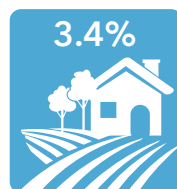
Population 2,602,696

County Populations

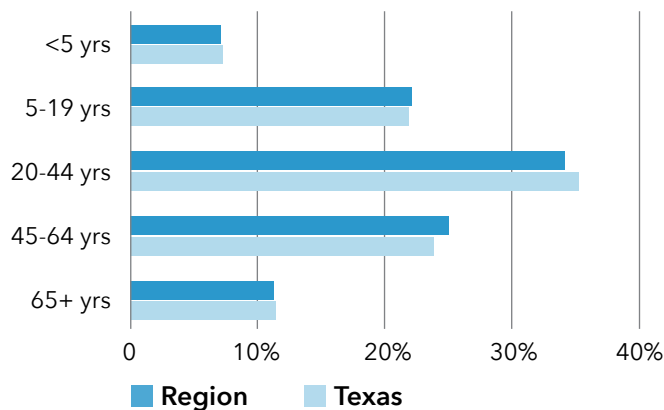


■ Tarrant ■ Ellis
■ Johnson ■ Others

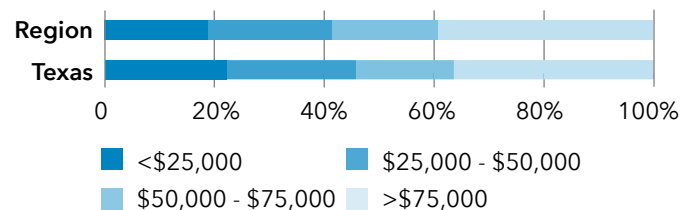
Rural Population



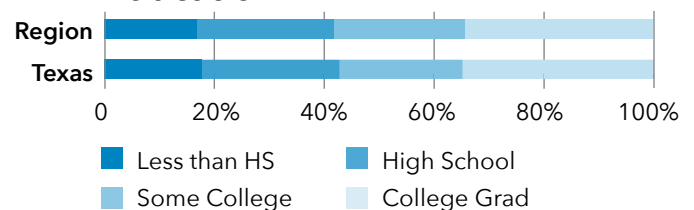
Age



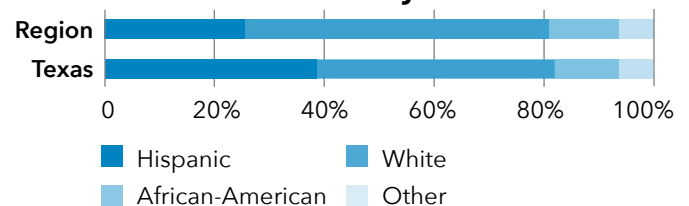
Income



Education



Race and Ethnicity

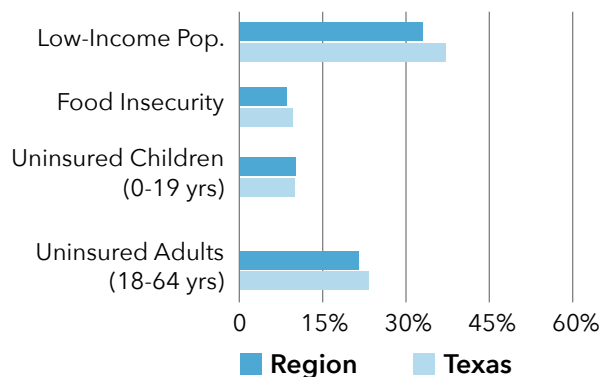


Key Points

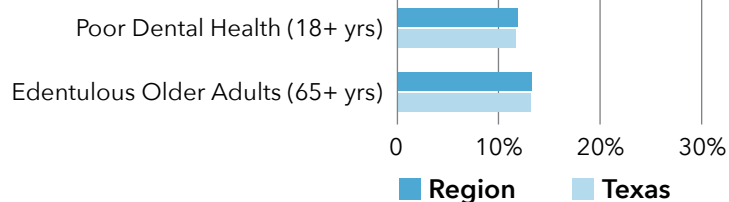
- The supply of dentists within the region varies, with Tarrant and Hood Counties performing better on access measures, and Wise, Navarro, and Parker counties performing worse.
- This region has the lowest rate of FQHCs per 100,000 population in the state, despite one in three residents being classified as low-income (33.0%).
- Oral health outcomes, rates of past-year dental visits, and rates of risk factors for oral disease are on par with state averages.

North - Fort Worth

Socioeconomic Factors



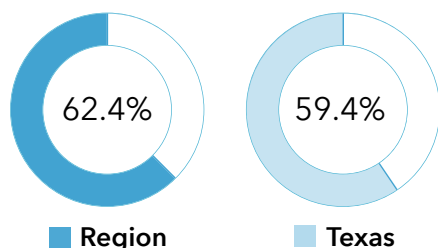
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	14.6	15.8
Oral Cancer Incidence rate per 100,000 Pop.	12.3	10.8
Oral Cancer Mortality rate per 100,00 Pop.	2	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

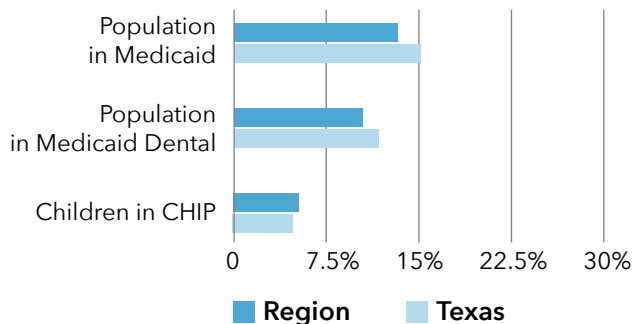


Population to Provider Ratio

	Region	Texas
General Dentist	2720: 1	2970: 1
Pediatric Dentist	9399: 1	9411: 1
Specialized Dentist	15241: 1	14291: 1
Dental Hygienist	1951: 1	2220: 1
Dental Assistant	703: 1	805: 1
Primary Care Physician	1328: 1	1362: 1
Nurse Practitioner	2212: 1	1961: 1
FQHCs per 100,000 pop.	0.2	1.5

Medicaid and CHIP

Enrollment (% of total population)

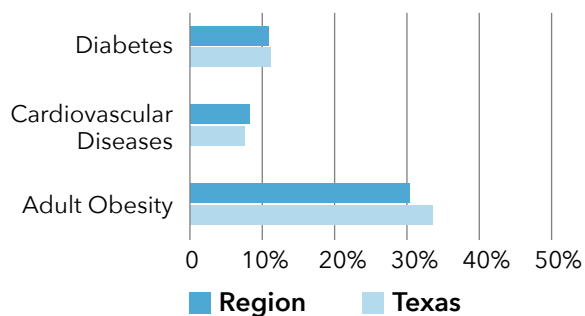


Annual Expenses Per Enrollee

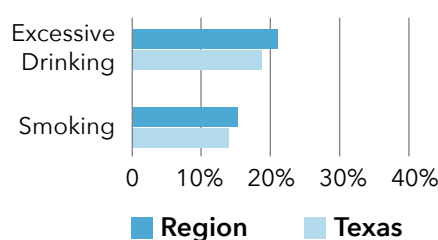
	Region	Texas
Medicaid Non-Dental	\$5,072	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,584	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

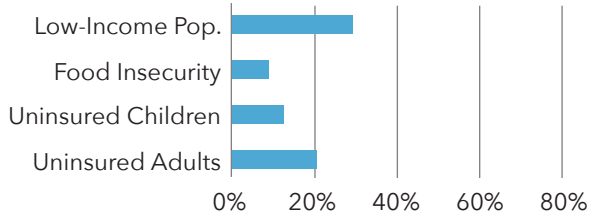


Behaviors



Ellis County Population 160,225

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	8.3
Oral Cancer Incidence Rate per 100,000 pop.	13.6
Oral Cancer Mortality Rate per 100,000 pop.	3.6

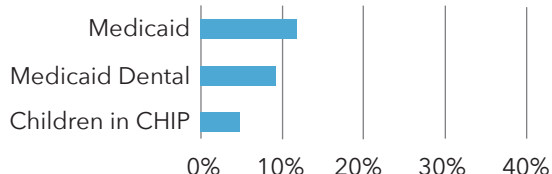
Clinical Care

Pop. to Provider Ratio

General Dentist	3531:1
Pediatric Dentist	10771:1
Specialized Dentist	61206:1
Dental Hygienist	2416:1
Dental Assistant	633:1
Primary Care Physician	1855:1
Nurse Practitioner	2915:1
FQHCs per 100,000 pop.	1.2

Medicaid & CHIP

Enrollment (% of total population)

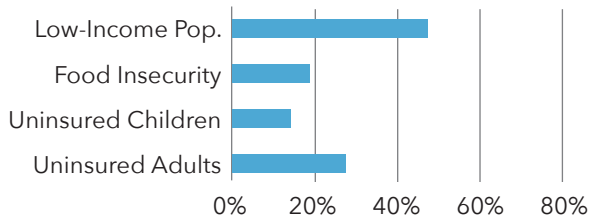


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,946
Medicaid Dental	\$419
CHIP Non- Dental	\$1,587
CHIP Dental	\$286

Erath County Population 40,641

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.8
Oral Cancer Mortality Rate per 100,000 pop.	2.2

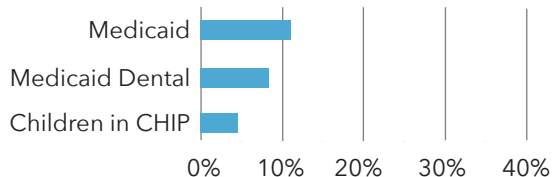
Clinical Care

Pop. to Provider Ratio

General Dentist	3668:1
Pediatric Dentist	-
Specialized Dentist	13451:1
Dental Hygienist	2242:1
Dental Assistant	807:1
Primary Care Physician	1552:1
Nurse Practitioner	3669:1
FQHCs per 100,000 pop.	2.5

Medicaid & CHIP

Enrollment (% of total population)

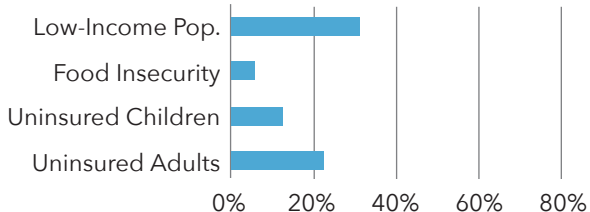


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,825
Medicaid Dental	\$416
CHIP Non- Dental	\$1,301
CHIP Dental	\$286

Hood County Population 54,217

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.1
Oral Cancer Mortality Rate per 100,000 pop.	2.1

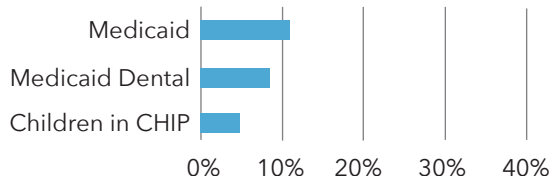
Clinical Care

Pop. to Provider Ratio

General Dentist	2529:1
Pediatric Dentist	11280:1
Specialized Dentist	-
Dental Hygienist	1711:1
Dental Assistant	701:1
Primary Care Physician	1616:1
Nurse Practitioner	2908:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

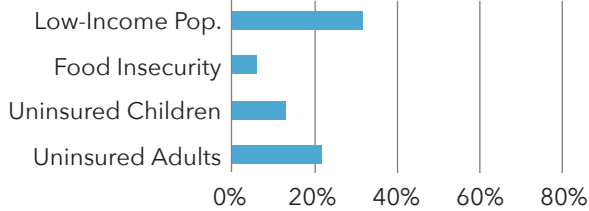


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,230
Medicaid Dental	\$415
CHIP Non- Dental	\$1,595
CHIP Dental	\$285

Johnson County Population 157,544

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	10.0
Oral Cancer Incidence Rate per 100,000 pop.	12.2
Oral Cancer Mortality Rate per 100,000 pop.	2.2

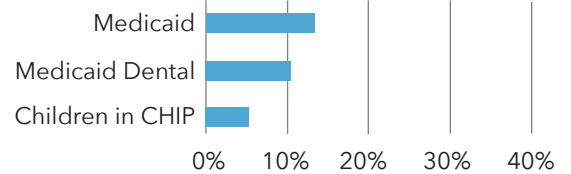
Clinical Care

Pop. to Provider Ratio

General Dentist	3501:1
Pediatric Dentist	10317:1
Specialized Dentist	35006:1
Dental Hygienist	2735:1
Dental Assistant	632:1
Primary Care Physician	2693:1
Nurse Practitioner	4488:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

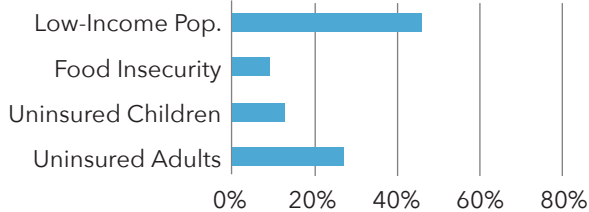


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,090
Medicaid Dental	\$419
CHIP Non- Dental	\$1,592
CHIP Dental	\$285

Navarro County Population 48,177

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.9
Oral Cancer Mortality Rate per 100,000 pop.	3.5

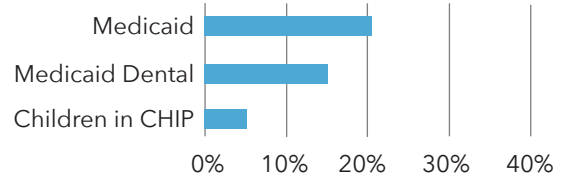
Clinical Care

Pop. to Provider Ratio

General Dentist	4418:1
Pediatric Dentist	-
Specialized Dentist	26510:1
Dental Hygienist	2651:1
Dental Assistant	768:1
Primary Care Physician	1894:1
Nurse Practitioner	4418:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

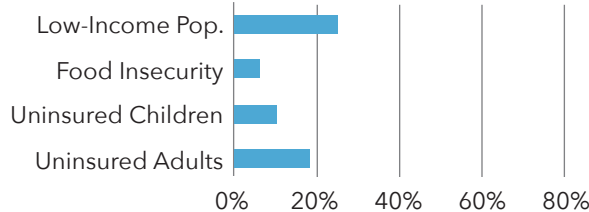


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,218
Medicaid Dental	\$421
CHIP Non- Dental	\$1,589
CHIP Dental	\$285

Parker County Population 123,601

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.4
Oral Cancer Mortality Rate per 100,000 pop.	1.8

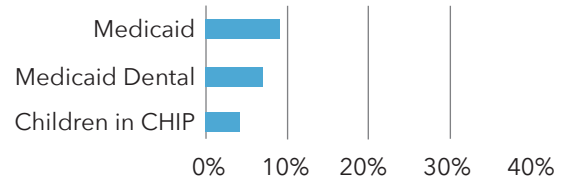
Clinical Care

Pop. to Provider Ratio

General Dentist	4268:1
Pediatric Dentist	14995:1
Specialized Dentist	24184:1
Dental Hygienist	2015:1
Dental Assistant	648:1
Primary Care Physician	2303:1
Nurse Practitioner	4837:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

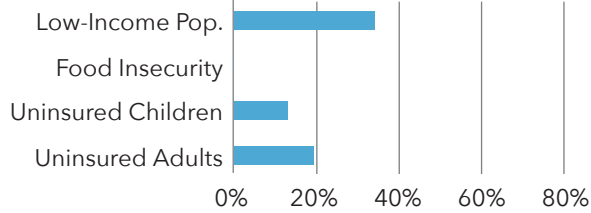


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,346
Medicaid Dental	\$417
CHIP Non- Dental	\$1,594
CHIP Dental	\$282

Somervell County Population 8,673

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	9.9
Oral Cancer Mortality Rate per 100,000 pop.	1.4

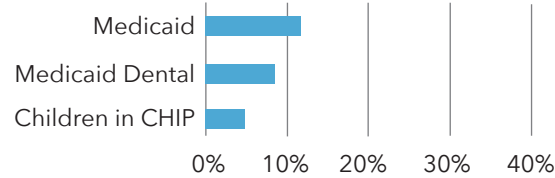
Clinical Care

Pop. to Provider Ratio

General Dentist	3281:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2461:1
Dental Assistant	1231:1
Primary Care Physician	1231:1
Nurse Practitioner	2461:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

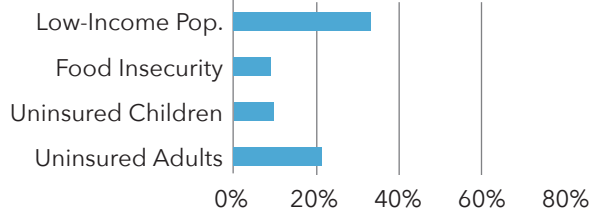


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,478
Medicaid Dental	\$418
CHIP Non- Dental	\$1,313
CHIP Dental	\$287

Tarrant County Population 1,947,529

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	9.1
Oral Cancer Incidence Rate per 100,000 pop.	12.1
Oral Cancer Mortality Rate per 100,000 pop.	2.4

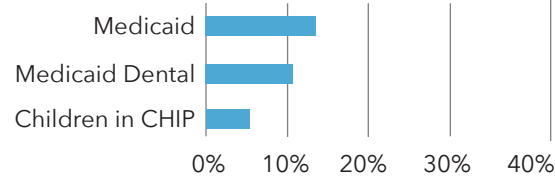
Clinical Care

Pop. to Provider Ratio

General Dentist	2486:1
Pediatric Dentist	8423:1
Specialized Dentist	12571:1
Dental Hygienist	1842:1
Dental Assistant	711:1
Primary Care Physician	1182:1
Nurse Practitioner	1935:1
FQHCs per 100,000 pop.	0.2

Medicaid & CHIP

Enrollment (% of total population)

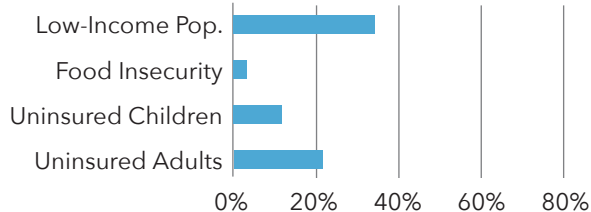


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,059
Medicaid Dental	\$418
CHIP Non- Dental	\$1,588
CHIP Dental	\$285

Wise County Population 62,089

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.9
Oral Cancer Mortality Rate per 100,000 pop.	3.6

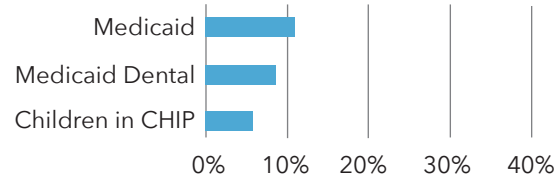
Clinical Care

Pop. to Provider Ratio

General Dentist	4630:1
Pediatric Dentist	-
Specialized Dentist	69449:1
Dental Hygienist	2572:1
Dental Assistant	951:1
Primary Care Physician	1781:1
Nurse Practitioner	3157:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

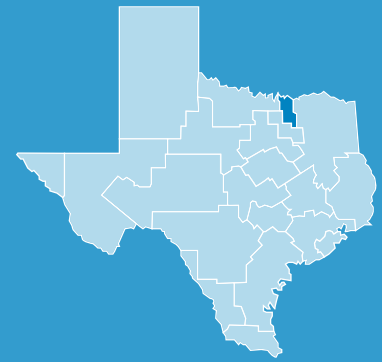
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,128
Medicaid Dental	\$415
CHIP Non- Dental	\$1,584
CHIP Dental	\$286

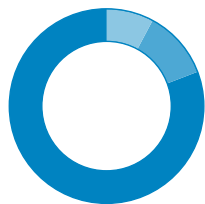
North - Plano/Sherman



3 counties: Collin, Grayson, Rockwall

Population 1,098,874

County Populations

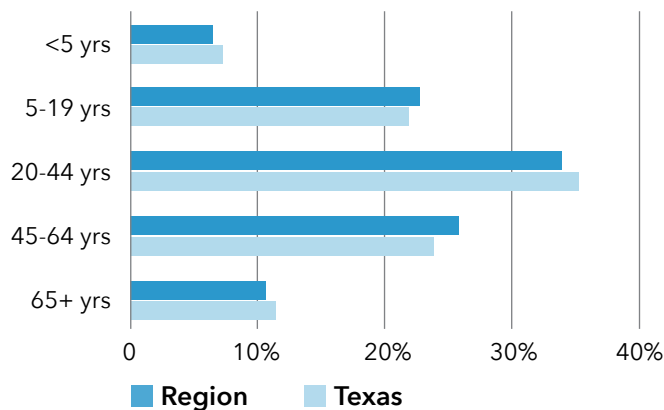


Collin
Grayson
Rockwall

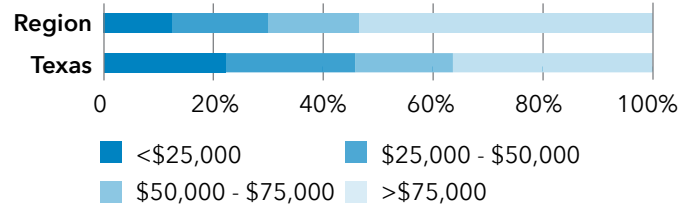
Rural Population



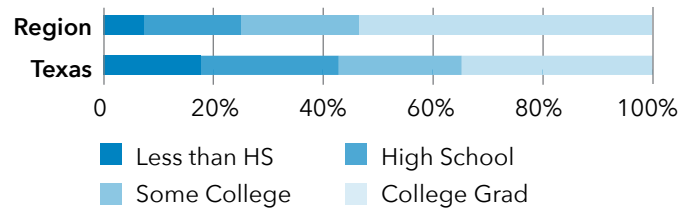
Age



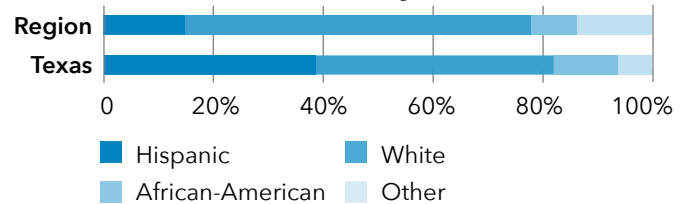
Income



Education



Race and Ethnicity

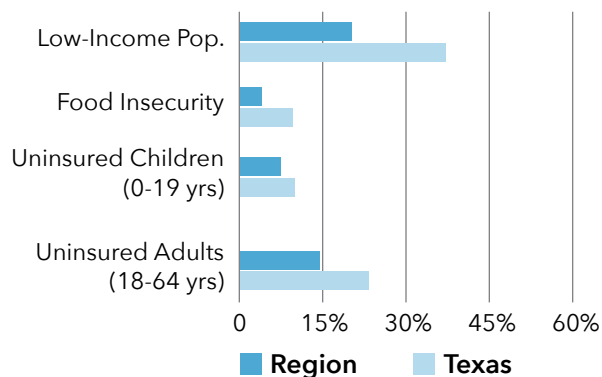


Key Points

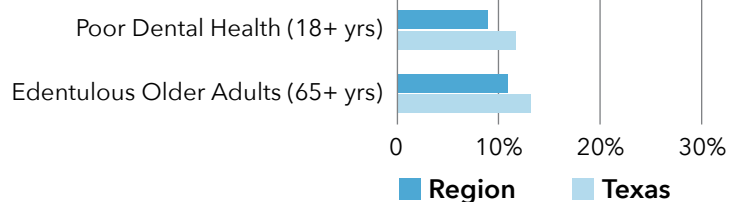
- This region has an above-average supply of general dentists, pediatric dentists, specialized dentists, dental hygienists, and primary care physicians compared to other regions.
- Estimated rates of excessive drinking (12.4%) and obesity (23.8%) fall well below the state average in this region.
- The region has better estimated rates of oral health outcomes and use of dental care in the past year compared to the state average. However, oral cancer incidence rates in Rockwall and Grayson counties exceed the state overall.
- Overall, the region has the lowest proportion of low-income residents (20.2%) and uninsured adults (14.4%) of any region in the state.

North - Plano/Sherman

Socioeconomic Factors



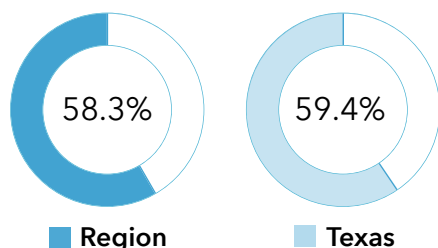
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	16	15.8
Oral Cancer Incidence rate per 100,000 Pop.	10.9	10.8
Oral Cancer Mortality rate per 100,00 Pop.	4	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

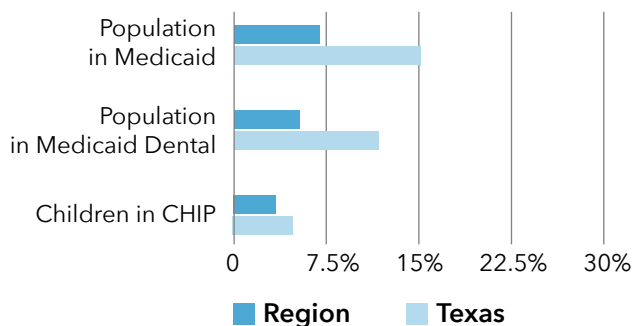


Population to Provider Ratio

	Region	Texas
General Dentist	2084: 1	2970: 1
Pediatric Dentist	5335: 1	9411: 1
Specialized Dentist	7319: 1	14291: 1
Dental Hygienist	1393: 1	2220: 1
Dental Assistant	803: 1	805: 1
Primary Care Physician	1129: 1	1362: 1
Nurse Practitioner	2011: 1	1961: 1
FQHCs per 100,000 pop.	0.4	1.5

Medicaid and CHIP

Enrollment (% of total population)

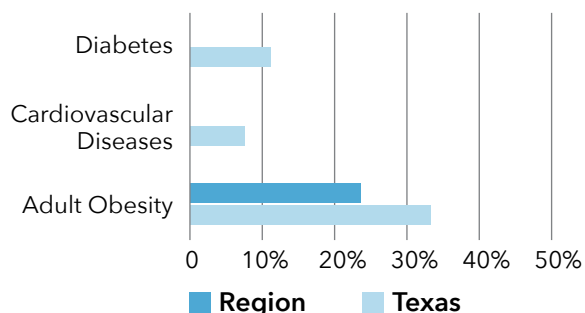


Annual Expenses Per Enrollee

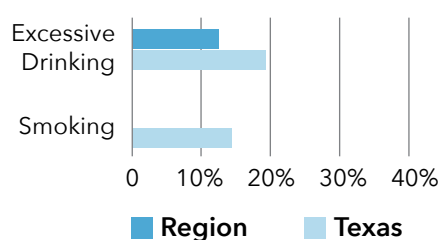
	Region	Texas
Medicaid Non-Dental	\$5,051	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,545	\$1,527
CHIP Dental	\$286	\$285

Risk Factors

Chronic Conditions

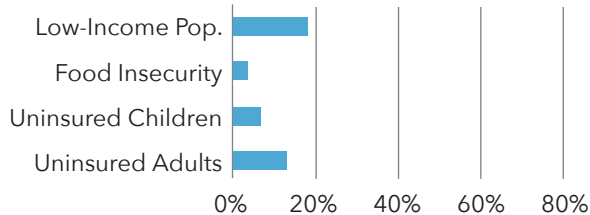


Behaviors



Collin County Population 886,633

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	8.8
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	1.8

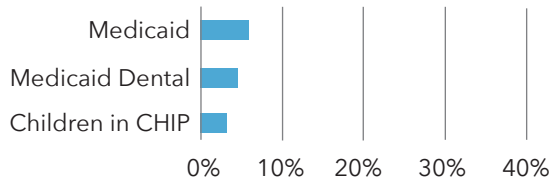
Clinical Care

Pop. to Provider Ratio

General Dentist	2043:1
Pediatric Dentist	5581:1
Specialized Dentist	7223:1
Dental Hygienist	1360:1
Dental Assistant	847:1
Primary Care Physician	1105:1
Nurse Practitioner	2043:1
FQHCs per 100,000 pop.	0.5

Medicaid & CHIP

Enrollment (% of total population)

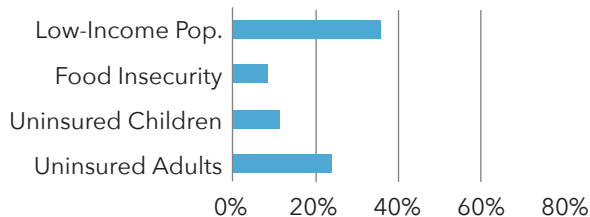


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,893
Medicaid Dental	\$418
CHIP Non- Dental	\$1,585
CHIP Dental	\$286

Grayson County Population 124,231

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	10.9
Oral Cancer Incidence Rate per 100,000 pop.	13
Oral Cancer Mortality Rate per 100,000 pop.	3.2

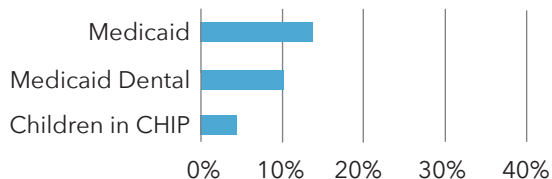
Clinical Care

Pop. to Provider Ratio

General Dentist	2647:1
Pediatric Dentist	7242:1
Specialized Dentist	12968:1
Dental Hygienist	2092:1
Dental Assistant	648:1
Primary Care Physician	1259:1
Nurse Practitioner	1995:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

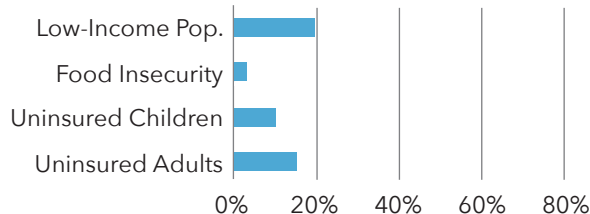


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,523
Medicaid Dental	\$418
CHIP Non- Dental	\$1,306
CHIP Dental	\$283

Rockwall County Population 88,010

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	20.5
Oral Cancer Incidence Rate per 100,000 pop.	14.6
Oral Cancer Mortality Rate per 100,000 pop.	2.3

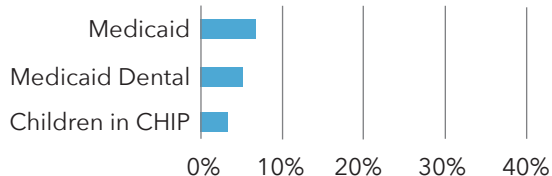
Clinical Care

Pop. to Provider Ratio

General Dentist	1954:1
Pediatric Dentist	3056:1
Specialized Dentist	5177:1
Dental Hygienist	1177:1
Dental Assistant	664:1
Primary Care Physician	1233:1
Nurse Practitioner	1755:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

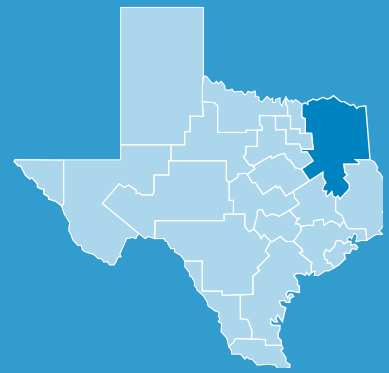
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,097
Medicaid Dental	\$421
CHIP Non- Dental	\$1,583
CHIP Dental	\$287

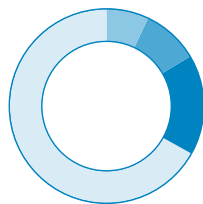
North - Texarkana/Tyler



28 counties: Anderson, Bowie, Camp, Cass, Cherokee, Delta, Fannin, Franklin, Freestone, Gregg, Harrison, Henderson, Hopkins, Houston, Hunt, Lamar, Marion, Morris, Panola, Rains, Red River, Rusk, Smith, Titus, Trinity, Upshur, Van Zandt, Wood

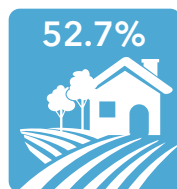
Population 1,307,509

County Populations

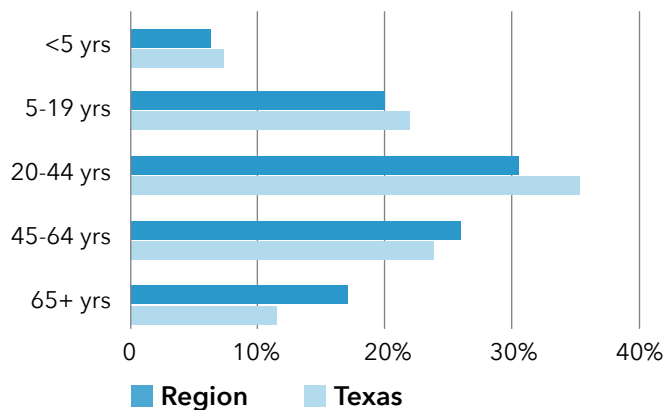


■ Smith ■ Gregg
■ Bowie ■ Others

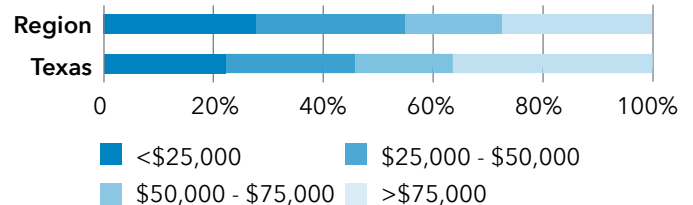
Rural Population



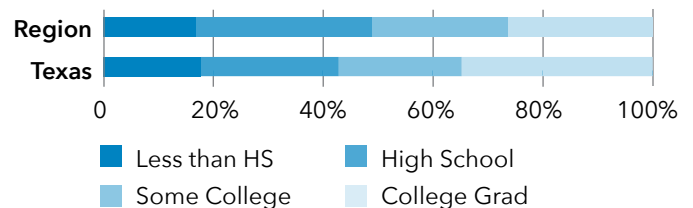
Age



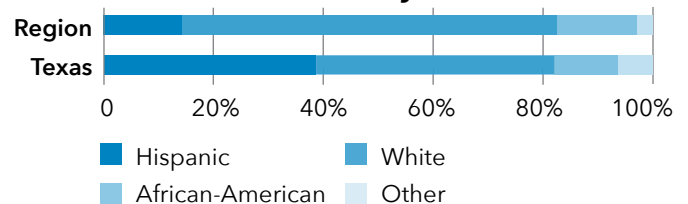
Income



Education



Race and Ethnicity

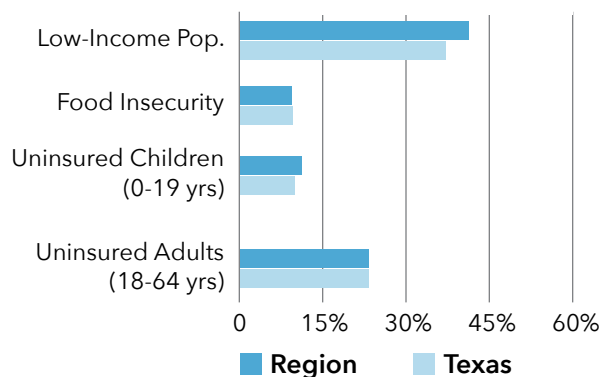


Key Points

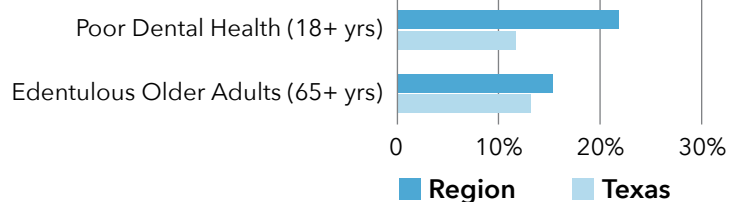
- This region performs worse on measures of oral health provider supply and oral health outcomes compared to the state overall.
- Adults in this region have some of the state's highest estimated rates of obesity (45.6%) and diabetes (17.2%).
- In seven of the 28 counties in this region, more than 45.0% of residents are classified as low-income with the highest proportion (49.1%) in Red River County.

North - Texarkana/Tyler

Socioeconomic Factors



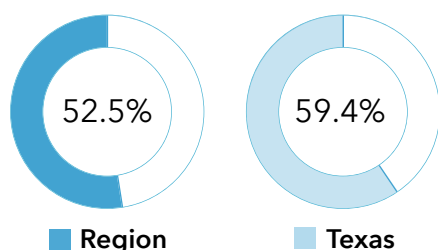
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	17.2	15.8
Oral Cancer Incidence rate per 100,000 Pop.	12.7	10.8
Oral Cancer Mortality rate per 100,00 Pop.	3.5	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

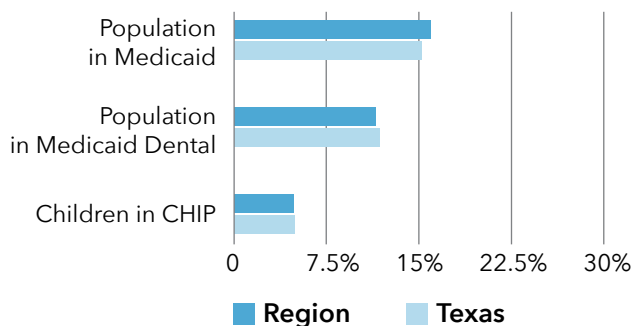


Population to Provider Ratio

	Region	Texas
General Dentist	3830: 1	2970: 1
Pediatric Dentist	13279: 1	9411: 1
Specialized Dentist	22486: 1	14291: 1
Dental Hygienist	2135: 1	2220: 1
Dental Assistant	828: 1	805: 1
Primary Care Physician	1514: 1	1362: 1
Nurse Practitioner	2044: 1	1961: 1
FQHCs per 100,000 pop.	2.2	1.5

Medicaid and CHIP

Enrollment (% of total population)

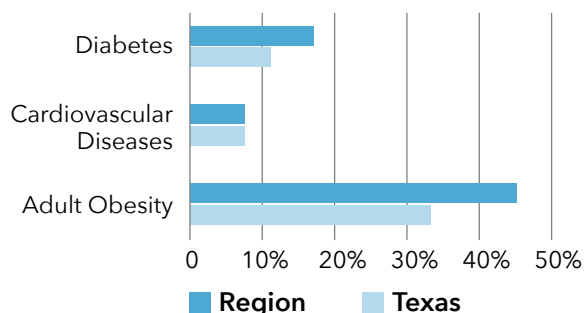


Annual Expenses Per Enrollee

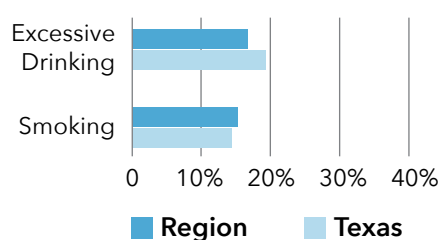
	Region	Texas
Medicaid Non-Dental	\$5,823	\$5,224
Medicaid Dental	\$419	\$419
CHIP Non-Dental	\$1,326	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

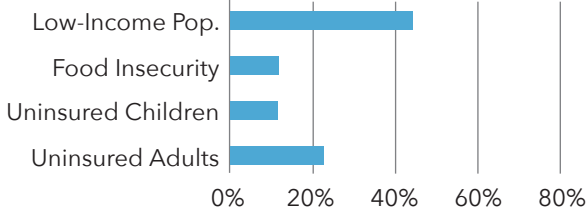


Behaviors



Anderson County Population 57,772

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.9
Oral Cancer Mortality Rate per 100,000 pop.	3.5

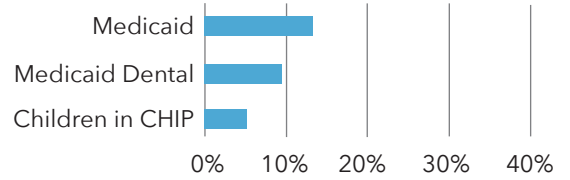
Clinical Care

Pop. to Provider Ratio

General Dentist	5094:1
Pediatric Dentist	-
Specialized Dentist	15282:1
Dental Hygienist	2911:1
Dental Assistant	1153:1
Primary Care Physician	1910:1
Nurse Practitioner	2658:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

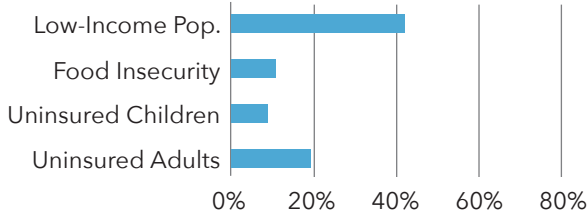


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,925
Medicaid Dental	\$416
CHIP Non- Dental	\$1,306
CHIP Dental	\$285

Bowie County Population 93,483

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11.6
Oral Cancer Mortality Rate per 100,000 pop.	1.1

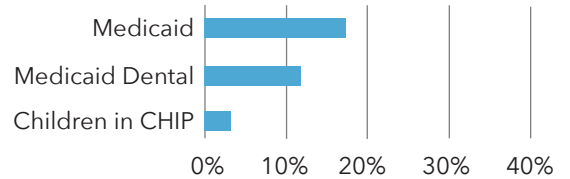
Clinical Care

Pop. to Provider Ratio

General Dentist	2948:1
Pediatric Dentist	10968:1
Specialized Dentist	7860:1
Dental Hygienist	1814:1
Dental Assistant	953:1
Primary Care Physician	1014:1
Nurse Practitioner	1014:1
FQHCs per 100,000 pop.	3.2

Medicaid & CHIP

Enrollment (% of total population)

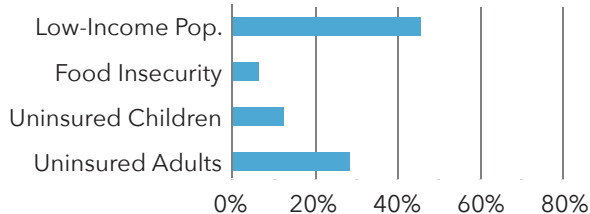


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,766
Medicaid Dental	\$418
CHIP Non- Dental	\$1,312
CHIP Dental	\$284

Camp County Population 12,631

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11
Oral Cancer Mortality Rate per 100,000 pop.	4.4

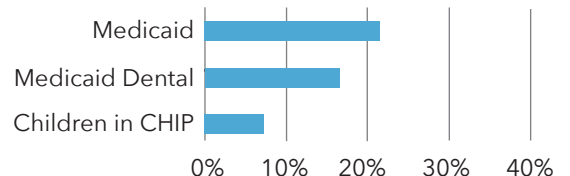
Clinical Care

Pop. to Provider Ratio

General Dentist	3452:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6905:1
Dental Assistant	986:1
Primary Care Physician	1381:1
Nurse Practitioner	3452:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

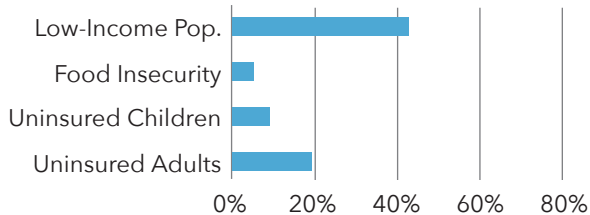


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,180
Medicaid Dental	\$426
CHIP Non- Dental	\$1,309
CHIP Dental	\$285

Cass County Population 30,346

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	13.6
Oral Cancer Mortality Rate per 100,000 pop.	2.1

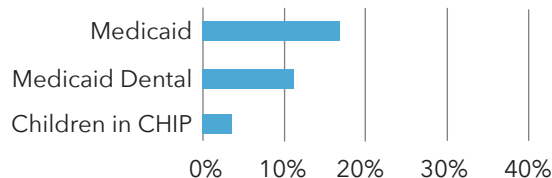
Clinical Care

Pop. to Provider Ratio

General Dentist	4518:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4518:1
Dental Assistant	1375:1
Primary Care Physician	3162:1
Nurse Practitioner	2875:1
FQHCs per 100,000 pop.	3.3

Medicaid & CHIP

Enrollment (% of total population)

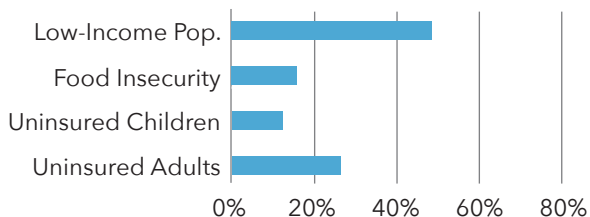


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,513
Medicaid Dental	\$420
CHIP Non- Dental	\$1,315
CHIP Dental	\$284

Cherokee County Population 51,257

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	16.8
Oral Cancer Mortality Rate per 100,000 pop.	4.5

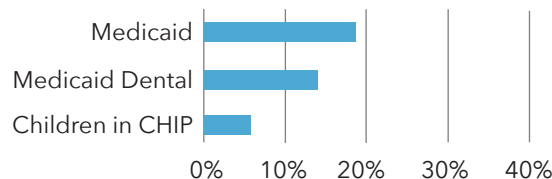
Clinical Care

Pop. to Provider Ratio

General Dentist	6936:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2522:1
Dental Assistant	1181:1
Primary Care Physician	1790:1
Nurse Practitioner	3264:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

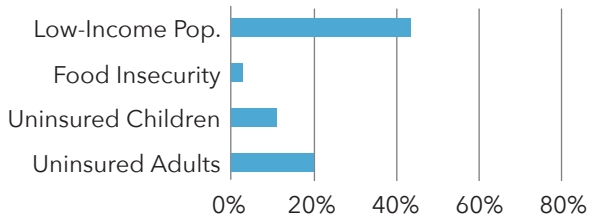


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,445
Medicaid Dental	\$417
CHIP Non- Dental	\$1,307
CHIP Dental	\$287

Delta County Population 5,226

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.6
Oral Cancer Mortality Rate per 100,000 pop.	6.7

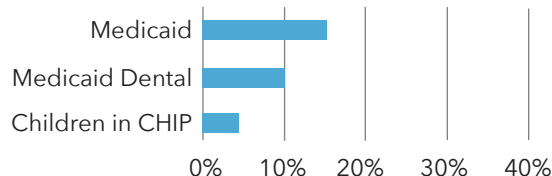
Clinical Care

Pop. to Provider Ratio

General Dentist	5623:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3089:1
Dental Assistant	803:1
Primary Care Physician	5623:1
Nurse Practitioner	5623:1
FQHCs per 100,000 pop.	19.1

Medicaid & CHIP

Enrollment (% of total population)

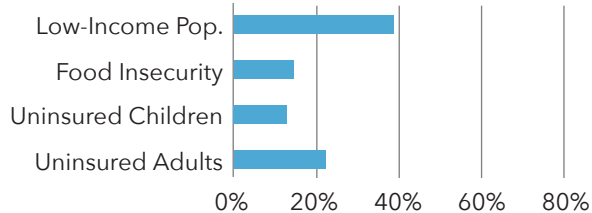


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,525
Medicaid Dental	\$422
CHIP Non- Dental	\$1,296
CHIP Dental	\$288

Fannin County Population 33,757

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	17.8
Oral Cancer Mortality Rate per 100,000 pop.	1.5

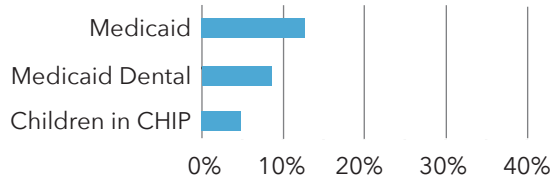
Clinical Care

Pop. to Provider Ratio

General Dentist	6095:1
Pediatric Dentist	-
Specialized Dentist	36571:1
Dental Hygienist	4571:1
Dental Assistant	581:1
Primary Care Physician	3325:1
Nurse Practitioner	4063:1
FQHCs per 100,000 pop.	3

Medicaid & CHIP

Enrollment (% of total population)

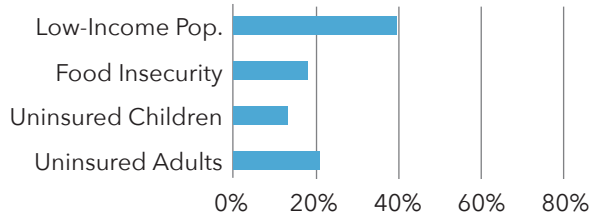


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,150
Medicaid Dental	\$420
CHIP Non- Dental	\$1,304
CHIP Dental	\$284

Franklin County Population 10,571

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	15.4
Oral Cancer Mortality Rate per 100,000 pop.	1.4

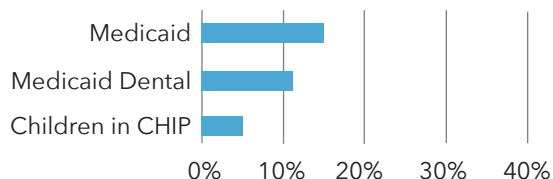
Clinical Care

Pop. to Provider Ratio

General Dentist	5735:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5735:1
Dental Assistant	1639:1
Primary Care Physician	3823:1
Nurse Practitioner	11470:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

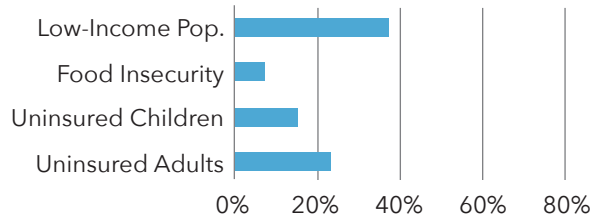


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,225
Medicaid Dental	\$422
CHIP Non- Dental	\$1,308
CHIP Dental	\$284

Freestone County Population 19,585

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	16.2
Oral Cancer Mortality Rate per 100,000 pop.	2.9

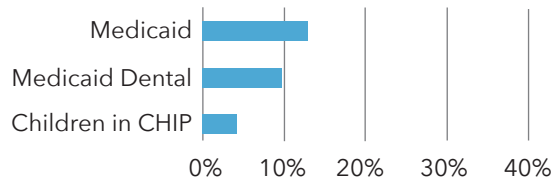
Clinical Care

Pop. to Provider Ratio

General Dentist	7119:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4271:1
Dental Assistant	1424:1
Primary Care Physician	3051:1
Nurse Practitioner	4271:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

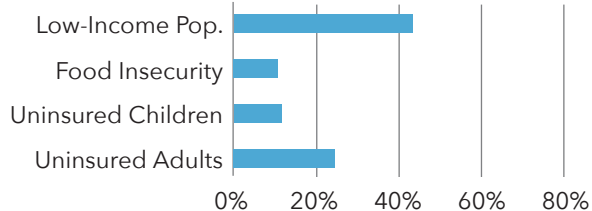


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,439
Medicaid Dental	\$422
CHIP Non- Dental	\$1,304
CHIP Dental	\$284

Gregg County Population 123,283

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.9
Oral Cancer Mortality Rate per 100,000 pop.	2.1

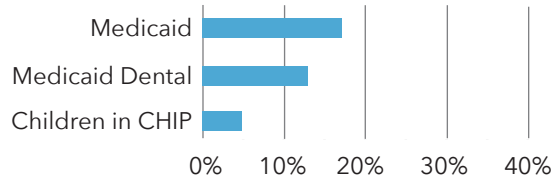
Clinical Care

Pop. to Provider Ratio

General Dentist	2234:1
Pediatric Dentist	5241:1
Specialized Dentist	8788:1
Dental Hygienist	1156:1
Dental Assistant	656:1
Primary Care Physician	862:1
Nurse Practitioner	1244:1
FQHCs per 100,000 pop.	7.3

Medicaid & CHIP

Enrollment (% of total population)

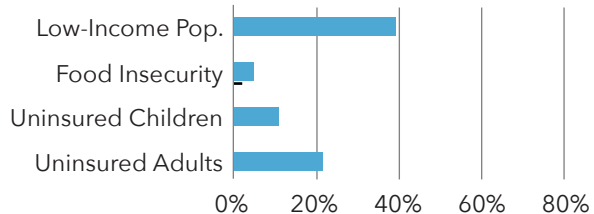


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,658
Medicaid Dental	\$418
CHIP Non- Dental	\$1,305
CHIP Dental	\$284

Harrison County Population 66,431

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	5.1

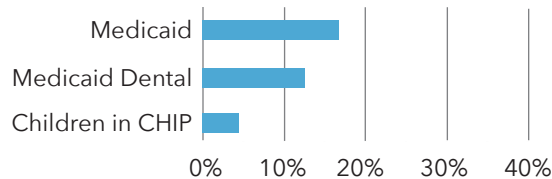
Clinical Care

Pop. to Provider Ratio

General Dentist	5848:1
Pediatric Dentist	16481:1
Specialized Dentist	-
Dental Hygienist	4128:1
Dental Assistant	763:1
Primary Care Physician	2924:1
Nurse Practitioner	4128:1
FQHCs per 100,000 pop.	3

Medicaid & CHIP

Enrollment (% of total population)

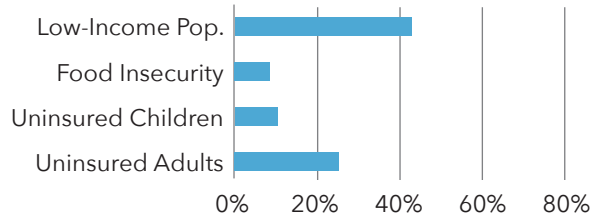


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,607
Medicaid Dental	\$422
CHIP Non- Dental	\$1,305
CHIP Dental	\$284

Henderson County Population 79,213

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	30.2
Oral Cancer Incidence Rate per 100,000 pop.	14.2
Oral Cancer Mortality Rate per 100,000 pop.	2.7

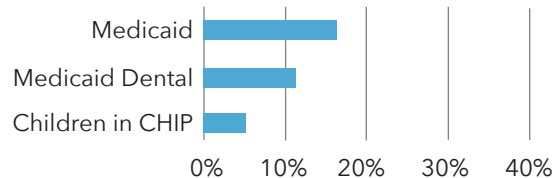
Clinical Care

Pop. to Provider Ratio

General Dentist	4854:1
Pediatric Dentist	17144:1
Specialized Dentist	41261:1
Dental Hygienist	2662:1
Dental Assistant	860:1
Primary Care Physician	1834:1
Nurse Practitioner	2427:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

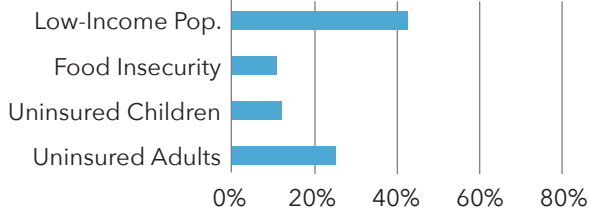


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,906
Medicaid Dental	\$420
CHIP Non- Dental	\$1,314
CHIP Dental	\$284

Hopkins County Population 35,844

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.5
Oral Cancer Mortality Rate per 100,000 pop.	4

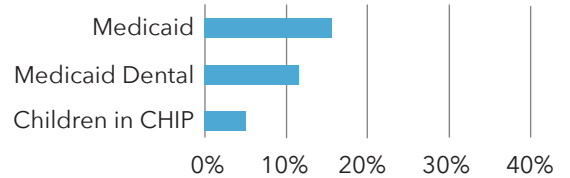
Clinical Care

Pop. to Provider Ratio

General Dentist	4163:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2081:1
Dental Assistant	815:1
Primary Care Physician	2342:1
Nurse Practitioner	2676:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

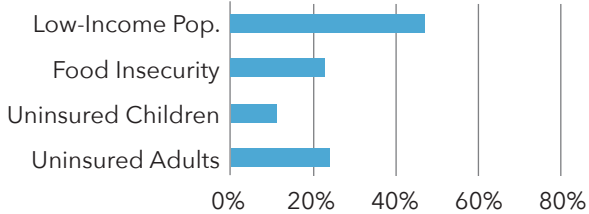


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,524
Medicaid Dental	\$421
CHIP Non- Dental	\$1,303
CHIP Dental	\$284

Houston County Population 22,802

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.5
Oral Cancer Mortality Rate per 100,000 pop.	4.3

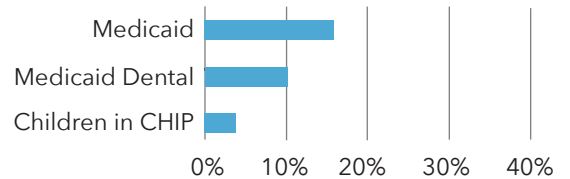
Clinical Care

Pop. to Provider Ratio

General Dentist	4954:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4128:1
Dental Assistant	1239:1
Primary Care Physician	3539:1
Nurse Practitioner	4954:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

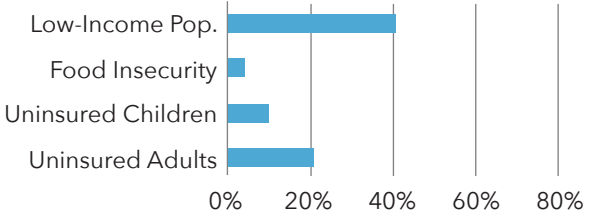


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,720
Medicaid Dental	\$422
CHIP Non- Dental	\$1,309
CHIP Dental	\$286

Hunt County Population 89,068

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	24.4
Oral Cancer Incidence Rate per 100,000 pop.	12.8
Oral Cancer Mortality Rate per 100,000 pop.	2.8

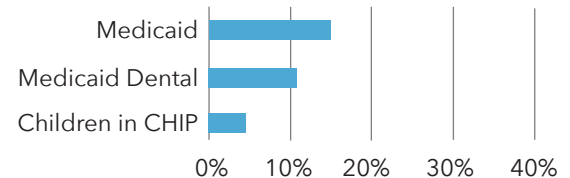
Clinical Care

Pop. to Provider Ratio

General Dentist	3331:1
Pediatric Dentist	20978:1
Specialized Dentist	96586:1
Dental Hygienist	2356:1
Dental Assistant	485:1
Primary Care Physician	1932:1
Nurse Practitioner	2683:1
FQHCs per 100,000 pop.	3.4

Medicaid & CHIP

Enrollment (% of total population)

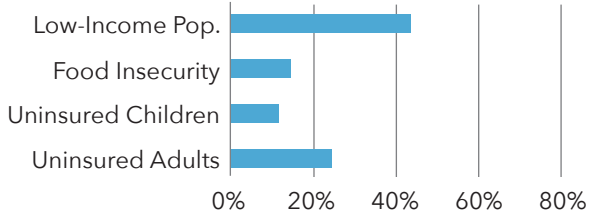


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,565
Medicaid Dental	\$421
CHIP Non- Dental	\$1,585
CHIP Dental	\$287

Lamar County Population 49,626

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.1
Oral Cancer Mortality Rate per 100,000 pop.	1

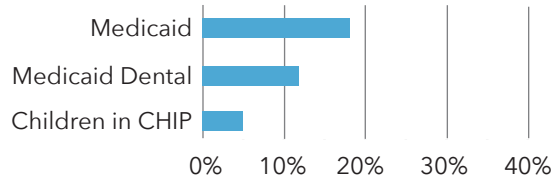
Clinical Care

Pop. to Provider Ratio

General Dentist	3477:1
Pediatric Dentist	-
Specialized Dentist	17387:1
Dental Hygienist	2484:1
Dental Assistant	1338:1
Primary Care Physician	1186:1
Nurse Practitioner	1581:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

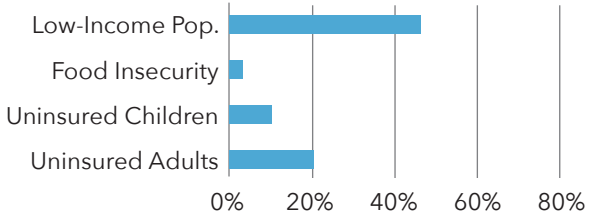


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,431
Medicaid Dental	\$417
CHIP Non- Dental	\$1,311
CHIP Dental	\$281

Marion County Population 10,191

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11
Oral Cancer Mortality Rate per 100,000 pop.	3.8

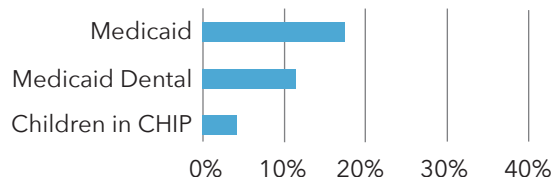
Clinical Care

Pop. to Provider Ratio

General Dentist	11220:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2805:1
Dental Assistant	1020:1
Primary Care Physician	11220:1
Nurse Practitioner	2244:1
FQHCs per 100,000 pop.	9.8

Medicaid & CHIP

Enrollment (% of total population)

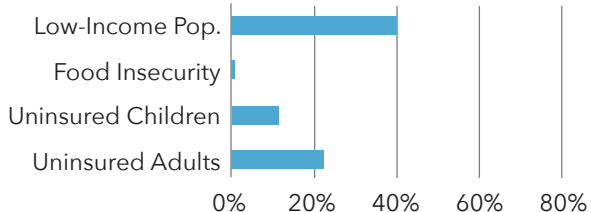


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,998
Medicaid Dental	\$423
CHIP Non- Dental	\$1,310
CHIP Dental	\$284

Morris County Population 12,653

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6.2
Oral Cancer Mortality Rate per 100,000 pop.	1

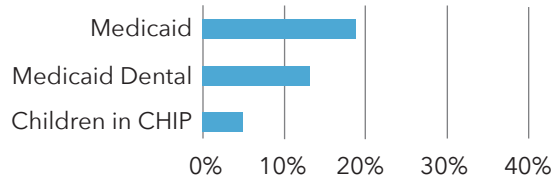
Clinical Care

Pop. to Provider Ratio

General Dentist	2725:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2271:1
Dental Assistant	1946:1
Primary Care Physician	4542:1
Nurse Practitioner	13625:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

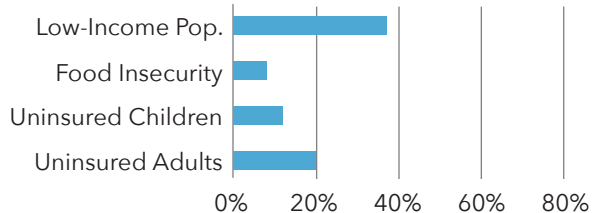


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,255
Medicaid Dental	\$420
CHIP Non- Dental	\$1,308
CHIP Dental	\$283

Panola County Population 23,771

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	8.2
Oral Cancer Mortality Rate per 100,000 pop.	1

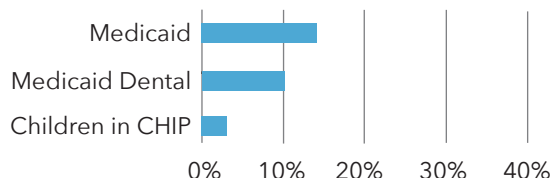
Clinical Care

Pop. to Provider Ratio

General Dentist	6331:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2302:1
Dental Assistant	1333:1
Primary Care Physician	3618:1
Nurse Practitioner	8442:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

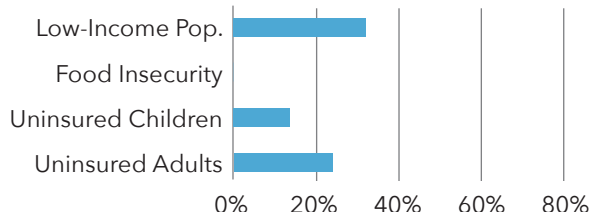


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,817
Medicaid Dental	\$420
CHIP Non- Dental	\$1,309
CHIP Dental	\$289

Rains County Population 11,087

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12.9
Oral Cancer Mortality Rate per 100,000 pop.	5.6

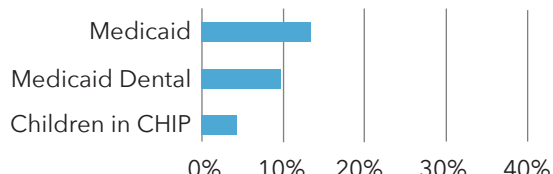
Clinical Care

Pop. to Provider Ratio

General Dentist	6231:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6231:1
Dental Assistant	890:1
Primary Care Physician	12461:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

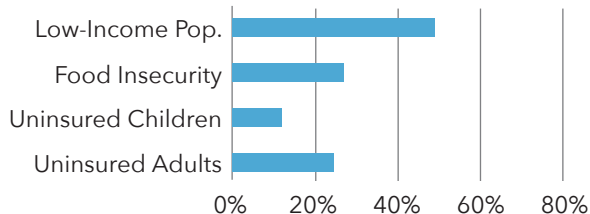


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,554
Medicaid Dental	\$428
CHIP Non- Dental	\$1,303
CHIP Dental	\$292

Red River County Population 12,455

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	8.9
Oral Cancer Mortality Rate per 100,000 pop.	4.6

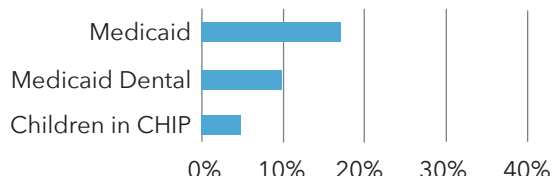
Clinical Care

Pop. to Provider Ratio

General Dentist	6673:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	13345:1
Dental Assistant	1906:1
Primary Care Physician	6673:1
Nurse Practitioner	2669:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

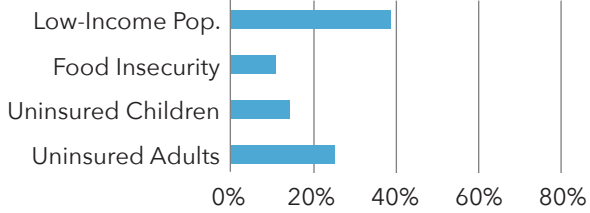


Annual Expenses per Enrollee

Medicaid Non- Dental	\$7,060
Medicaid Dental	\$423
CHIP Non- Dental	\$1,301
CHIP Dental	\$288

Rusk County Population 53,197

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.9
Oral Cancer Mortality Rate per 100,000 pop.	3.5

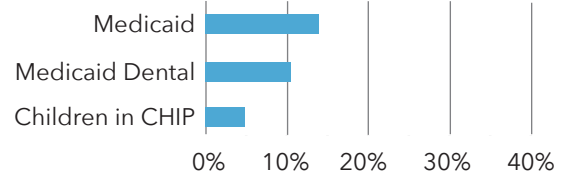
Clinical Care

Pop. to Provider Ratio

General Dentist	7521:1
Pediatric Dentist	-
Specialized Dentist	60164:1
Dental Hygienist	4297:1
Dental Assistant	970:1
Primary Care Physician	3167:1
Nurse Practitioner	3760:1
FQHCs per 100,000 pop.	3.8

Medicaid & CHIP

Enrollment (% of total population)

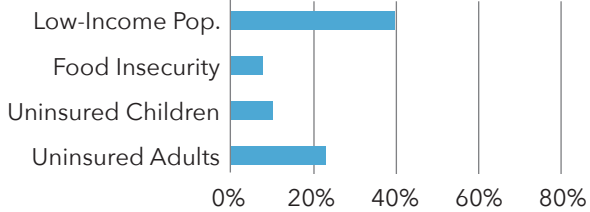


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,609
Medicaid Dental	\$421
CHIP Non- Dental	\$1,307
CHIP Dental	\$284

Smith County Population 219,745

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	17.3
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	2.5

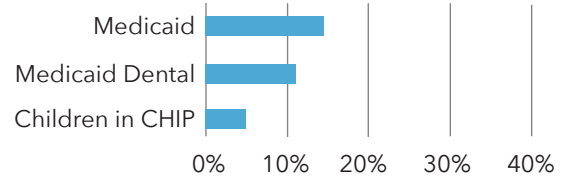
Clinical Care

Pop. to Provider Ratio

General Dentist	2642:1
Pediatric Dentist	5407:1
Specialized Dentist	10567:1
Dental Hygienist	1368:1
Dental Assistant	694:1
Primary Care Physician	842:1
Nurse Practitioner	1151:1
FQHCs per 100,000 pop.	2.3

Medicaid & CHIP

Enrollment (% of total population)

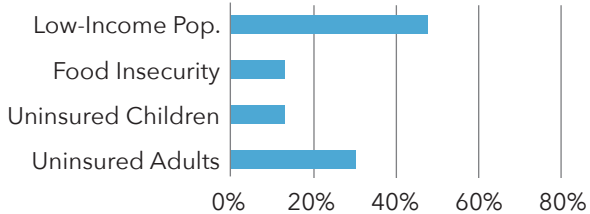


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,468
Medicaid Dental	\$418
CHIP Non- Dental	\$1,309
CHIP Dental	\$284

Titus County Population 32,592

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.4
Oral Cancer Mortality Rate per 100,000 pop.	3.2

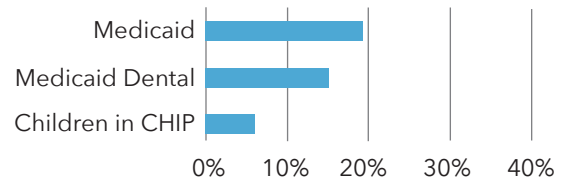
Clinical Care

Pop. to Provider Ratio

General Dentist	5147:1
Pediatric Dentist	4641:1
Specialized Dentist	36032:1
Dental Hygienist	1386:1
Dental Assistant	1060:1
Primary Care Physician	1243:1
Nurse Practitioner	2402:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

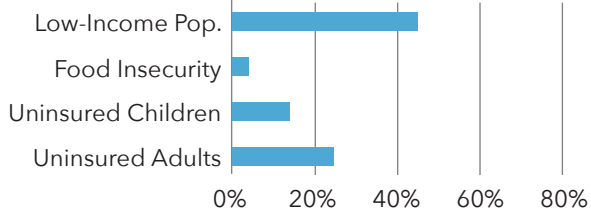


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,701
Medicaid Dental	\$419
CHIP Non- Dental	\$1,298
CHIP Dental	\$286

Trinity County Population 14,360

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	18
Oral Cancer Mortality Rate per 100,000 pop.	2.3

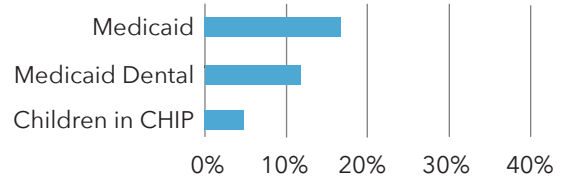
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	16035:1
Dental Assistant	3207:1
Primary Care Physician	8018:1
Nurse Practitioner	16035:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

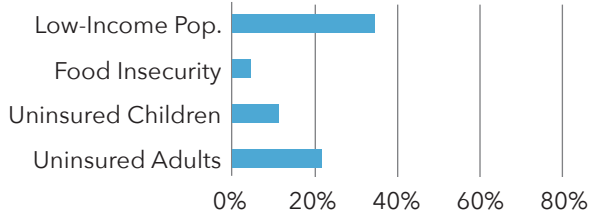


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,508
Medicaid Dental	\$423
CHIP Non- Dental	\$1,316
CHIP Dental	\$286

Upshur County Population 40,295

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.2
Oral Cancer Mortality Rate per 100,000 pop.	3.2

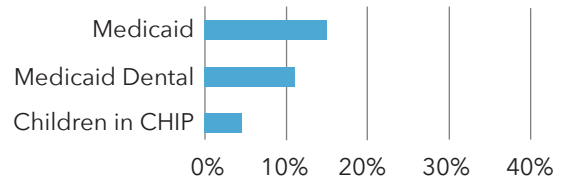
Clinical Care

Pop. to Provider Ratio

General Dentist	8674:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4337:1
Dental Assistant	923:1
Primary Care Physician	5421:1
Nurse Practitioner	14456:1
FQHCs per 100,000 pop.	2.5

Medicaid & CHIP

Enrollment (% of total population)

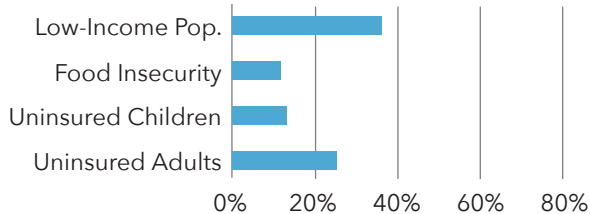


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,884
Medicaid Dental	\$423
CHIP Non- Dental	\$1,308
CHIP Dental	\$286

Van Zandt County Population 53,070

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	15.6
Oral Cancer Mortality Rate per 100,000 pop.	4

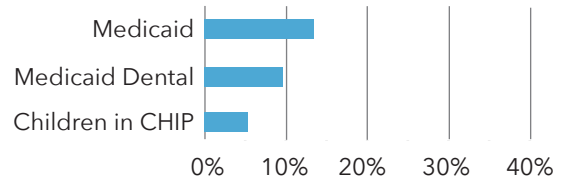
Clinical Care

Pop. to Provider Ratio

General Dentist	4348:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2261:1
Dental Assistant	716:1
Primary Care Physician	4711:1
Nurse Practitioner	9421:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

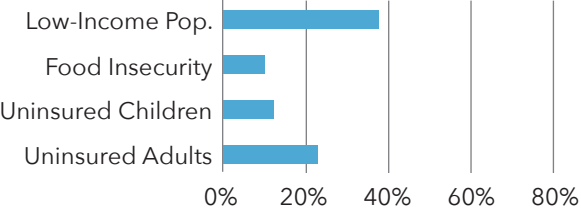


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,770
Medicaid Dental	\$420
CHIP Non- Dental	\$1,312
CHIP Dental	\$285

Wood County Population 43,198

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12.5
Oral Cancer Mortality Rate per 100,000 pop.	3

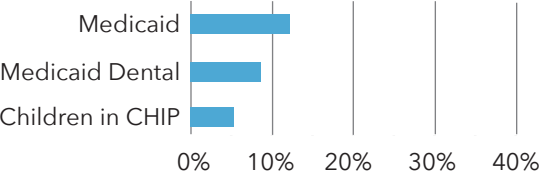
Clinical Care

Pop. to Provider Ratio

General Dentist	5831:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3110:1
Dental Assistant	1085:1
Primary Care Physician	1944:1
Nurse Practitioner	2916:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

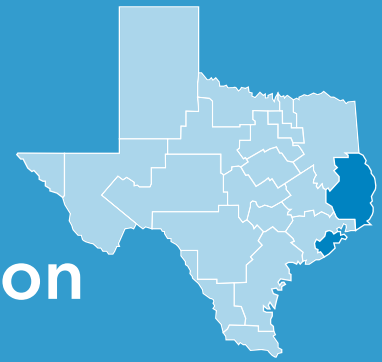
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,939
Medicaid Dental	\$420
CHIP Non- Dental	\$1,304
CHIP Dental	\$286

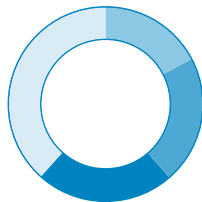
Southeast - Beaumont/Galveston



16 counties: Angelina, Brazoria, Galveston, Hardin, Jasper, Jefferson, Liberty, Nacogdoches, Newton, Orange, Polk, Sabine, San Augustine, San Jacinto, Shelby, Tyler

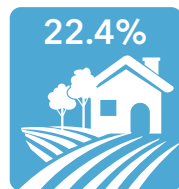
Population 1,466,615

County Populations

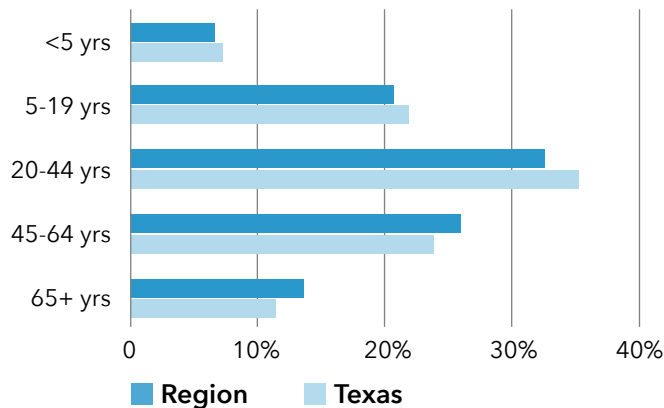


■ Brazoria ■ Galveston
■ Jefferson ■ Others

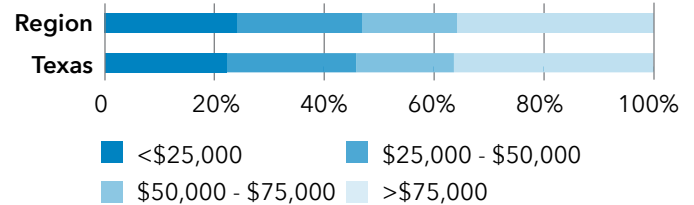
Rural Population



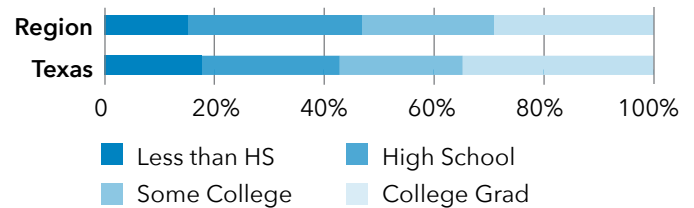
Age



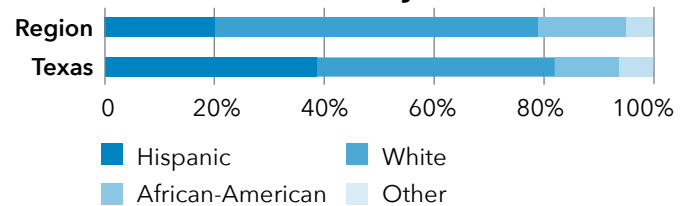
Income



Education



Race and Ethnicity

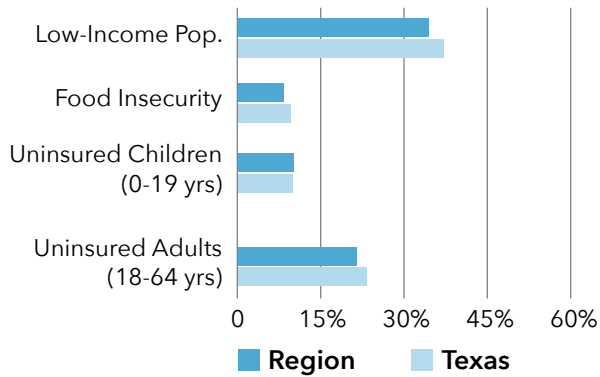


Key Points

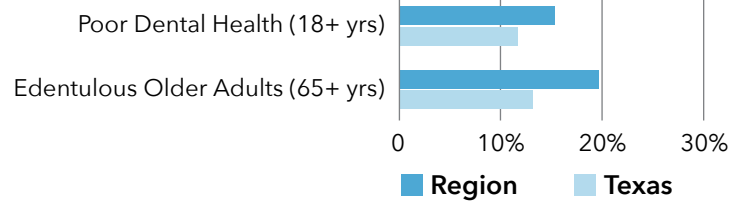
- This region's dental outcomes are poor compared to the rest of the state, with the highest estimated rate of edentulous older adults in the state (19.6%) and highest mortality rate from oral cancer (9.2 deaths per 100,000 population).
- Measures of provider supply and clinical care use are on par with the rest of the state. Access to pediatric and specialized dentists appears limited in the less populous counties (Newton, San Jacinto, and Tyler).
- The region performs in line with state averages for the proportion of low-income residents and uninsured rates, though some of the small counties have much larger shares of low-income and uninsured residents.
- Estimated rates of adult obesity (36.7%), smoking (17.8%), and cardiovascular disease (11.2%) are among the highest in the state.

Southeast - Beaumont/Galveston

Socioeconomic Factors



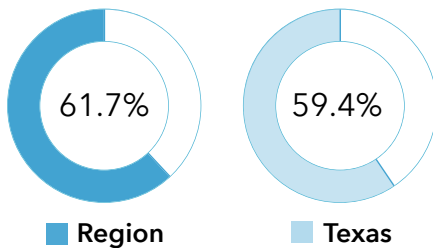
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	13.4	15.8
Oral Cancer Incidence rate per 100,000 Pop.	12.1	10.8
Oral Cancer Mortality rate per 100,00 Pop.	9.2	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

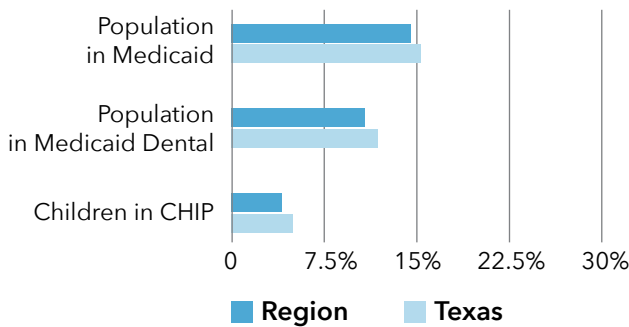


Population to Provider Ratio

	Region	Texas
General Dentist	3356: 1	2970: 1
Pediatric Dentist	14341: 1	9411: 1
Specialized Dentist	22951: 1	14291: 1
Dental Hygienist	2165: 1	2220: 1
Dental Assistant	922: 1	805: 1
Primary Care Physician	1802: 1	1362: 1
Nurse Practitioner	2011: 1	1961: 1
FQHCs per 100,000 pop.	1.6	1.5

Medicaid and CHIP

Enrollment (% of total population)

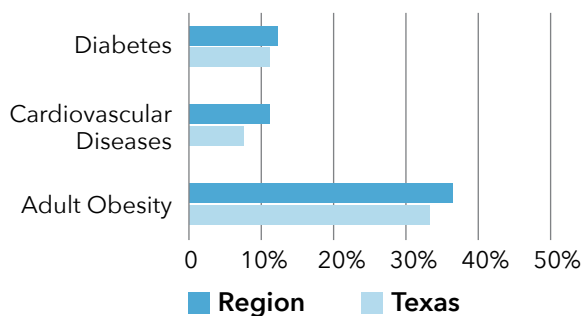


Annual Expenses Per Enrollee

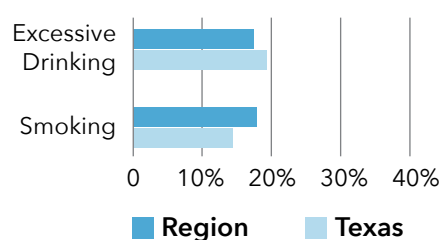
	Region	Texas
Medicaid Non-Dental	\$5,694	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,553	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

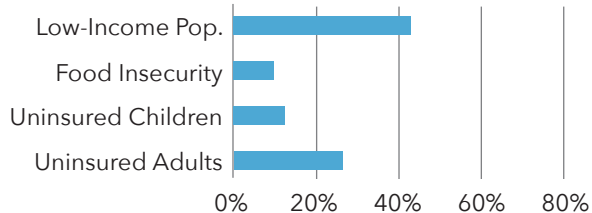


Behaviors



Angelina County Population 87,657

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.1
Oral Cancer Mortality Rate per 100,000 pop.	3.5

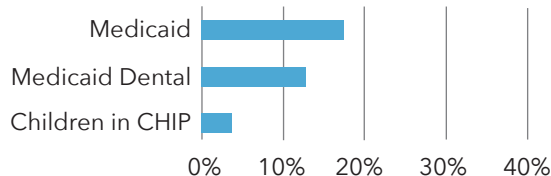
Clinical Care

Pop. to Provider Ratio

General Dentist	3835:1
Pediatric Dentist	11284:1
Specialized Dentist	30678:1
Dental Hygienist	2789:1
Dental Assistant	1011:1
Primary Care Physician	1136:1
Nurse Practitioner	1805:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

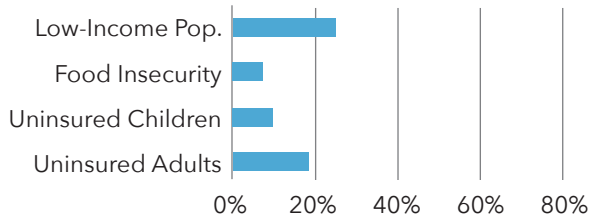


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,825
Medicaid Dental	\$419
CHIP Non- Dental	\$1,307
CHIP Dental	\$284

Brazoria County Population 338,419

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	6.4
Oral Cancer Incidence Rate per 100,000 pop.	10.7
Oral Cancer Mortality Rate per 100,000 pop.	2.9

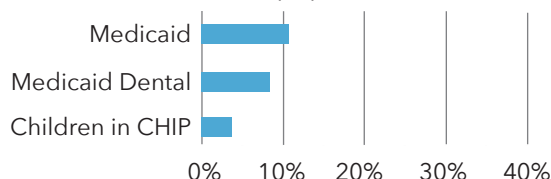
Clinical Care

Pop. to Provider Ratio

General Dentist	2848:1
Pediatric Dentist	6422:1
Specialized Dentist	15151:1
Dental Hygienist	2070:1
Dental Assistant	749:1
Primary Care Physician	1830:1
Nurse Practitioner	3323:1
FQHCs per 100,000 pop.	0.9

Medicaid & CHIP

Enrollment (% of total population)

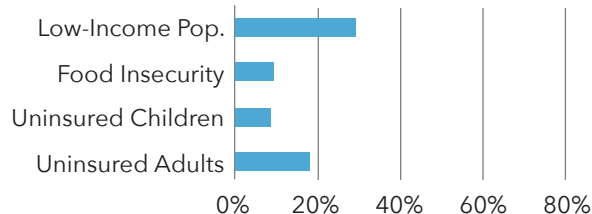


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,024
Medicaid Dental	\$418
CHIP Non- Dental	\$1,585
CHIP Dental	\$286

Galveston County Population 314,485

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	9.2
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	3.4

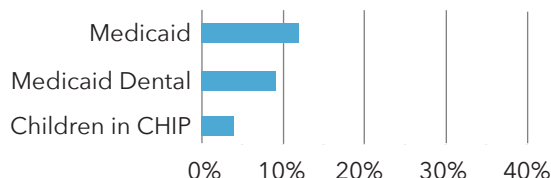
Clinical Care

Pop. to Provider Ratio

General Dentist	3063:1
Pediatric Dentist	15274:1
Specialized Dentist	24741:1
Dental Hygienist	2023:1
Dental Assistant	821:1
Primary Care Physician	1569:1
Nurse Practitioner	1496:1
FQHCs per 100,000 pop.	0.6

Medicaid & CHIP

Enrollment (% of total population)

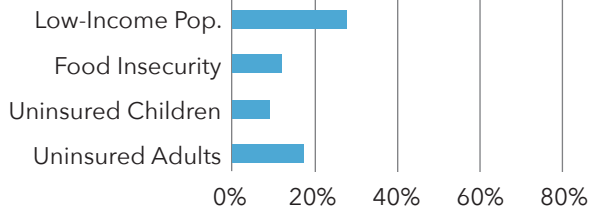


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,372
Medicaid Dental	\$419
CHIP Non- Dental	\$1,591
CHIP Dental	\$285

Hardin County Population 55,624

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.7
Oral Cancer Mortality Rate per 100,000 pop.	5.4

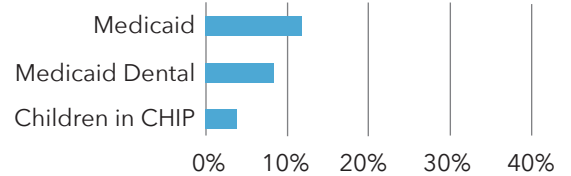
Clinical Care

Pop. to Provider Ratio

General Dentist	5451:1
Pediatric Dentist	13709:1
Specialized Dentist	-
Dental Hygienist	2726:1
Dental Assistant	1249:1
Primary Care Physician	4283:1
Nurse Practitioner	2306:1
FQHCs per 100,000 pop.	1.8

Medicaid & CHIP

Enrollment (% of total population)

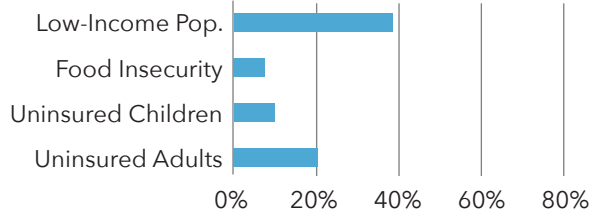


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,107
Medicaid Dental	\$416
CHIP Non- Dental	\$1,587
CHIP Dental	\$285

Jasper County Population 35,640

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.7
Oral Cancer Mortality Rate per 100,000 pop.	2.7

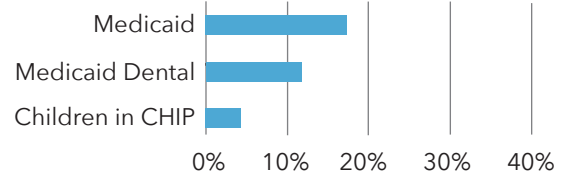
Clinical Care

Pop. to Provider Ratio

General Dentist	3680:1
Pediatric Dentist	-
Specialized Dentist	36798:1
Dental Hygienist	2300:1
Dental Assistant	995:1
Primary Care Physician	2165:1
Nurse Practitioner	2300:1
FQHCs per 100,000 pop.	5.6

Medicaid & CHIP

Enrollment (% of total population)

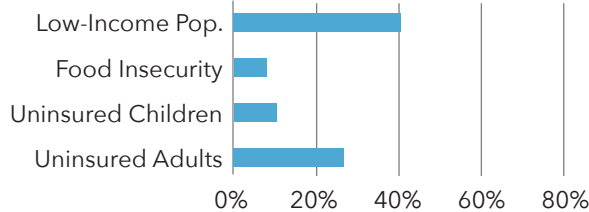


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,316
Medicaid Dental	\$420
CHIP Non- Dental	\$1,581
CHIP Dental	\$288

Jefferson County Population 252,993

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	4.7
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	4

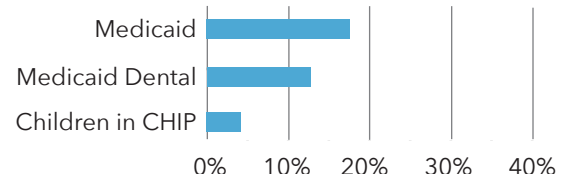
Clinical Care

Pop. to Provider Ratio

General Dentist	2887:1
Pediatric Dentist	29579:1
Specialized Dentist	13134:1
Dental Hygienist	1510:1
Dental Assistant	1340:1
Primary Care Physician	1435:1
Nurse Practitioner	1113:1
FQHCs per 100,000 pop.	2

Medicaid & CHIP

Enrollment (% of total population)

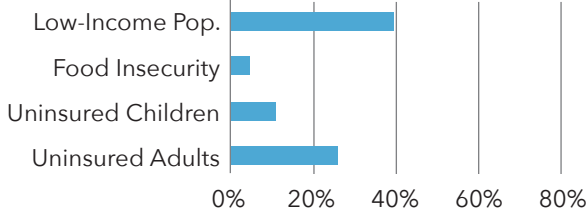


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,012
Medicaid Dental	\$416
CHIP Non- Dental	\$1,590
CHIP Dental	\$285

Liberty County Population 78,598

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.3
Oral Cancer Mortality Rate per 100,000 pop.	4.8

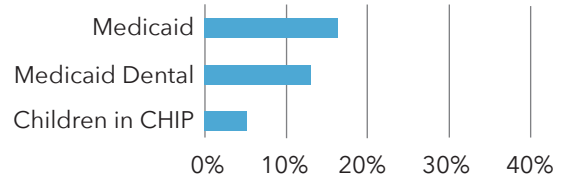
Clinical Care

Pop. to Provider Ratio

General Dentist	4097:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3911:1
Dental Assistant	735:1
Primary Care Physician	3073:1
Nurse Practitioner	3911:1
FQHCs per 100,000 pop.	2.5

Medicaid & CHIP

Enrollment (% of total population)

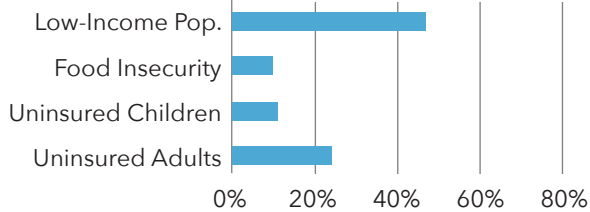


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,376
Medicaid Dental	\$419
CHIP Non- Dental	\$1,592
CHIP Dental	\$285

Nacogdoches County Population 65,556

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.7
Oral Cancer Mortality Rate per 100,000 pop.	2.5

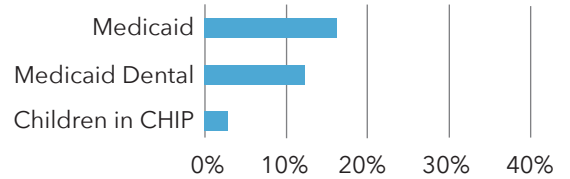
Clinical Care

Pop. to Provider Ratio

General Dentist	4147:1
Pediatric Dentist	15355:1
Specialized Dentist	17623:1
Dental Hygienist	2937:1
Dental Assistant	1356:1
Primary Care Physician	1175:1
Nurse Practitioner	2073:1
FQHCs per 100,000 pop.	4.6

Medicaid & CHIP

Enrollment (% of total population)

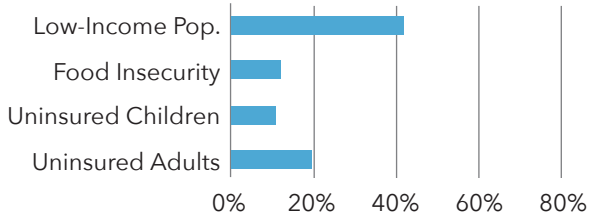


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,551
Medicaid Dental	\$421
CHIP Non- Dental	\$1,310
CHIP Dental	\$284

Newton County Population 14,138

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.3
Oral Cancer Mortality Rate per 100,000 pop.	3.3

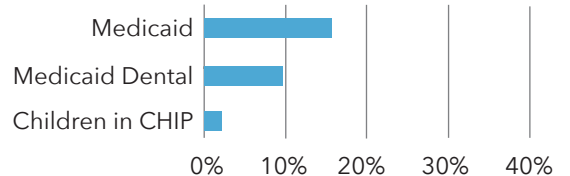
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	7194:1
Dental Assistant	1799:1
Primary Care Physician	3597:1
Nurse Practitioner	7194:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

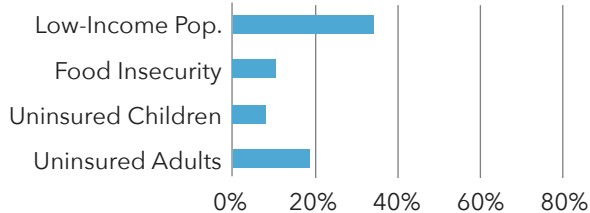


Annual Expenses per Enrollee

Medicaid Non- Dental	\$7,071
Medicaid Dental	\$422
CHIP Non- Dental	\$1,607
CHIP Dental	\$283

Orange County Population 83,751

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.6
Oral Cancer Mortality Rate per 100,000 pop.	3.7

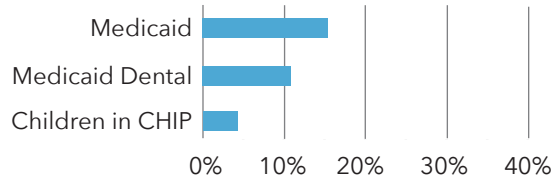
Clinical Care

Pop. to Provider Ratio

General Dentist	3750:1
Pediatric Dentist	-
Specialized Dentist	86261:1
Dental Hygienist	1540:1
Dental Assistant	814:1
Primary Care Physician	3594:1
Nurse Practitioner	3921:1
FQHCs per 100,000 pop.	1.2

Medicaid & CHIP

Enrollment (% of total population)

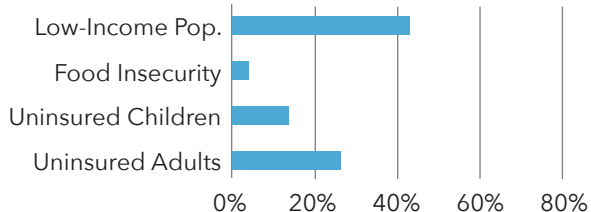


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,046
Medicaid Dental	\$415
CHIP Non- Dental	\$1,589
CHIP Dental	\$284

Polk County Population 46,583

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	16.4
Oral Cancer Mortality Rate per 100,000 pop.	4.9

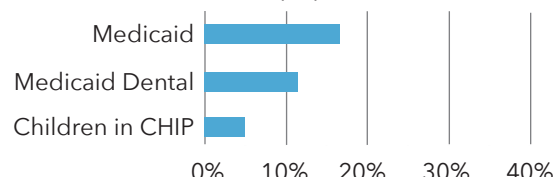
Clinical Care

Pop. to Provider Ratio

General Dentist	3330:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4541:1
Dental Assistant	1020:1
Primary Care Physician	1921:1
Nurse Practitioner	3568:1
FQHCs per 100,000 pop.	2.1

Medicaid & CHIP

Enrollment (% of total population)

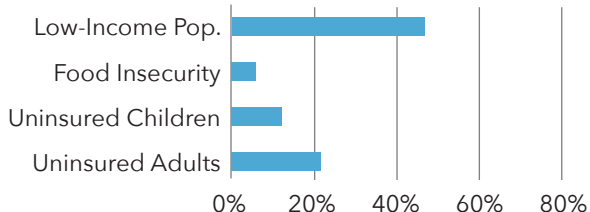


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,477
Medicaid Dental	\$418
CHIP Non- Dental	\$1,577
CHIP Dental	\$287

Sabine County Population 10,367

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12
Oral Cancer Mortality Rate per 100,000 pop.	1

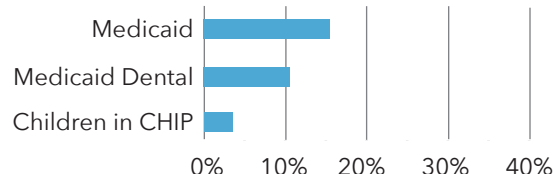
Clinical Care

Pop. to Provider Ratio

General Dentist	5882:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3921:1
Dental Assistant	2941:1
Primary Care Physician	2941:1
Nurse Practitioner	11763:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

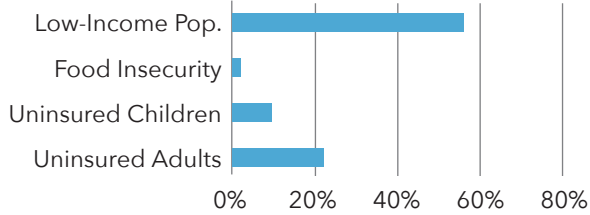


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,257
Medicaid Dental	\$423
CHIP Non- Dental	\$1,329
CHIP Dental	\$288

San Augustine County Population 8,556

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	7.2
Oral Cancer Mortality Rate per 100,000 pop.	0

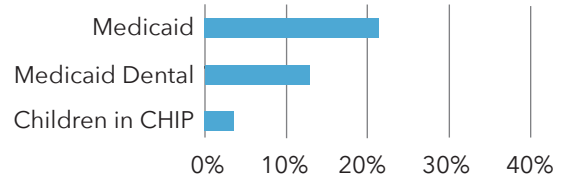
Clinical Care

Pop. to Provider Ratio

General Dentist	2310:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2310:1
Dental Assistant	1155:1
Primary Care Physician	4619:1
Nurse Practitioner	1320:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

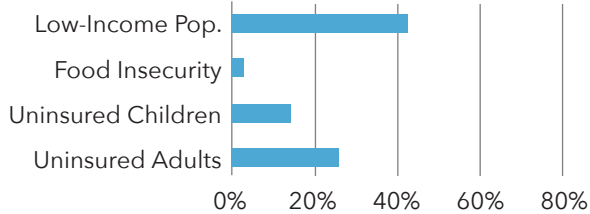


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,871
Medicaid Dental	\$426
CHIP Non- Dental	\$1,325
CHIP Dental	\$287

San Jacinto County Population 27,172

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14
Oral Cancer Mortality Rate per 100,000 pop.	6.1

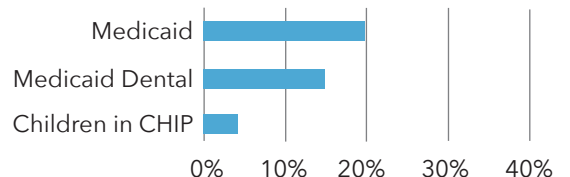
Clinical Care

Pop. to Provider Ratio

General Dentist	30578:1
Pediatric Dentist	-
Specialized Dentist	30578:1
Dental Hygienist	10193:1
Dental Assistant	746:1
Primary Care Physician	7645:1
Nurse Practitioner	10193:1
FQHCs per 100,000 pop.	3.7

Medicaid & CHIP

Enrollment (% of total population)

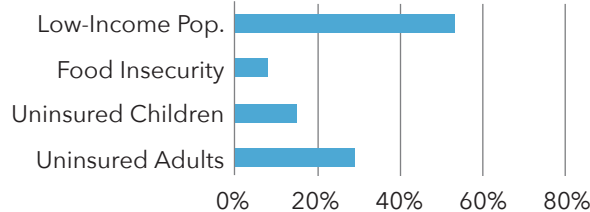


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,018
Medicaid Dental	\$423
CHIP Non- Dental	\$1,600
CHIP Dental	\$281

Shelby County Population 25,705

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	63.5
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	2.7

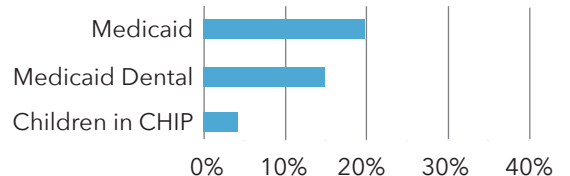
Clinical Care

Pop. to Provider Ratio

General Dentist	4616:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3956:1
Dental Assistant	1108:1
Primary Care Physician	9231:1
Nurse Practitioner	3462:1
FQHCs per 100,000 pop.	7.8

Medicaid & CHIP

Enrollment (% of total population)

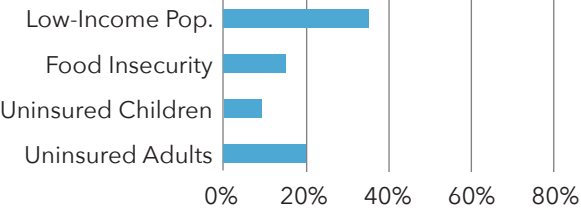


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,616
Medicaid Dental	\$422
CHIP Non- Dental	\$1,316
CHIP Dental	\$287

Tyler County Population 21,371

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	5.6

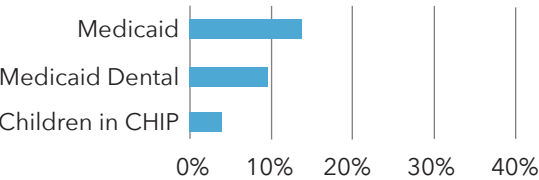
Clinical Care

Pop. to Provider Ratio

General Dentist	11201:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	11201:1
Dental Assistant	1867:1
Primary Care Physician	5600:1
Nurse Practitioner	4480:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

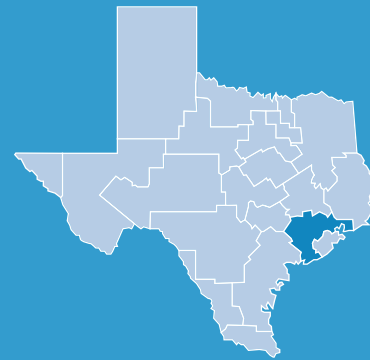
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,408
Medicaid Dental	\$420
CHIP Non- Dental	\$1,605
CHIP Dental	\$282

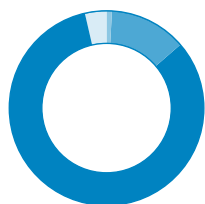
Southeast - Houston



9 counties: Austin, Calhoun, Chambers, Colorado, Fort Bend, Harris, Matagorda, Waller, Wharton

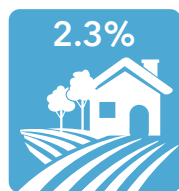
Population 5,352,934

County Populations

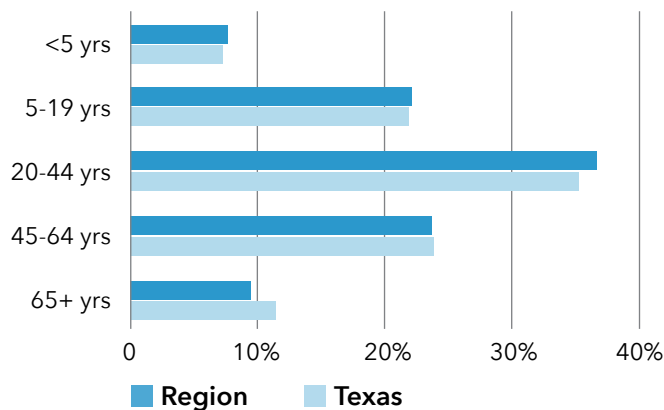


■ Harris ■ Ft. Bend
■ Waller ■ Others

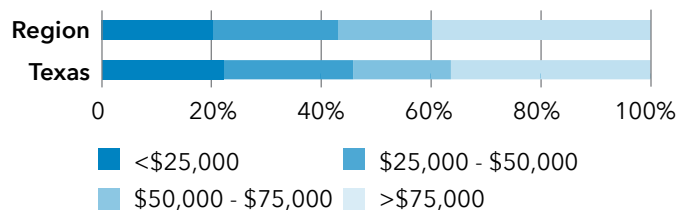
Rural Population



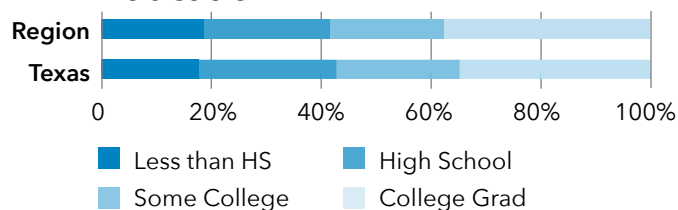
Age



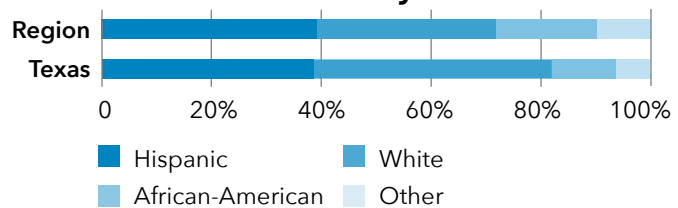
Income



Education



Race and Ethnicity

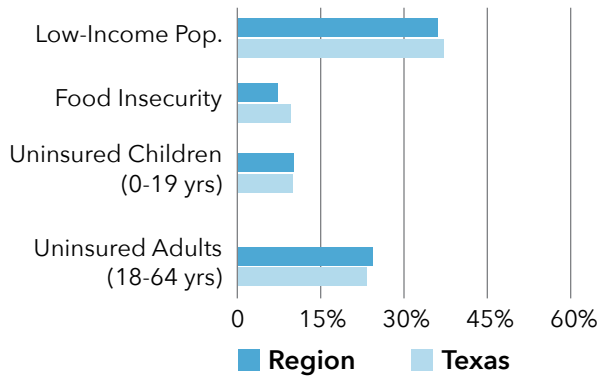


Key Points

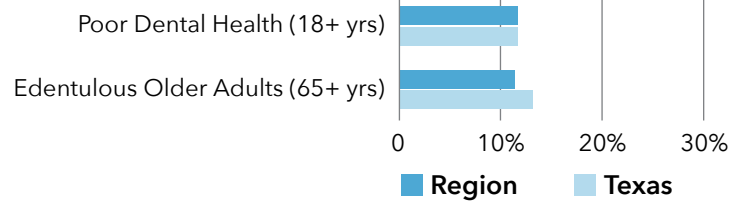
- This region's oral health outcomes are similar to the rest of the state, but not as good as other regions containing the state's major cities (Dallas, San Antonio, Austin).
- Past-year dental visit rates among adults are on par with the state average. Provider supply is more abundant in this region, but appears driven by higher numbers of providers per capita in Fort Bend and Harris, the region's two most populous counties. On the other hand, Chambers and Waller counties have more limited provider supply.
- There is substantial county-level variation on social and economic measures, with approximately a two-fold difference between the counties with highest and lowest rates of low-income and uninsured residents.

Southeast - Houston

Socioeconomic Factors



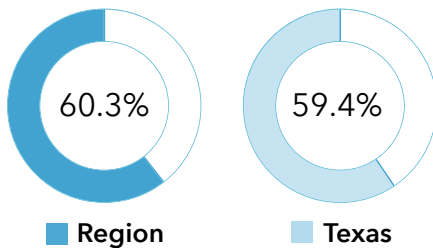
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	12.7	15.8
Oral Cancer Incidence rate per 100,000 Pop.	10.9	10.8
Oral Cancer Mortality rate per 100,00 Pop.	3.5	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

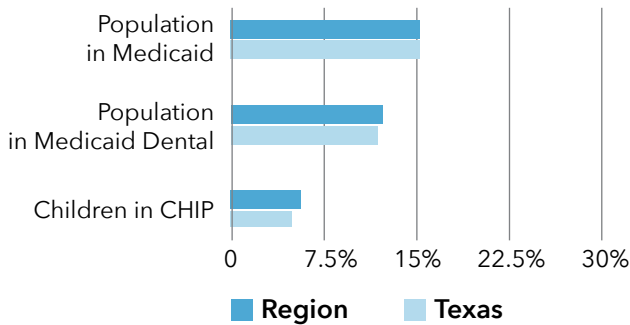


Population to Provider Ratio

	Region	Texas
General Dentist	2468: 1	2970: 1
Pediatric Dentist	10172: 1	9411: 1
Specialized Dentist	12318: 1	14291: 1
Dental Hygienist	2513: 1	2220: 1
Dental Assistant	785: 1	805: 1
Primary Care Physician	1206: 1	1362: 1
Nurse Practitioner	1722: 1	1961: 1
FQHCs per 100,000 pop.	1.4	1.5

Medicaid and CHIP

Enrollment (% of total population)

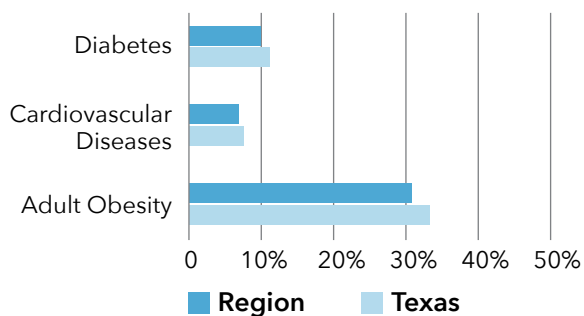


Annual Expenses Per Enrollee

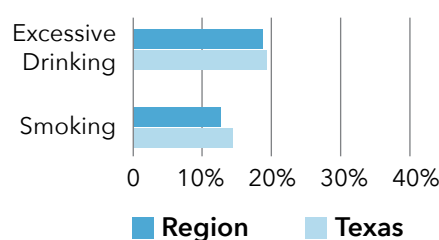
	Region	Texas
Medicaid Non-Dental	\$4,832	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,587	\$1,527
CHIP Dental	\$286	\$285

Risk Factors

Chronic Conditions

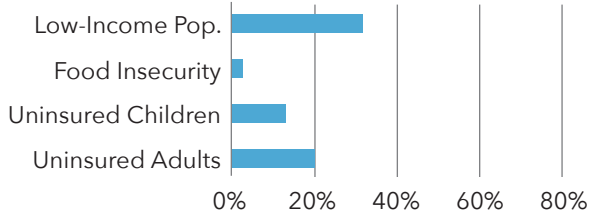


Behaviors



Austin County Population 29,107

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.3
Oral Cancer Mortality Rate per 100,000 pop.	3.5

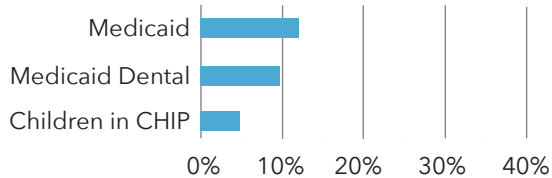
Clinical Care

Pop. to Provider Ratio

General Dentist	3080:1
Pediatric Dentist	7026:1
Specialized Dentist	33876:1
Dental Hygienist	2606:1
Dental Assistant	584:1
Primary Care Physician	3764:1
Nurse Practitioner	8469:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

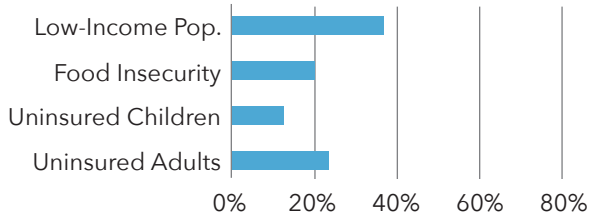


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,974
Medicaid Dental	\$417
CHIP Non- Dental	\$1,595
CHIP Dental	\$284

Calhoun County Population 21,805

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	16.6
Oral Cancer Mortality Rate per 100,000 pop.	2.4

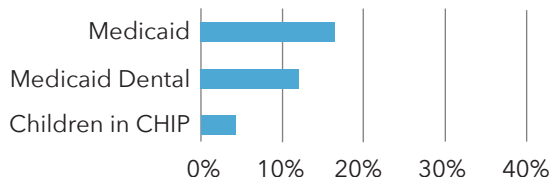
Clinical Care

Pop. to Provider Ratio

General Dentist	4814:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4012:1
Dental Assistant	1504:1
Primary Care Physician	1852:1
Nurse Practitioner	3439:1
FQHCs per 100,000 pop.	18.3

Medicaid & CHIP

Enrollment (% of total population)

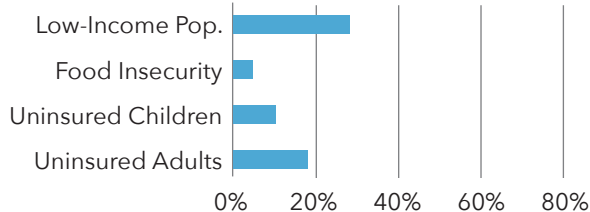


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,348
Medicaid Dental	\$416
CHIP Non- Dental	\$1,591
CHIP Dental	\$284

Chambers County Population 38,072

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13
Oral Cancer Mortality Rate per 100,000 pop.	3

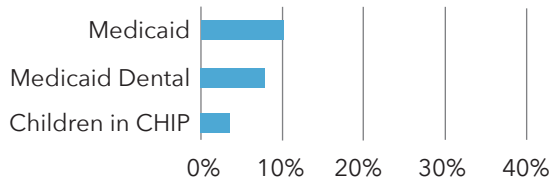
Clinical Care

Pop. to Provider Ratio

General Dentist	10878:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	7252:1
Dental Assistant	1088:1
Primary Care Physician	3956:1
Nurse Practitioner	3626:1
FQHCs per 100,000 pop.	5.3

Medicaid & CHIP

Enrollment (% of total population)

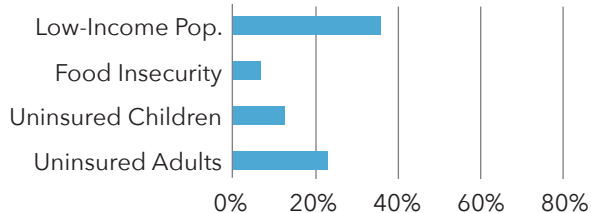


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,246
Medicaid Dental	\$418
CHIP Non- Dental	\$1,586
CHIP Dental	\$286

Colorado County Population 20,792

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.1
Oral Cancer Mortality Rate per 100,000 pop.	4.1

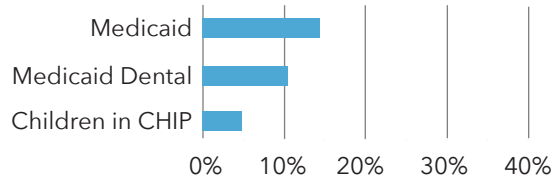
Clinical Care

Pop. to Provider Ratio

General Dentist	5538:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3692:1
Dental Assistant	1007:1
Primary Care Physician	1166:1
Nurse Practitioner	4430:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

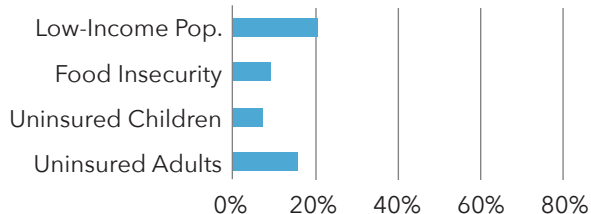


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,400
Medicaid Dental	\$419
CHIP Non- Dental	\$1,306
CHIP Dental	\$283

Fort Bend County Population 683,756

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	6.9
Oral Cancer Incidence Rate per 100,000 pop.	10
Oral Cancer Mortality Rate per 100,000 pop.	2

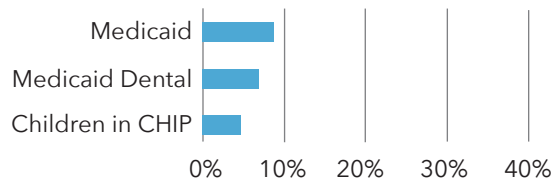
Clinical Care

Pop. to Provider Ratio

General Dentist	2742:1
Pediatric Dentist	5621:1
Specialized Dentist	9481:1
Dental Hygienist	2023:1
Dental Assistant	802:1
Primary Care Physician	1613:1
Nurse Practitioner	2281:1
FQHCs per 100,000 pop.	0.4

Medicaid & CHIP

Enrollment (% of total population)

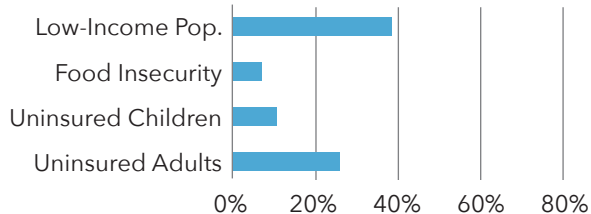


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,029
Medicaid Dental	\$421
CHIP Non- Dental	\$1,590
CHIP Dental	\$287

Harris County Population 4,434,257

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	9.1
Oral Cancer Incidence Rate per 100,000 pop.	10.9
Oral Cancer Mortality Rate per 100,000 pop.	2.6

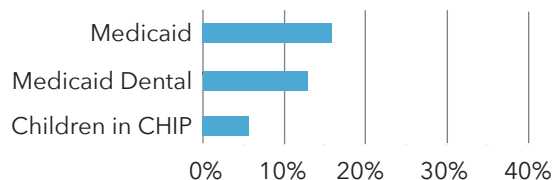
Clinical Care

Pop. to Provider Ratio

General Dentist	2363:1
Pediatric Dentist	11160:1
Specialized Dentist	12356:1
Dental Hygienist	2606:1
Dental Assistant	783:1
Primary Care Physician	1124:1
Nurse Practitioner	1599:1
FQHCs per 100,000 pop.	1.3

Medicaid & CHIP

Enrollment (% of total population)

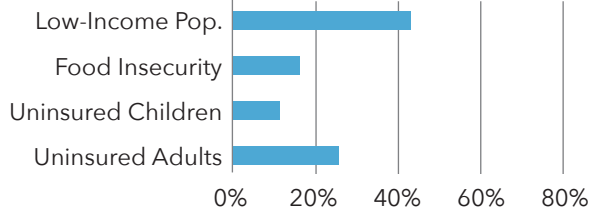


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,798
Medicaid Dental	\$418
CHIP Non- Dental	\$1,588
CHIP Dental	\$285

Matagorda County Population 36,719

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	16.9
Oral Cancer Mortality Rate per 100,000 pop.	1.7

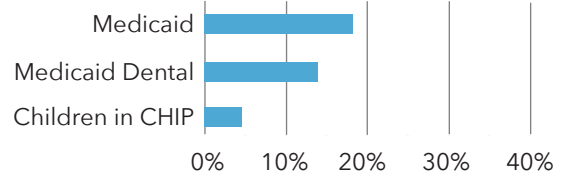
Clinical Care

Pop. to Provider Ratio

General Dentist	4860:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1851:1
Dental Assistant	793:1
Primary Care Physician	1851:1
Nurse Practitioner	2991:1
FQHCs per 100,000 pop.	10.9

Medicaid & CHIP

Enrollment (% of total population)

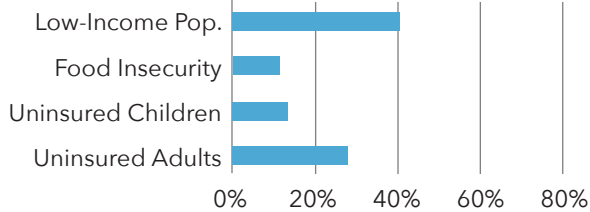


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,110
Medicaid Dental	\$419
CHIP Non- Dental	\$1,588
CHIP Dental	\$286

Waller County Population 47,049

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.1
Oral Cancer Mortality Rate per 100,000 pop.	3

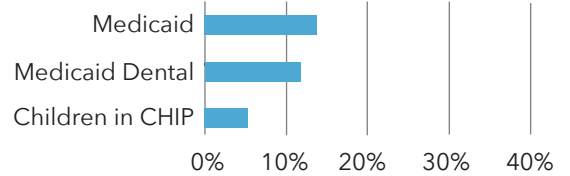
Clinical Care

Pop. to Provider Ratio

General Dentist	10619:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6637:1
Dental Assistant	1002:1
Primary Care Physician	17698:1
Nurse Practitioner	10619:1
FQHCs per 100,000 pop.	4.3

Medicaid & CHIP

Enrollment (% of total population)

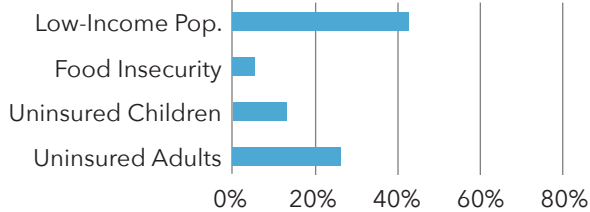


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,647
Medicaid Dental	\$421
CHIP Non- Dental	\$1,585
CHIP Dental	\$286

Wharton County Population 41,377

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.8
Oral Cancer Mortality Rate per 100,000 pop.	2.8

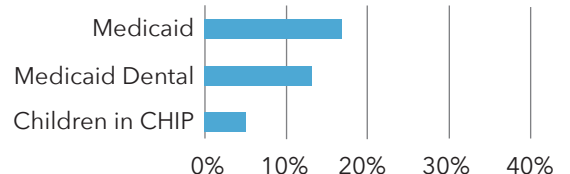
Clinical Care

Pop. to Provider Ratio

General Dentist	2669:1
Pediatric Dentist	-
Specialized Dentist	21351:1
Dental Hygienist	1294:1
Dental Assistant	445:1
Primary Care Physician	1941:1
Nurse Practitioner	5338:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

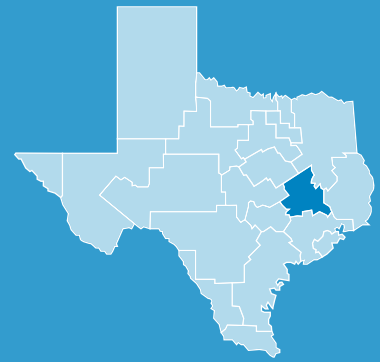
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,044
Medicaid Dental	\$420
CHIP Non- Dental	\$1,581
CHIP Dental	\$288

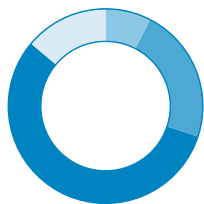
Southeast - Brazos Valley



9 counties: Brazos, Burleson, Grimes, Leon, Madison, Montgomery, Robertson, Walker, Washington

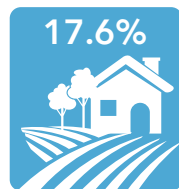
Population 925,075

County Populations

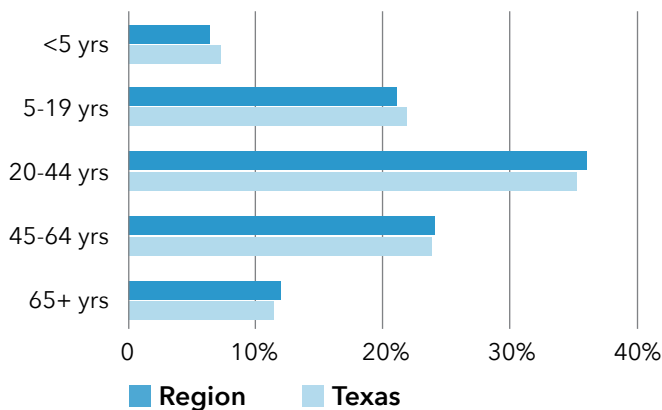


■ Montgomery ■ Brazos
■ Walker ■ Others

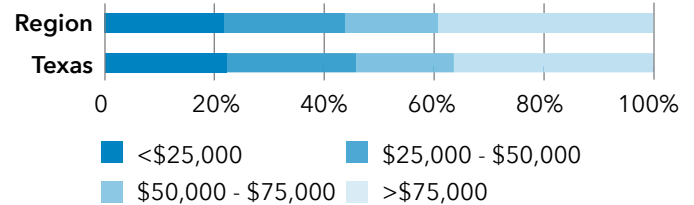
Rural Population



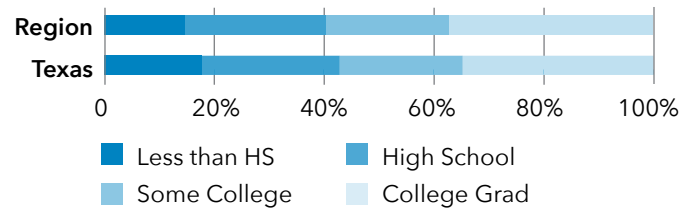
Age



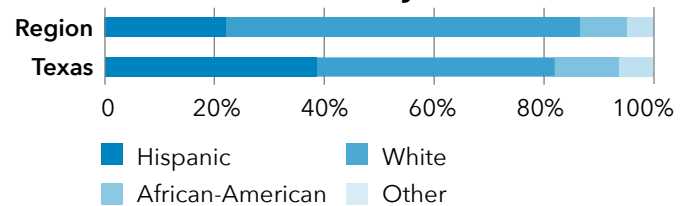
Income



Education



Race and Ethnicity

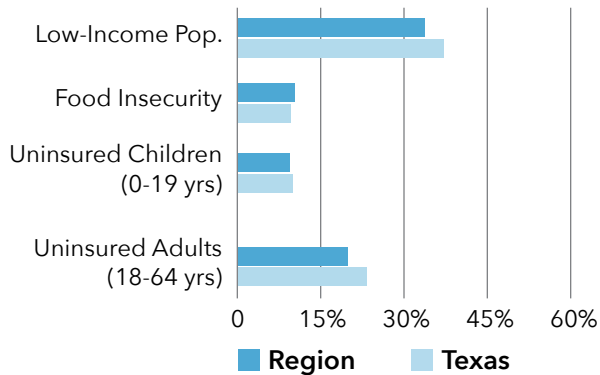


Key Points

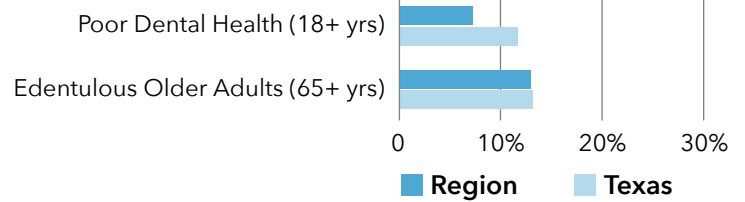
- This region has the lowest percentage of adults with poor dental health in the state (7.2%).
- The rate of adult past-year dental visits (58.4%) is similar to the state average. Outside of Brazos and Montgomery, counties in this region face limited provider supply. There are few pediatric and specialized dentists in this region.
- Estimated rates of adult with diabetes (8.9%) and obesity (24.8%) are second lowest in the state, but the region's excessive drinking rate is highest in the state (27.6%).

Southeast - Brazos Valley

Socioeconomic Factors



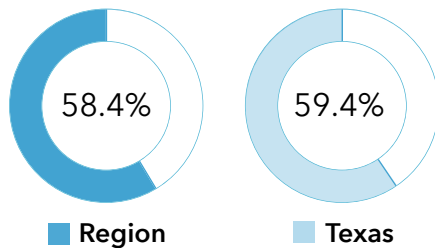
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	14.8	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11.7	10.8
Oral Cancer Mortality rate per 100,00 Pop.	0	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

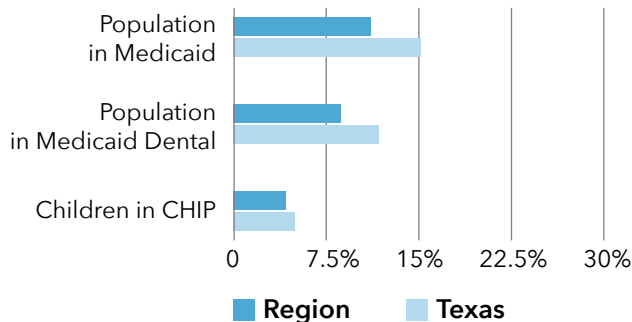


Population to Provider Ratio

	Region	Texas
General Dentist	3494: 1	2970: 1
Pediatric Dentist	9912: 1	9411: 1
Specialized Dentist	13834: 1	14291: 1
Dental Hygienist	1910: 1	2220: 1
Dental Assistant	892: 1	805: 1
Primary Care Physician	1311: 1	1362: 1
Nurse Practitioner	2752: 1	1961: 1
FQHCs per 100,000 pop.	1.8	1.5

Medicaid and CHIP

Enrollment (% of total population)

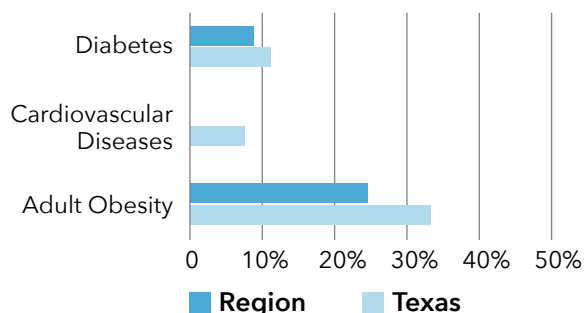


Annual Expenses Per Enrollee

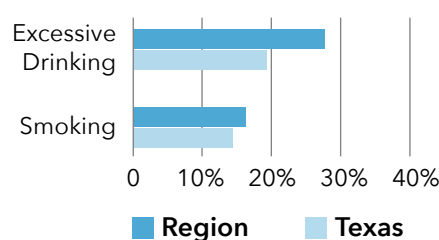
	Region	Texas
Medicaid Non-Dental	\$5,057	\$5,224
Medicaid Dental	\$417	\$419
CHIP Non-Dental	\$1,492	\$1,527
CHIP Dental	\$284	\$285

Risk Factors

Chronic Conditions

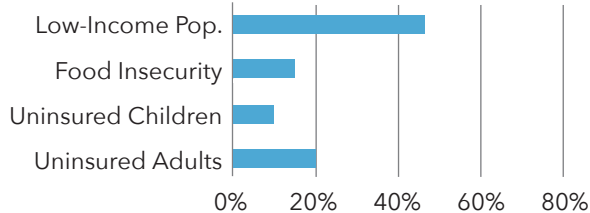


Behaviors



Brazos County Population 209,896

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.9
Oral Cancer Mortality Rate per 100,000 pop.	2

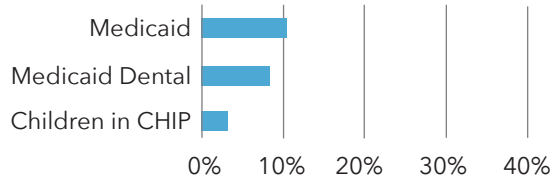
Clinical Care

Pop. to Provider Ratio

General Dentist	3560:1
Pediatric Dentist	8550:1
Specialized Dentist	16018:1
Dental Hygienist	1637:1
Dental Assistant	954:1
Primary Care Physician	1001:1
Nurse Practitioner	2990:1
FQHCs per 100,000 pop.	2.4

Medicaid & CHIP

Enrollment (% of total population)

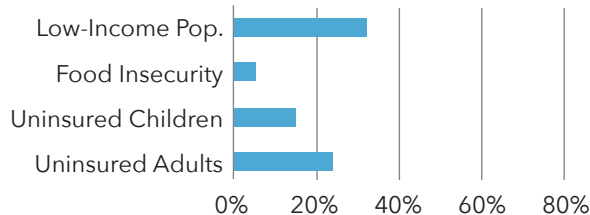


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,998
Medicaid Dental	\$414
CHIP Non- Dental	\$1,303
CHIP Dental	\$283

Burleson County Population 17,417

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6.9
Oral Cancer Mortality Rate per 100,000 pop.	3.8

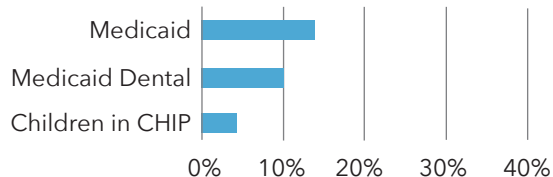
Clinical Care

Pop. to Provider Ratio

General Dentist	18980:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4745:1
Dental Assistant	1117:1
Primary Care Physician	3796:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	17.2

Medicaid & CHIP

Enrollment (% of total population)

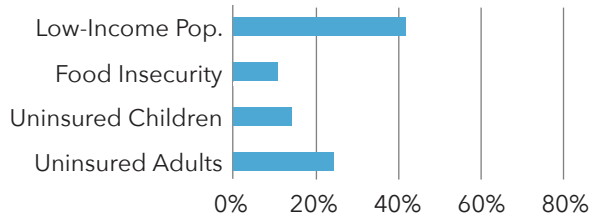


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,916
Medicaid Dental	\$418
CHIP Non- Dental	\$1,315
CHIP Dental	\$284

Grimes County Population 27,140

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.7
Oral Cancer Mortality Rate per 100,000 pop.	6.2

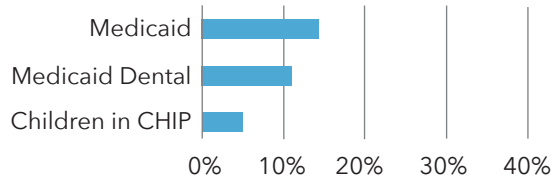
Clinical Care

Pop. to Provider Ratio

General Dentist	14763:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5905:1
Dental Assistant	777:1
Primary Care Physician	2684:1
Nurse Practitioner	9842:1
FQHCs per 100,000 pop.	3.7

Medicaid & CHIP

Enrollment (% of total population)

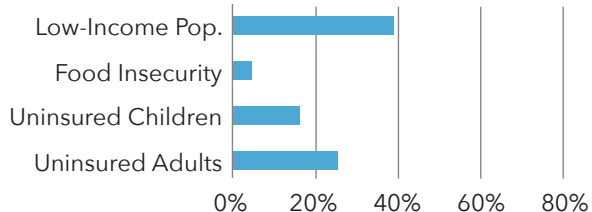


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,455
Medicaid Dental	\$419
CHIP Non- Dental	\$1,305
CHIP Dental	\$287

Leon County Population 16,923

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.7
Oral Cancer Mortality Rate per 100,000 pop.	4.4

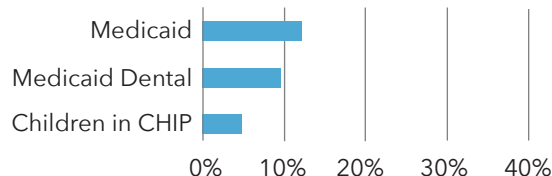
Clinical Care

Pop. to Provider Ratio

General Dentist	6223:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4668:1
Dental Assistant	1697:1
Primary Care Physician	6223:1
Nurse Practitioner	18670:1
FQHCs per 100,000 pop.	5.9

Medicaid & CHIP

Enrollment (% of total population)

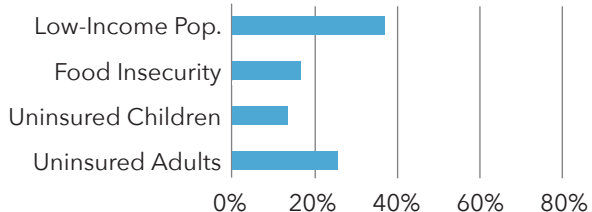


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,283
Medicaid Dental	\$419
CHIP Non- Dental	\$1,303
CHIP Dental	\$286

Madison County Population 13,843

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.7
Oral Cancer Mortality Rate per 100,000 pop.	2.2

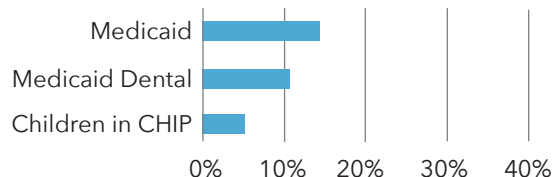
Clinical Care

Pop. to Provider Ratio

General Dentist	3760:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5013:1
Dental Assistant	1671:1
Primary Care Physician	2149:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	7.2

Medicaid & CHIP

Enrollment (% of total population)

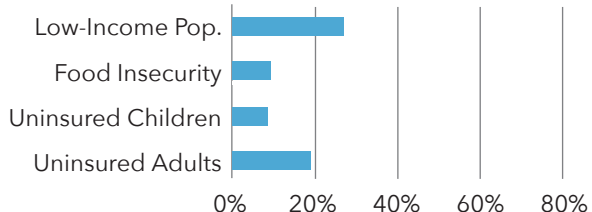


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,210
Medicaid Dental	\$419
CHIP Non- Dental	\$1,315
CHIP Dental	\$281

Montgomery County Population 518,849

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	11.5
Oral Cancer Incidence Rate per 100,000 pop.	12.2
Oral Cancer Mortality Rate per 100,000 pop.	2.5

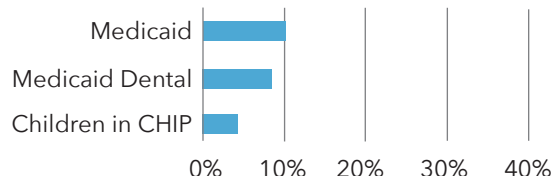
Clinical Care

Pop. to Provider Ratio

General Dentist	3110:1
Pediatric Dentist	9179:1
Specialized Dentist	10743:1
Dental Hygienist	1743:1
Dental Assistant	808:1
Primary Care Physician	1290:1
Nurse Practitioner	2326:1
FQHCs per 100,000 pop.	0.6

Medicaid & CHIP

Enrollment (% of total population)

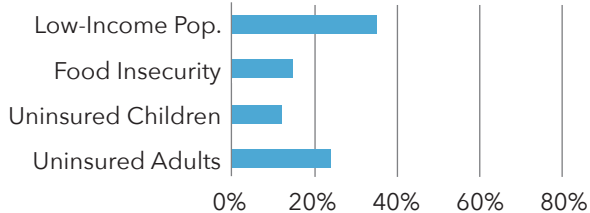


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,809
Medicaid Dental	\$417
CHIP Non- Dental	\$1,589
CHIP Dental	\$285

Robertson County Population 16,537

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.9
Oral Cancer Mortality Rate per 100,000 pop.	3.3

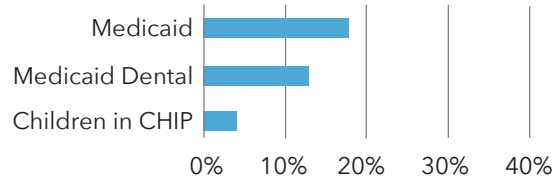
Clinical Care

Pop. to Provider Ratio

General Dentist	9333:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6222:1
Dental Assistant	1556:1
Primary Care Physician	18666:1
Nurse Practitioner	3733:1
FQHCs per 100,000 pop.	18.1

Medicaid & CHIP

Enrollment (% of total population)

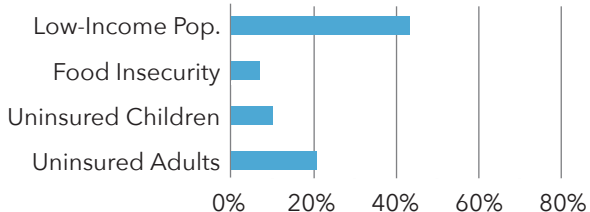


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,907
Medicaid Dental	\$424
CHIP Non- Dental	\$1,313
CHIP Dental	\$285

Walker County Population 69,926

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	2.5

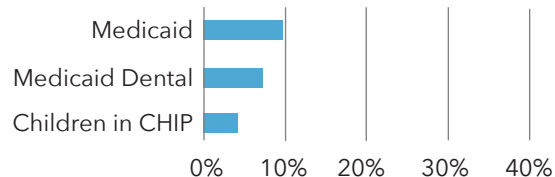
Clinical Care

Pop. to Provider Ratio

General Dentist	3956:1
Pediatric Dentist	10477:1
Specialized Dentist	23735:1
Dental Hygienist	3096:1
Dental Assistant	1149:1
Primary Care Physician	1780:1
Nurse Practitioner	3391:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

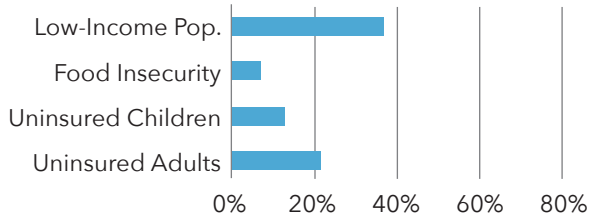


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,777
Medicaid Dental	\$415
CHIP Non- Dental	\$1,582
CHIP Dental	\$284

Washington County Population 34,544

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	13.2
Oral Cancer Mortality Rate per 100,000 pop.	2.6

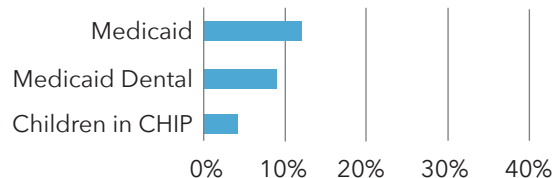
Clinical Care

Pop. to Provider Ratio

General Dentist	3652:1
Pediatric Dentist	7318:1
Specialized Dentist	18260:1
Dental Hygienist	2029:1
Dental Assistant	1107:1
Primary Care Physician	1141:1
Nurse Practitioner	2809:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

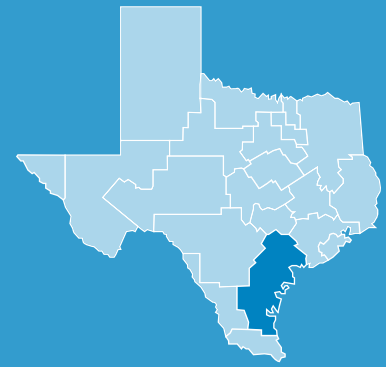
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,750
Medicaid Dental	\$419
CHIP Non- Dental	\$1,311
CHIP Dental	\$282

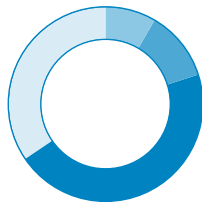
South - Corpus Christi Gulf Coast



18 counties: Aransas, Bee, Brooks, DeWitt, Duval, Goliad, Gonzales, Jackson, Jim Wells, Karnes, Kennedy, Kleberg, Lavaca, Live Oak, Nueces, Refugio, San Patricio, Victoria

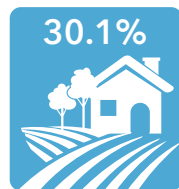
Population 780,545

County Populations

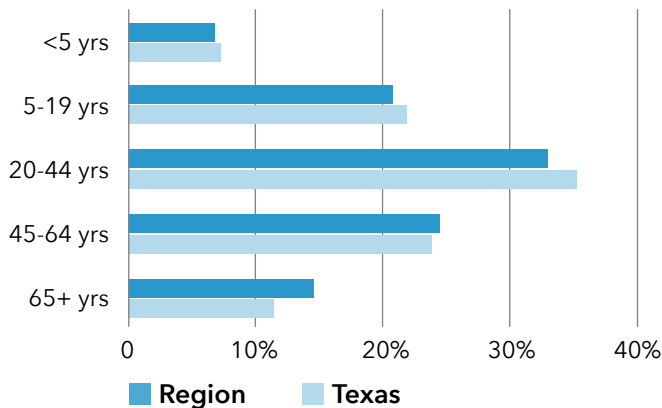


■ Nueces
■ Victoria
■ San Patricio
■ Others

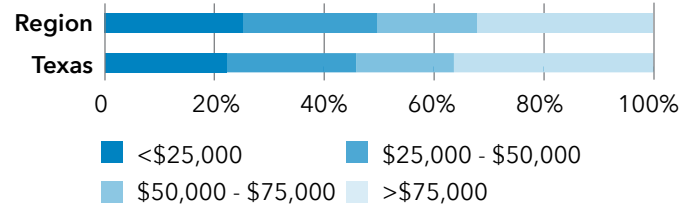
Rural Population



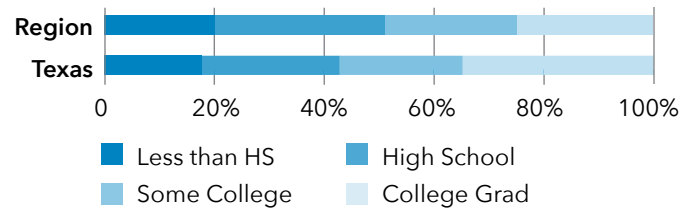
Age



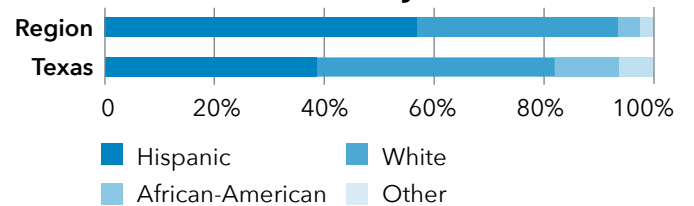
Income



Education



Race and Ethnicity

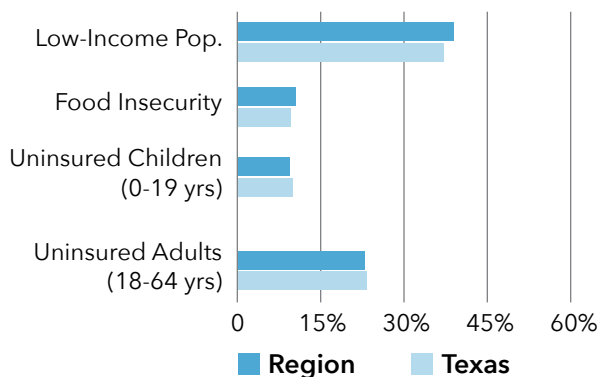


Key Points

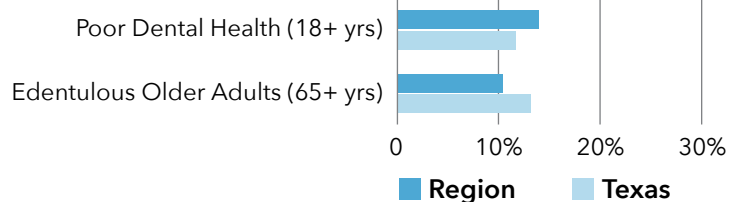
- Over 27% of this region's population lives in rural counties. Four of the 18 counties have populations below 10,000.
- The estimated rate of adults in poor dental health (13.3%) is higher than the state average, while the proportion of edentulous older adults (10.3%) is second lowest in the state.
- This region has the fourth highest rates of both dental hygienists and FQHC sites per capita. Access to specialty providers is limited; 13 counties in this region have no pediatric or specialized dentists.
- Estimated adult smoking rates in this region (19.2%) are second highest in the state, though oral cancer incidence and mortality rates are relatively low.

South - Corpus Christi/Gulf

Socioeconomic Factors



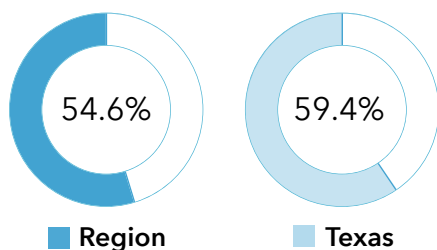
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	16.1	15.8
Oral Cancer Incidence rate per 100,000 Pop.	10.4	10.8
Oral Cancer Mortality rate per 100,00 Pop.	2.5	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

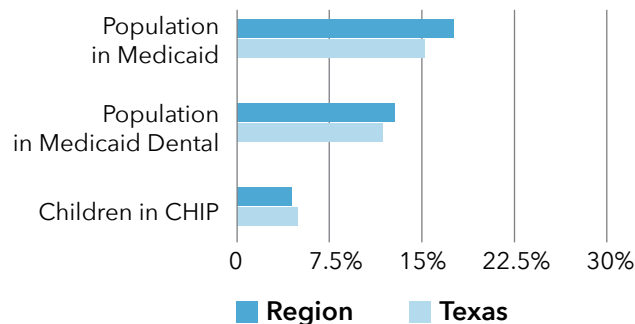


Population to Provider Ratio

	Region	Texas
General Dentist	3790: 1	2970: 1
Pediatric Dentist	9598: 1	9411: 1
Specialized Dentist	19506: 1	14291: 1
Dental Hygienist	1869: 1	2220: 1
Dental Assistant	954: 1	805: 1
Primary Care Physician	1374: 1	1362: 1
Nurse Practitioner	1895: 1	1961: 1
FQHCs per 100,000 pop.	2.6	1.5

Medicaid and CHIP

Enrollment (% of total population)

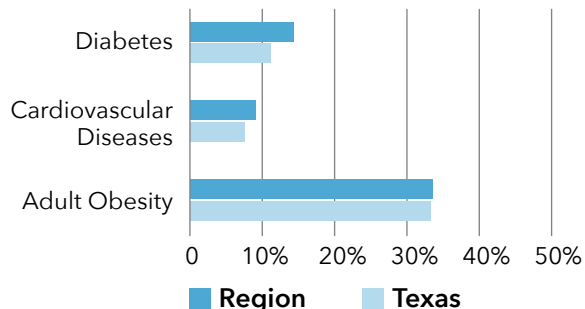


Annual Expenses Per Enrollee

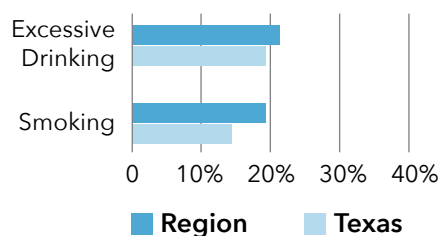
	Region	Texas
Medicaid Non-Dental	\$6,543	\$5,224
Medicaid Dental	\$420	\$419
CHIP Non-Dental	\$1,560	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

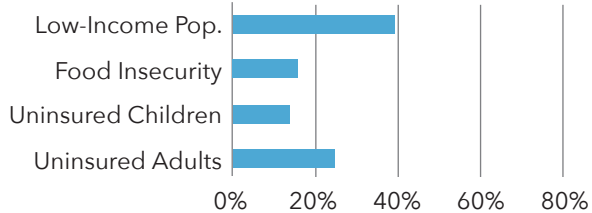


Behaviors



Aransas County Population 24,729

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	13.1
Oral Cancer Mortality Rate per 100,000 pop.	2.5

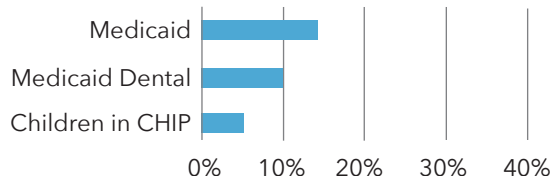
Clinical Care

Pop. to Provider Ratio

General Dentist	6328:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3164:1
Dental Assistant	1101:1
Primary Care Physician	2531:1
Nurse Practitioner	12656:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

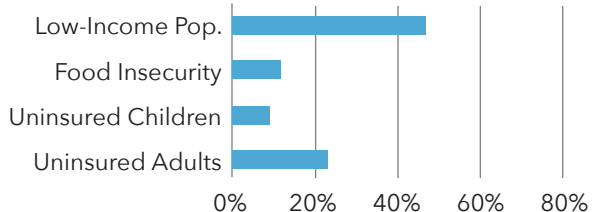


Annual Expenses per Enrollee

Medicaid Non- Dental	\$7,285
Medicaid Dental	\$417
CHIP Non- Dental	\$1,592
CHIP Dental	\$284

Bee County Population 32,706

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	8.4
Oral Cancer Mortality Rate per 100,000 pop.	4.2

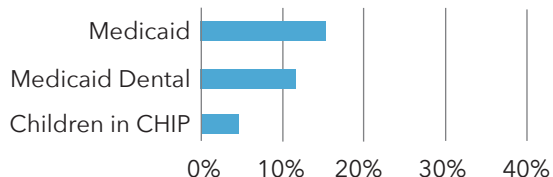
Clinical Care

Pop. to Provider Ratio

General Dentist	8252:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1435:1
Dental Assistant	1223:1
Primary Care Physician	2201:1
Nurse Practitioner	2201:1
FQHCs per 100,000 pop.	6.1

Medicaid & CHIP

Enrollment (% of total population)

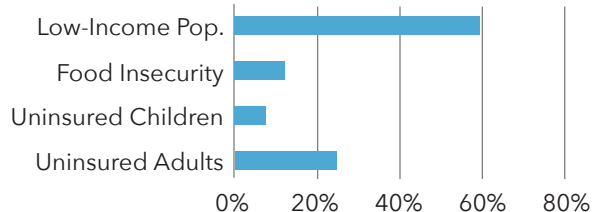


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,612
Medicaid Dental	\$418
CHIP Non- Dental	\$1,595
CHIP Dental	\$286

Brooks County Population 7,217

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	7.8
Oral Cancer Mortality Rate per 100,000 pop.	0

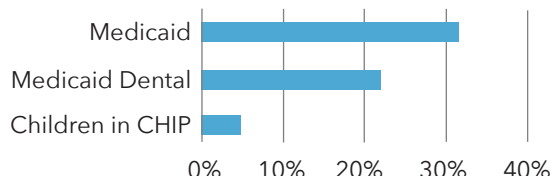
Clinical Care

Pop. to Provider Ratio

General Dentist	7567:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	7567:1
Dental Assistant	946:1
Primary Care Physician	7567:1
Nurse Practitioner	3784:1
FQHCs per 100,000 pop.	27.7

Medicaid & CHIP

Enrollment (% of total population)

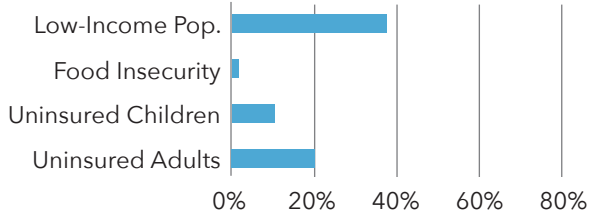


Annual Expenses per Enrollee

Medicaid Non- Dental	\$7,045
Medicaid Dental	\$422
CHIP Non- Dental	\$1,572
CHIP Dental	\$290

DeWitt County Population 20,660

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13
Oral Cancer Mortality Rate per 100,000 pop.	2.1

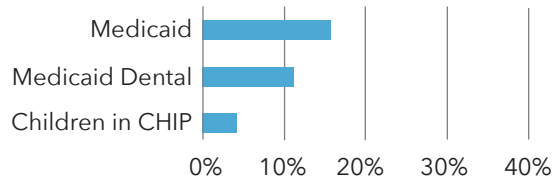
Clinical Care

Pop. to Provider Ratio

General Dentist	2584:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1894:1
Dental Assistant	1216:1
Primary Care Physician	1378:1
Nurse Practitioner	2584:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

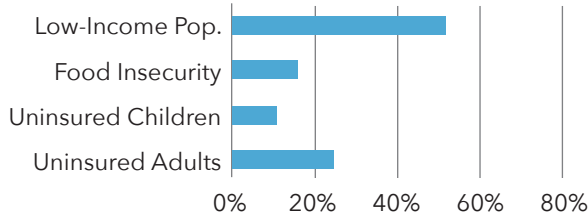


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,836
Medicaid Dental	\$420
CHIP Non- Dental	\$1,305
CHIP Dental	\$284

Duval County Population 11,510

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	1.2

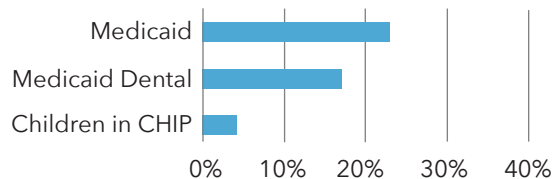
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3100:1
Dental Assistant	1033:1
Primary Care Physician	-
Nurse Practitioner	3100:1
FQHCs per 100,000 pop.	8.7

Medicaid & CHIP

Enrollment (% of total population)

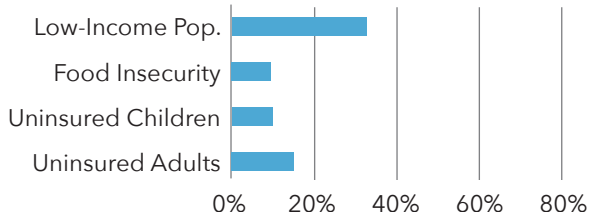


Annual Expenses per Enrollee

Medicaid Non- Dental	\$7,059
Medicaid Dental	\$420
CHIP Non- Dental	\$1,317
CHIP Dental	\$287

Goliad County Population 7,463

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11
Oral Cancer Mortality Rate per 100,000 pop.	3.1

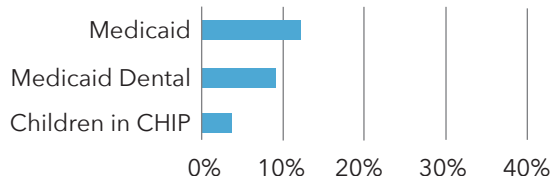
Clinical Care

Pop. to Provider Ratio

General Dentist	8122:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1160:1
Dental Assistant	1015:1
Primary Care Physician	8122:1
Nurse Practitioner	8122:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

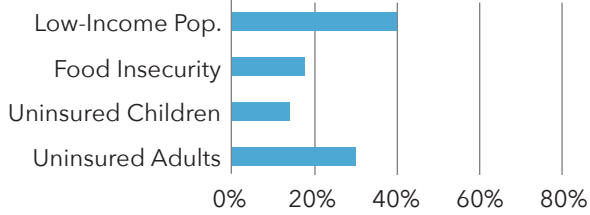


Annual Expenses per Enrollee

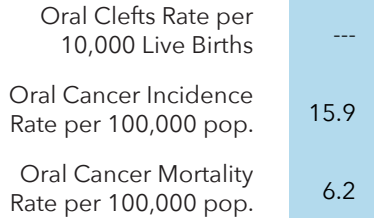
Medicaid Non- Dental	\$6,630
Medicaid Dental	\$424
CHIP Non- Dental	\$1,559
CHIP Dental	\$295

Gonzales County Population 20,370

Socioeconomic Factors



Oral Health Outcomes



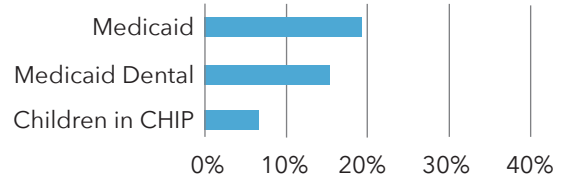
Clinical Care

Pop. to Provider Ratio

General Dentist	10808:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4323:1
Dental Assistant	1272:1
Primary Care Physician	2402:1
Nurse Practitioner	3088:1
FQHCs per 100,000 pop.	9.8

Medicaid & CHIP

Enrollment (% of total population)

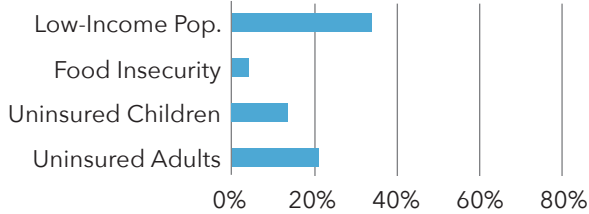


Annual Expenses per Enrollee

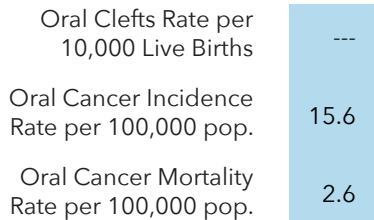
Medicaid Non- Dental	\$4,738
Medicaid Dental	\$417
CHIP Non- Dental	\$1,300
CHIP Dental	\$287

Jackson County Population 14,678

Socioeconomic Factors



Oral Health Outcomes



Clinical Care

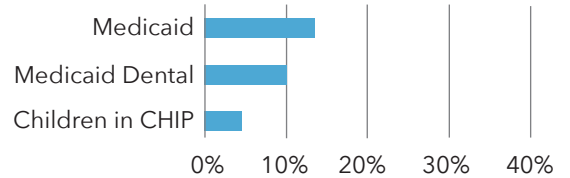
Pop. to Provider Ratio

General Dentist	3569:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3569:1
Dental Assistant	680:1
Primary Care Physician	2040:1
Nurse Practitioner	2855:1
FQHCs per 100,000 pop.	0

Jackson

Medicaid & CHIP

Enrollment (% of total population)

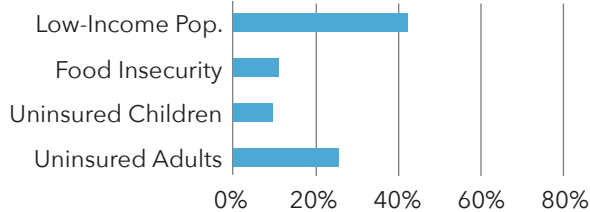


Annual Expenses per Enrollee

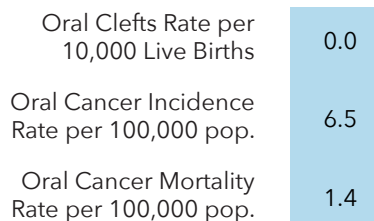
Medicaid Non- Dental	\$5,450
Medicaid Dental	\$419
CHIP Non- Dental	\$1,308
CHIP Dental	\$287

Jim Wells County Population 41,486

Socioeconomic Factors



Oral Health Outcomes



Clinical Care

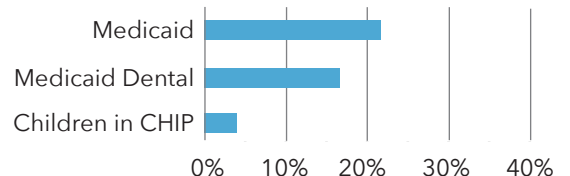
Pop. to Provider Ratio

General Dentist	5436:1
Pediatric Dentist	11655:1
Specialized Dentist	-
Dental Hygienist	1812:1
Dental Assistant	1175:1
Primary Care Physician	1977:1
Nurse Practitioner	3345:1
FQHCs per 100,000 pop.	4.8

Jim Wells

Medicaid & CHIP

Enrollment (% of total population)

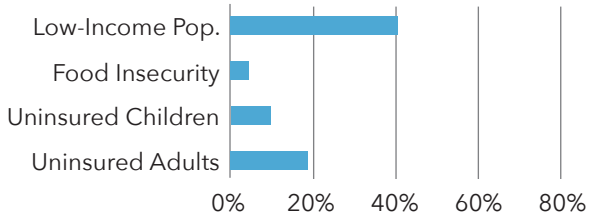


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,692
Medicaid Dental	\$420
CHIP Non- Dental	\$1,601
CHIP Dental	\$285

Karnes County Population 14,984

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	1

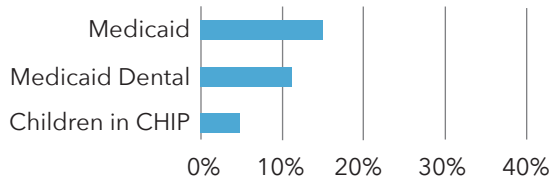
Clinical Care

Pop. to Provider Ratio

General Dentist	3171:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2642:1
Dental Assistant	933:1
Primary Care Physician	3963:1
Nurse Practitioner	3171:1
FQHCs per 100,000 pop.	13.3

Medicaid & CHIP

Enrollment (% of total population)

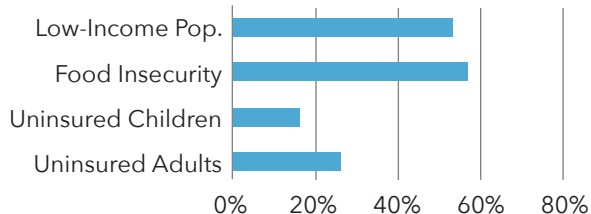


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,745
Medicaid Dental	\$420
CHIP Non- Dental	\$1,606
CHIP Dental	\$282

Kenedy County Population 558

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	55.7
Oral Cancer Mortality Rate per 100,000 pop.	0

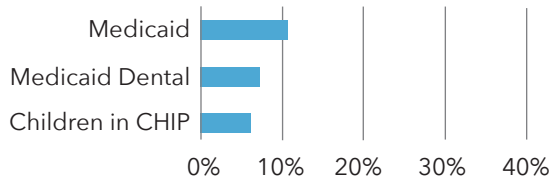
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	450:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

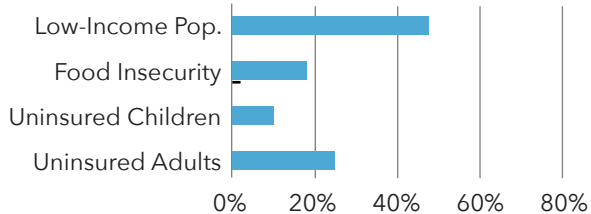


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,152
Medicaid Dental	\$445
CHIP Non- Dental	\$1,521
CHIP Dental	\$297

Kleberg County Population 31,877

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.8
Oral Cancer Mortality Rate per 100,000 pop.	1.9

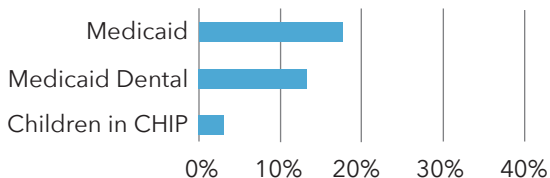
Clinical Care

Pop. to Provider Ratio

General Dentist	4299:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4913:1
Dental Assistant	1274:1
Primary Care Physician	2149:1
Nurse Practitioner	3439:1
FQHCs per 100,000 pop.	6.3

Medicaid & CHIP

Enrollment (% of total population)

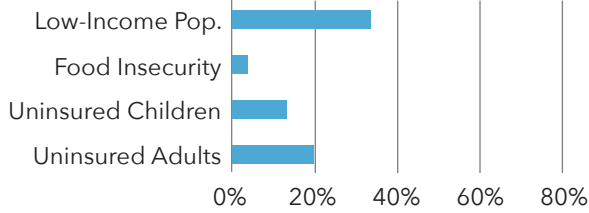


Annual Expenses per Enrollee

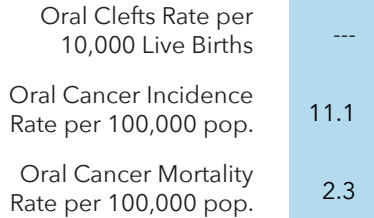
Medicaid Non- Dental	\$6,711
Medicaid Dental	\$421
CHIP Non- Dental	\$1,590
CHIP Dental	\$285

Lavaca County Population 19,654

Socioeconomic Factors



Oral Health Outcomes



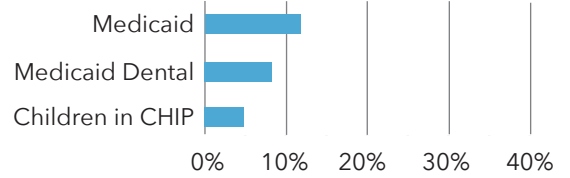
Clinical Care

Pop. to Provider Ratio

General Dentist	3930:1
Pediatric Dentist	4597:1
Specialized Dentist	-
Dental Hygienist	1786:1
Dental Assistant	854:1
Primary Care Physician	1637:1
Nurse Practitioner	2807:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

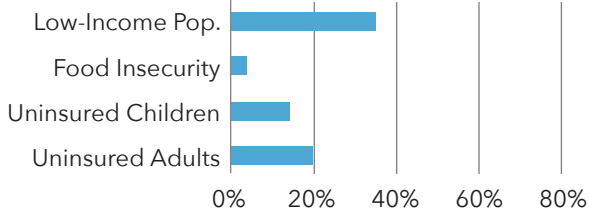


Annual Expenses per Enrollee

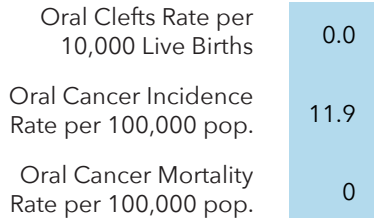
Medicaid Non- Dental	\$5,780
Medicaid Dental	\$423
CHIP Non- Dental	\$1,302
CHIP Dental	\$289

Live Oak County Population 11,976

Socioeconomic Factors



Oral Health Outcomes



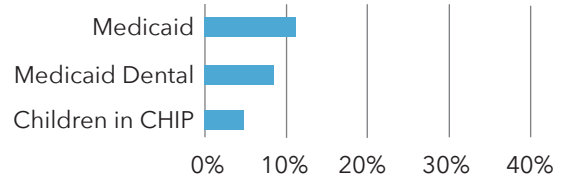
Clinical Care

Pop. to Provider Ratio

General Dentist	5885:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1471:1
Dental Assistant	1681:1
Primary Care Physician	-
Nurse Practitioner	5885:1
FQHCs per 100,000 pop.	8.4

Medicaid & CHIP

Enrollment (% of total population)

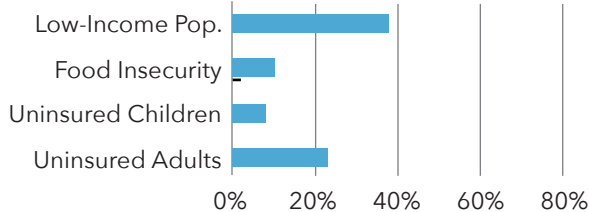


Annual Expenses per Enrollee

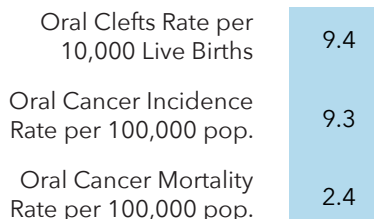
Medicaid Non- Dental	\$6,573
Medicaid Dental	\$416
CHIP Non- Dental	\$1,589
CHIP Dental	\$285

Nueces County Population 355,667

Socioeconomic Factors



Oral Health Outcomes



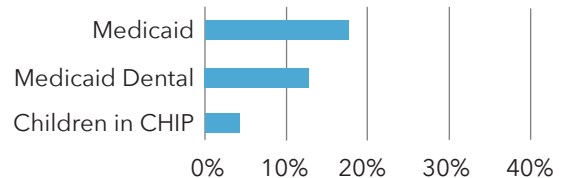
Clinical Care

Pop. to Provider Ratio

General Dentist	3321:1
Pediatric Dentist	5909:1
Specialized Dentist	12176:1
Dental Hygienist	1731:1
Dental Assistant	864:1
Primary Care Physician	1029:1
Nurse Practitioner	1503:1
FQHCs per 100,000 pop.	0.6

Medicaid & CHIP

Enrollment (% of total population)

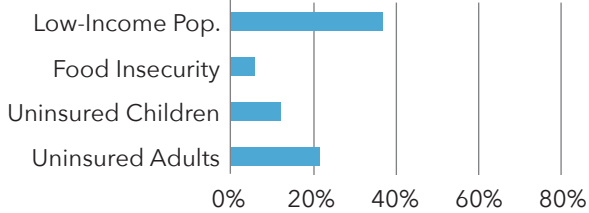


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,642
Medicaid Dental	\$420
CHIP Non- Dental	\$1,597
CHIP Dental	\$285

Refugio County Population 7,315

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.5
Oral Cancer Mortality Rate per 100,000 pop.	0

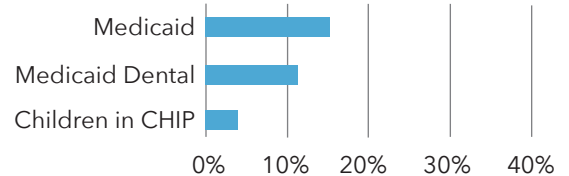
Clinical Care

Pop. to Provider Ratio

General Dentist	3744:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3744:1
Dental Assistant	3744:1
Primary Care Physician	2496:1
Nurse Practitioner	3744:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

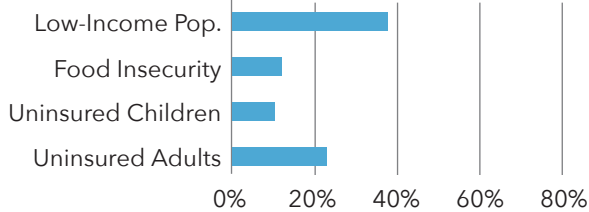


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,953
Medicaid Dental	\$421
CHIP Non- Dental	\$1,587
CHIP Dental	\$285

San Patricio County Population 66,706

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10
Oral Cancer Mortality Rate per 100,000 pop.	3.9

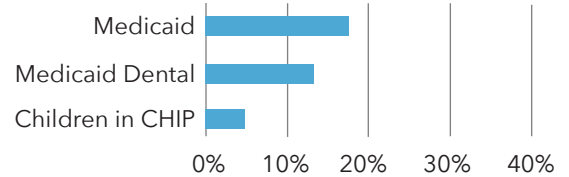
Clinical Care

Pop. to Provider Ratio

General Dentist	4813:1
Pediatric Dentist	-
Specialized Dentist	67385:1
Dental Hygienist	2246:1
Dental Assistant	802:1
Primary Care Physician	3209:1
Nurse Practitioner	2930:1
FQHCs per 100,000 pop.	3

Medicaid & CHIP

Enrollment (% of total population)

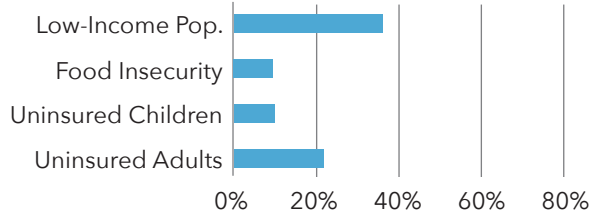


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,497
Medicaid Dental	\$418
CHIP Non- Dental	\$1,596
CHIP Dental	\$285

Victoria County Population 90,989

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.8
Oral Cancer Mortality Rate per 100,000 pop.	2.9

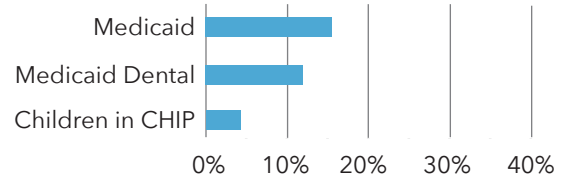
Clinical Care

Pop. to Provider Ratio

General Dentist	2759:1
Pediatric Dentist	7665:1
Specialized Dentist	9103:1
Dental Hygienist	1379:1
Dental Assistant	1084:1
Primary Care Physician	1000:1
Nurse Practitioner	1247:1
FQHCs per 100,000 pop.	2.2

Medicaid & CHIP

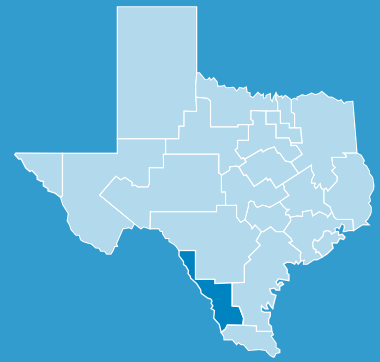
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,466
Medicaid Dental	\$418
CHIP Non- Dental	\$1,594
CHIP Dental	\$285

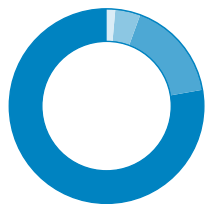
South - Laredo



4 counties: Jim Hogg, Maverick, Webb, Zapata

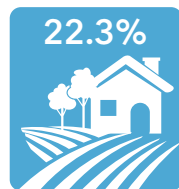
Population 342,389

County Populations

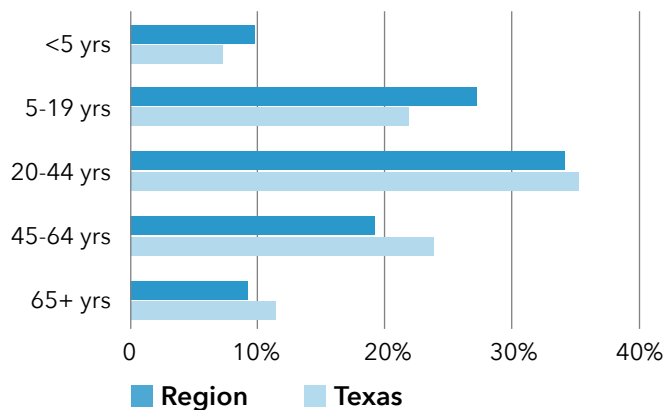


■ Webb ■ Maverick
■ Zapata ■ Jim Hogg

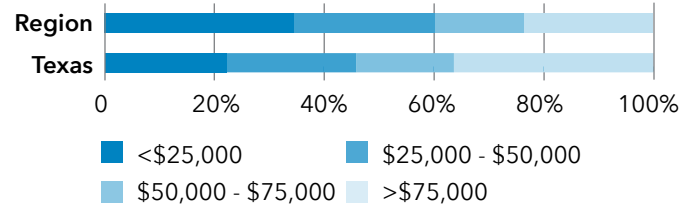
Rural Population



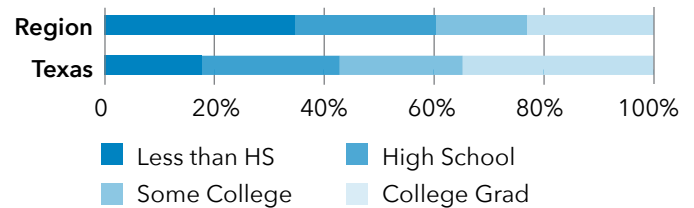
Age



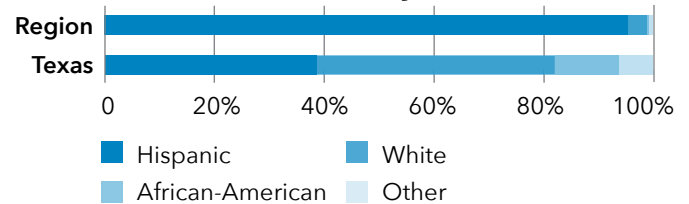
Income



Education



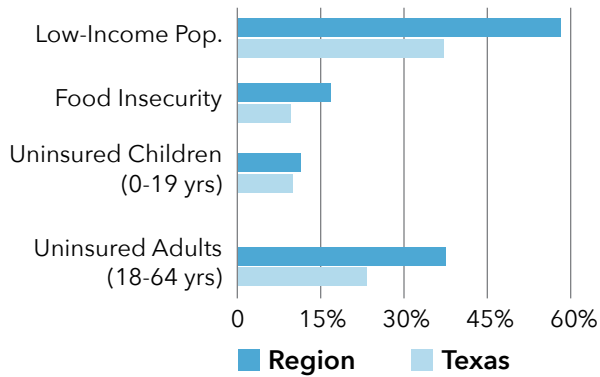
Race and Ethnicity



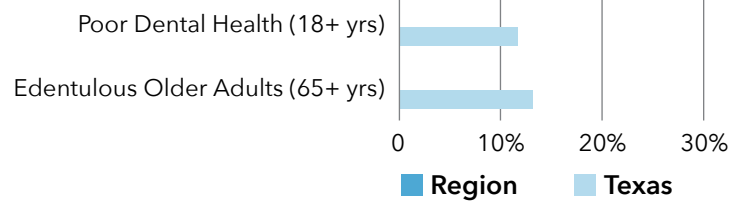
Key Points

- Provider supply is substantially more limited in this region than any other region in the state. It has the lowest per capita rates of general dentists, specialized dentists, dental hygienists, and primary care physicians.
- Oral cancer incidence rate in this region is lowest of any region in the state (5.5 cases per 100,000 population).
- This region is home to the second-highest proportion of uninsured adults (37.5%), low-income population (58.1%), and food insecurity (16.9%).

Socioeconomic Factors



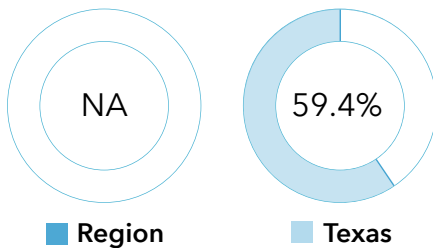
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	15.7	15.8
Oral Cancer Incidence rate per 100,000 Pop.	5.5	10.8
Oral Cancer Mortality rate per 100,00 Pop.	2.9	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

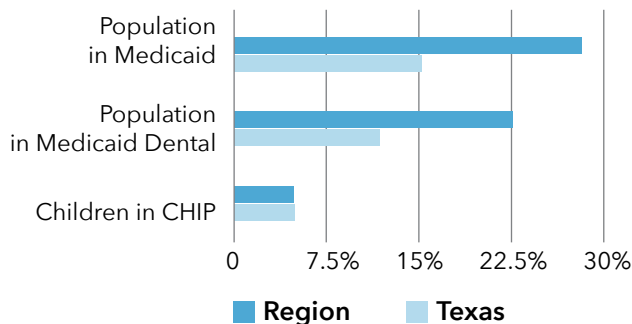


Population to Provider Ratio

	Region	Texas
General Dentist	9012: 1	2970: 1
Pediatric Dentist	14294: 1	9411: 1
Specialized Dentist	47311: 1	14291: 1
Dental Hygienist	8228: 1	2220: 1
Dental Assistant	1154: 1	805: 1
Primary Care Physician	2684: 1	1362: 1
Nurse Practitioner	2980: 1	1961: 1
FQHCs per 100,000 pop.	2.3	1.5

Medicaid and CHIP

Enrollment (% of total population)

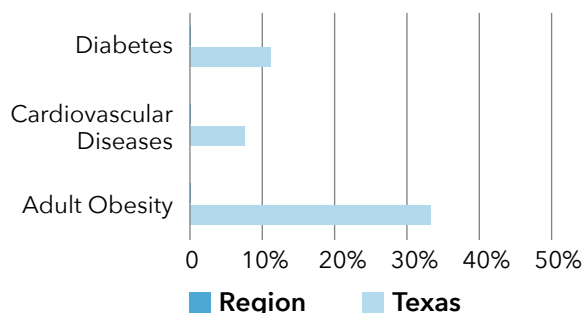


Annual Expenses Per Enrollee

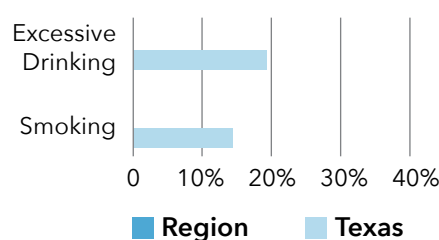
	Region	Texas
Medicaid Non-Dental	\$5,697	\$5,224
Medicaid Dental	\$421	\$419
CHIP Non-Dental	\$1,313	\$1,527
CHIP Dental	\$286	\$285

Risk Factors

Chronic Conditions

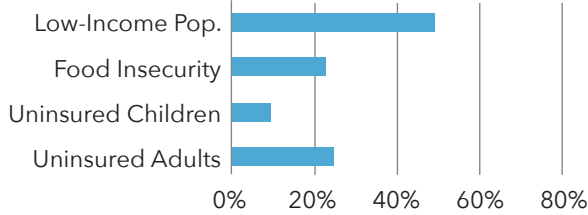


Behaviors



Jim Hogg County Population 5,218

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	3.4
Oral Cancer Mortality Rate per 100,000 pop.	0

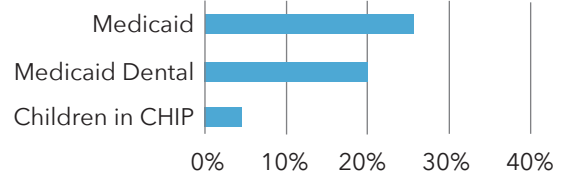
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	5626:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	19.2

Medicaid & CHIP

Enrollment (% of total population)

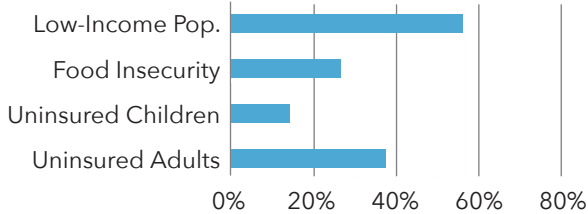


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,554
Medicaid Dental	\$420
CHIP Non- Dental	\$1,311
CHIP Dental	\$287

Maverick County Population 56,830

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6.1
Oral Cancer Mortality Rate per 100,000 pop.	1.2

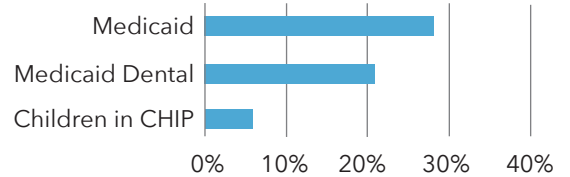
Clinical Care

Pop. to Provider Ratio

General Dentist	10132:1
Pediatric Dentist	18259:1
Specialized Dentist	-
Dental Hygienist	7599:1
Dental Assistant	1447:1
Primary Care Physician	2432:1
Nurse Practitioner	6754:1
FQHCs per 100,000 pop.	7

Medicaid & CHIP

Enrollment (% of total population)

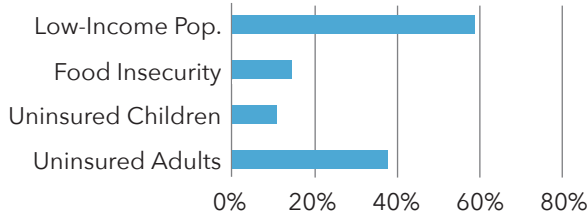


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,401
Medicaid Dental	\$419
CHIP Non- Dental	\$1,314
CHIP Dental	\$284

Webb County Population 266,006

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	11.5
Oral Cancer Incidence Rate per 100,000 pop.	5.5
Oral Cancer Mortality Rate per 100,000 pop.	2

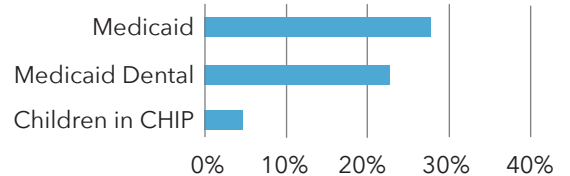
Clinical Care

Pop. to Provider Ratio

General Dentist	8704:1
Pediatric Dentist	12832:1
Specialized Dentist	36992:1
Dental Hygienist	7788:1
Dental Assistant	1057:1
Primary Care Physician	2551:1
Nurse Practitioner	2596:1
FQHCs per 100,000 pop.	0.8

Medicaid & CHIP

Enrollment (% of total population)

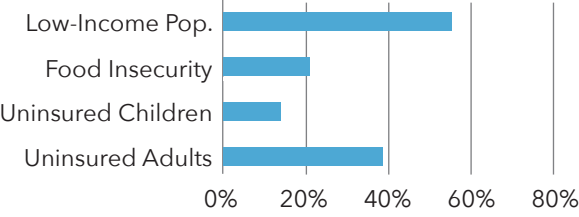


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,541
Medicaid Dental	\$422
CHIP Non- Dental	\$1,313
CHIP Dental	\$286

Zapata County Population 14,335

Socioeconomic Factors



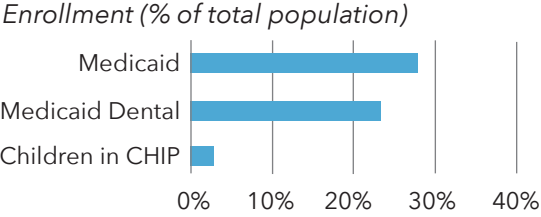
Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	5
Oral Cancer Mortality Rate per 100,000 pop.	1.8

Clinical Care

<i>Pop. to Provider Ratio</i>	
General Dentist	8069:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	3228:1
Primary Care Physician	-
Nurse Practitioner	4035:1
FQHCs per 100,000 pop.	7

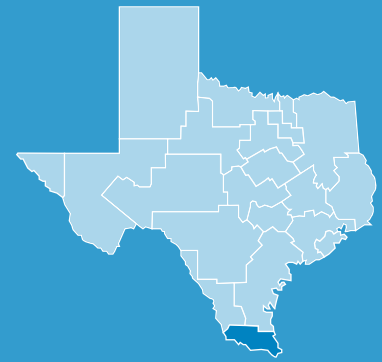
Medicaid & CHIP



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,410
Medicaid Dental	\$421
CHIP Non- Dental	\$1,316
CHIP Dental	\$284

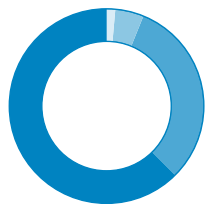
South - Rio Grande Valley



4 counties: Cameron, Hidalgo, Starr, Willacy

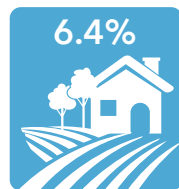
Population 1,332,071

County Populations

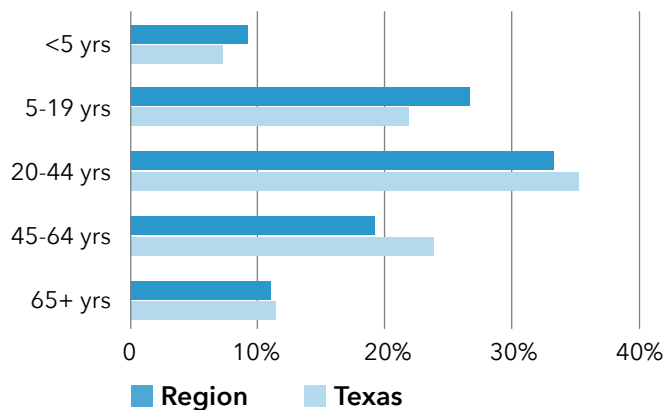


■ Hidalgo ■ Cameron
■ Starr ■ Willacy

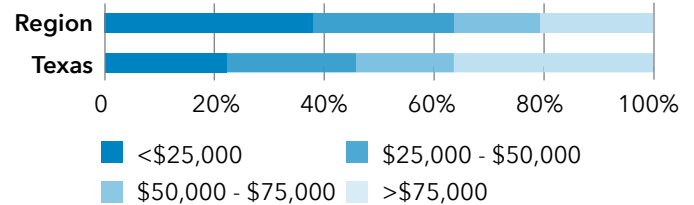
Rural Population



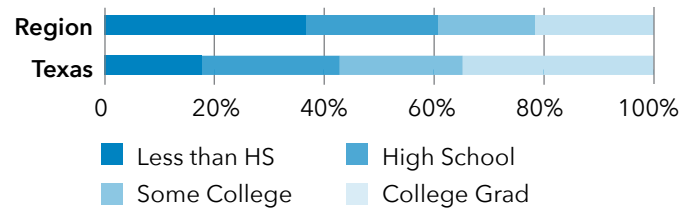
Age



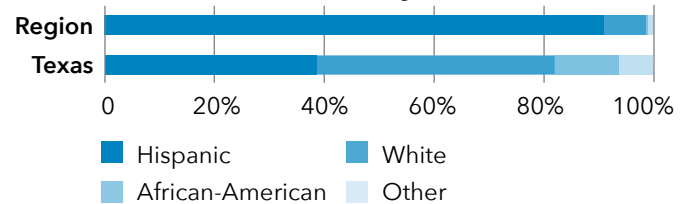
Income



Education



Race and Ethnicity

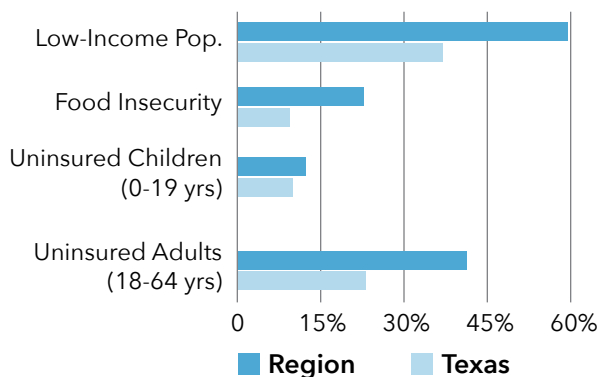


Key Points

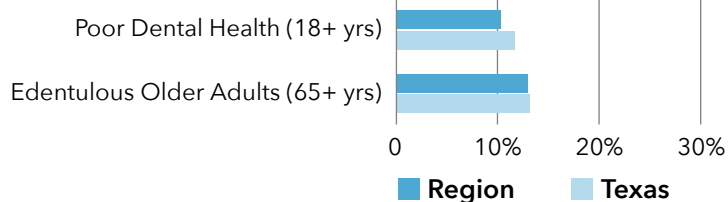
- This region performs among the state's worst on measures of clinical care access. Fewer than half (46.8%) of adults made a past year dental visit. Compared to other regions, it has the second-lowest ratio of general dentists, specialized dentists and dental hygienists per capita and the lowest rate of nurse practitioners.
- Oral health outcomes are similar to state averages in this region.
- This region has the lowest estimated percentage of adults with cardiovascular diseases (3.7%) and the second-lowest adult smoking rate (12.4%).
- Nearly 60% of residents in this region are classified as low-income. The adult uninsured rate in this region (41.6%) is highest in the state, approaching double the state average. The child uninsured rate (12.4%) is also high.

South - Rio Grande Valley

Socioeconomic Factors



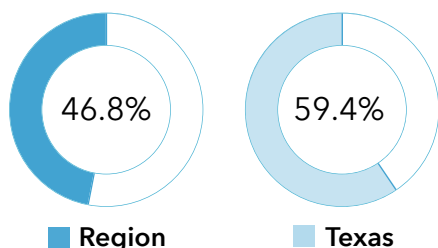
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	18.6	15.8
Oral Cancer Incidence rate per 100,000 Pop.	7.3	10.8
Oral Cancer Mortality rate per 100,000 Pop.	1.6	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

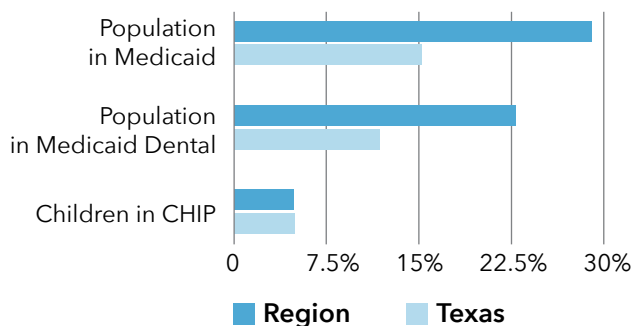


Population to Provider Ratio

	Region	Texas
General Dentist	5912: 1	2970: 1
Pediatric Dentist	12420: 1	9411: 1
Specialized Dentist	42567: 1	14291: 1
Dental Hygienist	5686: 1	2220: 1
Dental Assistant	931: 1	805: 1
Primary Care Physician	1958: 1	1362: 1
Nurse Practitioner	3130: 1	1961: 1
FQHCs per 100,000 pop.	1.6	1.5

Medicaid and CHIP

Enrollment (% of total population)

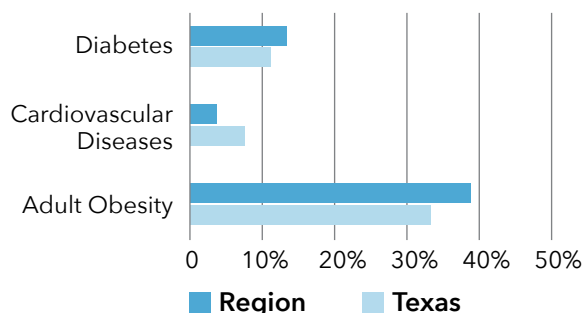


Annual Expenses Per Enrollee

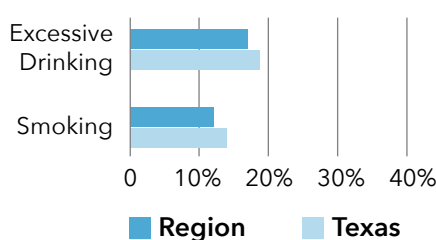
	Region	Texas
Medicaid Non-Dental	\$5,849	\$5,224
Medicaid Dental	\$424	\$419
CHIP Non-Dental	\$1,314	\$1,527
CHIP Dental	\$286	\$285

Risk Factors

Chronic Conditions

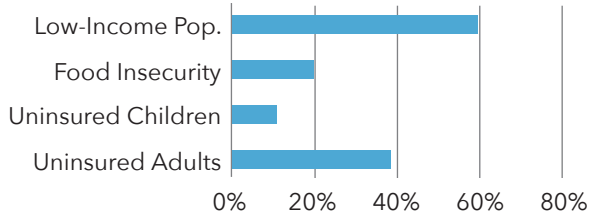


Behaviors



Cameron County Population 418,785

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	11.4
Oral Cancer Incidence Rate per 100,000 pop.	8.6
Oral Cancer Mortality Rate per 100,000 pop.	2.1

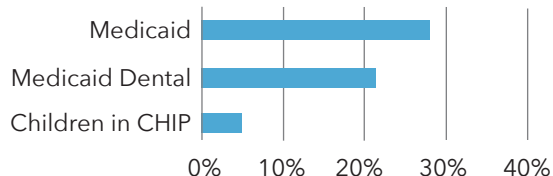
Clinical Care

Pop. to Provider Ratio

General Dentist	6224:1
Pediatric Dentist	13080:1
Specialized Dentist	42435:1
Dental Hygienist	3858:1
Dental Assistant	791:1
Primary Care Physician	1929:1
Nurse Practitioner	3091:1
FQHCs per 100,000 pop.	2.4

Medicaid & CHIP

Enrollment (% of total population)

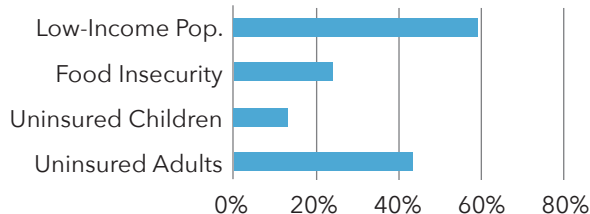


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,073
Medicaid Dental	\$424
CHIP Non- Dental	\$1,312
CHIP Dental	\$286

Hidalgo County Population 828,334

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	14.8
Oral Cancer Incidence Rate per 100,000 pop.	6.4
Oral Cancer Mortality Rate per 100,000 pop.	2.1

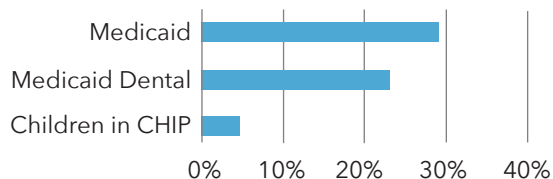
Clinical Care

Pop. to Provider Ratio

General Dentist	5509:1
Pediatric Dentist	11567:1
Specialized Dentist	38792:1
Dental Hygienist	6896:1
Dental Assistant	1005:1
Primary Care Physician	1881:1
Nurse Practitioner	2956:1
FQHCs per 100,000 pop.	1

Medicaid & CHIP

Enrollment (% of total population)

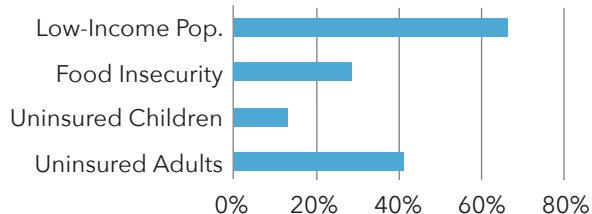


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,655
Medicaid Dental	\$423
CHIP Non- Dental	\$1,314
CHIP Dental	\$286

Starr County Population 63,008

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	8.9
Oral Cancer Mortality Rate per 100,000 pop.	2.1

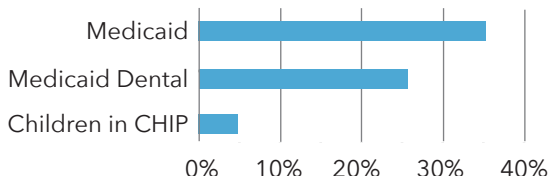
Clinical Care

Pop. to Provider Ratio

General Dentist	11110:1
Pediatric Dentist	20831:1
Specialized Dentist	-
Dental Hygienist	16665:1
Dental Assistant	952:1
Primary Care Physician	3921:1
Nurse Practitioner	9523:1
FQHCs per 100,000 pop.	3.2

Medicaid & CHIP

Enrollment (% of total population)

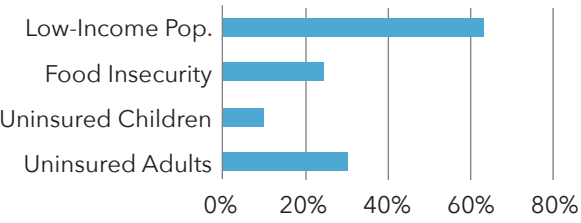


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,559
Medicaid Dental	\$422
CHIP Non- Dental	\$1,319
CHIP Dental	\$285

Willacy County **Population 21,944**

Socioeconomic Factors



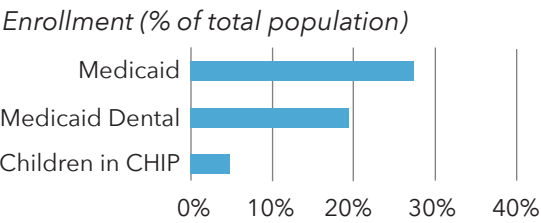
Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6.8
Oral Cancer Mortality Rate per 100,000 pop.	2.6

Clinical Care

Pop. to Provider Ratio	
General Dentist	12693:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	12693:1
Dental Assistant	1692:1
Primary Care Physician	3627:1
Nurse Practitioner	8462:1
FQHCs per 100,000 pop.	4.6

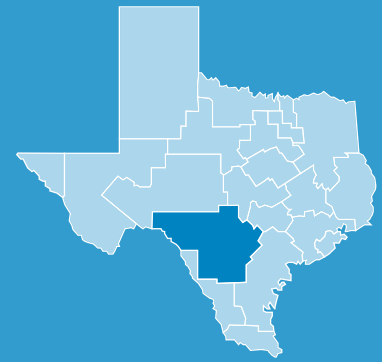
Medicaid & CHIP



Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,659
Medicaid Dental	\$426
CHIP Non- Dental	\$1,318
CHIP Dental	\$289

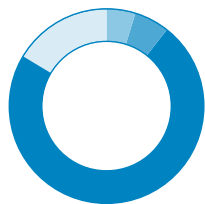
South - San Antonio



20 counties: Atascosa, Bandera, Bexar, Comal, Dimmit, Edwards, Frio, Gillespie, Guadalupe, Kendall, Kerr, Kinney, La Salle, McMullen, Medina, Real, Uvalde, Val Verde, Wilson, Zavala

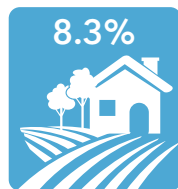
Population 2,542,934

County Populations

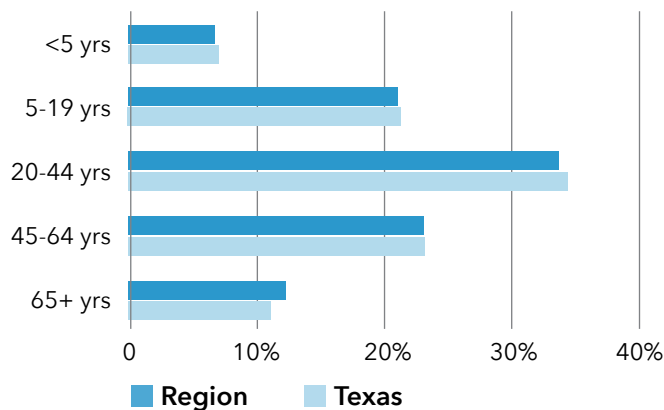


■ Bexar ■ Guadalupe
■ Comal ■ Others

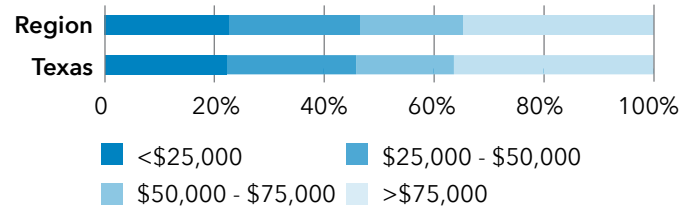
Rural Population



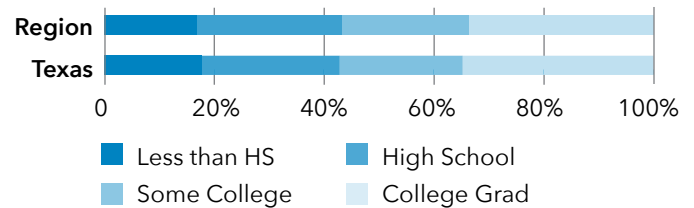
Age



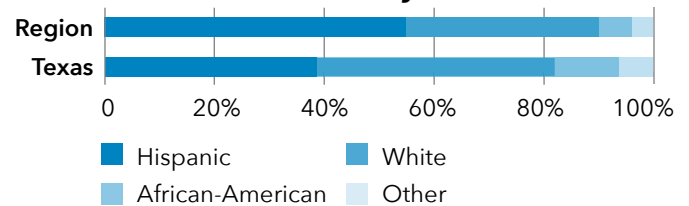
Income



Education



Race and Ethnicity

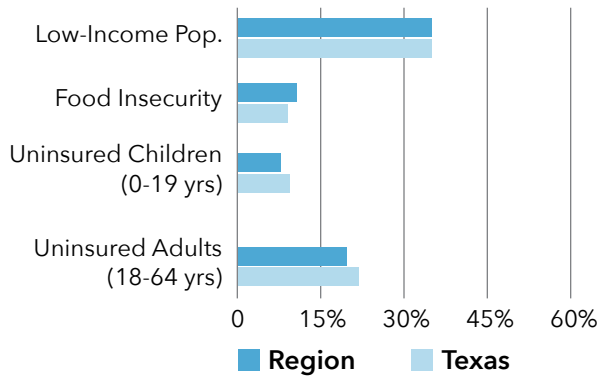


Key Points

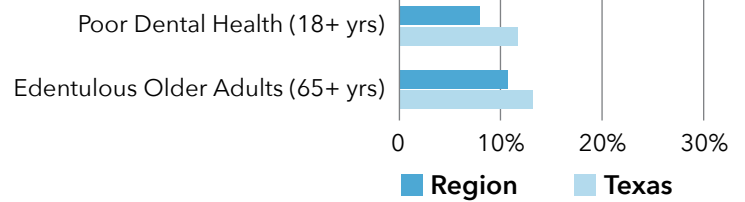
- Oral health outcomes in this region are among the state's best. The estimated rate of adults in poor dental health is 7.9%, while 10.6% of the region's older adults are edentulous.
- Rates of past-year dental visits in this region are in line with state averages, and higher than other south Texas regions. Provider supply is higher in this region than the state overall; however, Edwards, Kinney, McMullen, La Salle, and Zavala counties have no general dentists, pediatric dentists, or specialized dentists.
- This region has the lowest estimated rate of adult smoking in the state (11.5%).
- Compared to other regions in South Texas, the region's child (8.3%) and adult (20.9%) uninsured rates are lower.

South - San Antonio

Socioeconomic Factors



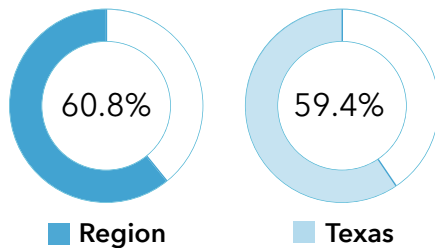
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	19.8	15.8
Oral Cancer Incidence rate per 100,000 Pop.	9.6	10.8
Oral Cancer Mortality rate per 100,000 Pop.	8.5	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

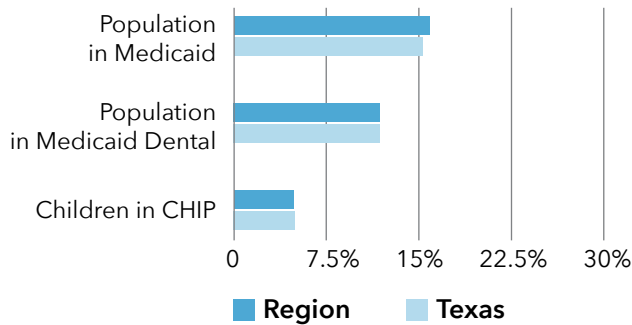


Population to Provider Ratio

	Region	Texas
General Dentist	2926: 1	2970: 1
Pediatric Dentist	7794: 1	9411: 1
Specialized Dentist	12812: 1	14291: 1
Dental Hygienist	2157: 1	2220: 1
Dental Assistant	712: 1	805: 1
Primary Care Physician	1328: 1	1362: 1
Nurse Practitioner	2107: 1	1961: 1
FQHCs per 100,000 pop.	2.1	1.5

Medicaid and CHIP

Enrollment (% of total population)

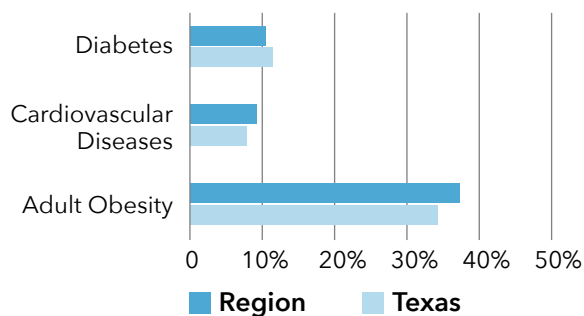


Annual Expenses Per Enrollee

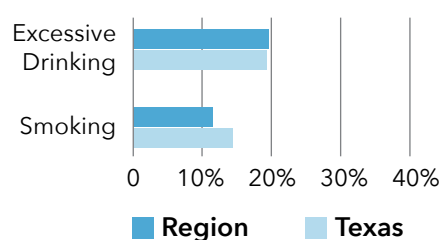
	Region	Texas
Medicaid Non-Dental	\$5,342	\$5,224
Medicaid Dental	\$420	\$419
CHIP Non-Dental	\$1,567	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

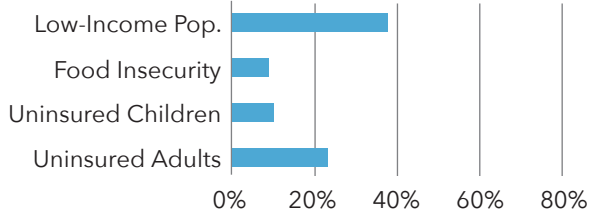


Behaviors



Atascosa County Population 47,710

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	8.6
Oral Cancer Mortality Rate per 100,000 pop.	1.9

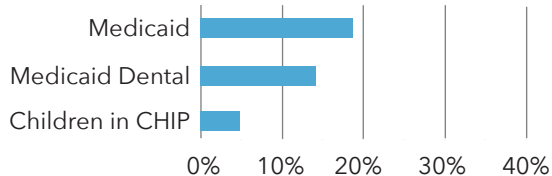
Clinical Care

Pop. to Provider Ratio

General Dentist	6565:1
Pediatric Dentist	6620:1
Specialized Dentist	26260:1
Dental Hygienist	4040:1
Dental Assistant	834:1
Primary Care Physician	2764:1
Nurse Practitioner	3283:1
FQHCs per 100,000 pop.	6.3

Medicaid & CHIP

Enrollment (% of total population)

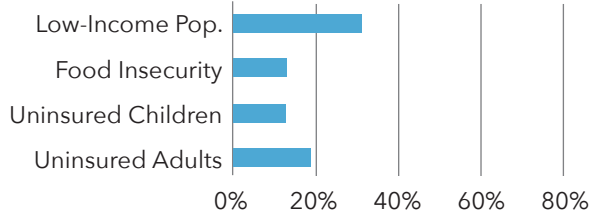


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,310
Medicaid Dental	\$422
CHIP Non- Dental	\$1,598
CHIP Dental	\$285

Bandera County Population 21,015

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.8
Oral Cancer Mortality Rate per 100,000 pop.	2

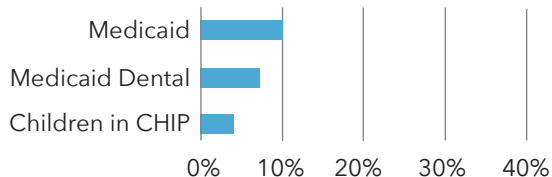
Clinical Care

Pop. to Provider Ratio

General Dentist	5931:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3954:1
Dental Assistant	913:1
Primary Care Physician	4745:1
Nurse Practitioner	5931:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

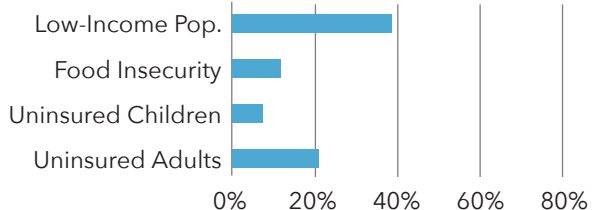


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,439
Medicaid Dental	\$423
CHIP Non- Dental	\$1,601
CHIP Dental	\$286

Bexar County Population 1,858,699

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	11.8
Oral Cancer Incidence Rate per 100,000 pop.	9.4
Oral Cancer Mortality Rate per 100,000 pop.	2.2

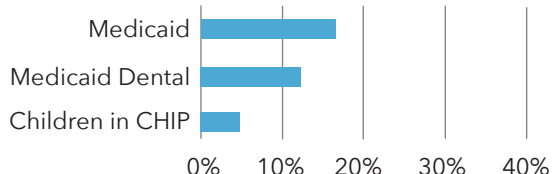
Clinical Care

Pop. to Provider Ratio

General Dentist	2732:1
Pediatric Dentist	6968:1
Specialized Dentist	10850:1
Dental Hygienist	2121:1
Dental Assistant	686:1
Primary Care Physician	1206:1
Nurse Practitioner	1874:1
FQHCs per 100,000 pop.	1.2

Medicaid & CHIP

Enrollment (% of total population)

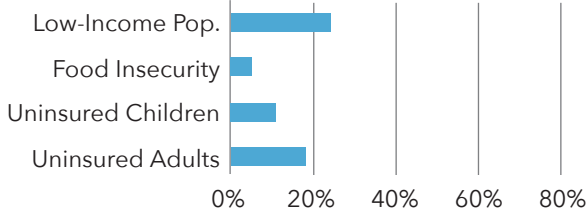


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,371
Medicaid Dental	\$420
CHIP Non- Dental	\$1,591
CHIP Dental	\$285

Comal County Population 124,234

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	12.1
Oral Cancer Incidence Rate per 100,000 pop.	10
Oral Cancer Mortality Rate per 100,000 pop.	1.9

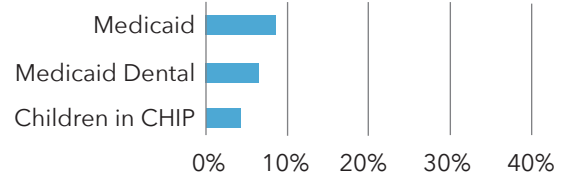
Clinical Care

Pop. to Provider Ratio

General Dentist	2402:1
Pediatric Dentist	9386:1
Specialized Dentist	13693:1
Dental Hygienist	1292:1
Dental Assistant	710:1
Primary Care Physician	1412:1
Nurse Practitioner	2282:1
FQHCs per 100,000 pop.	2.4

Medicaid & CHIP

Enrollment (% of total population)

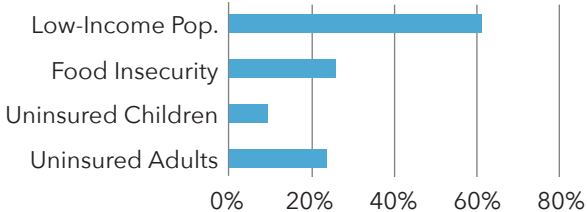


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,084
Medicaid Dental	\$414
CHIP Non- Dental	\$1,584
CHIP Dental	\$286

Dimmit County Population 10,842

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	3.1
Oral Cancer Mortality Rate per 100,000 pop.	6.2

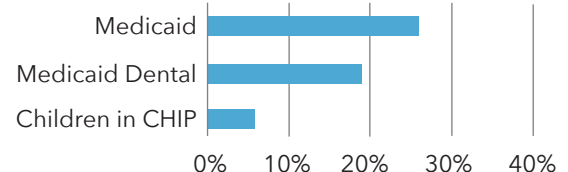
Clinical Care

Pop. to Provider Ratio

General Dentist	2661:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	10645:1
Dental Assistant	2129:1
Primary Care Physician	1331:1
Nurse Practitioner	5323:1
FQHCs per 100,000 pop.	18.4

Medicaid & CHIP

Enrollment (% of total population)

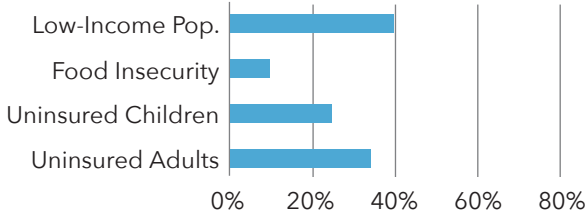


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,305
Medicaid Dental	\$422
CHIP Non- Dental	\$1,313
CHIP Dental	\$287

Edwards County Population 2,028

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	16.9
Oral Cancer Mortality Rate per 100,000 pop.	11.6

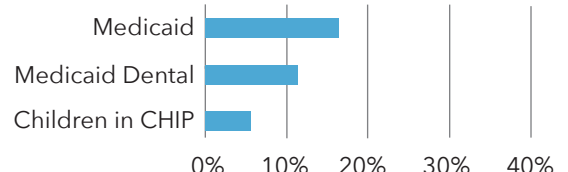
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	2144:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

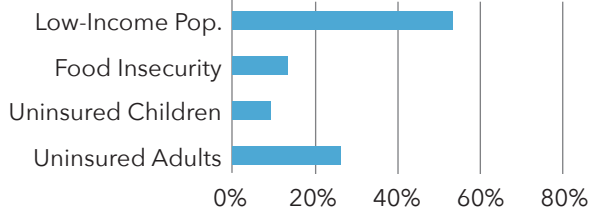


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,535
Medicaid Dental	\$416
CHIP Non- Dental	\$1,311
CHIP Dental	\$285

Frio County Population 18,542

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	5
Oral Cancer Mortality Rate per 100,000 pop.	1

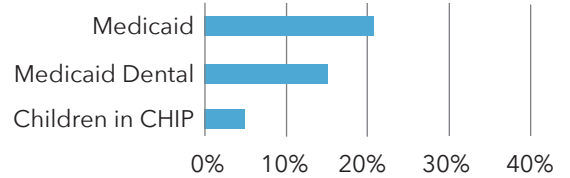
Clinical Care

Pop. to Provider Ratio

General Dentist	4808:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	9615:1
Dental Assistant	1131:1
Primary Care Physician	1748:1
Nurse Practitioner	1603:1
FQHCs per 100,000 pop.	10.8

Medicaid & CHIP

Enrollment (% of total population)

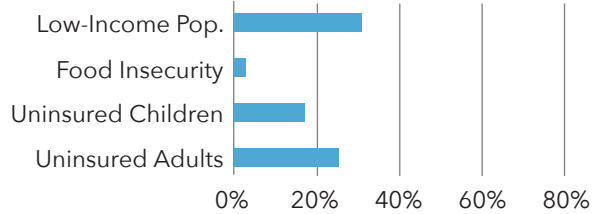


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,228
Medicaid Dental	\$421
CHIP Non- Dental	\$1,312
CHIP Dental	\$285

Gillespie County Population 25,732

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.6
Oral Cancer Mortality Rate per 100,000 pop.	2.3

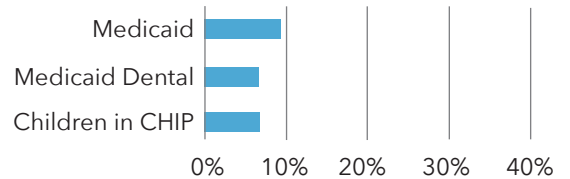
Clinical Care

Pop. to Provider Ratio

General Dentist	1886:1
Pediatric Dentist	-
Specialized Dentist	14144:1
Dental Hygienist	1768:1
Dental Assistant	643:1
Primary Care Physician	832:1
Nurse Practitioner	3143:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

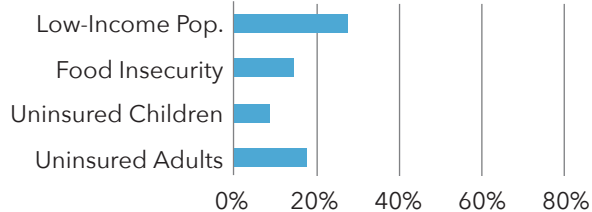


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,185
Medicaid Dental	\$416
CHIP Non- Dental	\$1,304
CHIP Dental	\$287

Guadalupe County Population 147,313

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.7
Oral Cancer Mortality Rate per 100,000 pop.	2.2

Clinical Care

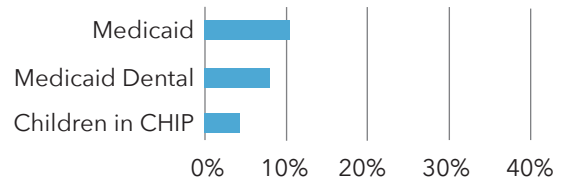
Pop. to Provider Ratio

General Dentist	3861:1
Pediatric Dentist	9572:1
Specialized Dentist	41507:1
Dental Hygienist	2185:1
Dental Assistant	595:1
Primary Care Physician	2722:1
Nurse Practitioner	6641:1
FQHCs per 100,000 pop.	0.7

Guadalupe

Medicaid & CHIP

Enrollment (% of total population)

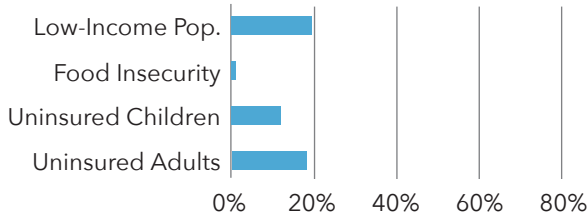


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,076
Medicaid Dental	\$418
CHIP Non- Dental	\$1,591
CHIP Dental	\$285

Kendall County Population 39,010

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11.7
Oral Cancer Mortality Rate per 100,000 pop.	1.5

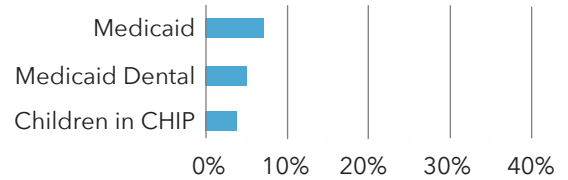
Clinical Care

Pop. to Provider Ratio

General Dentist	1880:1
Pediatric Dentist	4545:1
Specialized Dentist	6895:1
Dental Hygienist	1009:1
Dental Assistant	940:1
Primary Care Physician	1034:1
Nurse Practitioner	2434:1
FQHCs per 100,000 pop.	2.6

Medicaid & CHIP

Enrollment (% of total population)

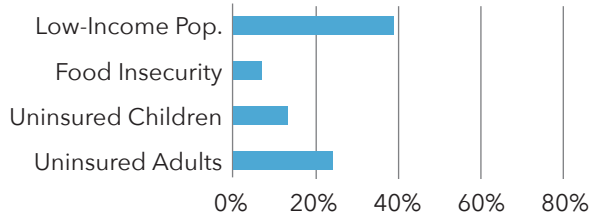


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,314
Medicaid Dental	\$418
CHIP Non- Dental	\$1,589
CHIP Dental	\$285

Kerr County Population 50,505

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12
Oral Cancer Mortality Rate per 100,000 pop.	2.7

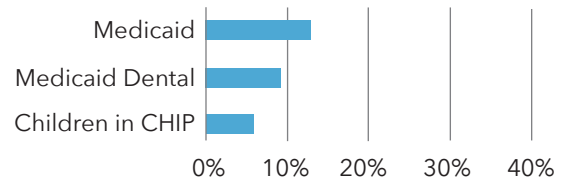
Clinical Care

Pop. to Provider Ratio

General Dentist	2607:1
Pediatric Dentist	-
Specialized Dentist	10948:1
Dental Hygienist	2106:1
Dental Assistant	944:1
Primary Care Physician	995:1
Nurse Practitioner	1521:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

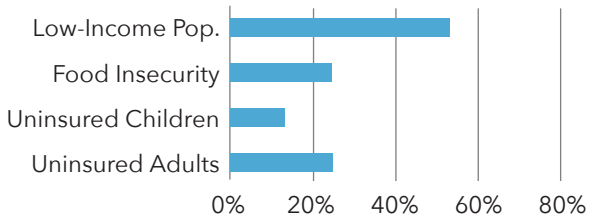


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,178
Medicaid Dental	\$418
CHIP Non- Dental	\$1,310
CHIP Dental	\$284

Kinney County Population 3,578

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	2.9
Oral Cancer Mortality Rate per 100,000 pop.	0

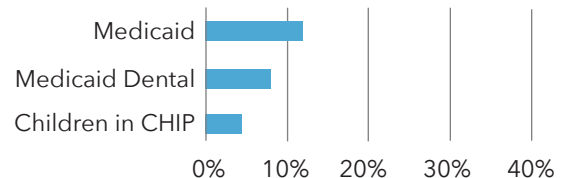
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	3765:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	27.9

Medicaid & CHIP

Enrollment (% of total population)

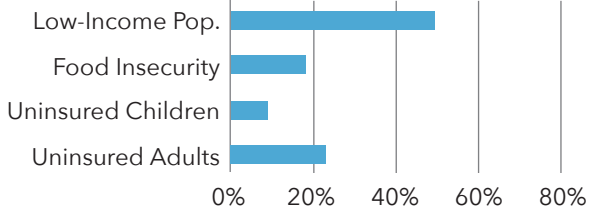


Annual Expenses per Enrollee

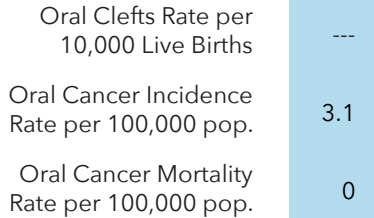
Medicaid Non- Dental	\$5,781
Medicaid Dental	\$414
CHIP Non- Dental	\$1,308
CHIP Dental	\$294

La Salle County Population 7,319

Socioeconomic Factors



Oral Health Outcomes



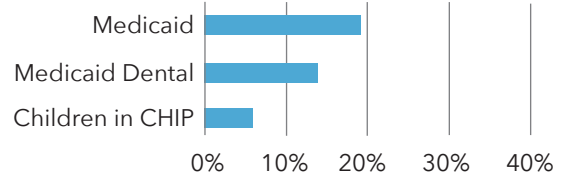
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	7837:1
Dental Assistant	2612:1
Primary Care Physician	3919:1
Nurse Practitioner	3919:1
FQHCs per 100,000 pop.	41

Medicaid & CHIP

Enrollment (% of total population)

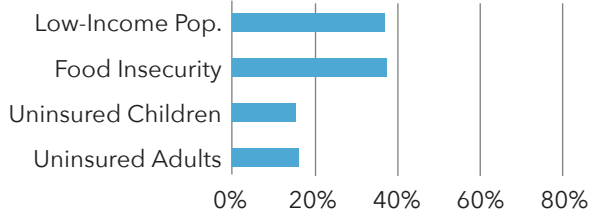


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,646
Medicaid Dental	\$419
CHIP Non- Dental	\$1,308
CHIP Dental	\$287

McMullen County Population 671

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	16.2
Oral Cancer Mortality Rate per 100,000 pop.	16.2

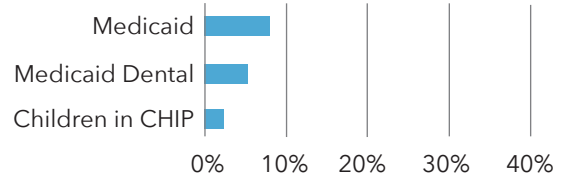
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	149

Medicaid & CHIP

Enrollment (% of total population)

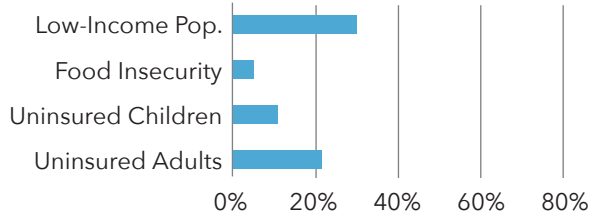


Annual Expenses per Enrollee

Medicaid Non- Dental	\$7,116
Medicaid Dental	\$411
CHIP Non- Dental	\$1,313
CHIP Dental	\$254

Medina County Population 47,920

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	1.4

Clinical Care

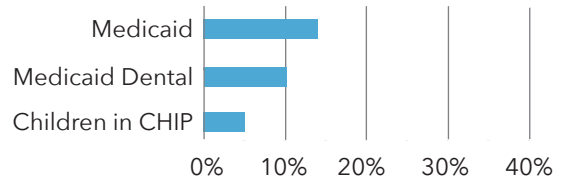
Pop. to Provider Ratio

General Dentist	5946:1
Pediatric Dentist	-
Specialized Dentist	53517:1
Dental Hygienist	5946:1
Dental Assistant	695:1
Primary Care Physician	3148:1
Nurse Practitioner	6690:1
FQHCs per 100,000 pop.	4.2

Medina

Medicaid & CHIP

Enrollment (% of total population)

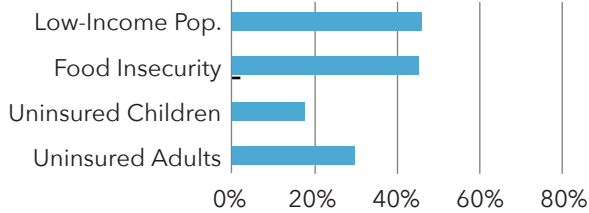


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,541
Medicaid Dental	\$422
CHIP Non- Dental	\$1,582
CHIP Dental	\$287

Real County Population 3,348

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	7.8
Oral Cancer Mortality Rate per 100,000 pop.	7.9

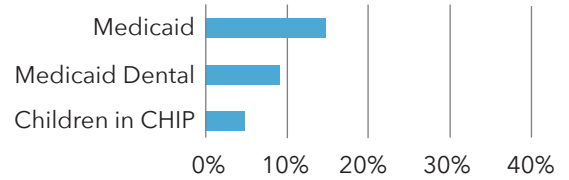
Clinical Care

Pop. to Provider Ratio

General Dentist	3418:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	3418:1
Primary Care Physician	-
Nurse Practitioner	3418:1
FQHCs per 100,000 pop.	59.7

Medicaid & CHIP

Enrollment (% of total population)

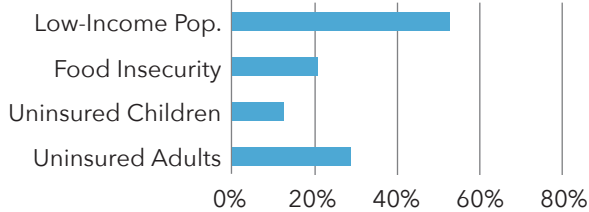


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,823
Medicaid Dental	\$413
CHIP Non- Dental	\$1,334
CHIP Dental	\$283

Uvalde County Population 27,055

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6.5
Oral Cancer Mortality Rate per 100,000 pop.	3

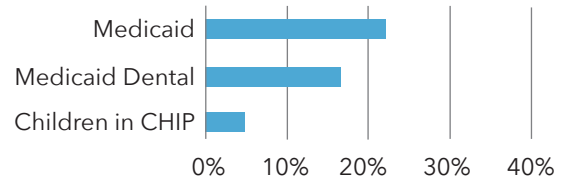
Clinical Care

Pop. to Provider Ratio

General Dentist	9314:1
Pediatric Dentist	7446:1
Specialized Dentist	-
Dental Hygienist	3493:1
Dental Assistant	717:1
Primary Care Physician	1471:1
Nurse Practitioner	2329:1
FQHCs per 100,000 pop.	14.8

Medicaid & CHIP

Enrollment (% of total population)

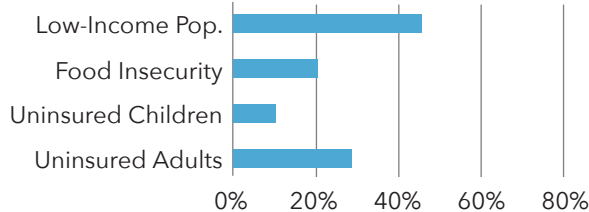


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,132
Medicaid Dental	\$422
CHIP Non- Dental	\$1,316
CHIP Dental	\$287

Val Verde County Population 48,862

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	8.9
Oral Cancer Mortality Rate per 100,000 pop.	2.3

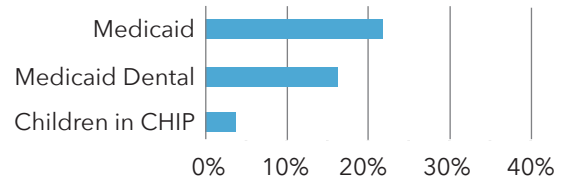
Clinical Care

Pop. to Provider Ratio

General Dentist	5782:1
Pediatric Dentist	14146:1
Specialized Dentist	-
Dental Hygienist	4003:1
Dental Assistant	1301:1
Primary Care Physician	2082:1
Nurse Practitioner	2739:1
FQHCs per 100,000 pop.	6.1

Medicaid & CHIP

Enrollment (% of total population)

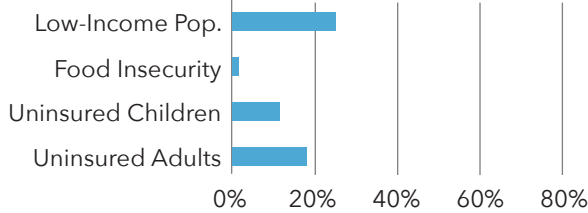


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,166
Medicaid Dental	\$420
CHIP Non- Dental	\$1,310
CHIP Dental	\$288

Wilson County Population 46,444

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.8
Oral Cancer Mortality Rate per 100,000 pop.	2.4

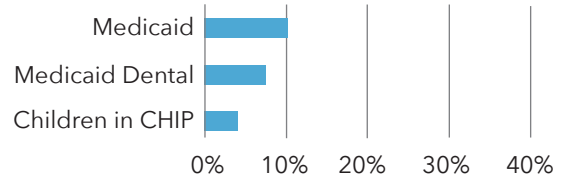
Clinical Care

Pop. to Provider Ratio

General Dentist	5862:1
Pediatric Dentist	11193:1
Specialized Dentist	52760:1
Dental Hygienist	4059:1
Dental Assistant	1015:1
Primary Care Physician	2638:1
Nurse Practitioner	3104:1
FQHCs per 100,000 pop.	2.2

Medicaid & CHIP

Enrollment (% of total population)

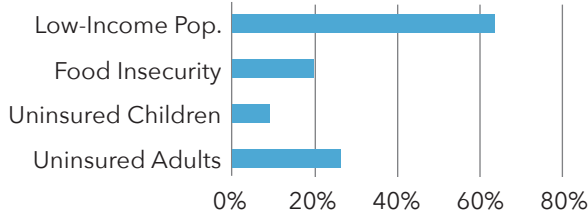


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,506
Medicaid Dental	\$419
CHIP Non- Dental	\$1,590
CHIP Dental	\$285

Zavala County Population 12,107

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	3.3
Oral Cancer Mortality Rate per 100,000 pop.	0

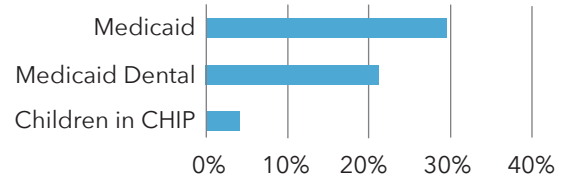
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	12560:1
Dental Assistant	2093:1
Primary Care Physician	6280:1
Nurse Practitioner	12560:1
FQHCs per 100,000 pop.	16.5

Medicaid & CHIP

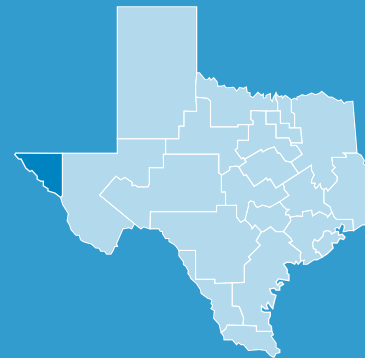
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,269
Medicaid Dental	\$424
CHIP Non- Dental	\$1,313
CHIP Dental	\$288

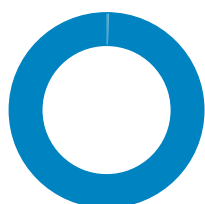
West - El Paso



2 counties: El Paso, Hudspeth

Population 837,073

County Populations



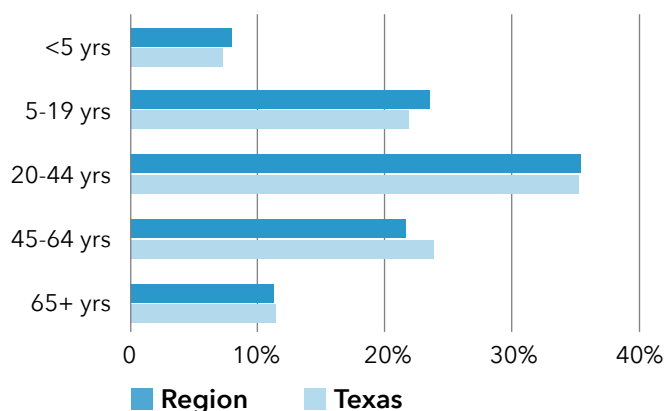
■ El Paso

■ Hudspeth

Rural Population



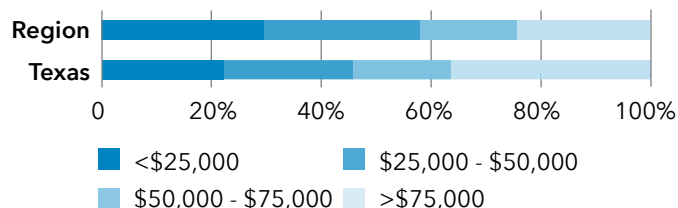
Age



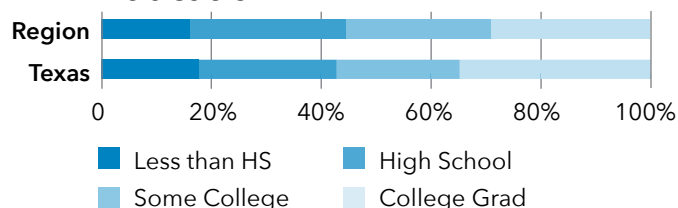
■ Region

■ Texas

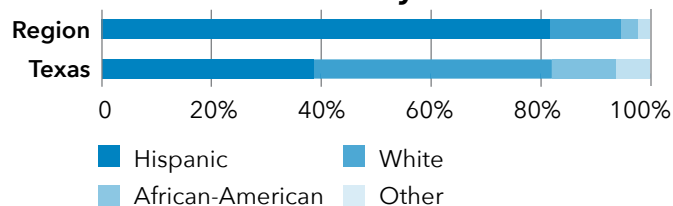
Income



Education



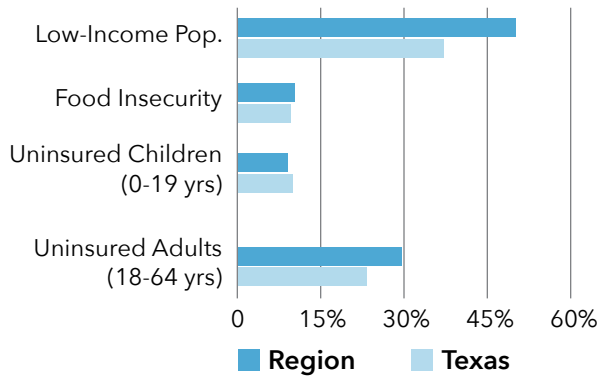
Race and Ethnicity



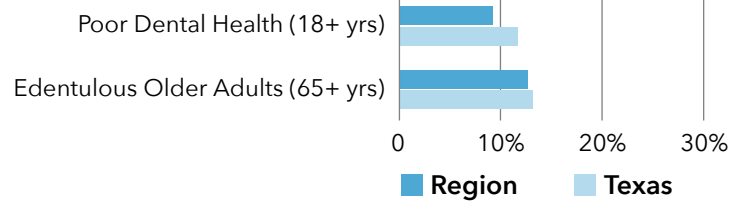
Key Points

- Oral health outcomes in this region are similar to or better than the state average. The oral cancer incidence rate in this region is lower than every region except South - Laredo.
- Provider supply in this region is lower than nearly all other regions of the state. This region has the second lowest supply of primary care physicians and third lowest supplies of general dentists and dental hygienists. There are relatively more FQHCs per capita in the region.
- About one in five adults in this region drink excessively (21.5%) and one in six smoke (17.0%).
- Over half the population in this region is considered low-income. Child and adult uninsured rates in this region are well above the state average, but are the lowest of the three border regions.

Socioeconomic Factors



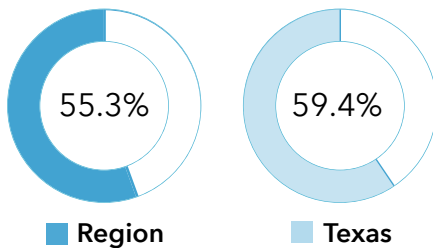
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	14.1	15.8
Oral Cancer Incidence rate per 100,000 Pop.	7.2	10.8
Oral Cancer Mortality rate per 100,00 Pop.	2.2	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

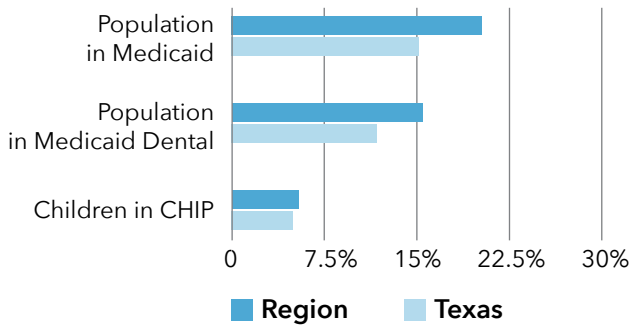


Population to Provider Ratio

	Region	Texas
General Dentist	5506: 1	2970: 1
Pediatric Dentist	9841: 1	9411: 1
Specialized Dentist	18168: 1	14291: 1
Dental Hygienist	3390: 1	2220: 1
Dental Assistant	972: 1	805: 1
Primary Care Physician	2019: 1	1362: 1
Nurse Practitioner	2132: 1	1961: 1
FQHCs per 100,000 pop.	2.9	1.5

Medicaid and CHIP

Enrollment (% of total population)

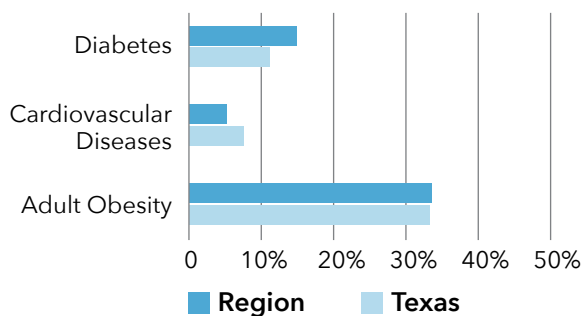


Annual Expenses Per Enrollee

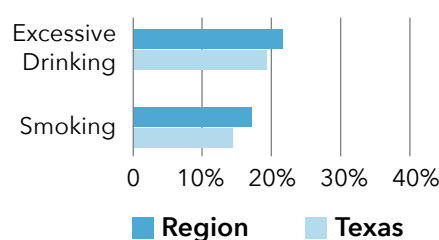
	Region	Texas
Medicaid Non-Dental	\$4,530	\$5,224
Medicaid Dental	\$422	\$419
CHIP Non-Dental	\$1,593	\$1,527
CHIP Dental	\$287	\$285

Risk Factors

Chronic Conditions

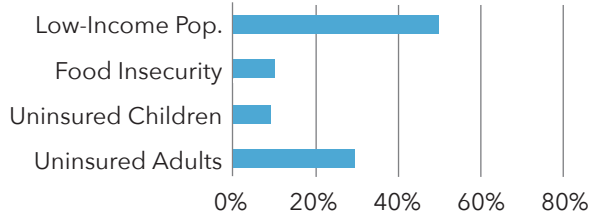


Behaviors



El Paso County Population 833,592

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	10.5
Oral Cancer Incidence Rate per 100,000 pop.	7.3
Oral Cancer Mortality Rate per 100,000 pop.	1.6

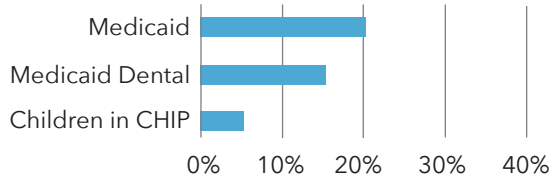
Clinical Care

Pop. to Provider Ratio

General Dentist	5482:1
Pediatric Dentist	9804:1
Specialized Dentist	18092:1
Dental Hygienist	3375:1
Dental Assistant	968:1
Primary Care Physician	2015:1
Nurse Practitioner	2123:1
FQHCs per 100,000 pop.	2.5

Medicaid & CHIP

Enrollment (% of total population)

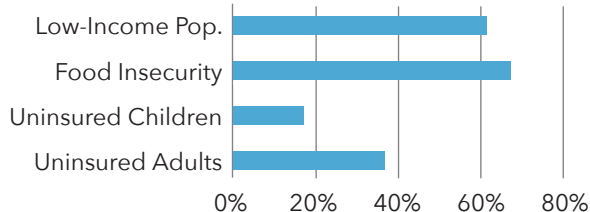


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,529
Medicaid Dental	\$422
CHIP Non- Dental	\$1,593
CHIP Dental	\$287

Hudspeth County Population 3,481

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

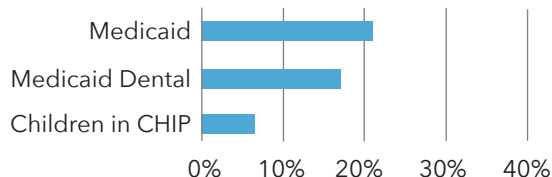
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	3835:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	86.2

Medicaid & CHIP

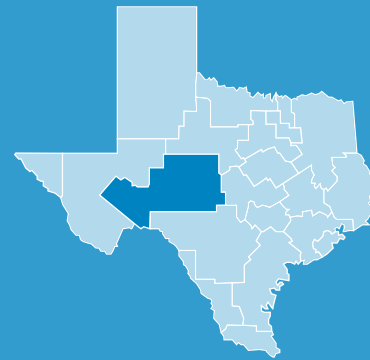
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,744
Medicaid Dental	\$422
CHIP Non- Dental	\$1,571
CHIP Dental	\$290

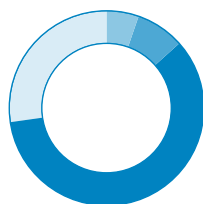
West - San Angelo



17 counties: Coke, Coleman, Concho, Crockett, Irion, Kimble, Mason, McCulloch, Menard, Pecos, Reagan, Runnels, Schleicher, Sterling, Sutton, Terrell, Tom Green

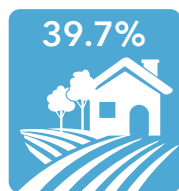
Population 195,479

County Populations

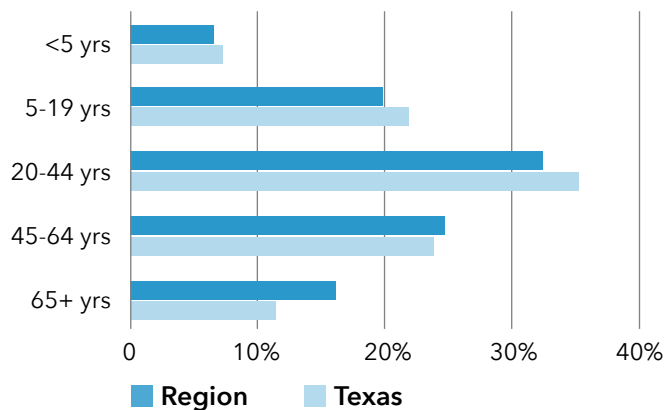


■ Tom Green ■ Pecos
■ Runnels ■ Others

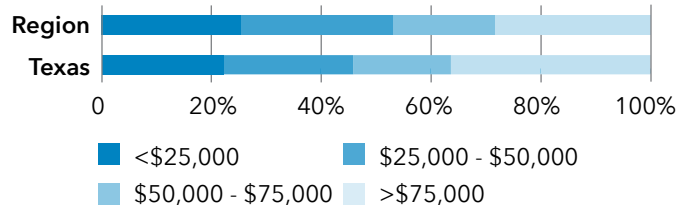
Rural Population



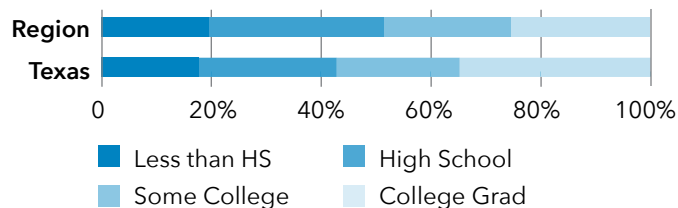
Age



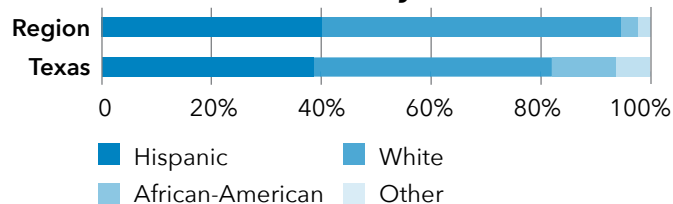
Income



Education



Race and Ethnicity

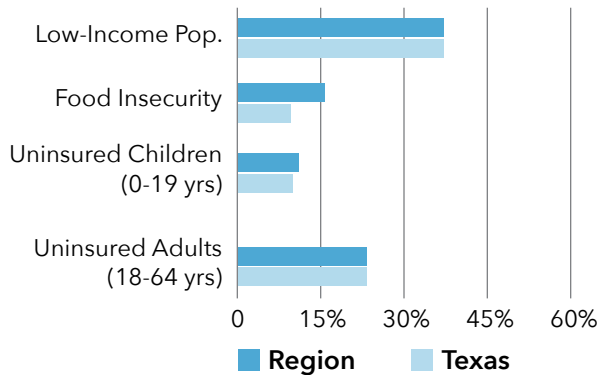


Key Points

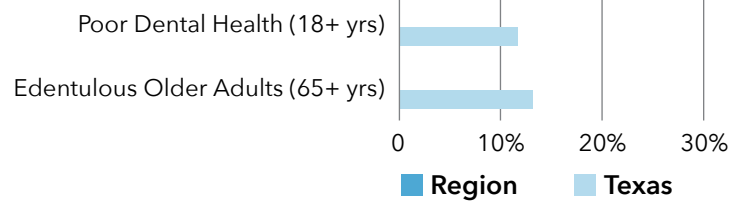
- Fourteen of this region's 17 counties have populations less than 10,000, and 39.7% of the total population is rural.
- This region has the second lowest number of pediatric dentists in the state. Only Tom Green County has a pediatric dentist and only Tom Green and Pecos County have specialized dentists.
- The region has an above-average estimated percentage of adults who smoke. Annual mortality from oral cancer in this region (4.2 deaths per 100,000 population) is third highest of any region in the state.

West - San Angelo

Socioeconomic Factors



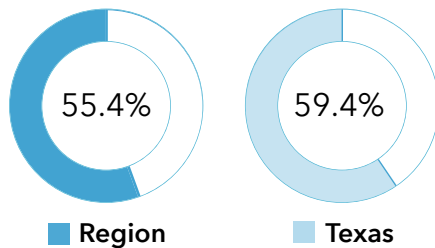
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	18.8	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11.5	10.8
Oral Cancer Mortality rate per 100,00 Pop.	4.2	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

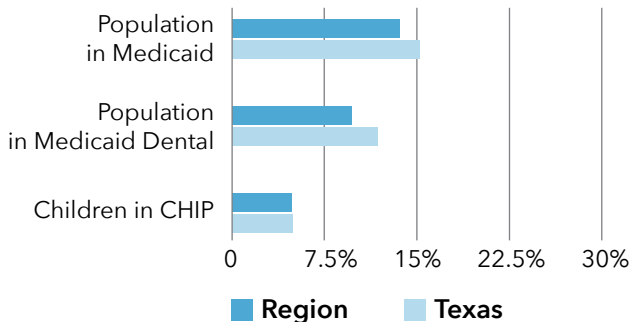


Population to Provider Ratio

	Region	Texas
General Dentist	4710: 1	2970: 1
Pediatric Dentist	22534: 1	9411: 1
Specialized Dentist	16484: 1	14291: 1
Dental Hygienist	2603: 1	2220: 1
Dental Assistant	1252: 1	805: 1
Primary Care Physician	1214: 1	1362: 1
Nurse Practitioner	2150: 1	1961: 1
FQHCs per 100,000 pop.	5.1	1.5

Medicaid and CHIP

Enrollment (% of total population)

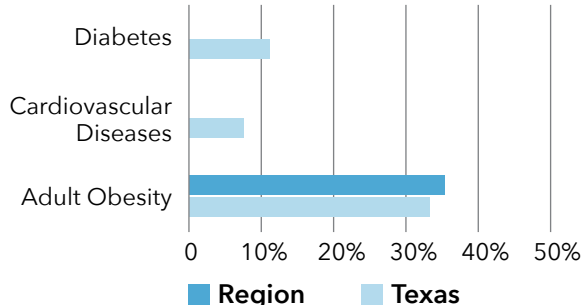


Annual Expenses Per Enrollee

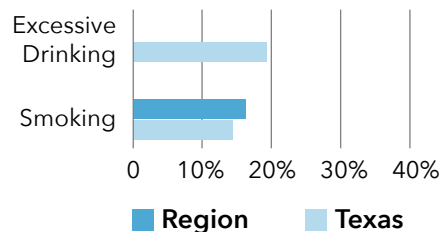
	Region	Texas
Medicaid Non-Dental	\$5,333	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,308	\$1,527
CHIP Dental	\$284	\$285

Risk Factors

Chronic Conditions

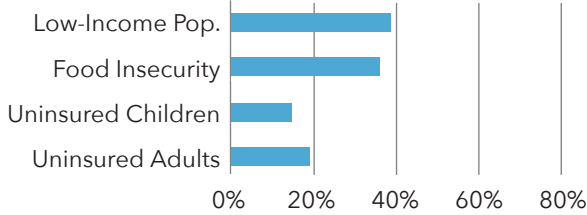


Behaviors



Coke County Population 3,228

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.6
Oral Cancer Mortality Rate per 100,000 pop.	0

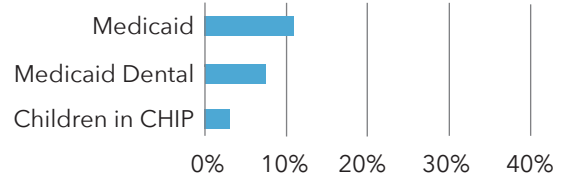
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1579:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

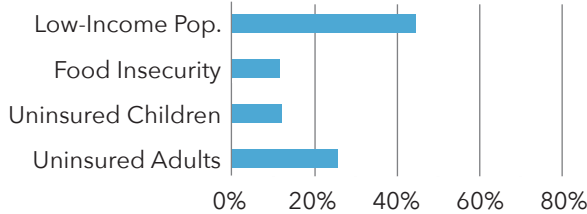


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,730
Medicaid Dental	\$414
CHIP Non- Dental	\$1,309
CHIP Dental	\$285

Coleman County Population 8,476

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	14.1
Oral Cancer Mortality Rate per 100,000 pop.	2.6

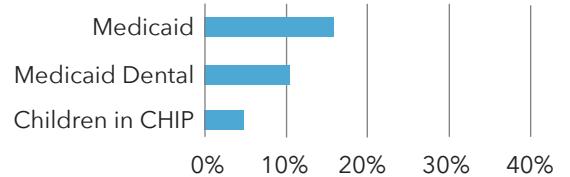
Clinical Care

Pop. to Provider Ratio

General Dentist	3049:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1307:1
Primary Care Physician	2287:1
Nurse Practitioner	2287:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

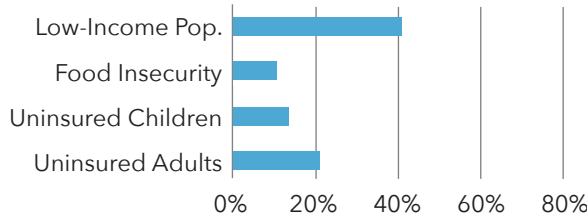


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,903
Medicaid Dental	\$426
CHIP Non- Dental	\$1,328
CHIP Dental	\$281

Concho County Population 4,142

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.1
Oral Cancer Mortality Rate per 100,000 pop.	13.4

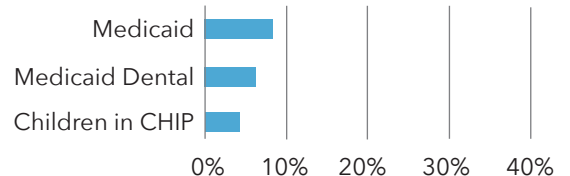
Clinical Care

Pop. to Provider Ratio

General Dentist	4256:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4256:1
Dental Assistant	2128:1
Primary Care Physician	1419:1
Nurse Practitioner	4256:1
FQHCs per 100,000 pop.	24.1

Medicaid & CHIP

Enrollment (% of total population)

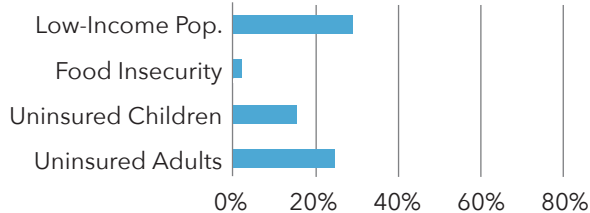


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,685
Medicaid Dental	\$419
CHIP Non- Dental	\$1,309
CHIP Dental	\$282

Crockett County Population 3,836

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.1
Oral Cancer Mortality Rate per 100,000 pop.	3.3

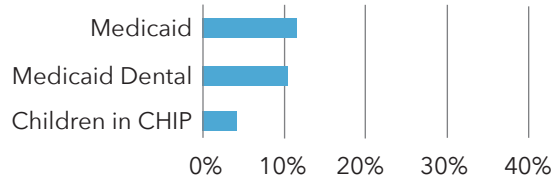
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3986:1
Dental Assistant	3986:1
Primary Care Physician	3986:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

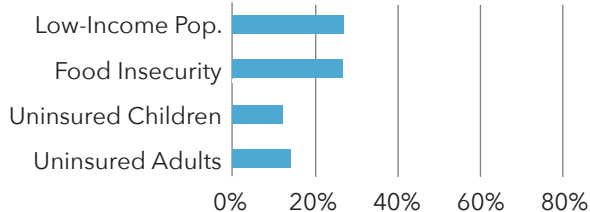


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,511
Medicaid Dental	\$413
CHIP Non- Dental	\$1,298
CHIP Dental	\$288

Irion County Population 1,631

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

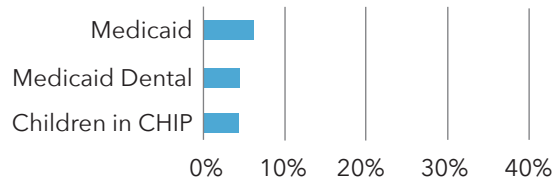
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	1697:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

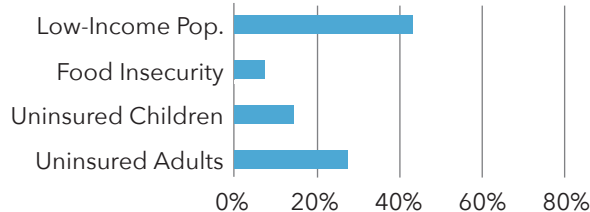


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,501
Medicaid Dental	\$415
CHIP Non- Dental	\$1,314
CHIP Dental	\$291

Kimble County Population 4,453

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	8.2
Oral Cancer Mortality Rate per 100,000 pop.	4.1

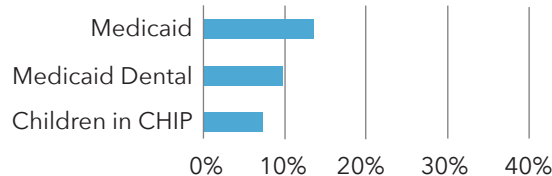
Clinical Care

Pop. to Provider Ratio

General Dentist	4917:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	4917:1
Primary Care Physician	2459:1
Nurse Practitioner	4917:1
FQHCs per 100,000 pop.	22.5

Medicaid & CHIP

Enrollment (% of total population)

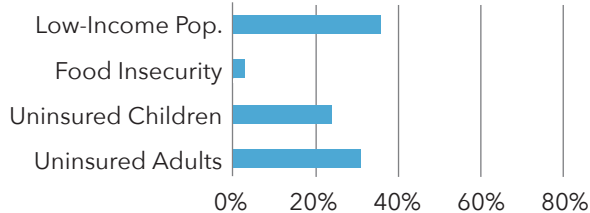


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,654
Medicaid Dental	\$425
CHIP Non- Dental	\$1,322
CHIP Dental	\$284

Mason County Population 4,064

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	2
Oral Cancer Mortality Rate per 100,000 pop.	0

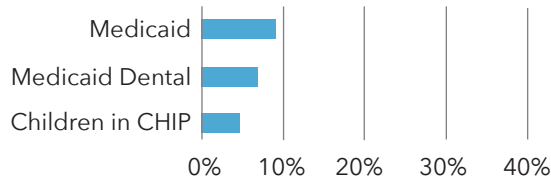
Clinical Care

Pop. to Provider Ratio

General Dentist	4155:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2078:1
Dental Assistant	2078:1
Primary Care Physician	4155:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	24.6

Medicaid & CHIP

Enrollment (% of total population)

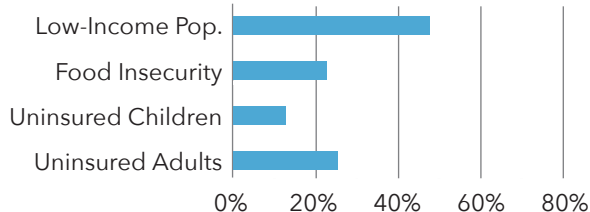


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,974
Medicaid Dental	\$420
CHIP Non- Dental	\$1,317
CHIP Dental	\$280

McCulloch County Population 8,242

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	14.5
Oral Cancer Mortality Rate per 100,000 pop.	7

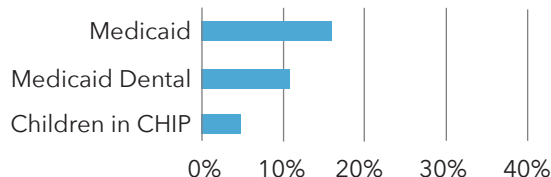
Clinical Care

Pop. to Provider Ratio

General Dentist	8798:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2933:1
Dental Assistant	2200:1
Primary Care Physician	1466:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	12.1

Medicaid & CHIP

Enrollment (% of total population)

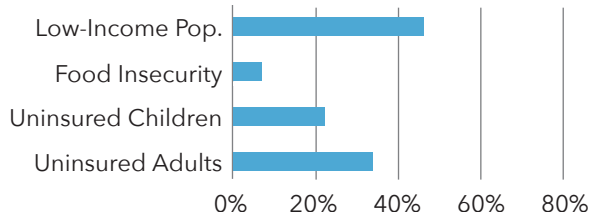


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,930
Medicaid Dental	\$423
CHIP Non- Dental	\$1,311
CHIP Dental	\$284

Menard County Population 2,163

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

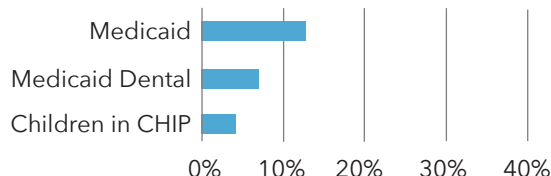
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1190:1
Primary Care Physician	2380:1
Nurse Practitioner	2380:1
FQHCs per 100,000 pop.	92.5

Medicaid & CHIP

Enrollment (% of total population)

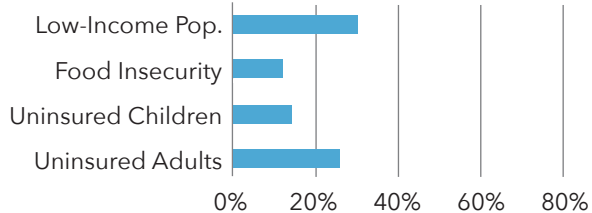


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,749
Medicaid Dental	\$429
CHIP Non- Dental	\$1,330
CHIP Dental	\$284

Pecos County Population 15,826

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	14.5
Oral Cancer Mortality Rate per 100,000 pop.	3.6

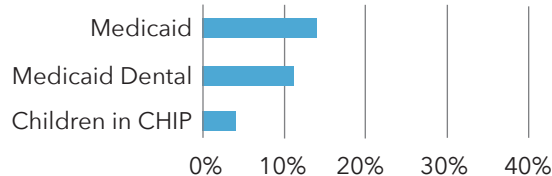
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	16661:1
Dental Hygienist	5554:1
Dental Assistant	1851:1
Primary Care Physician	2083:1
Nurse Practitioner	2380:1
FQHCs per 100,000 pop.	6.3

Medicaid & CHIP

Enrollment (% of total population)

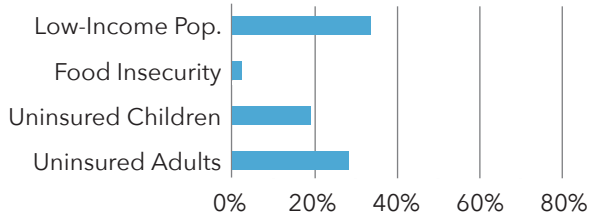


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,715
Medicaid Dental	\$416
CHIP Non- Dental	\$1,305
CHIP Dental	\$285

Reagan County Population 3,625

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	4.5
Oral Cancer Mortality Rate per 100,000 pop.	0

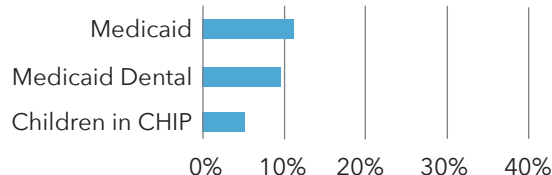
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3747:1
Dental Assistant	3747:1
Primary Care Physician	1874:1
Nurse Practitioner	1874:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

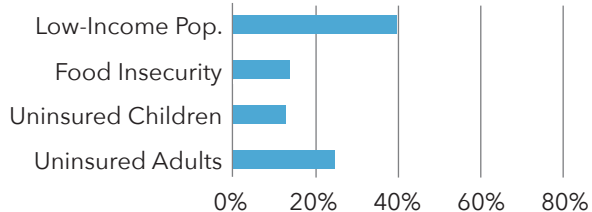


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,638
Medicaid Dental	\$403
CHIP Non- Dental	\$1,307
CHIP Dental	\$275

Runnels County Population 10,411

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	9.7
Oral Cancer Mortality Rate per 100,000 pop.	4.4

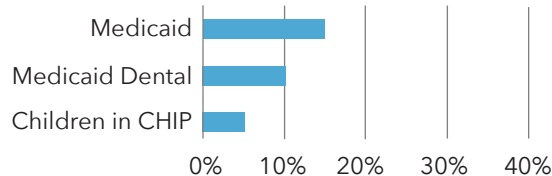
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	10846:1
Dental Assistant	1549:1
Primary Care Physician	1356:1
Nurse Practitioner	5423:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

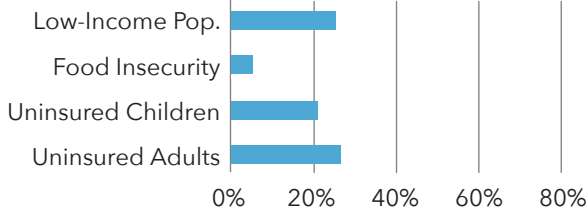


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,774
Medicaid Dental	\$422
CHIP Non- Dental	\$1,313
CHIP Dental	\$283

Schleicher County Population 3,171

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	3.6
Oral Cancer Mortality Rate per 100,000 pop.	8.6

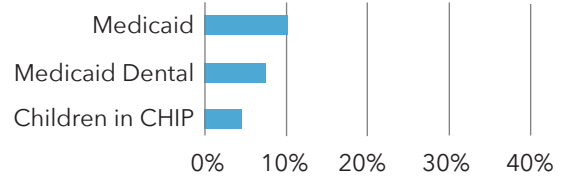
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	3792:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

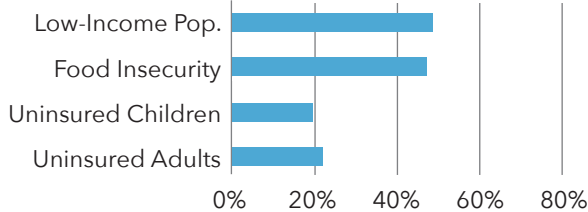


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,299
Medicaid Dental	\$428
CHIP Non- Dental	\$1,316
CHIP Dental	\$277

Sterling County Population 1,233

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

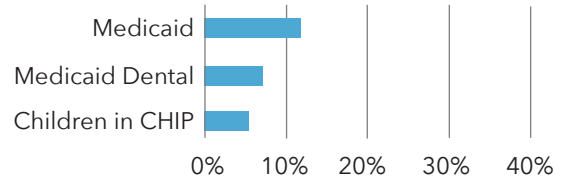
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1201:1
Primary Care Physician	-
Nurse Practitioner	1201:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

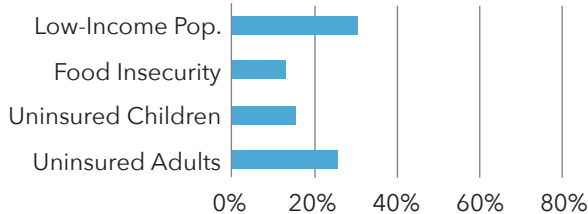


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,195
Medicaid Dental	\$425
CHIP Non- Dental	\$1,286
CHIP Dental	\$295

Sutton County Population 3,936

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.1
Oral Cancer Mortality Rate per 100,000 pop.	3.2

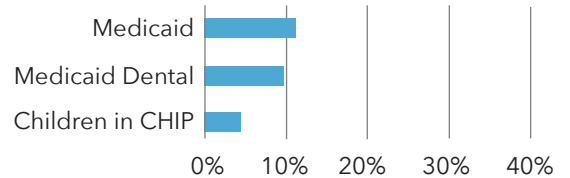
Clinical Care

Pop. to Provider Ratio

General Dentist	4505:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2253:1
Dental Assistant	1502:1
Primary Care Physician	4505:1
Nurse Practitioner	4505:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

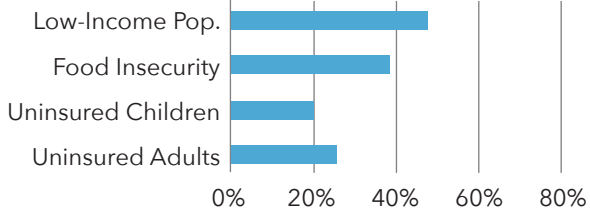


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,424
Medicaid Dental	\$422
CHIP Non- Dental	\$1,308
CHIP Dental	\$287

Terrell County Population 778

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

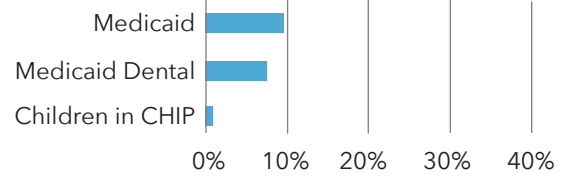
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

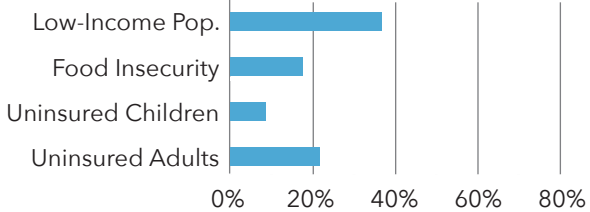


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,227
Medicaid Dental	\$431
CHIP Non- Dental	\$1,400
CHIP Dental	\$284

Tom Green County Population 116,264

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	10.6
Oral Cancer Incidence Rate per 100,000 pop.	12.8
Oral Cancer Mortality Rate per 100,000 pop.	2.4

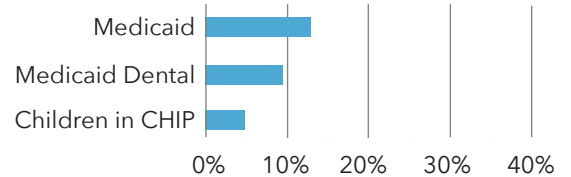
Clinical Care

Pop. to Provider Ratio

General Dentist	3339:1
Pediatric Dentist	13548:1
Specialized Dentist	10320:1
Dental Hygienist	1831:1
Dental Assistant	979:1
Primary Care Physician	908:1
Nurse Practitioner	1599:1
FQHCs per 100,000 pop.	2.6

Medicaid & CHIP

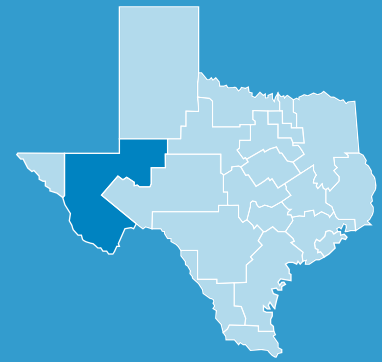
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,318
Medicaid Dental	\$416
CHIP Non- Dental	\$1,305
CHIP Dental	\$285

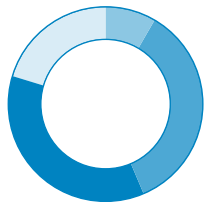
West - Midland/Big Bend



16 counties: Andrews, Brewster, Crane, Culberson, Ector, Glasscock, Howard, Jeff Davis, Loving, Martin, Midland, Presidio, Reeves, Upton, Ward, Winkler

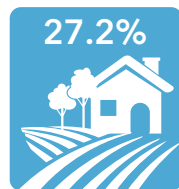
Population 432,079

County Populations

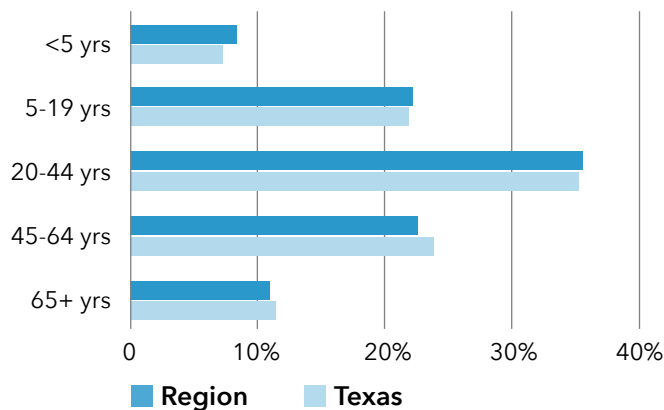


Midland Ector
Howard Others

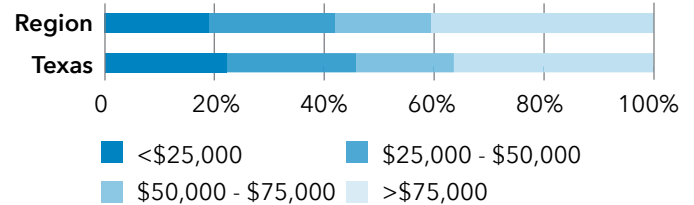
Rural Population



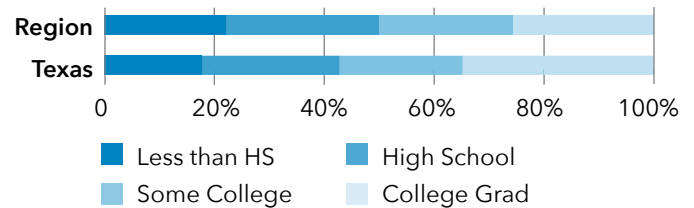
Age



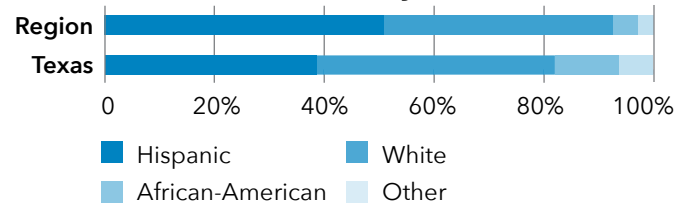
Income



Education



Race and Ethnicity

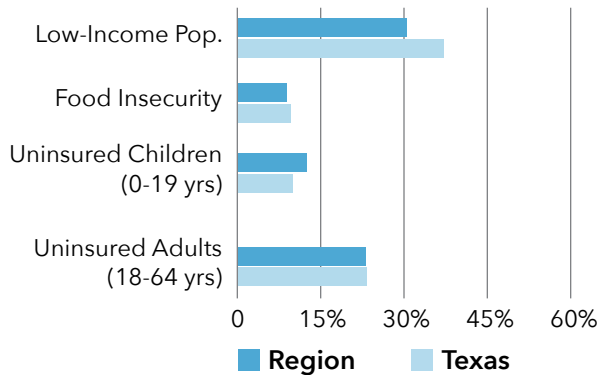


Key Points

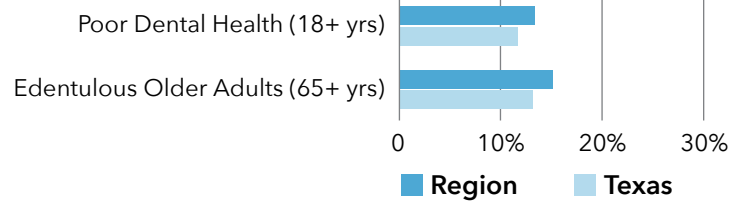
- Midland's estimated rates of adults in poor dental health (13.3%), edentulous older adults (15.1%), and adults making a past-year dental visit (58.2%) are below the state average, but better than rates observed in several other rural regions.
- The number of health professionals is low in the region. Only Midland and Ector Counties (the two largest counties in the region) have pediatric and specialized dentists.
- Midland has the third lowest estimated rate of diabetes (9.9%) and second lowest estimated rate of excessive drinking (16.2%) in the state.
- Less than one-third of the population is low-income, yet this region has the highest percentage of uninsured children in the state (12.5%).

West - Midland/Big Bend

Socioeconomic Factors



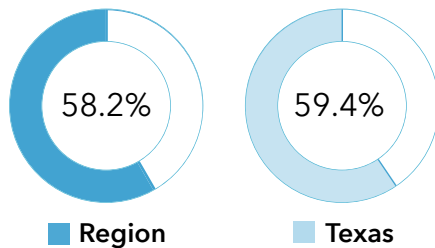
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	20.6	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11.9	10.8
Oral Cancer Mortality rate per 100,00 Pop.	3.2	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

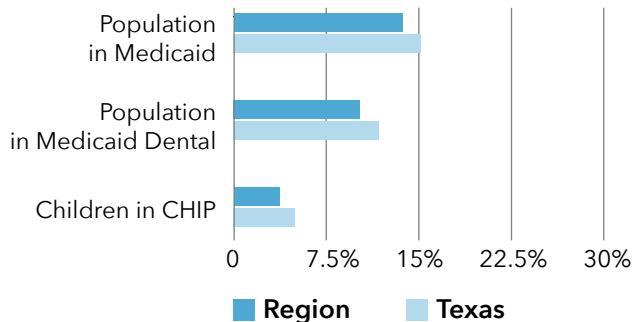


Population to Provider Ratio

	Region	Texas
General Dentist	4228: 1	2970: 1
Pediatric Dentist	14847: 1	9411: 1
Specialized Dentist	16589: 1	14291: 1
Dental Hygienist	2370: 1	2220: 1
Dental Assistant	866: 1	805: 1
Primary Care Physician	1705: 1	1362: 1
Nurse Practitioner	2074: 1	1961: 1
FQHCs per 100,000 pop.	2.5	1.5

Medicaid and CHIP

Enrollment (% of total population)

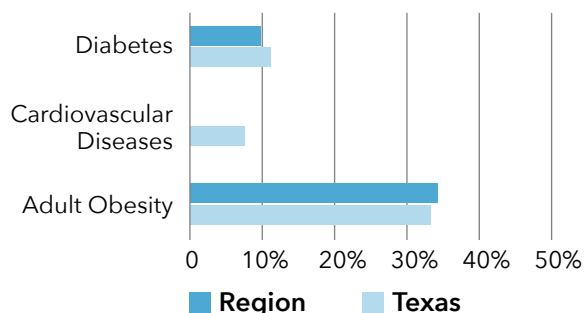


Annual Expenses Per Enrollee

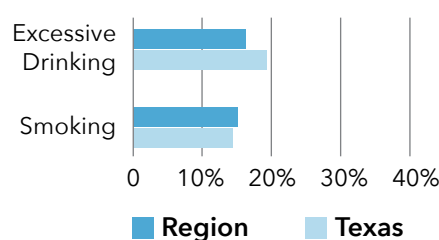
	Region	Texas
Medicaid Non-Dental	\$4,996	\$5,224
Medicaid Dental	\$409	\$419
CHIP Non-Dental	\$1,306	\$1,527
CHIP Dental	\$284	\$285

Risk Factors

Chronic Conditions

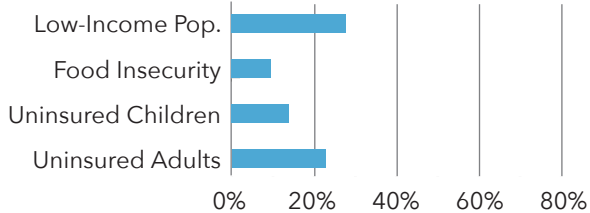


Behaviors



Andrews County Population 17,215

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	17
Oral Cancer Mortality Rate per 100,000 pop.	9.2

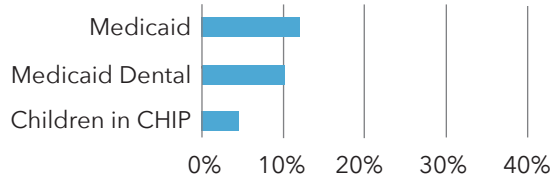
Clinical Care

Pop. to Provider Ratio

General Dentist	3333:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	980:1
Primary Care Physician	1852:1
Nurse Practitioner	2083:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

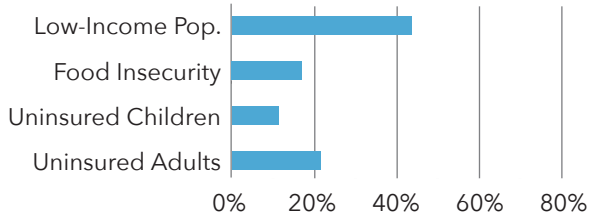


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,658
Medicaid Dental	\$410
CHIP Non- Dental	\$1,306
CHIP Dental	\$281

Brewster County Population 9,188

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	7.4
Oral Cancer Mortality Rate per 100,000 pop.	3.4

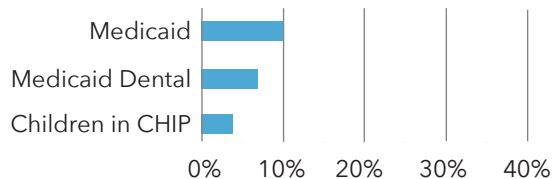
Clinical Care

Pop. to Provider Ratio

General Dentist	4986:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2493:1
Dental Assistant	1994:1
Primary Care Physician	1246:1
Nurse Practitioner	1662:1
FQHCs per 100,000 pop.	10.9

Medicaid & CHIP

Enrollment (% of total population)

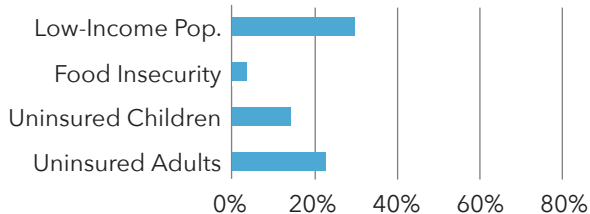


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,446
Medicaid Dental	\$417
CHIP Non- Dental	\$1,310
CHIP Dental	\$285

Crane County Population 4,823

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	3.9
Oral Cancer Mortality Rate per 100,000 pop.	0

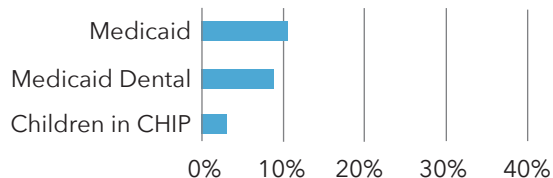
Clinical Care

Pop. to Provider Ratio

General Dentist	5054:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5054:1
Dental Assistant	2527:1
Primary Care Physician	2527:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

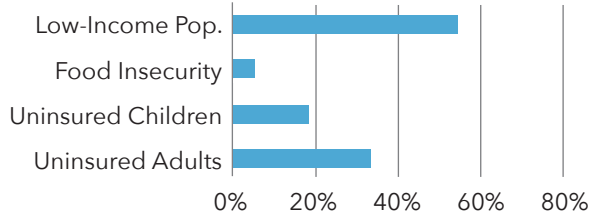


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,613
Medicaid Dental	\$403
CHIP Non- Dental	\$1,312
CHIP Dental	\$288

Culberson County Population 2,259

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.2
Oral Cancer Mortality Rate per 100,000 pop.	7.9

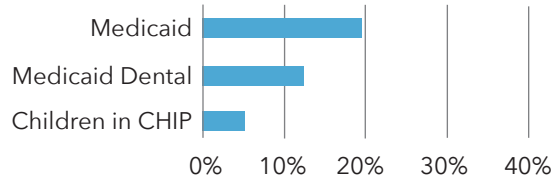
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	2628:1
Nurse Practitioner	2628:1
FQHCs per 100,000 pop.	44.3

Medicaid & CHIP

Enrollment (% of total population)

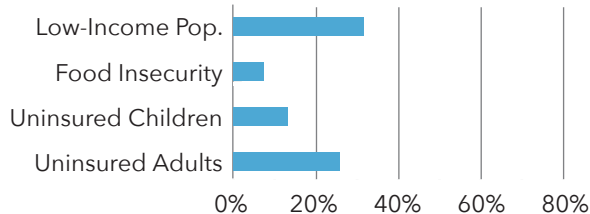


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,767
Medicaid Dental	\$421
CHIP Non- Dental	\$1,323
CHIP Dental	\$290

Ector County Population 153,177

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	12.5
Oral Cancer Incidence Rate per 100,000 pop.	12.4
Oral Cancer Mortality Rate per 100,000 pop.	4.1

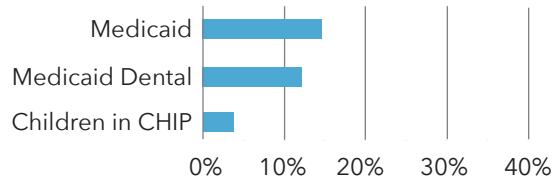
Clinical Care

Pop. to Provider Ratio

General Dentist	4772:1
Pediatric Dentist	14994:1
Specialized Dentist	13883:1
Dental Hygienist	2937:1
Dental Assistant	717:1
Primary Care Physician	1512:1
Nurse Practitioner	2151:1
FQHCs per 100,000 pop.	1.3

Medicaid & CHIP

Enrollment (% of total population)

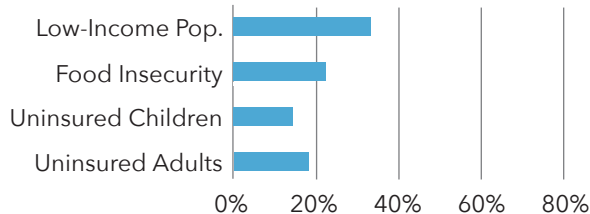


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,773
Medicaid Dental	\$410
CHIP Non- Dental	\$1,305
CHIP Dental	\$283

Glasscock County Population 1,253

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	28.6
Oral Cancer Mortality Rate per 100,000 pop.	15.4

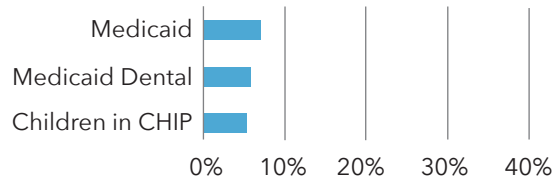
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	658:1
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

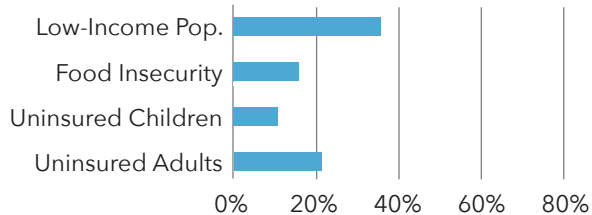


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,277
Medicaid Dental	\$407
CHIP Non- Dental	\$1,309
CHIP Dental	\$294

Howard County Population 36,423

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	16.9
Oral Cancer Mortality Rate per 100,000 pop.	7

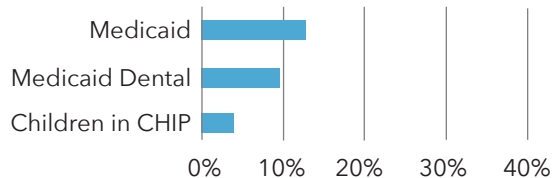
Clinical Care

Pop. to Provider Ratio

General Dentist	5286:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1542:1
Dental Assistant	1057:1
Primary Care Physician	1947:1
Nurse Practitioner	1609:1
FQHCs per 100,000 pop.	2.7

Medicaid & CHIP

Enrollment (% of total population)

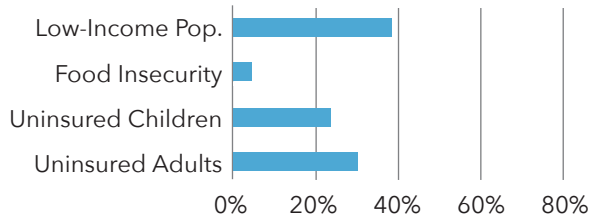


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,176
Medicaid Dental	\$413
CHIP Non- Dental	\$1,313
CHIP Dental	\$284

Jeff Davis County Population 2,221

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	14.2
Oral Cancer Mortality Rate per 100,000 pop.	0

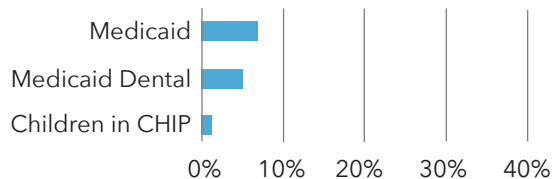
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	2460:1
Nurse Practitioner	2460:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

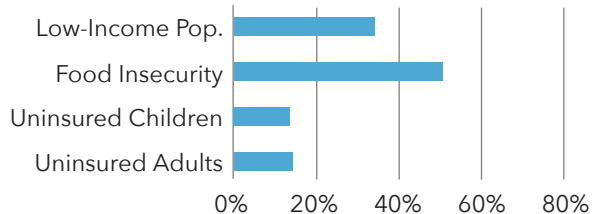


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,604
Medicaid Dental	\$424
CHIP Non- Dental	\$1,291
CHIP Dental	\$299

Loving County Population 76

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

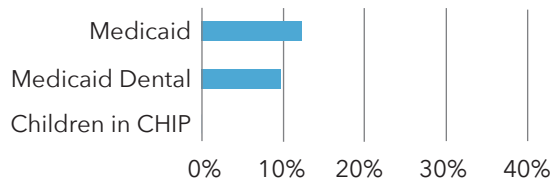
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

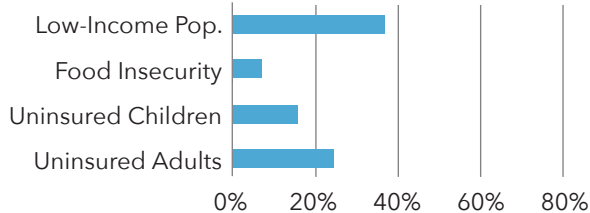


Annual Expenses per Enrollee

Medicaid Non- Dental	\$2,819
Medicaid Dental	\$396
CHIP Non- Dental	\$0
CHIP Dental	\$0

Martin County Population 5,451

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	9.4
Oral Cancer Mortality Rate per 100,000 pop.	4.4

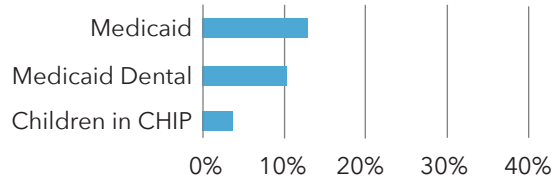
Clinical Care

Pop. to Provider Ratio

General Dentist	5347:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2674:1
Dental Assistant	891:1
Primary Care Physician	1337:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

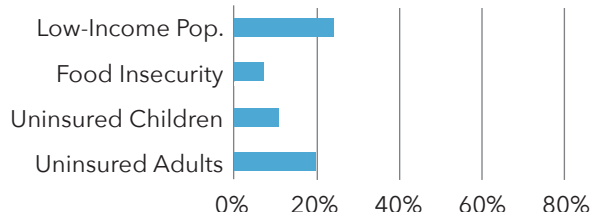


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,599
Medicaid Dental	\$411
CHIP Non- Dental	\$1,302
CHIP Dental	\$286

Midland County Population 155,817

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	12.4
Oral Cancer Incidence Rate per 100,000 pop.	11
Oral Cancer Mortality Rate per 100,000 pop.	2.4

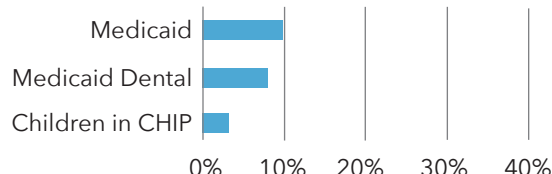
Clinical Care

Pop. to Provider Ratio

General Dentist	3106:1
Pediatric Dentist	8556:1
Specialized Dentist	10146:1
Dental Hygienist	1585:1
Dental Assistant	773:1
Primary Care Physician	1619:1
Nurse Practitioner	1812:1
FQHCs per 100,000 pop.	2.6

Medicaid & CHIP

Enrollment (% of total population)

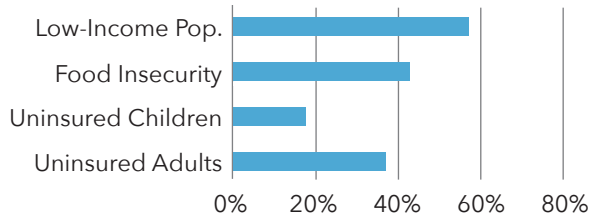


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,022
Medicaid Dental	\$404
CHIP Non- Dental	\$1,304
CHIP Dental	\$283

Presidio County Population 7,144

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.2
Oral Cancer Mortality Rate per 100,000 pop.	1.8

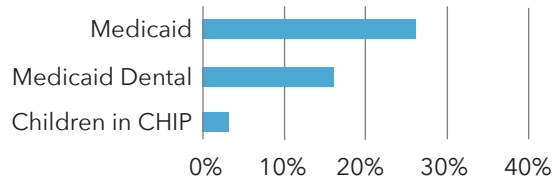
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	8485:1
Primary Care Physician	2828:1
Nurse Practitioner	2828:1
FQHCs per 100,000 pop.	28

Medicaid & CHIP

Enrollment (% of total population)

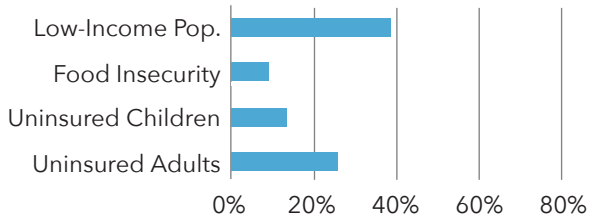


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,342
Medicaid Dental	\$423
CHIP Non- Dental	\$1,306
CHIP Dental	\$290

Reeves County Population 14,438

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	13.2
Oral Cancer Mortality Rate per 100,000 pop.	4.4

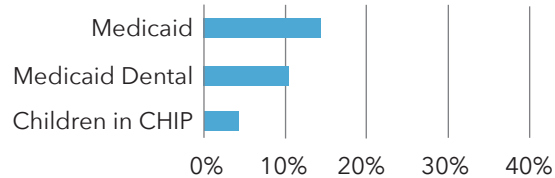
Clinical Care

Pop. to Provider Ratio

General Dentist	7303:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	14605:1
Dental Assistant	1623:1
Primary Care Physician	2434:1
Nurse Practitioner	3651:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

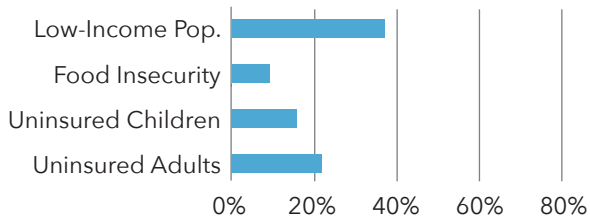


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,497
Medicaid Dental	\$411
CHIP Non- Dental	\$1,306
CHIP Dental	\$286

Upton County Population 3,475

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

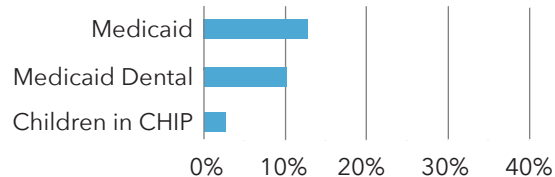
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	3730:1
Nurse Practitioner	746:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

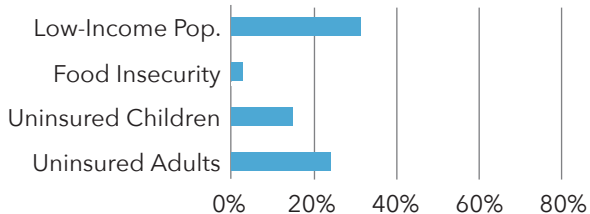


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,026
Medicaid Dental	\$418
CHIP Non- Dental	\$1,321
CHIP Dental	\$278

Ward County Population 11,396

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6
Oral Cancer Mortality Rate per 100,000 pop.	1.5

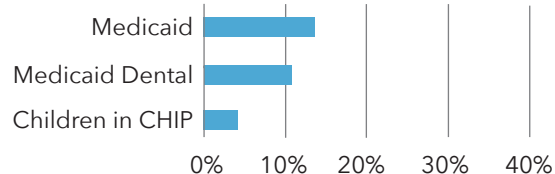
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1844:1
Primary Care Physician	3688:1
Nurse Practitioner	5532:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

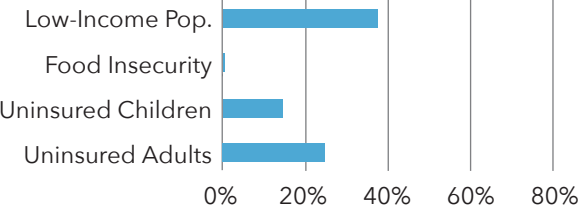


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,156
Medicaid Dental	\$416
CHIP Non- Dental	\$1,312
CHIP Dental	\$283

Winkler County Population 7,723

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	17.2
Oral Cancer Mortality Rate per 100,000 pop.	2.9

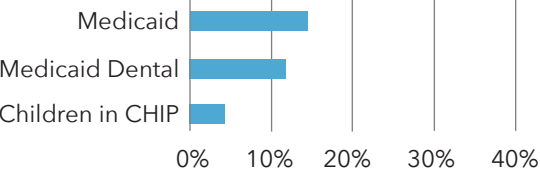
Clinical Care

Pop. to Provider Ratio

General Dentist	2663:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1141:1
Primary Care Physician	7990:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

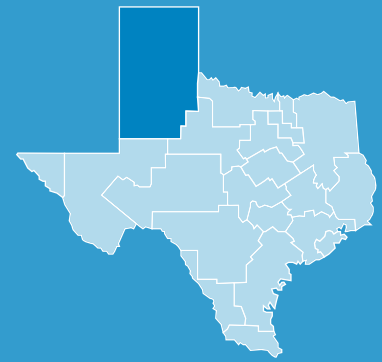
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,059
Medicaid Dental	\$415
CHIP Non- Dental	\$1,297
CHIP Dental	\$290

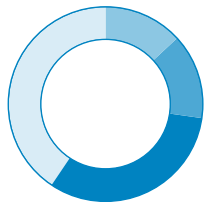
West - Panhandle



47 counties: Armstrong, Bailey, Borden, Briscoe, Carson, Castro, Childress, Cochran, Collingsworth, Cottle, Crosby, Dallam, Dawson, Deaf Smith, Dickens, Donley, Floyd, Gaines, Garza, Gray, Hale, Hall, Hansford, Hartley, Hemphill, Hockley, Hutchinson, Kent, King, Lamb, Lipscomb, Lubbock, Lynn, Moore, Motley, Ochiltree, Oldham, Parmer, Potter, Randall, Roberts, Scurry, Sherman, Swisher, Terry, Wheeler, Yoakum

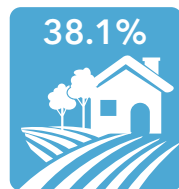
Population 915,590

County Populations

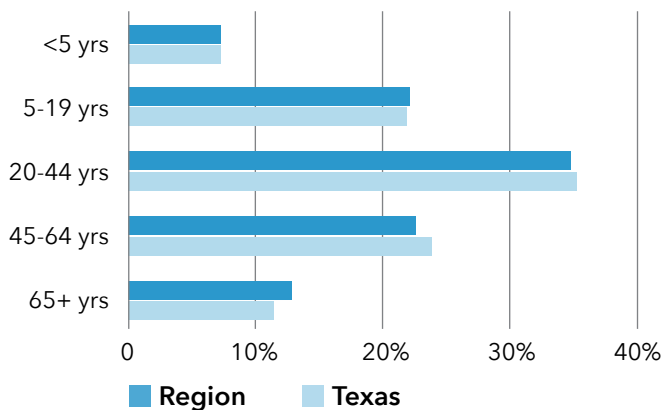


■ Lubbock ■ Randall
■ Potter ■ Others

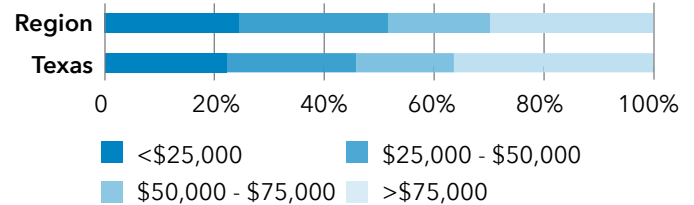
Rural Population



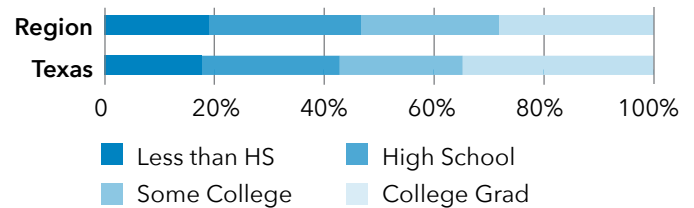
Age



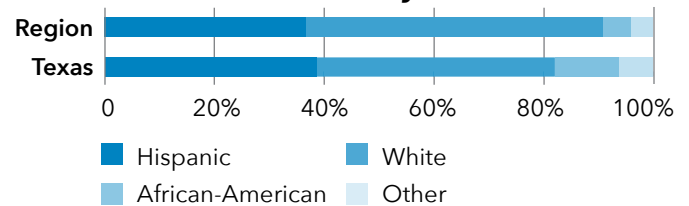
Income



Education



Race and Ethnicity



Key Points

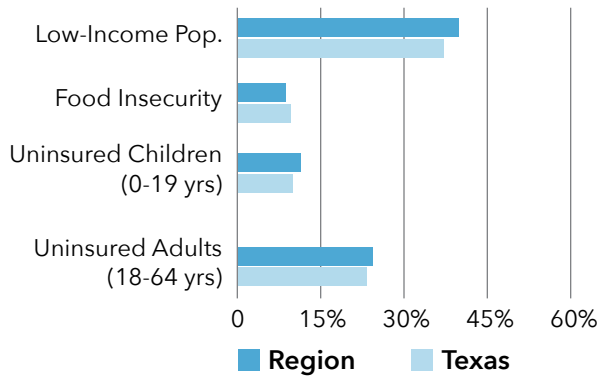
- The largest region by geography, 37 of 42 panhandle counties have populations less than 10,000. 38.1% of the population resides in rural counties.
- Apart from the three most populous counties (Lubbock, Randall, and Potter), the region performs below average on measures of utilization and provider supply compared to

the state. There are more nurse practitioners per capita in the panhandle than any other region.

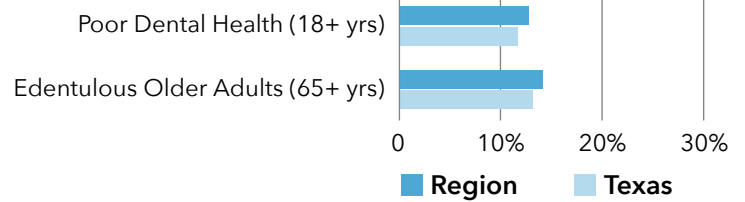
- The panhandle performs near or slightly below the state average on most estimates of oral health outcomes; consistently among the best of the rural regions.

West - Panhandle

Socioeconomic Factors



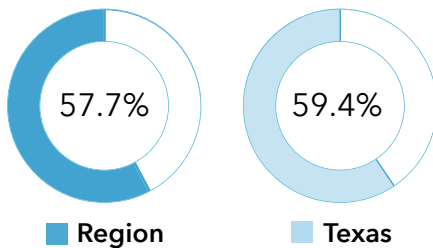
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	19.4	15.8
Oral Cancer Incidence rate per 100,000 Pop.	10.7	10.8
Oral Cancer Mortality rate per 100,000 Pop.	3.7	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

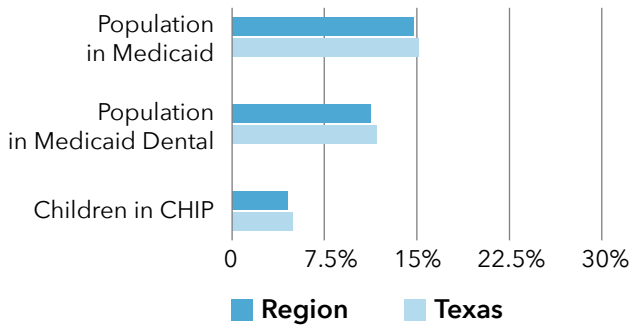


Population to Provider Ratio

	Region	Texas
General Dentist	4043: 1	2970: 1
Pediatric Dentist	14725: 1	9411: 1
Specialized Dentist	21471: 1	14291: 1
Dental Hygienist	2087: 1	2220: 1
Dental Assistant	919: 1	805: 1
Primary Care Physician	1663: 1	1362: 1
Nurse Practitioner	1449: 1	1961: 1
FQHCs per 100,000 pop.	2.9	1.5

Medicaid and CHIP

Enrollment (% of total population)

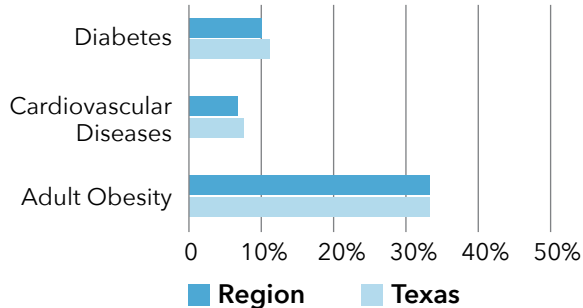


Annual Expenses Per Enrollee

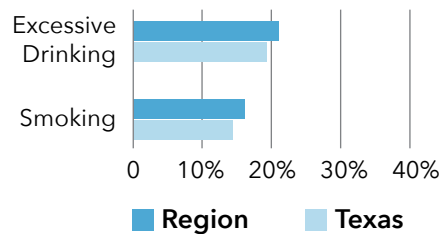
	Region	Texas
Medicaid Non-Dental	\$4,852	\$5,224
Medicaid Dental	\$417	\$419
CHIP Non-Dental	\$1,513	\$1,527
CHIP Dental	\$284	\$285

Risk Factors

Chronic Conditions

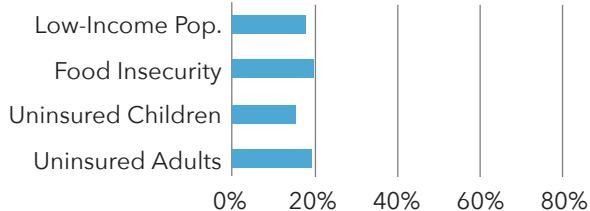


Behaviors



Armstrong County Population 1,913

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	24.7
Oral Cancer Mortality Rate per 100,000 pop.	8.5

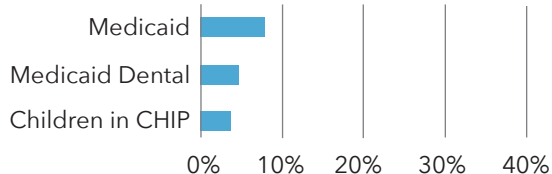
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	1987:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

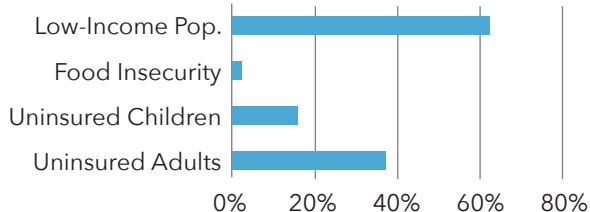


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,798
Medicaid Dental	\$424
CHIP Non- Dental	\$1,338
CHIP Dental	\$290

Bailey County Population 7,131

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.5
Oral Cancer Mortality Rate per 100,000 pop.	0

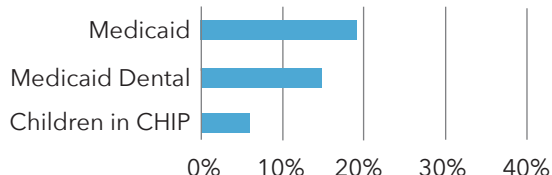
Clinical Care

Pop. to Provider Ratio

General Dentist	4015:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2676:1
Dental Assistant	803:1
Primary Care Physician	2676:1
Nurse Practitioner	4015:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

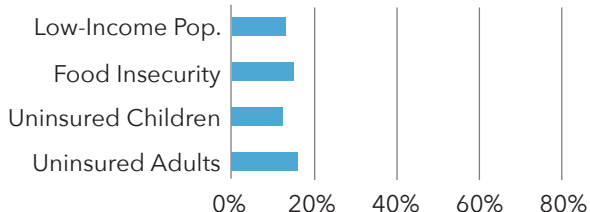


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,485
Medicaid Dental	\$410
CHIP Non- Dental	\$1,306
CHIP Dental	\$281

Borden County Population 698

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	25.4
Oral Cancer Mortality Rate per 100,000 pop.	0

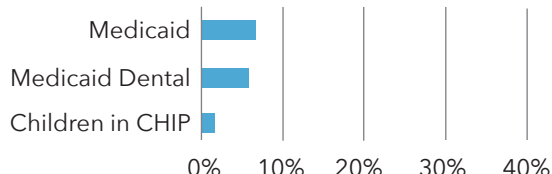
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

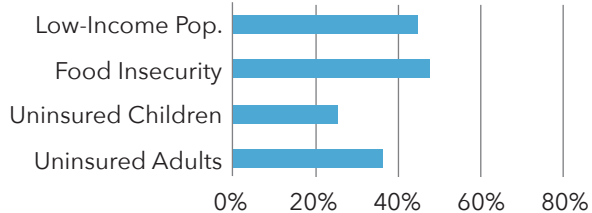


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,184
Medicaid Dental	\$419
CHIP Non- Dental	\$1,268
CHIP Dental	\$308

Briscoe County Population 1,672

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	7.5
Oral Cancer Mortality Rate per 100,000 pop.	0

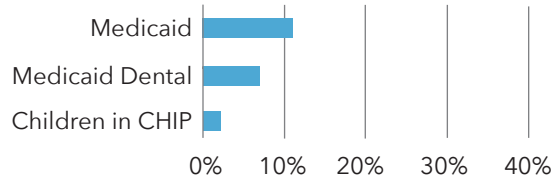
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	1679:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

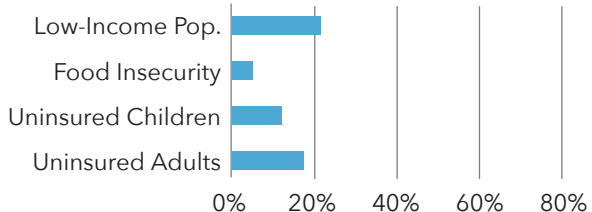


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,961
Medicaid Dental	\$439
CHIP Non- Dental	\$1,287
CHIP Dental	\$290

Carson County Population 6,027

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	2.4
Oral Cancer Mortality Rate per 100,000 pop.	5.1

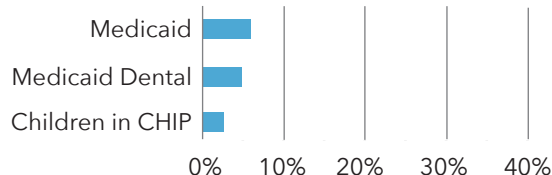
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6418:1
Dental Assistant	1284:1
Primary Care Physician	-
Nurse Practitioner	1605:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

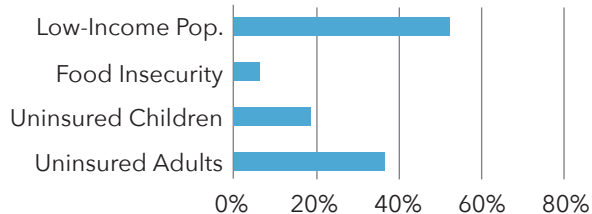


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,993
Medicaid Dental	\$422
CHIP Non- Dental	\$1,573
CHIP Dental	\$286

Castro County Population 7,875

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.6
Oral Cancer Mortality Rate per 100,000 pop.	4.2

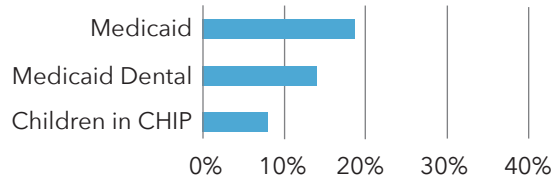
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4331:1
Dental Assistant	1732:1
Primary Care Physician	4331:1
Nurse Practitioner	2887:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

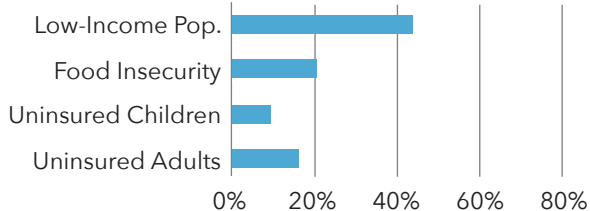


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,396
Medicaid Dental	\$417
CHIP Non- Dental	\$1,311
CHIP Dental	\$280

Childress County Population 7,059

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	18.7
Oral Cancer Mortality Rate per 100,000 pop.	9.7

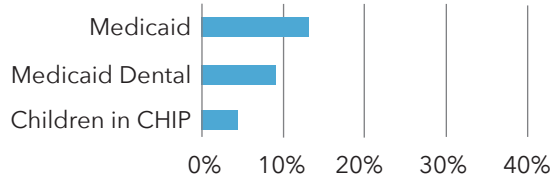
Clinical Care

Pop. to Provider Ratio

General Dentist	2447:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2447:1
Dental Assistant	1224:1
Primary Care Physician	918:1
Nurse Practitioner	1049:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

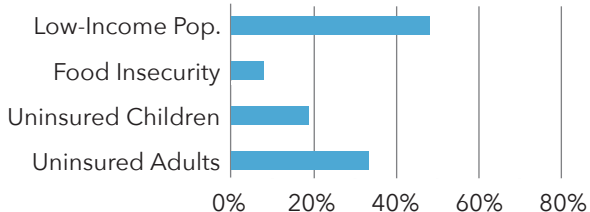


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,542
Medicaid Dental	\$421
CHIP Non- Dental	\$1,308
CHIP Dental	\$288

Cochran County Population 2,955

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.5
Oral Cancer Mortality Rate per 100,000 pop.	0

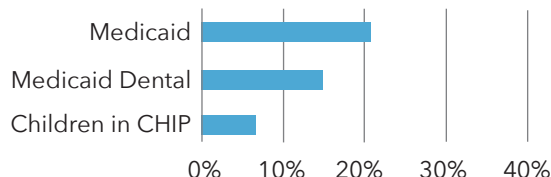
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1125:1
Primary Care Physician	3374:1
Nurse Practitioner	1687:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

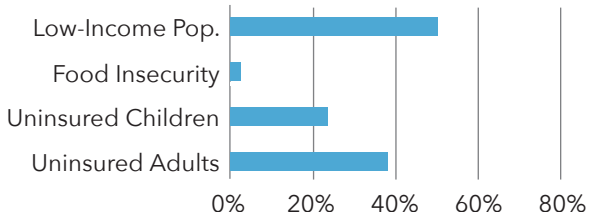


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,949
Medicaid Dental	\$425
CHIP Non- Dental	\$1,296
CHIP Dental	\$290

Collingsworth County Population 3,032

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	9.3
Oral Cancer Mortality Rate per 100,000 pop.	0

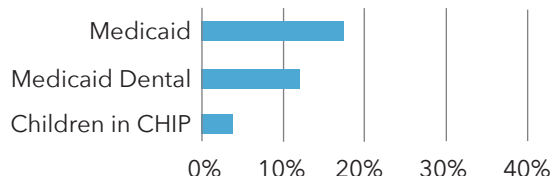
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1592:1
Primary Care Physician	3183:1
Nurse Practitioner	3183:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

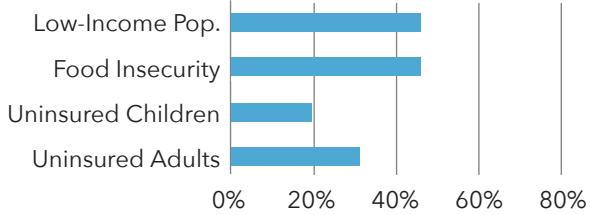


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,979
Medicaid Dental	\$428
CHIP Non- Dental	\$1,305
CHIP Dental	\$279

Cottle County Population 1,560

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

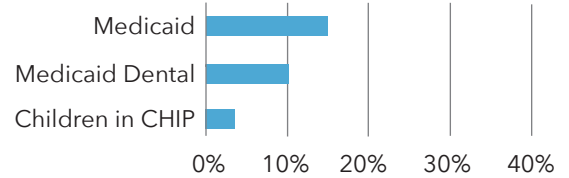
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1583:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

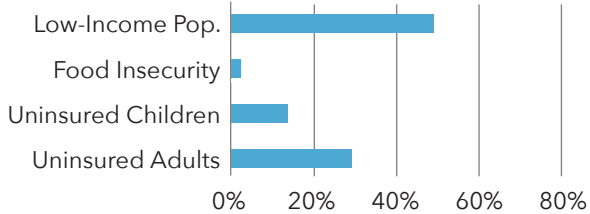


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,605
Medicaid Dental	\$436
CHIP Non- Dental	\$1,291
CHIP Dental	\$286

Crosby County Population 5,987

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	2.5
Oral Cancer Mortality Rate per 100,000 pop.	2.2

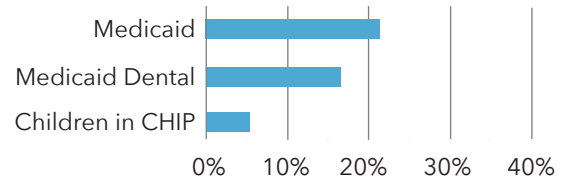
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6860:1
Dental Assistant	1372:1
Primary Care Physician	6860:1
Nurse Practitioner	1715:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

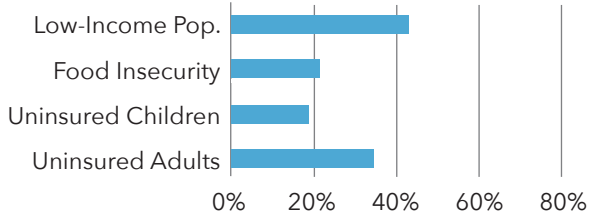


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,894
Medicaid Dental	\$421
CHIP Non- Dental	\$1,610
CHIP Dental	\$284

Dallam County Population 7,052

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	8.3
Oral Cancer Mortality Rate per 100,000 pop.	9.5

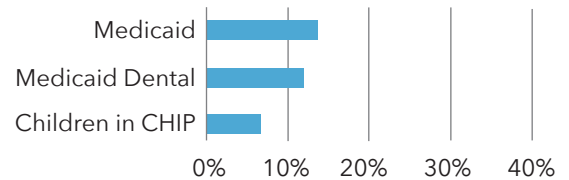
Clinical Care

Pop. to Provider Ratio

General Dentist	3830:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1915:1
Dental Assistant	1532:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

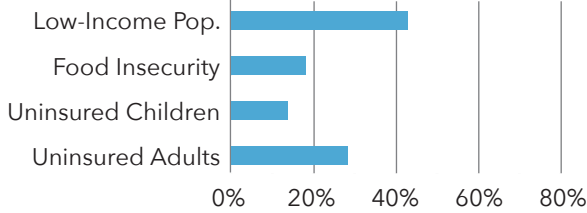


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,127
Medicaid Dental	\$399
CHIP Non- Dental	\$1,307
CHIP Dental	\$281

Dawson County Population 13,317

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	9.3
Oral Cancer Mortality Rate per 100,000 pop.	2.6

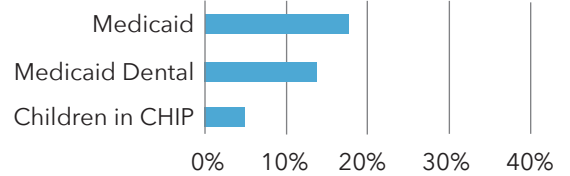
Clinical Care

Pop. to Provider Ratio

General Dentist	7268:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	7268:1
Dental Assistant	1454:1
Primary Care Physician	1817:1
Nurse Practitioner	4845:1
FQHCs per 100,000 pop.	15

Medicaid & CHIP

Enrollment (% of total population)

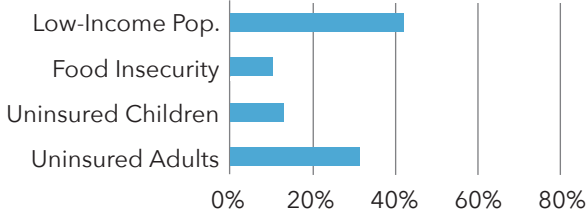


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,948
Medicaid Dental	\$417
CHIP Non- Dental	\$1,307
CHIP Dental	\$285

Deaf Smith County Population 19,039

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.5
Oral Cancer Mortality Rate per 100,000 pop.	0

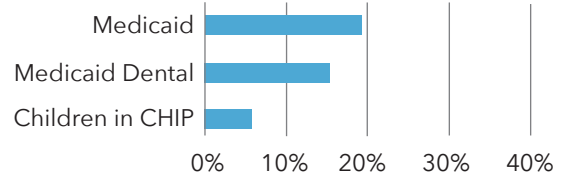
Clinical Care

Pop. to Provider Ratio

General Dentist	3604:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1879:1
Dental Assistant	1966:1
Primary Care Physician	2703:1
Nurse Practitioner	1802:1
FQHCs per 100,000 pop.	5.3

Medicaid & CHIP

Enrollment (% of total population)

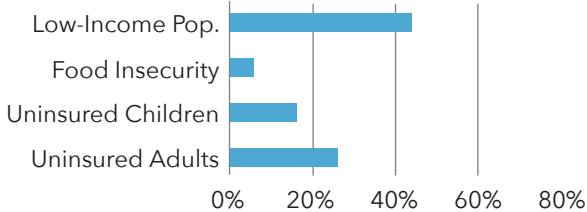


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,506
Medicaid Dental	\$413
CHIP Non- Dental	\$1,582
CHIP Dental	\$288

Dickens County Population 2,237

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.4
Oral Cancer Mortality Rate per 100,000 pop.	8

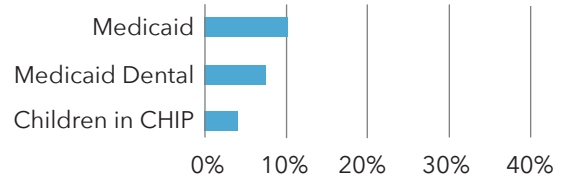
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

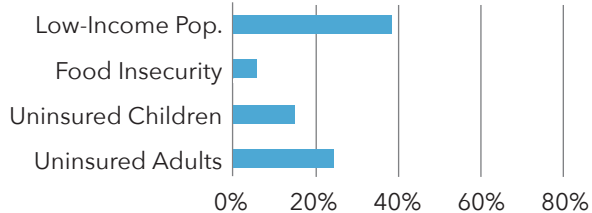


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,452
Medicaid Dental	\$422
CHIP Non- Dental	\$1,309
CHIP Dental	\$288

Donley County Population 3,506

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12.5
Oral Cancer Mortality Rate per 100,000 pop.	6.2

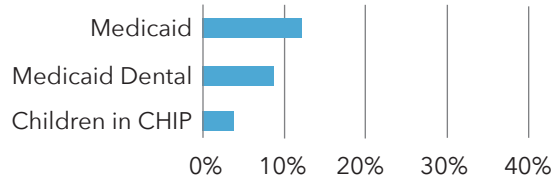
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1914:1
Dental Assistant	1276:1
Primary Care Physician	3827:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

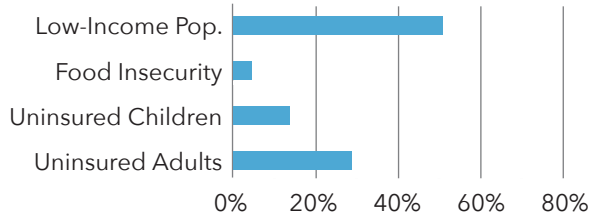


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,040
Medicaid Dental	\$430
CHIP Non- Dental	\$1,312
CHIP Dental	\$283

Floyd County Population 6,088

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12.7
Oral Cancer Mortality Rate per 100,000 pop.	0

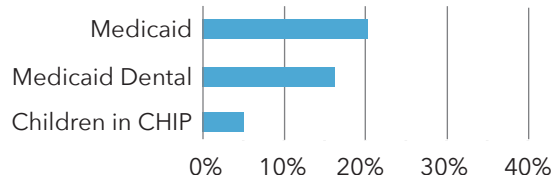
Clinical Care

Pop. to Provider Ratio

General Dentist	3298:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3298:1
Dental Assistant	1319:1
Primary Care Physician	1319:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

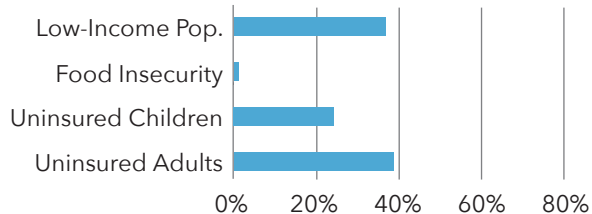


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,574
Medicaid Dental	\$426
CHIP Non- Dental	\$1,597
CHIP Dental	\$285

Gaines County Population 19,485

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.2
Oral Cancer Mortality Rate per 100,000 pop.	5.3

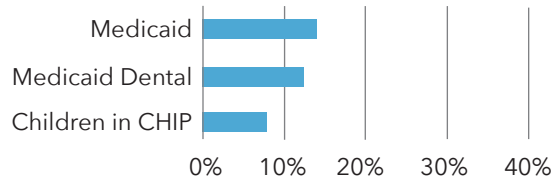
Clinical Care

Pop. to Provider Ratio

General Dentist	10188:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	10188:1
Dental Assistant	2264:1
Primary Care Physician	2547:1
Nurse Practitioner	5094:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

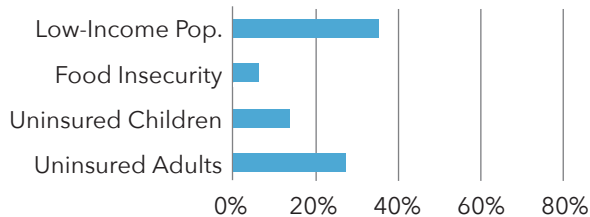


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,261
Medicaid Dental	\$400
CHIP Non- Dental	\$1,302
CHIP Dental	\$279

Garza County Population 6,614

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6.9
Oral Cancer Mortality Rate per 100,000 pop.	0

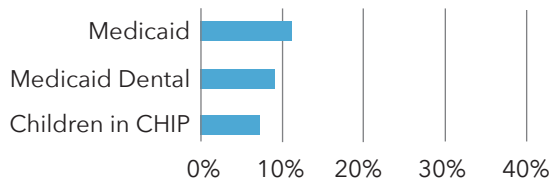
Clinical Care

Pop. to Provider Ratio

General Dentist	6836:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1139:1
Primary Care Physician	-
Nurse Practitioner	6836:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

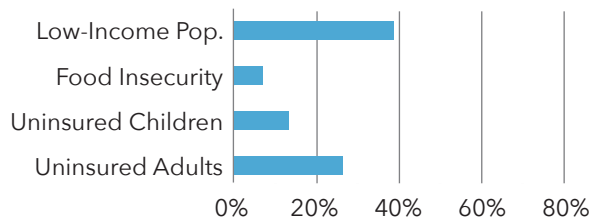


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,120
Medicaid Dental	\$418
CHIP Non- Dental	\$1,583
CHIP Dental	\$285

Gray County Population 23,028

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	14.1
Oral Cancer Mortality Rate per 100,000 pop.	5.1

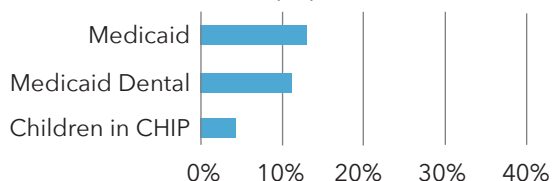
Clinical Care

Pop. to Provider Ratio

General Dentist	6032:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1340:1
Dental Assistant	1149:1
Primary Care Physician	1856:1
Nurse Practitioner	2681:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

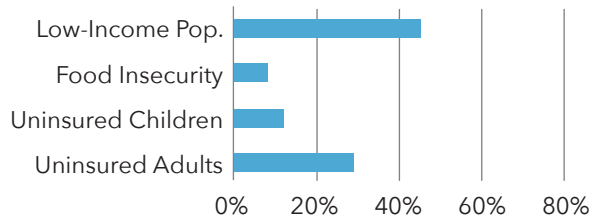


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,421
Medicaid Dental	\$417
CHIP Non- Dental	\$1,306
CHIP Dental	\$282

Hale County Population 35,007

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	33.0
Oral Cancer Incidence Rate per 100,000 pop.	7
Oral Cancer Mortality Rate per 100,000 pop.	0.5

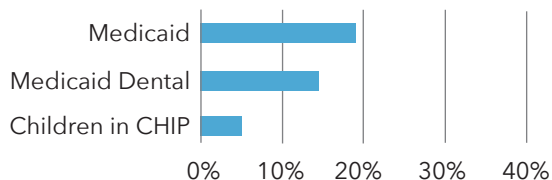
Clinical Care

Pop. to Provider Ratio

General Dentist	7563:1
Pediatric Dentist	-
Specialized Dentist	37816:1
Dental Hygienist	3782:1
Dental Assistant	1050:1
Primary Care Physician	1891:1
Nurse Practitioner	2364:1
FQHCs per 100,000 pop.	11.4

Medicaid & CHIP

Enrollment (% of total population)

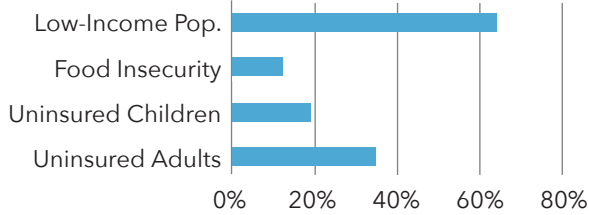


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,697
Medicaid Dental	\$423
CHIP Non- Dental	\$1,580
CHIP Dental	\$287

Hall County Population 3,162

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	7.8
Oral Cancer Mortality Rate per 100,000 pop.	3.5

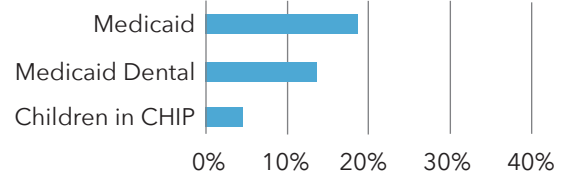
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1667:1
Primary Care Physician	3334:1
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

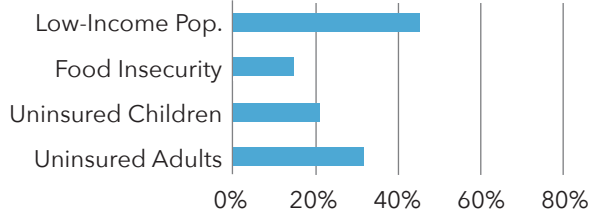


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,045
Medicaid Dental	\$432
CHIP Non- Dental	\$1,315
CHIP Dental	\$289

Hansford County Population 5,552

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.1
Oral Cancer Mortality Rate per 100,000 pop.	0

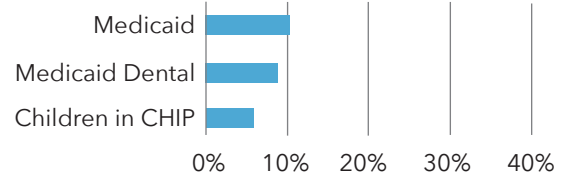
Clinical Care

Pop. to Provider Ratio

General Dentist	6224:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2075:1
Dental Assistant	-
Primary Care Physician	2075:1
Nurse Practitioner	3112:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

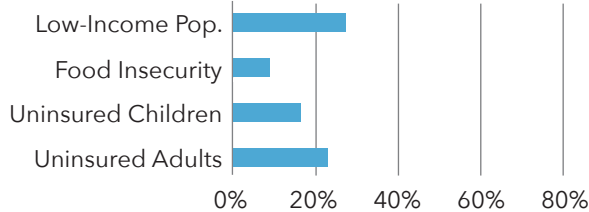


Annual Expenses per Enrollee

Medicaid Non- Dental	\$3,782
Medicaid Dental	\$419
CHIP Non- Dental	\$1,301
CHIP Dental	\$286

Hartley County Population 5,966

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.4
Oral Cancer Mortality Rate per 100,000 pop.	2.9

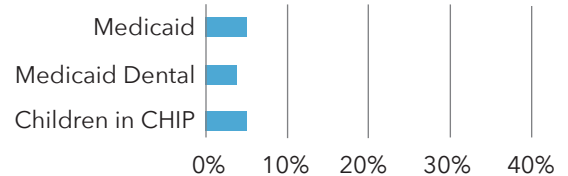
Clinical Care

Pop. to Provider Ratio

General Dentist	3113:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6225:1
Dental Assistant	3113:1
Primary Care Physician	889:1
Nurse Practitioner	6225:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

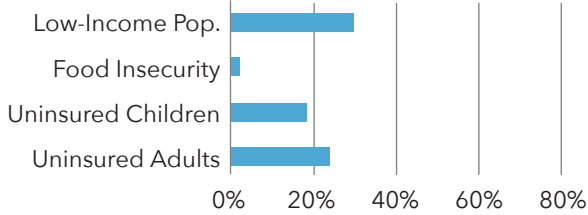


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,465
Medicaid Dental	\$400
CHIP Non- Dental	\$1,306
CHIP Dental	\$281

Hemphill County Population 4,151

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	17.3
Oral Cancer Mortality Rate per 100,000 pop.	4.2

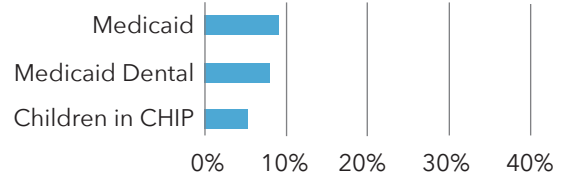
Clinical Care

Pop. to Provider Ratio

General Dentist	4228:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4228:1
Dental Assistant	1409:1
Primary Care Physician	846:1
Nurse Practitioner	1409:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

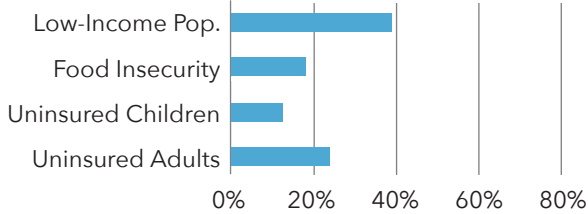


Annual Expenses per Enrollee

Medicaid Non- Dental	\$3,728
Medicaid Dental	\$411
CHIP Non- Dental	\$1,319
CHIP Dental	\$281

Hockley County Population 23,377

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	7.6
Oral Cancer Mortality Rate per 100,000 pop.	1.5

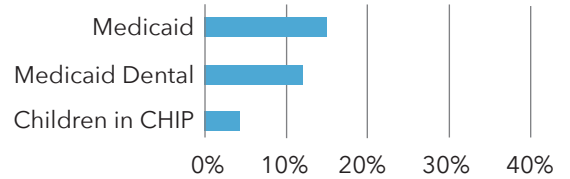
Clinical Care

Pop. to Provider Ratio

General Dentist	6117:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	4078:1
Dental Assistant	1439:1
Primary Care Physician	2447:1
Nurse Practitioner	6117:1
FQHCs per 100,000 pop.	4.3

Medicaid & CHIP

Enrollment (% of total population)

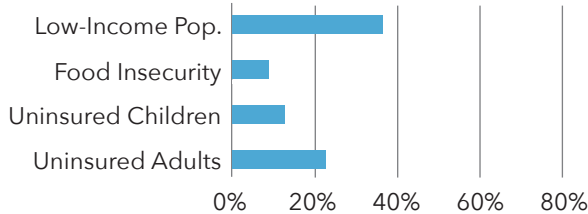


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,050
Medicaid Dental	\$416
CHIP Non- Dental	\$1,579
CHIP Dental	\$287

Hutchinson County Population 21,782

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12
Oral Cancer Mortality Rate per 100,000 pop.	2.6

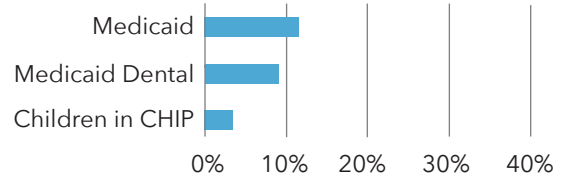
Clinical Care

Pop. to Provider Ratio

General Dentist	4490:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2806:1
Dental Assistant	1182:1
Primary Care Physician	1727:1
Nurse Practitioner	3741:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

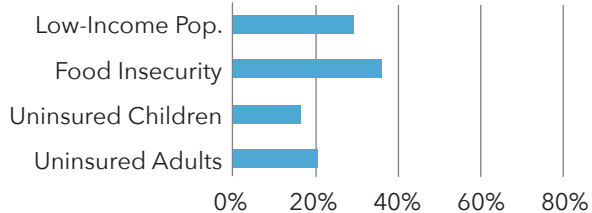


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,182
Medicaid Dental	\$414
CHIP Non- Dental	\$1,604
CHIP Dental	\$283

Kent County Population 667

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.7
Oral Cancer Mortality Rate per 100,000 pop.	0

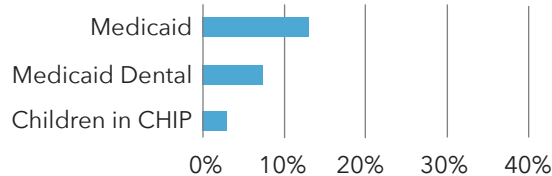
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	808:1
Nurse Practitioner	808:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

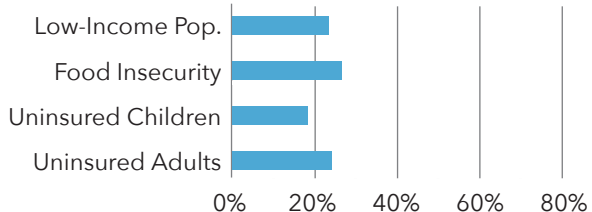


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,710
Medicaid Dental	\$422
CHIP Non- Dental	\$1,339
CHIP Dental	\$254

King County Population 274

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

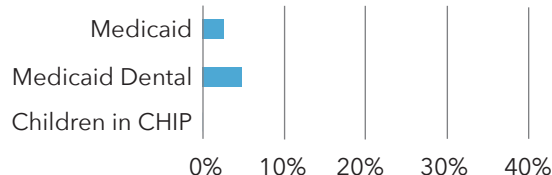
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	296:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

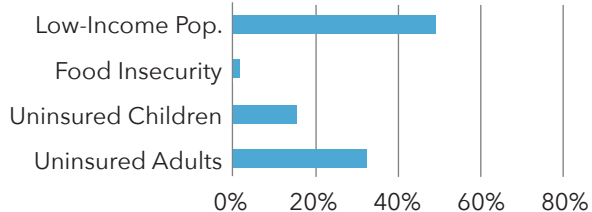


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,079
Medicaid Dental	\$395
CHIP Non- Dental	\$0
CHIP Dental	\$0

Lamb County Population 13,561

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	4.3
Oral Cancer Mortality Rate per 100,000 pop.	3.5

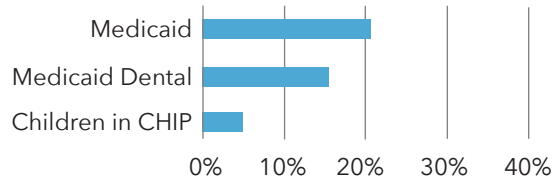
Clinical Care

Pop. to Provider Ratio

General Dentist	7216:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	14431:1
Dental Assistant	2062:1
Primary Care Physician	4810:1
Nurse Practitioner	7216:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

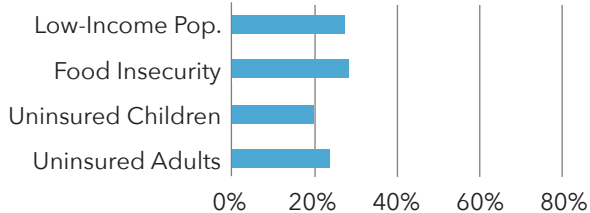


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,097
Medicaid Dental	\$424
CHIP Non- Dental	\$1,600
CHIP Dental	\$284

Lipscomb County Population 3,507

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10
Oral Cancer Mortality Rate per 100,000 pop.	3.8

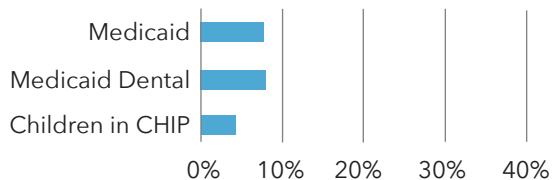
Clinical Care

Pop. to Provider Ratio

General Dentist	3639:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3639:1
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	3639:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

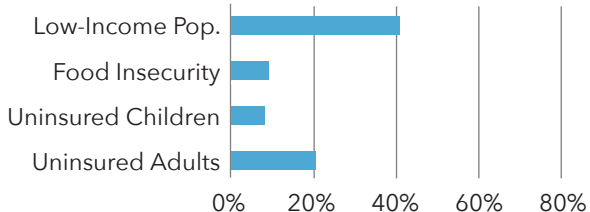


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,498
Medicaid Dental	\$410
CHIP Non- Dental	\$1,303
CHIP Dental	\$288

Lubbock County Population 294,682

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	10.6
Oral Cancer Incidence Rate per 100,000 pop.	12.1
Oral Cancer Mortality Rate per 100,000 pop.	3.9

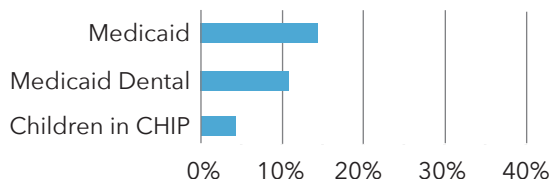
Clinical Care

Pop. to Provider Ratio

General Dentist	3253:1
Pediatric Dentist	10033:1
Specialized Dentist	13753:1
Dental Hygienist	2031:1
Dental Assistant	788:1
Primary Care Physician	1201:1
Nurse Practitioner	952:1
FQHCs per 100,000 pop.	5.4

Medicaid & CHIP

Enrollment (% of total population)

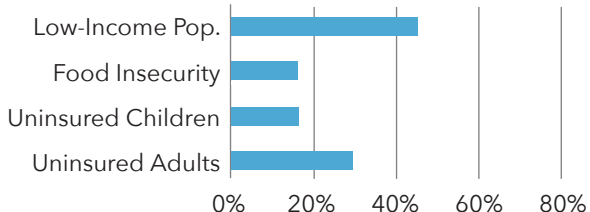


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,127
Medicaid Dental	\$419
CHIP Non- Dental	\$1,589
CHIP Dental	\$284

Lynn County Population 5,723

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.7
Oral Cancer Mortality Rate per 100,000 pop.	0

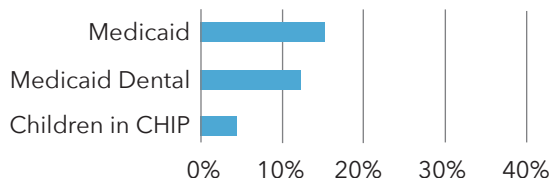
Clinical Care

Pop. to Provider Ratio

General Dentist	6140:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	6140:1
Dental Assistant	3070:1
Primary Care Physician	2047:1
Nurse Practitioner	1228:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

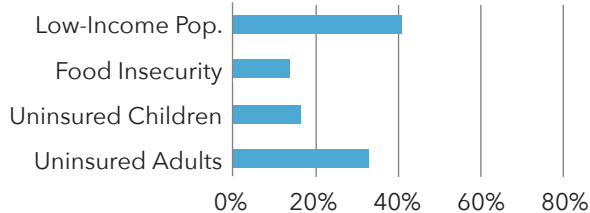


Annual Expenses per Enrollee

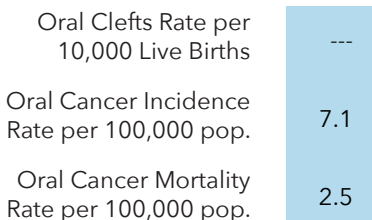
Medicaid Non- Dental	\$4,852
Medicaid Dental	\$422
CHIP Non- Dental	\$1,586
CHIP Dental	\$290

Moore County Population 22,186

Socioeconomic Factors



Oral Health Outcomes



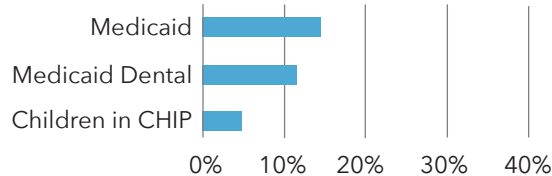
Clinical Care

Pop. to Provider Ratio

General Dentist	4927:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3080:1
Dental Assistant	821:1
Primary Care Physician	1895:1
Nurse Practitioner	6159:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

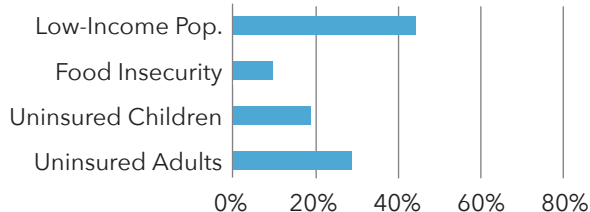


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,259
Medicaid Dental	\$401
CHIP Non- Dental	\$1,309
CHIP Dental	\$279

Motley County Population 1,022

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	0

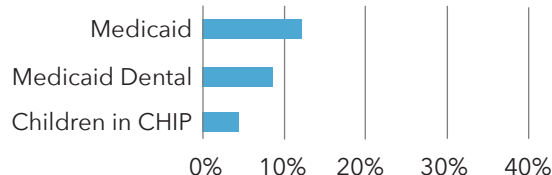
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	1212:1
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

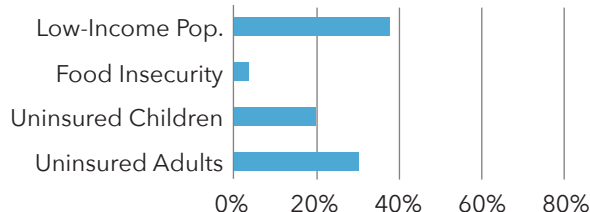


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,618
Medicaid Dental	\$438
CHIP Non- Dental	\$1,325
CHIP Dental	\$282

Ochiltree County Population 10,577

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	12.8
Oral Cancer Mortality Rate per 100,000 pop.	5.4

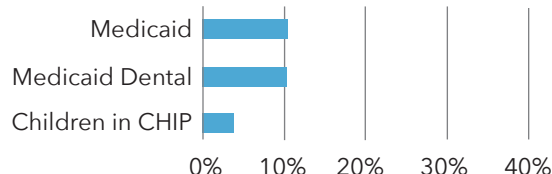
Clinical Care

Pop. to Provider Ratio

General Dentist	3977:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2386:1
Dental Assistant	1704:1
Primary Care Physician	2386:1
Nurse Practitioner	5965:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

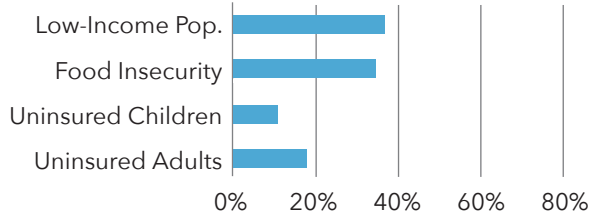


Annual Expenses per Enrollee

Medicaid Non- Dental	\$3,930
Medicaid Dental	\$411
CHIP Non- Dental	\$1,297
CHIP Dental	\$283

Oldham County Population 2,069

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.6
Oral Cancer Mortality Rate per 100,000 pop.	0

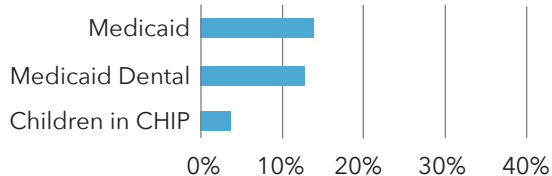
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	2165:1
Primary Care Physician	-
Nurse Practitioner	1083:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

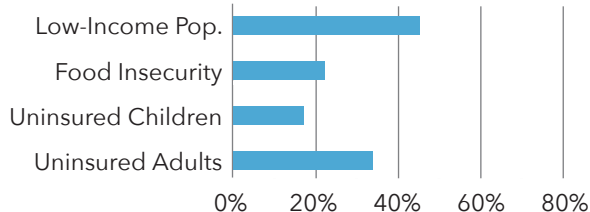


Annual Expenses per Enrollee

Medicaid Non- Dental	\$3,289
Medicaid Dental	\$442
CHIP Non- Dental	\$1,325
CHIP Dental	\$284

Parmer County Population 9,921

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.8
Oral Cancer Mortality Rate per 100,000 pop.	4.5

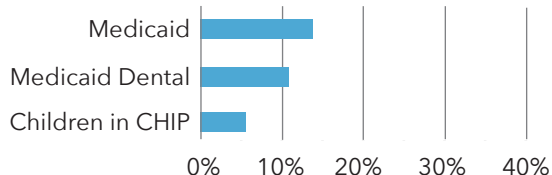
Clinical Care

Pop. to Provider Ratio

General Dentist	11687:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2922:1
Dental Assistant	2922:1
Primary Care Physician	5844:1
Nurse Practitioner	2337:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

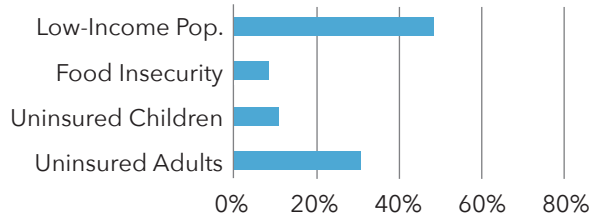


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,626
Medicaid Dental	\$409
CHIP Non- Dental	\$1,304
CHIP Dental	\$285

Potter County Population 121,883

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	12.8
Oral Cancer Incidence Rate per 100,000 pop.	12.5
Oral Cancer Mortality Rate per 100,000 pop.	3.6

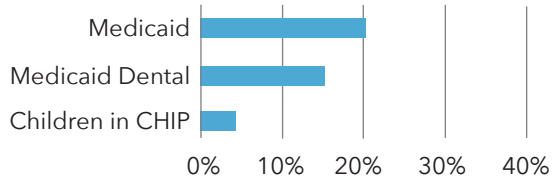
Clinical Care

Pop. to Provider Ratio

General Dentist	3179:1
Pediatric Dentist	8332:1
Specialized Dentist	14482:1
Dental Hygienist	1303:1
Dental Assistant	745:1
Primary Care Physician	1043:1
Nurse Practitioner	712:1
FQHCs per 100,000 pop.	2.5

Medicaid & CHIP

Enrollment (% of total population)

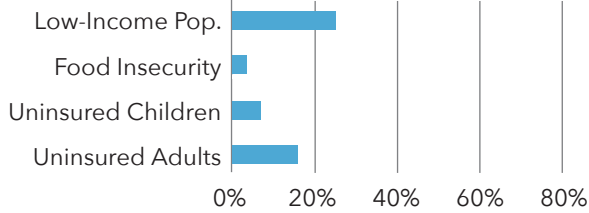


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,709
Medicaid Dental	\$417
CHIP Non- Dental	\$1,591
CHIP Dental	\$285

Randall County Population 128,603

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	15.8
Oral Cancer Incidence Rate per 100,000 pop.	11.9
Oral Cancer Mortality Rate per 100,000 pop.	2.6

Clinical Care

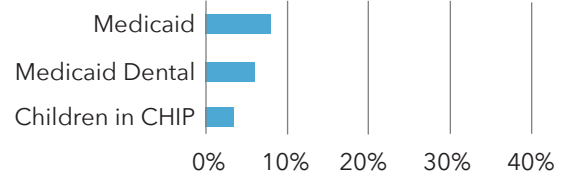
Pop. to Provider Ratio

General Dentist	3465:1
Pediatric Dentist	6135:1
Specialized Dentist	10394:1
Dental Hygienist	1240:1
Dental Assistant	637:1
Primary Care Physician	3974:1
Nurse Practitioner	3142:1
FQHCs per 100,000 pop.	0

Randall

Medicaid & CHIP

Enrollment (% of total population)

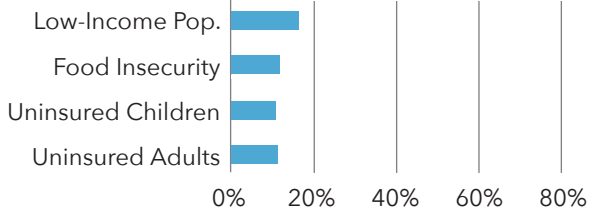


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,922
Medicaid Dental	\$412
CHIP Non- Dental	\$1,595
CHIP Dental	\$282

Roberts County Population 939

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	0
Oral Cancer Mortality Rate per 100,000 pop.	12.8

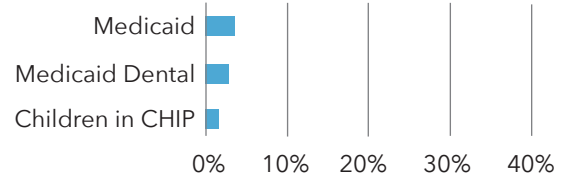
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	-
Primary Care Physician	-
Nurse Practitioner	-
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

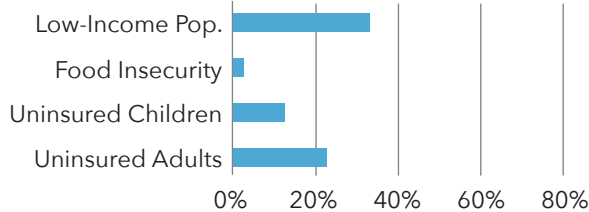


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,936
Medicaid Dental	\$398
CHIP Non- Dental	\$1,335
CHIP Dental	\$296

Scurry County Population 17,314

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	11.3
Oral Cancer Mortality Rate per 100,000 pop.	4.1

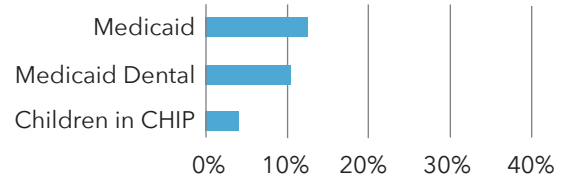
Clinical Care

Pop. to Provider Ratio

General Dentist	3655:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	18274:1
Dental Assistant	1218:1
Primary Care Physician	1827:1
Nurse Practitioner	9137:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

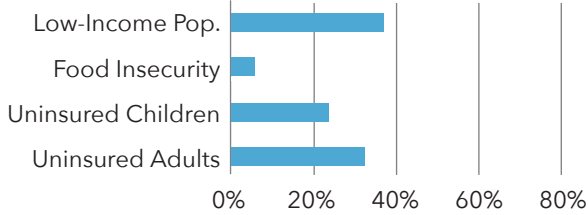


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,913
Medicaid Dental	\$416
CHIP Non- Dental	\$1,310
CHIP Dental	\$284

Sherman County Population 3,069

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	5.4
Oral Cancer Mortality Rate per 100,000 pop.	0

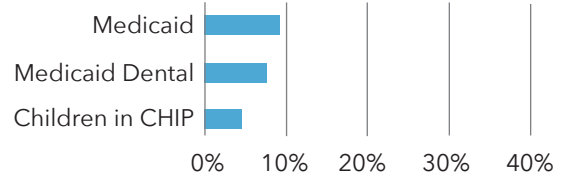
Clinical Care

Pop. to Provider Ratio

General Dentist	-
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	-
Dental Assistant	3311:1
Primary Care Physician	-
Nurse Practitioner	1656:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

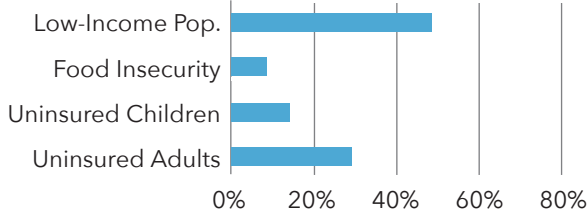


Annual Expenses per Enrollee

Medicaid Non- Dental	\$3,954
Medicaid Dental	\$415
CHIP Non- Dental	\$1,314
CHIP Dental	\$282

Swisher County Population 7,639

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	3.6
Oral Cancer Mortality Rate per 100,000 pop.	0

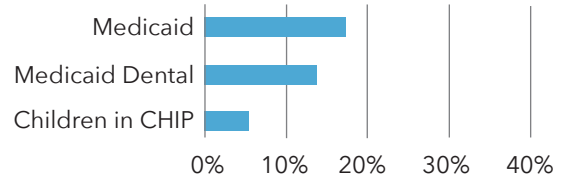
Clinical Care

Pop. to Provider Ratio

General Dentist	8107:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2027:1
Dental Assistant	2027:1
Primary Care Physician	2702:1
Nurse Practitioner	4054:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

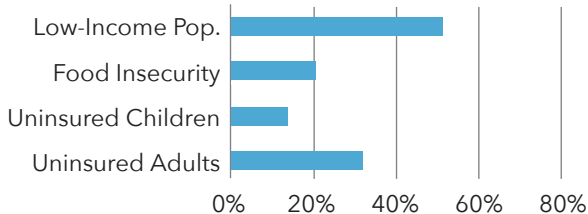


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,520
Medicaid Dental	\$421
CHIP Non- Dental	\$1,573
CHIP Dental	\$291

Terry County Population 12,724

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	5.4
Oral Cancer Mortality Rate per 100,000 pop.	0

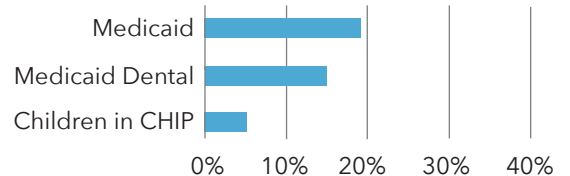
Clinical Care

Pop. to Provider Ratio

General Dentist	6575:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	13150:1
Dental Assistant	1012:1
Primary Care Physician	3288:1
Nurse Practitioner	3288:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

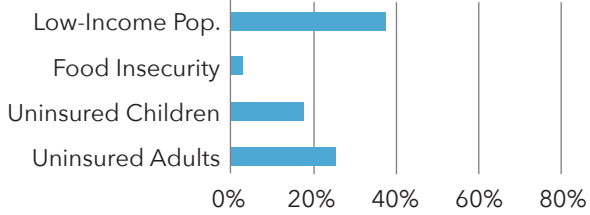


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,891
Medicaid Dental	\$419
CHIP Non- Dental	\$1,598
CHIP Dental	\$285

Wheeler County Population 5,642

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	10.4
Oral Cancer Mortality Rate per 100,000 pop.	2.4

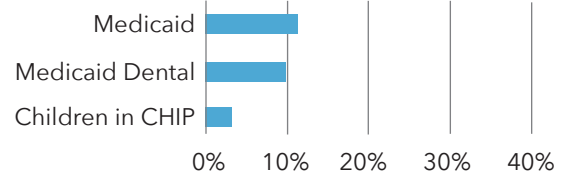
Clinical Care

Pop. to Provider Ratio

General Dentist	2870:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2870:1
Dental Assistant	1435:1
Primary Care Physician	1435:1
Nurse Practitioner	5740:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

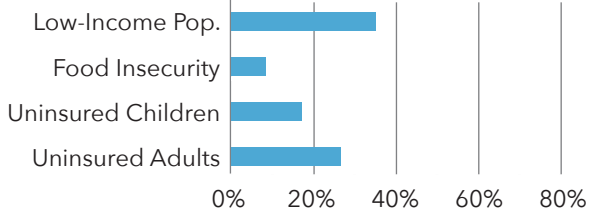


Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,375
Medicaid Dental	\$417
CHIP Non- Dental	\$1,297
CHIP Dental	\$286

Yoakum County Population 8,316

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	6
Oral Cancer Mortality Rate per 100,000 pop.	0

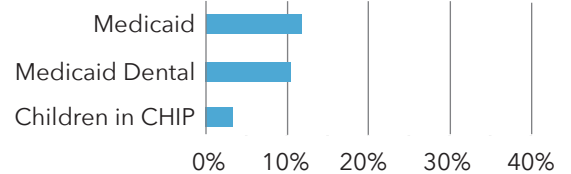
Clinical Care

Pop. to Provider Ratio

General Dentist	9026:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	9026:1
Dental Assistant	2257:1
Primary Care Physician	2257:1
Nurse Practitioner	2257:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$4,515
Medicaid Dental	\$409
CHIP Non- Dental	\$1,305
CHIP Dental	\$283

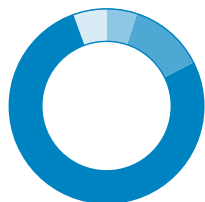
Central - Austin



6 counties: Bastrop, Caldwell, Fayette, Hays, Lee, Travis

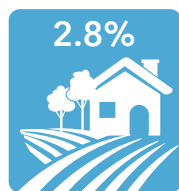
Population 1,493,659

County Populations

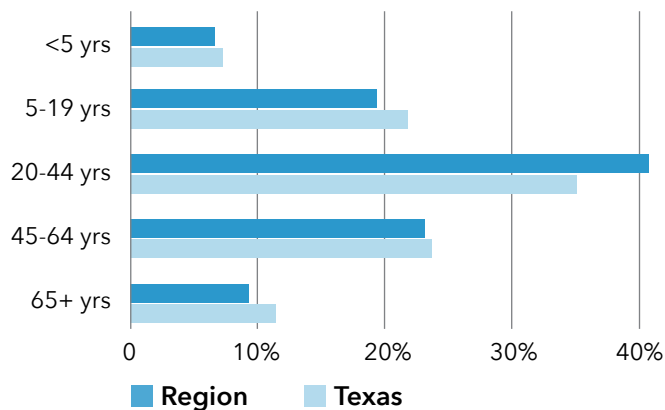


Travis Hays
Bastrop Others

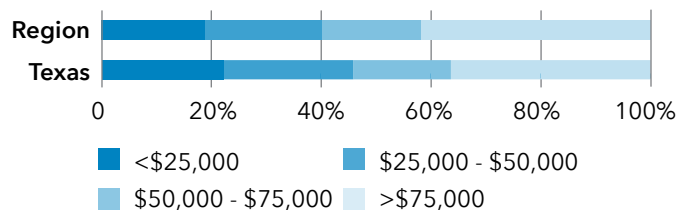
Rural Population



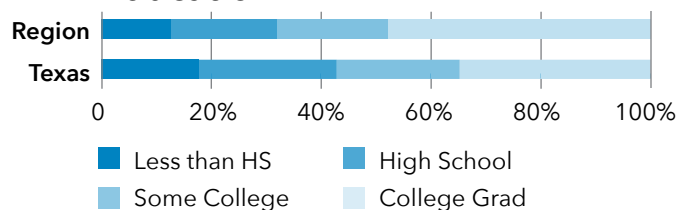
Age



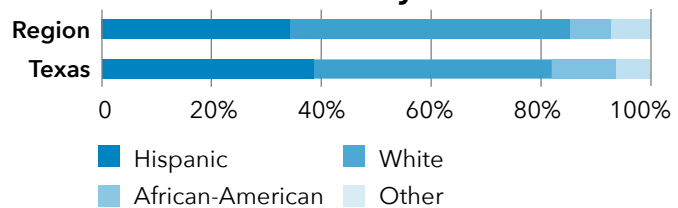
Income



Education



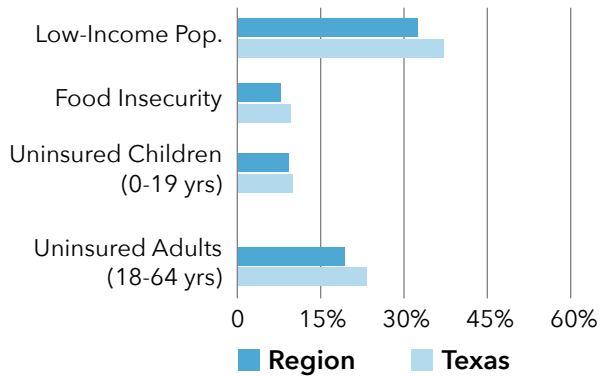
Race and Ethnicity



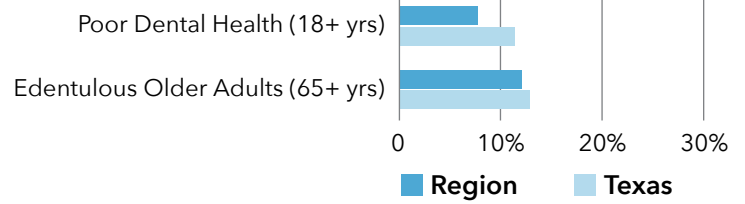
Key Points

- This region has the second highest supplies of primary care physicians, pediatric dentists, and specialized dentists in the state.
- This region performs better than the state average on most estimates of oral health outcome measures. Fewer than 8% of adults are estimated to be in poor oral health.
- The proportion of low-income residents (45.2%) and uninsured adults (26.6%) in Caldwell County is highest of any county in the region.
- One quarter (24.6%) of adults in this region drink excessively, the second highest estimated rate in the state.

Socioeconomic Factors



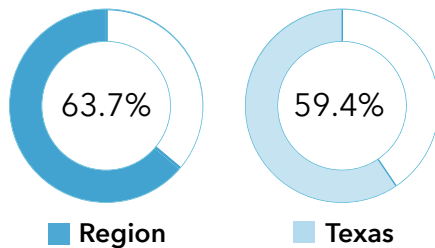
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	16.3	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11.9	10.8
Oral Cancer Mortality rate per 100,00 Pop.	1.9	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

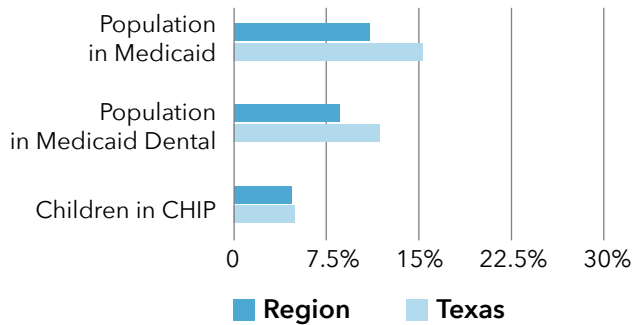


Population to Provider Ratio

	Region	Texas
General Dentist	2528: 1	2970: 1
Pediatric Dentist	5707: 1	9411: 1
Specialized Dentist	11235: 1	14291: 1
Dental Hygienist	1864: 1	2220: 1
Dental Assistant	841: 1	805: 1
Primary Care Physician	1171: 1	1362: 1
Nurse Practitioner	1879: 1	1961: 1
FQHCs per 100,000 pop.	2.8	1.5

Medicaid and CHIP

Enrollment (% of total population)

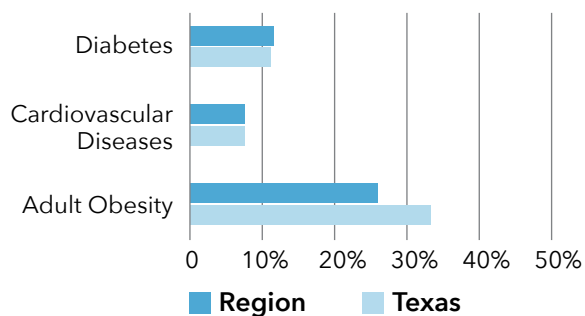


Annual Expenses Per Enrollee

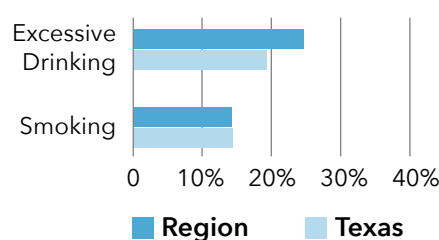
	Region	Texas
Medicaid Non-Dental	\$5,291	\$5,224
Medicaid Dental	\$417	\$419
CHIP Non-Dental	\$1,589	\$1,527
CHIP Dental	\$284	\$285

Risk Factors

Chronic Conditions

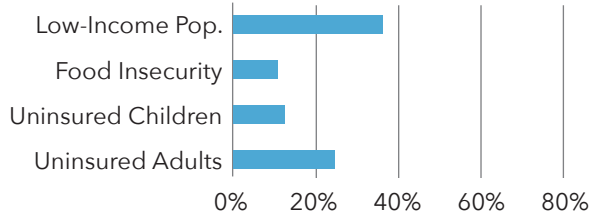


Behaviors



Bastrop County Population 78,286

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	16.9
Oral Cancer Mortality Rate per 100,000 pop.	3.8

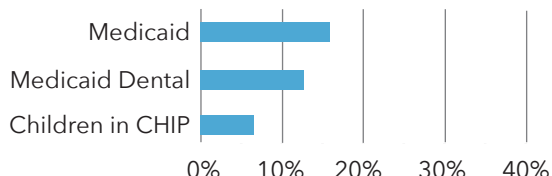
Clinical Care

Pop. to Provider Ratio

General Dentist	4823:1
Pediatric Dentist	6603:1
Specialized Dentist	45819:1
Dental Hygienist	3666:1
Dental Assistant	700:1
Primary Care Physician	3666:1
Nurse Practitioner	3394:1
FQHCs per 100,000 pop.	3.8

Medicaid & CHIP

Enrollment (% of total population)

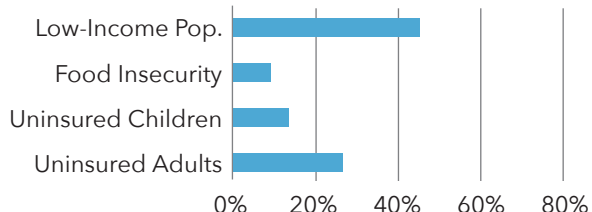


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,385
Medicaid Dental	\$421
CHIP Non- Dental	\$1,592
CHIP Dental	\$284

Caldwell County Population 39,848

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.1
Oral Cancer Mortality Rate per 100,000 pop.	3.4

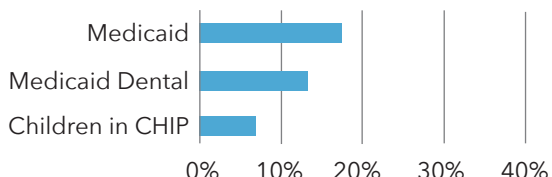
Clinical Care

Pop. to Provider Ratio

General Dentist	4143:1
Pediatric Dentist	9392:1
Specialized Dentist	-
Dental Hygienist	4143:1
Dental Assistant	690:1
Primary Care Physician	3505:1
Nurse Practitioner	9114:1
FQHCs per 100,000 pop.	7.5

Medicaid & CHIP

Enrollment (% of total population)

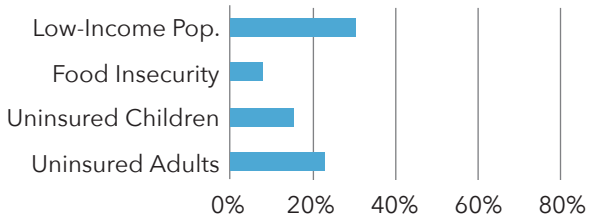


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,523
Medicaid Dental	\$420
CHIP Non- Dental	\$1,582
CHIP Dental	\$285

Fayette County Population 24,909

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.5
Oral Cancer Mortality Rate per 100,000 pop.	3.1

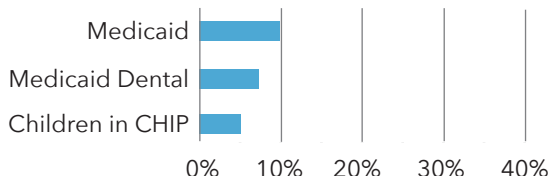
Clinical Care

Pop. to Provider Ratio

General Dentist	5429:1
Pediatric Dentist	5215:1
Specialized Dentist	27147:1
Dental Hygienist	1939:1
Dental Assistant	631:1
Primary Care Physician	2088:1
Nurse Practitioner	5429:1
FQHCs per 100,000 pop.	8

Medicaid & CHIP

Enrollment (% of total population)

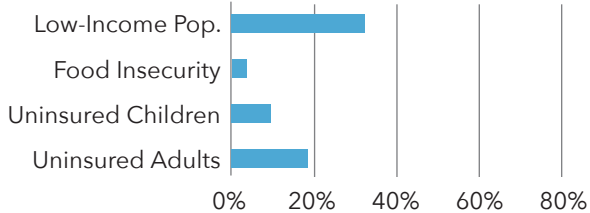


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,053
Medicaid Dental	\$420
CHIP Non- Dental	\$1,579
CHIP Dental	\$287

Hays County Population 185,686

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	13.7
Oral Cancer Incidence Rate per 100,000 pop.	11.4
Oral Cancer Mortality Rate per 100,000 pop.	2.9

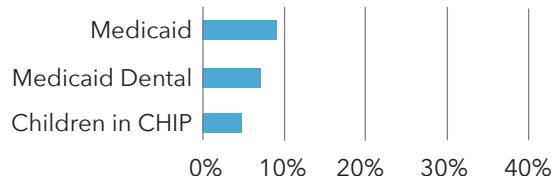
Clinical Care

Pop. to Provider Ratio

General Dentist	4227:1
Pediatric Dentist	7178:1
Specialized Dentist	19598:1
Dental Hygienist	2450:1
Dental Assistant	716:1
Primary Care Physician	1753:1
Nurse Practitioner	2913:1
FQHCs per 100,000 pop.	1.6

Medicaid & CHIP

Enrollment (% of total population)

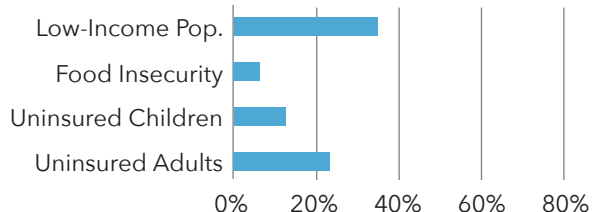


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,071
Medicaid Dental	\$416
CHIP Non- Dental	\$1,591
CHIP Dental	\$284

Lee County Population 16,754

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	9.5
Oral Cancer Mortality Rate per 100,000 pop.	3.4

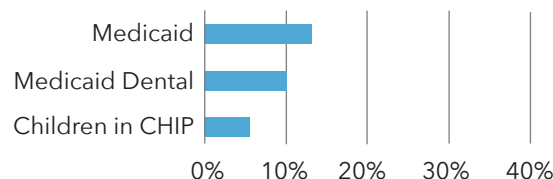
Clinical Care

Pop. to Provider Ratio

General Dentist	4593:1
Pediatric Dentist	3656:1
Specialized Dentist	-
Dental Hygienist	6124:1
Dental Assistant	612:1
Primary Care Physician	3675:1
Nurse Practitioner	3675:1
FQHCs per 100,000 pop.	6

Medicaid & CHIP

Enrollment (% of total population)

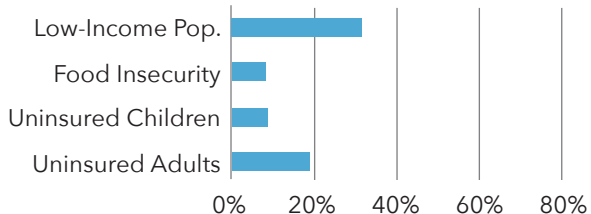


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,405
Medicaid Dental	\$420
CHIP Non- Dental	\$1,600
CHIP Dental	\$282

Travis County Population 1,148,176

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	9.6
Oral Cancer Incidence Rate per 100,000 pop.	11.6
Oral Cancer Mortality Rate per 100,000 pop.	2.3

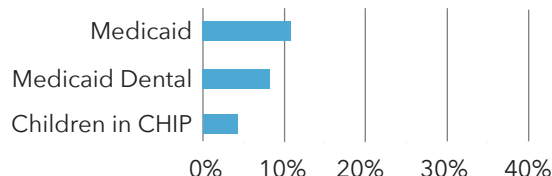
Clinical Care

Pop. to Provider Ratio

General Dentist	2213:1
Pediatric Dentist	5444:1
Specialized Dentist	9352:1
Dental Hygienist	1674:1
Dental Assistant	903:1
Primary Care Physician	1012:1
Nurse Practitioner	1633:1
FQHCs per 100,000 pop.	2.6

Medicaid & CHIP

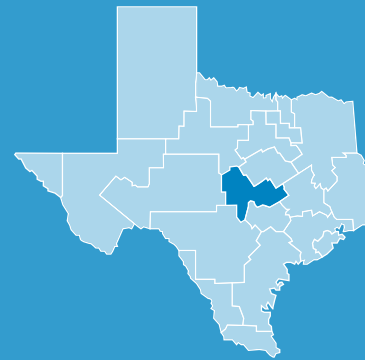
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,280
Medicaid Dental	\$417
CHIP Non- Dental	\$1,589
CHIP Dental	\$284

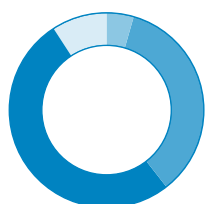
Central - Round Rock/ Hill Country



9 counties: Bell, Blanco, Burnet, Lampasas, Llano, Milam, Mills, San Saba, Williamson

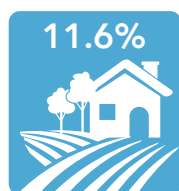
Population 952,085

County Populations

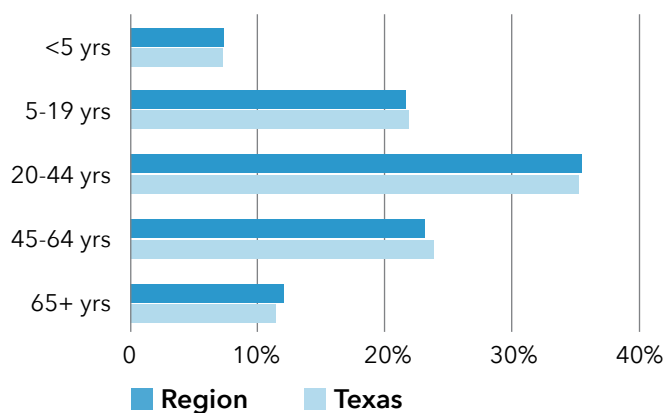


Williamson Bell
Burnet Others

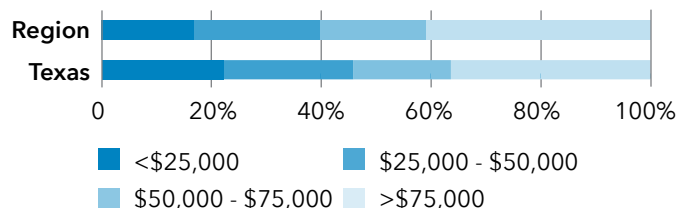
Rural Population



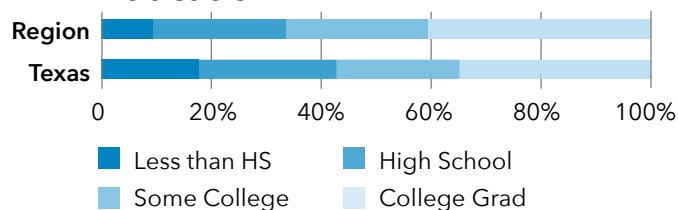
Age



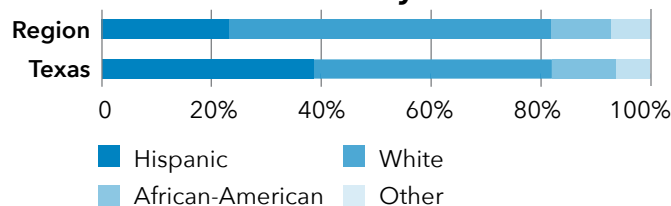
Income



Education



Race and Ethnicity

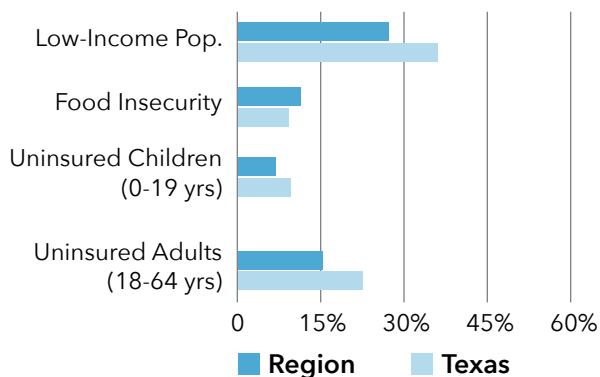


Key Points

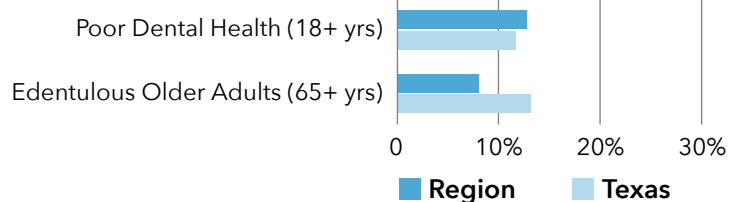
- The estimated rate of edentulism among older adults is lower in this region (8.0%) than any other region in the state, despite a higher rate of adults in poor dental health (12.7%) than the state overall.
- This region ranks second highest in the state for the rate of adults making a past-year dental visit (67.8%).
- This region performs similarly to the state on measures of provider supply.

Central - Round Rock/Hill Country

Socioeconomic Factors



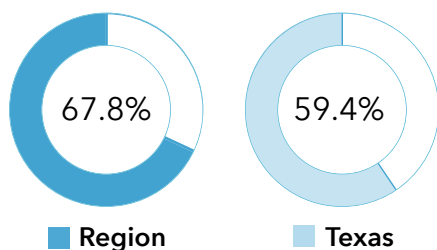
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	12.3	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11.7	10.8
Oral Cancer Mortality rate per 100,000 Pop.	3.5	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

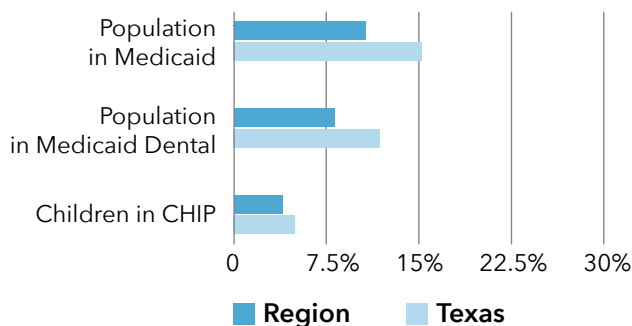


Population to Provider Ratio

	Region	Texas
General Dentist	3033: 1	2970: 1
Pediatric Dentist	6109: 1	9411: 1
Specialized Dentist	13767: 1	14291: 1
Dental Hygienist	1931: 1	2220: 1
Dental Assistant	637: 1	805: 1
Primary Care Physician	1318: 1	1362: 1
Nurse Practitioner	2057: 1	1961: 1
FQHCs per 100,000 pop.	1.5	1.5

Medicaid and CHIP

Enrollment (% of total population)

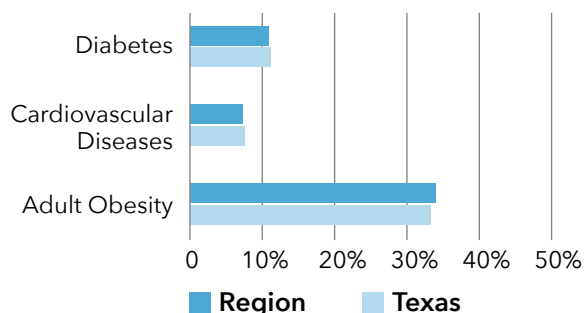


Annual Expenses Per Enrollee

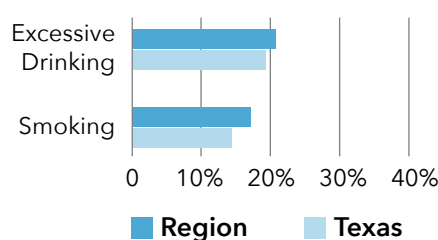
	Region	Texas
Medicaid Non-Dental	\$5,212	\$5,224
Medicaid Dental	\$418	\$419
CHIP Non-Dental	\$1,477	\$1,527
CHIP Dental	\$284	\$285

Risk Factors

Chronic Conditions

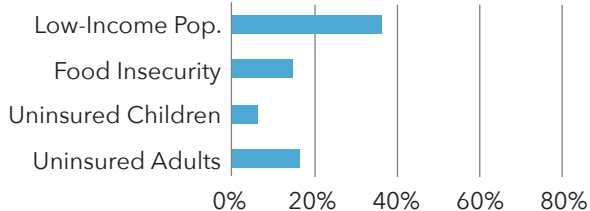


Behaviors



Bell County Population 330,859

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	8.5
Oral Cancer Incidence Rate per 100,000 pop.	12.9
Oral Cancer Mortality Rate per 100,000 pop.	3.2

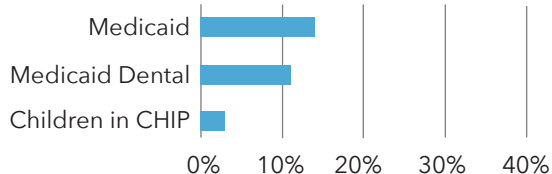
Clinical Care

Pop. to Provider Ratio

General Dentist	4057:1
Pediatric Dentist	7026:1
Specialized Dentist	21715:1
Dental Hygienist	2429:1
Dental Assistant	642:1
Primary Care Physician	1168:1
Nurse Practitioner	1507:1
FQHCs per 100,000 pop.	1.2

Medicaid & CHIP

Enrollment (% of total population)

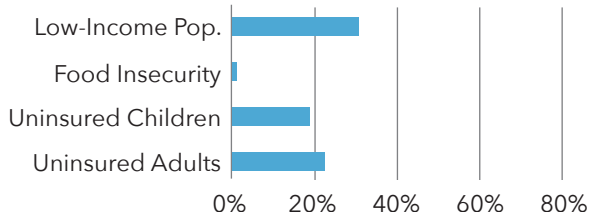


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,171
Medicaid Dental	\$419
CHIP Non- Dental	\$1,308
CHIP Dental	\$283

Blanco County Population 10,918

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	13.4
Oral Cancer Mortality Rate per 100,000 pop.	3.5

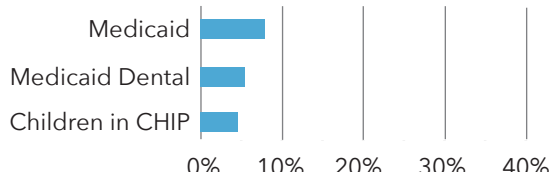
Clinical Care

Pop. to Provider Ratio

General Dentist	3061:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3061:1
Dental Assistant	1113:1
Primary Care Physician	2449:1
Nurse Practitioner	3061:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

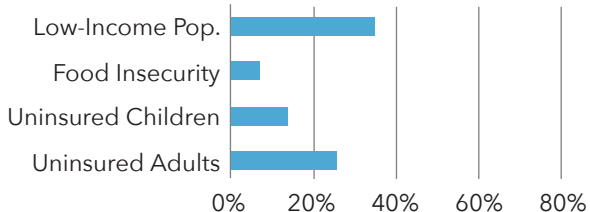


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,495
Medicaid Dental	\$419
CHIP Non- Dental	\$1,294
CHIP Dental	\$294

Burnet County Population 44,584

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	14.1
Oral Cancer Mortality Rate per 100,000 pop.	3.8

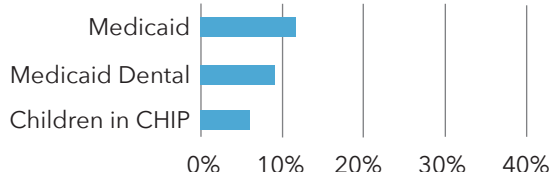
Clinical Care

Pop. to Provider Ratio

General Dentist	2470:1
Pediatric Dentist	3226:1
Specialized Dentist	-
Dental Hygienist	1900:1
Dental Assistant	489:1
Primary Care Physician	1497:1
Nurse Practitioner	2905:1
FQHCs per 100,000 pop.	2.2

Medicaid & CHIP

Enrollment (% of total population)

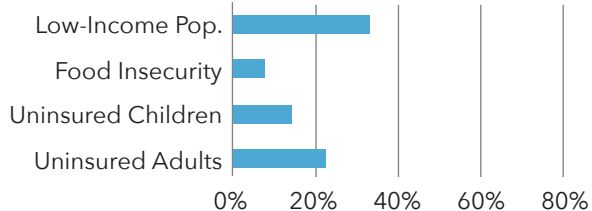


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,326
Medicaid Dental	\$415
CHIP Non- Dental	\$1,585
CHIP Dental	\$287

Lampasas County Population 20,357

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	7.6
Oral Cancer Mortality Rate per 100,000 pop.	2

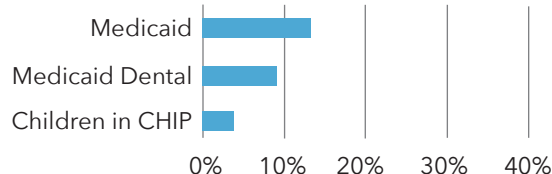
Clinical Care

Pop. to Provider Ratio

General Dentist	5558:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2223:1
Dental Assistant	585:1
Primary Care Physician	3176:1
Nurse Practitioner	5558:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

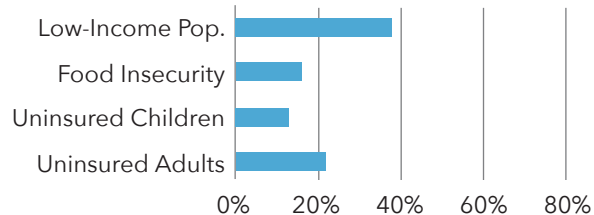


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,565
Medicaid Dental	\$419
CHIP Non- Dental	\$1,303
CHIP Dental	\$287

Llano County Population 19,624

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	20.3
Oral Cancer Mortality Rate per 100,000 pop.	5.3

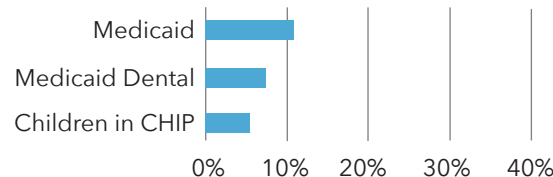
Clinical Care

Pop. to Provider Ratio

General Dentist	2314:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2604:1
Dental Assistant	833:1
Primary Care Physician	1894:1
Nurse Practitioner	10415:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

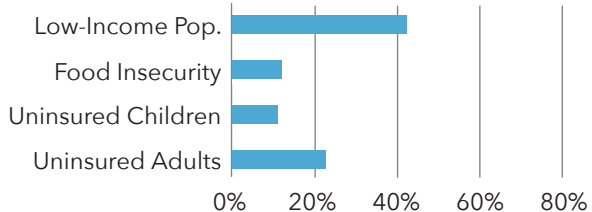


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,831
Medicaid Dental	\$415
CHIP Non- Dental	\$1,304
CHIP Dental	\$286

Milam County Population 24,372

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	10.9
Oral Cancer Mortality Rate per 100,000 pop.	5.5

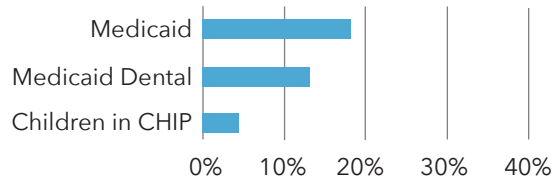
Clinical Care

Pop. to Provider Ratio

General Dentist	5236:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5236:1
Dental Assistant	639:1
Primary Care Physician	2182:1
Nurse Practitioner	2014:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

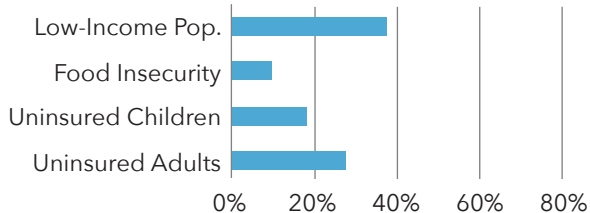


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,522
Medicaid Dental	\$422
CHIP Non- Dental	\$1,306
CHIP Dental	\$289

Mills County Population 4,871

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	5.9
Oral Cancer Mortality Rate per 100,000 pop.	0

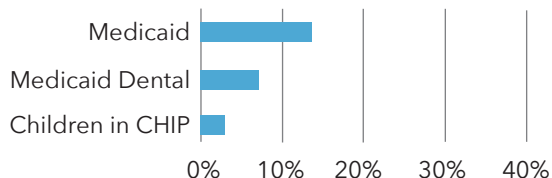
Clinical Care

Pop. to Provider Ratio

General Dentist	2561:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	5121:1
Dental Assistant	1024:1
Primary Care Physician	2561:1
Nurse Practitioner	1707:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

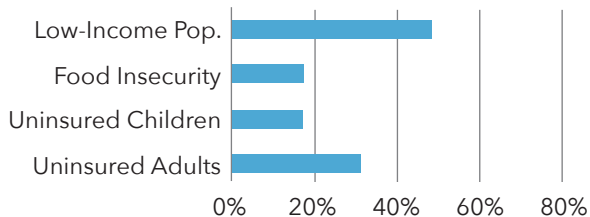


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,985
Medicaid Dental	\$421
CHIP Non- Dental	\$1,300
CHIP Dental	\$285

San Saba County Population 5,881

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.4
Oral Cancer Mortality Rate per 100,000 pop.	0

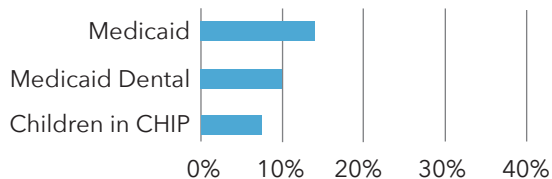
Clinical Care

Pop. to Provider Ratio

General Dentist	3176:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	3176:1
Dental Assistant	1059:1
Primary Care Physician	6351:1
Nurse Practitioner	2117:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

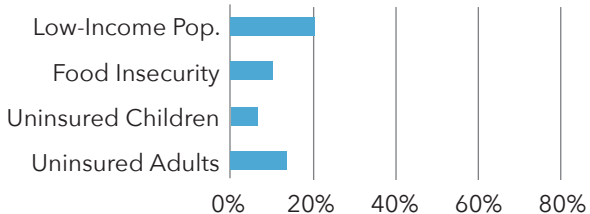


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,469
Medicaid Dental	\$415
CHIP Non- Dental	\$1,305
CHIP Dental	\$279

Williamson County Population 490,619

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	5.9
Oral Cancer Incidence Rate per 100,000 pop.	10.8
Oral Cancer Mortality Rate per 100,000 pop.	1.9

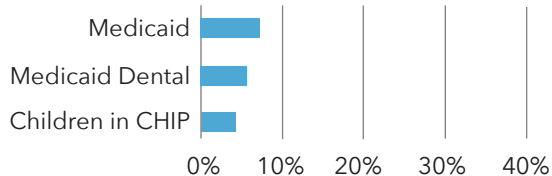
Clinical Care

Pop. to Provider Ratio

General Dentist	2591:1
Pediatric Dentist	5252:1
Specialized Dentist	9219:1
Dental Hygienist	1616:1
Dental Assistant	635:1
Primary Care Physician	1314:1
Nurse Practitioner	2434:1
FQHCs per 100,000 pop.	1.8

Medicaid & CHIP

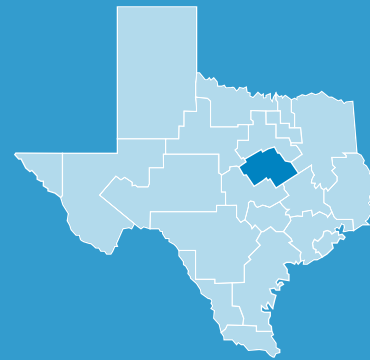
Enrollment (% of total population)



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,107
Medicaid Dental	\$417
CHIP Non- Dental	\$1,593
CHIP Dental	\$284

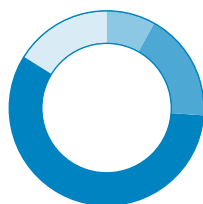
Central - Waco



7 counties: Bosque, Coryell, Falls, Hamilton, Hill, Limestone, McLennan

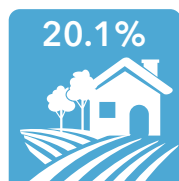
Population 420,924

County Populations

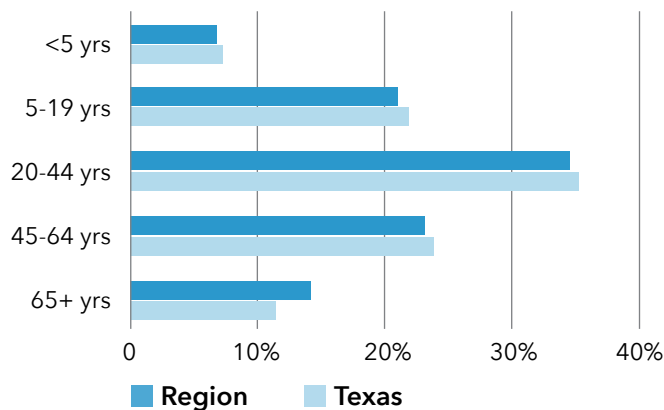


McLennan
Coryell
Hill
Others

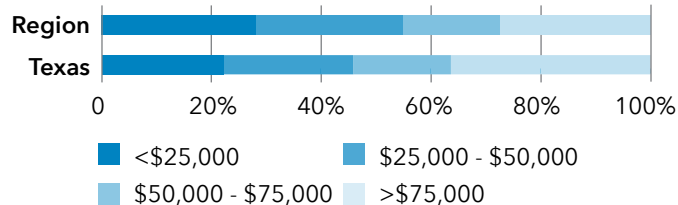
Rural Population



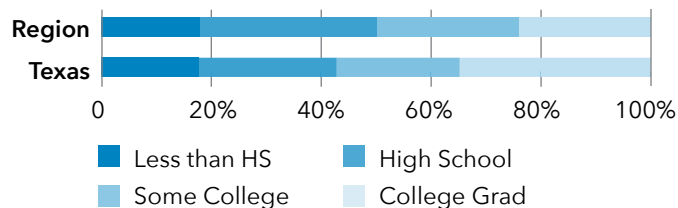
Age



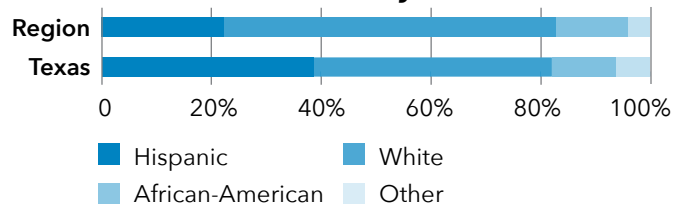
Income



Education



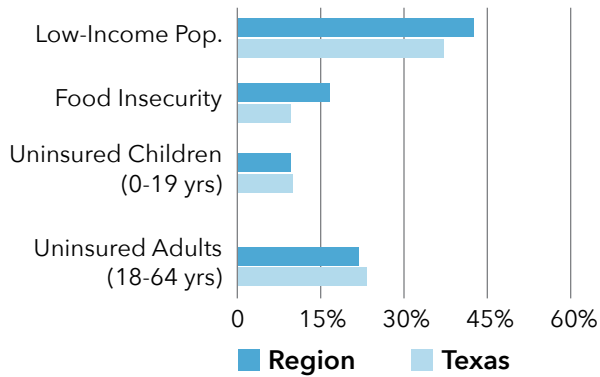
Race and Ethnicity



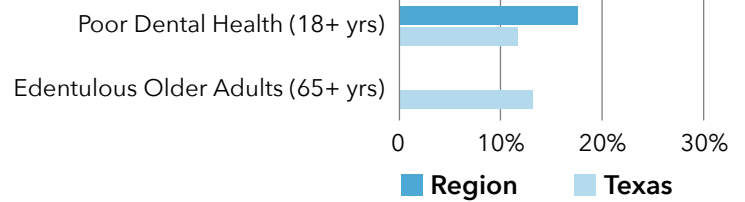
Key Points

- A high percentage of this region's population is estimated to have poor dental health (17.5%).
- In this region, 23.9 oral clefts occur per 10,000 live births, the highest rate in the state. This rate is approximately twice as high as the neighboring Central - Round Rock/Hill Country region (12.3 per 10,000), the lowest rate in the state.
- The region performs comparatively poorly on measures of provider supply. McLennan is the only county in the region with a pediatric dentist. However, the estimated rate of adults making a past-year dental visit (71.8%) is higher than any region in the state.
- Obesity is estimated to affect one in two adults in this region (49.0%), a rate in excess of the state average.

Socioeconomic Factors



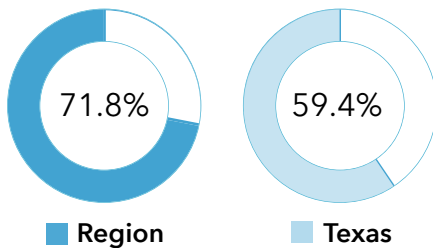
Oral Health Outcomes



	Region	Texas
Oral Clefts rate per 10,000 live births	23.9	15.8
Oral Cancer Incidence rate per 100,000 Pop.	11.7	10.8
Oral Cancer Mortality rate per 100,00 Pop.	3.5	2.6

Clinical Care

Past-Year Dental Visits (18+ years)

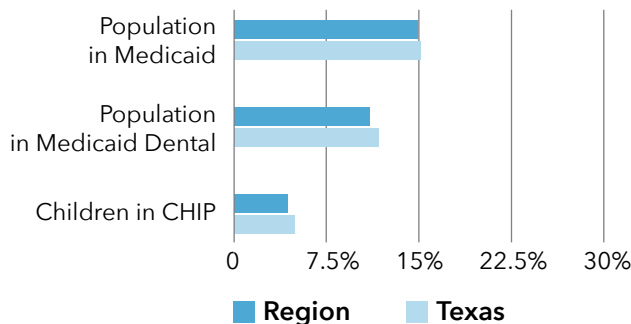


Population to Provider Ratio

	Region	Texas
General Dentist	4140: 1	2970: 1
Pediatric Dentist	16791: 1	9411: 1
Specialized Dentist	24612: 1	14291: 1
Dental Hygienist	2461: 1	2220: 1
Dental Assistant	816: 1	805: 1
Primary Care Physician	1647: 1	1362: 1
Nurse Practitioner	2151: 1	1961: 1
FQHCs per 100,000 pop.	2.6	1.5

Medicaid and CHIP

Enrollment (% of total population)

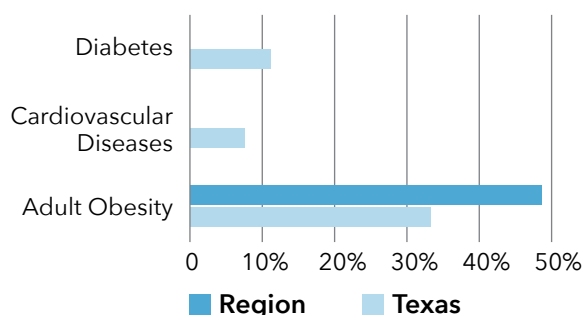


Annual Expenses Per Enrollee

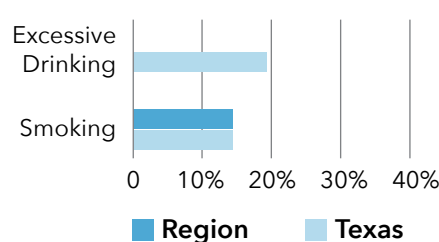
	Region	Texas
Medicaid Non-Dental	\$5,589	\$5,224
Medicaid Dental	\$419	\$419
CHIP Non-Dental	\$1,309	\$1,527
CHIP Dental	\$285	\$285

Risk Factors

Chronic Conditions

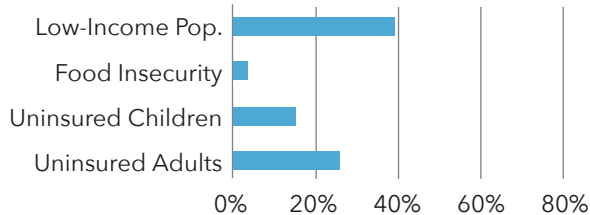


Behaviors



Bosque County Population 17,953

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	15.5
Oral Cancer Mortality Rate per 100,000 pop.	4

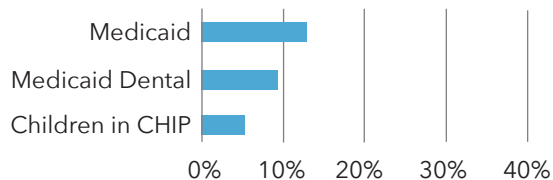
Clinical Care

Pop. to Provider Ratio

General Dentist	2830:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2830:1
Dental Assistant	1415:1
Primary Care Physician	2476:1
Nurse Practitioner	2201:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

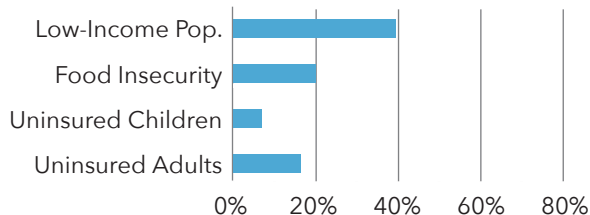


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,753
Medicaid Dental	\$421
CHIP Non- Dental	\$1,313
CHIP Dental	\$287

Coryell County Population 75,710

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	16.4
Oral Cancer Incidence Rate per 100,000 pop.	12.5
Oral Cancer Mortality Rate per 100,000 pop.	2.5

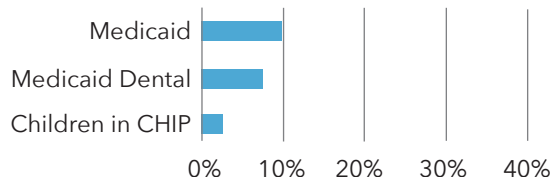
Clinical Care

Pop. to Provider Ratio

General Dentist	6954:1
Pediatric Dentist	-
Specialized Dentist	83448:1
Dental Hygienist	2878:1
Dental Assistant	860:1
Primary Care Physician	3628:1
Nurse Practitioner	2086:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

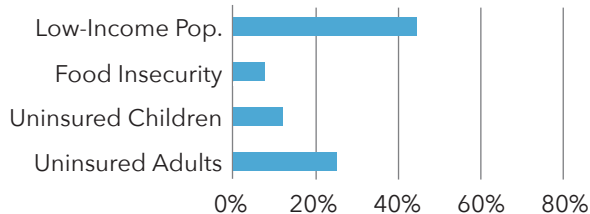


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,241
Medicaid Dental	\$419
CHIP Non- Dental	\$1,305
CHIP Dental	\$285

Falls County Population 17,265

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	12.2
Oral Cancer Mortality Rate per 100,000 pop.	1.8

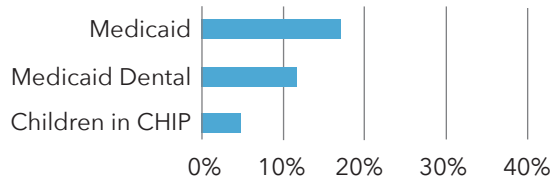
Clinical Care

Pop. to Provider Ratio

General Dentist	18879:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	18879:1
Dental Assistant	755:1
Primary Care Physician	3776:1
Nurse Practitioner	3147:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

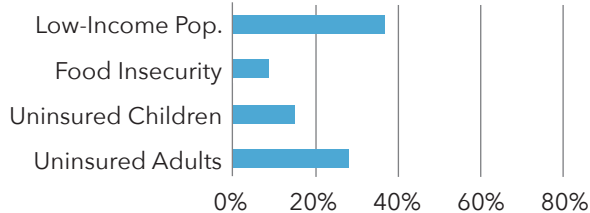


Annual Expenses per Enrollee

Medicaid Non- Dental	\$6,374
Medicaid Dental	\$418
CHIP Non- Dental	\$1,305
CHIP Dental	\$285

Hamilton County Population 8,232

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	11.2
Oral Cancer Mortality Rate per 100,000 pop.	7.3

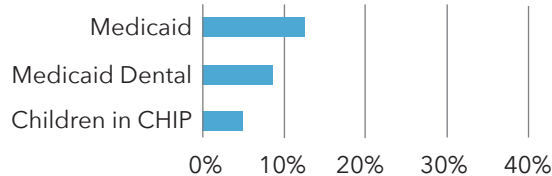
Clinical Care

Pop. to Provider Ratio

General Dentist	2903:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	1742:1
Dental Assistant	871:1
Primary Care Physician	968:1
Nurse Practitioner	2903:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

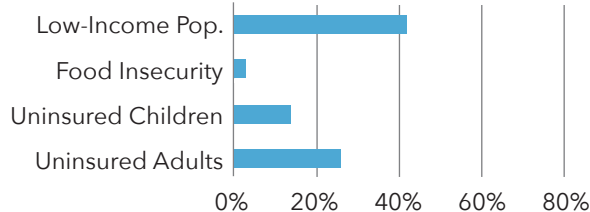


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,874
Medicaid Dental	\$418
CHIP Non- Dental	\$1,301
CHIP Dental	\$290

Hill County Population 34,901

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	0.0
Oral Cancer Incidence Rate per 100,000 pop.	16.4
Oral Cancer Mortality Rate per 100,000 pop.	4.6

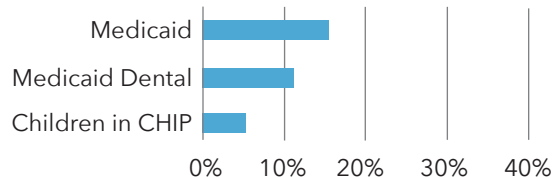
Clinical Care

Pop. to Provider Ratio

General Dentist	7622:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2932:1
Dental Assistant	1030:1
Primary Care Physician	3811:1
Nurse Practitioner	4764:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

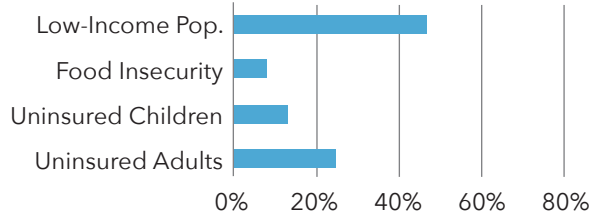


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,592
Medicaid Dental	\$423
CHIP Non- Dental	\$1,310
CHIP Dental	\$283

Limestone County Population 23,469

Socioeconomic Factors



Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	---
Oral Cancer Incidence Rate per 100,000 pop.	17.4
Oral Cancer Mortality Rate per 100,000 pop.	2.4

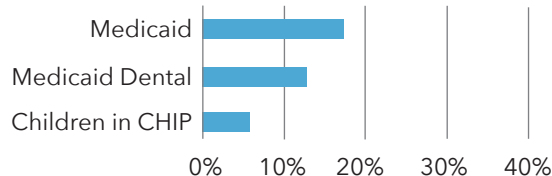
Clinical Care

Pop. to Provider Ratio

General Dentist	5061:1
Pediatric Dentist	-
Specialized Dentist	-
Dental Hygienist	2109:1
Dental Assistant	1489:1
Primary Care Physician	1687:1
Nurse Practitioner	3163:1
FQHCs per 100,000 pop.	0

Medicaid & CHIP

Enrollment (% of total population)

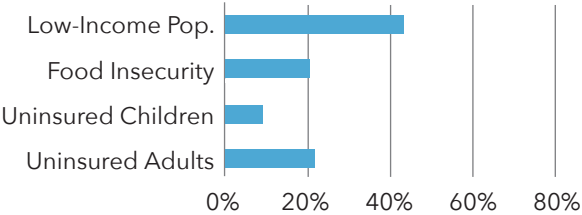


Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,284
Medicaid Dental	\$419
CHIP Non- Dental	\$1,309
CHIP Dental	\$286

McLennan County Population 243,394

Socioeconomic Factors



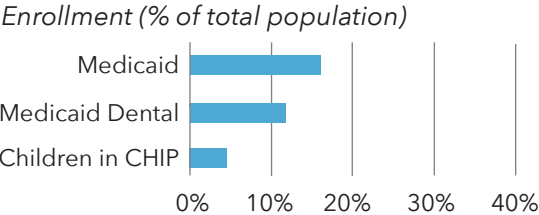
Oral Health Outcomes

Oral Clefts Rate per 10,000 Live Births	18.0
Oral Cancer Incidence Rate per 100,000 pop.	12.1
Oral Cancer Mortality Rate per 100,000 pop.	3.7

Clinical Care

<i>Pop. to Provider Ratio</i>	
General Dentist	3362:1
Pediatric Dentist	9934:1
Specialized Dentist	14632:1
Dental Hygienist	2201:1
Dental Assistant	725:1
Primary Care Physician	1250:1
Nurse Practitioner	1885:1
FQHCs per 100,000 pop.	4.5

Medicaid & CHIP



Annual Expenses per Enrollee

Medicaid Non- Dental	\$5,612
Medicaid Dental	\$418
CHIP Non- Dental	\$1,310
CHIP Dental	\$284

Methodology and Data Sources

Overview

To develop a better understanding of geographic variations and their impact on oral health needs, the report team identified and obtained data for over 30 indicators at the state, regional, and county levels. As described in the previous section, these indicators were categorized in five categories. This classification will help communities answer the following questions:

- 1 Population and Socioeconomic Factors** – What factors influence the oral health needs or status in our community?
- 2 Oral Health Outcomes** – What are the major oral health needs facing our community?
- 3 Clinical Care** – What is our current capacity and where are the greatest needs?
- 4 Medicaid and CHIP** – How are we utilizing our resources?
- 5 Risk Factors** – What is causing or impacting oral health needs in our community?

Additionally, to develop a better understanding of community residents and how demographic factors might be affecting oral health outcomes, demographic data were obtained from the U.S. Census Bureau American Community Survey (ACS), 2016.

Data Description and Methodology

Data for the regional and county profiles were obtained from a combination of publicly available national and state data sources. Indicator names, definitions, sources, and geography levels for each indicator are included in Table 3. Regional and local data for several indicators were requested from relevant state agencies. Technical notes and methodology (where calculated differently from primary source) for these indicators have been described below.

Oral Health Outcomes

State and regional data for selected oral health outcomes indicators (tooth loss due to tooth decay or gum disease and edentulous older adults) were provided by the Behavioral Risk

Factor Surveillance System (BRFSS) program at the Center for Health Statistics at Texas Department of State Health Services (DSHS). Given the age category constraints for the edentulous older adults indicator, three years of pooled data were used to ensure sufficient responses to report results by region. BRFSS suppresses data for fields where less than 50 responses had been received or the relative standard error was greater than 30%.

Data on oral and pharyngeal cancer incidence and mortality rate were provided by the Texas Cancer Registry at DSHS. Rates are per 100,000 and age-adjusted to the 2000 U.S. standard population (19 age groups - Census P25-1130). These data also use 95% confidence intervals (CIs).

Data for oral cleft rates (cleft lip and/or palate) were provided by the Birth Defects Epidemiology and Surveillance Branch at DSHS. These data include cases per 10,000 Texas resident live births.

Clinical Care

Provider data for 2017 were requested from the Health Professions Resource Center at DSHS.

In this report, we have defined general dentists as those providers who do not list a specialty with Texas State Board of Dental Examiners (TSBDE). It should be noted that this definition of general dentists is different than the one used by HPRC within DSHS. HPRC aggregates general, public health, and pediatric specialties from TSBDE into their general dentist tables.

In addition to general dentists, data are included on providers that have listed or registered as a specialized dentist. Specialized dentist data include all recognized dental specialties except for pediatric dentists. Population projections from the Texas Demographic Center have been used to calculate the provider to population ratios. However, population estimates from the 2016 U.S. Census Bureau's American Community Survey were utilized to calculate pediatric dentist to child population ratios.

Data from the Health Resources and Services Administration Data Warehouse were accessed through the Texas Primary Care Office at DSHS

website to determine the ratio of federally qualified health centers to population. Population data from the 2016 U.S. Census Bureau's American Community Survey were used to calculate this rate. We excluded school-based health centers, mobile dental vans, and administrative centers from the final count.

Medicaid and CHIP

Data were received from the Texas Health and Human Services Commission's Texas Health Steps Program (THSteps). These data, from FY2016, included Medicaid enrollment indicators such as number of non-dental Medicaid enrollees, the number of enrollees in Medicaid dental benefits, and the number of children enrolled in CHIP (<19 years). These along with population estimates from the 2016 U.S. Census Bureau's American Community Survey were utilized to calculate annual Medicaid (non-dental and dental), and 2016 population projections (<19 years) from the Texas Demographic Center were utilized to calculate annual CHIP enrollment. Data provided also included utilization indicators such as total annual expenses for Medicaid non-dental, Medicaid dental, CHIP non-dental, and CHIP dental expenses. Cost indicators represented cost of both fee-for-service expenditures and managed care capitation payments for children dental benefits provided through the THSteps. Annual expenses and number of enrollees were utilized to calculate the annual costs per enrollee for each program.

Risk Factors

2016 data were provided by the BRFSS program at the Center for Health Statistics at DSHS. Data was not available for fields where less than 50 responses had been received or the relative standard error was greater than 30%.

Strength and Limitations

BRFSS

BRFSS is the world's largest annual population-based telephone survey and research has shown to be both valid and reliable. However, as with any survey data there are multiple sources of potential error. For example, BRFSS relies on self-reported information that has not been verified by medical or dental records. The wording of questions may affect the responses given and can result in measurement error. Similarly, the

survey relies on the ability of respondents to recall details accurately, an ability that varies by person and how much time has passed since the event they are trying to recall, which can result in response error.

Health Professions Data

The health professions data received from DSHS are based on the licensure files DSHS receives from respective licensing boards. DSHS processes these data to estimate the number of physicians and dentists providing direct patient care and nurses employed full- or part-time in nursing. The number of dental hygienists and dental assistants reflect those currently licensed to practice in the state. Only those providers with a valid Texas address are included in these analyses.

Texas Cancer Registry Data

Data were drawn from 2011-2015 to reduce the likelihood of data suppression and the potential effect of few events affecting rates in sparsely populated areas.

Texas Birth Defects Registry

Data were drawn from 2012-2014 to reduce the likelihood of data suppression and the potential effect of few events affecting rates in sparsely populated areas.

Medicaid and CHIP Enrollment and Utilization Data

It is important to note that the Medicaid dental program does not include dental services for most adults since comprehensive dental services are generally not covered benefits for adults in the Texas Medicaid program.

Also, the annual costs reflect the costs per enrollee and do not consider whether an enrollee received treatment or not. Thus, the cost per patient would almost certainly be higher.

Glossary

NA means not available

- means no provider

--- means suppressed data

Socioeconomic Factors

Indicator Name	Definition & Methodology	Source	Age Group	Geographic Level
<i>Low-income Population</i>	Percent of individuals living in a household with income below 200% Federal Poverty Level (FPL)	U.S. Census Bureau, American Community Survey, 2016	All ages	State, Region, and County
<i>Food Insecurity</i>	Percent of population with low access to healthy foods and living in low income census tracts	U.S. Department of Agriculture, Economic Research Service, 2015 and U.S. Census Bureau, American Community Survey, 2010	All ages	State, Region, and County
<i>Uninsured Children (0-18 years)</i>	Percent of children under age 19 without health insurance coverage	U.S. Census Bureau, Small Area Health Insurance Estimates, 2015	0-18 years	State, Region, and County
<i>Uninsured Adults (18-64 years)</i>	Percent of non-elderly adults without health insurance coverage	U.S. Census Bureau, Small Area Health Insurance Estimates, 2015	18-64 years	State, Region, and County

Oral Health Outcomes

Indicator Name	Definition & Methodology	Source	Age Group	Geographic Level
<i>Poor Dental Health (18+ years)</i>	Percent of adults who self-report having had six or more teeth removed because of tooth decay or gum disease	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region
<i>Edentulous Older Adults (65+ years)</i>	Percent of adults 65 years and older who self-report having all teeth removed	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2012, 2014, 2016	65+ years	State and Region
<i>Oral Clefts rate per 10,000 Live Births</i>	Birth prevalence of cleft palate alone and/or cleft lip with or without cleft palate per 10,000 live births	Texas Department of State Health Services, Birth Defects Epidemiology and Surveillance Branch, 2012-2014	Infants	State, Region, and County
<i>Oral Cancer Incidence rate per 100,000 Population</i>	Age-adjusted incidence rate of invasive oral cavity and pharyngeal cancer per 100,000 population	Texas Department of State Health Services, Texas Cancer Registry, 2011-2015	All ages	Region and County
<i>Oral Cancer Mortality rate per 100,000 Population</i>	Age-adjusted mortality rate of invasive oral cavity and pharyngeal cancer per 100,000 population	Texas Department of State Health Services, Texas Cancer Registry, 2011-2015	All ages	Region and County

Clinical Care

Indicator Name	Definition & Methodology	Source	Age Group	Geographic Level
<i>Past-Year Dental Visits (18+ years)</i>	Percent of adults over 18 years who self-report visiting the dentist or dental clinic within the past year for any reason	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region
<i>Population to General Dentist Ratio</i>	The ratio of total population to total general dentists	Texas Department of State Health Services, Center for Health Statistics, 2017	Not applicable	State, Region, and County
<i>Child Population (0-17 years) to Pediatric Dentist Ratio</i>	The ratio of total child population under 18 years to total pediatric dentists	Texas Department of State Health Services, Center for Health Statistics, 2017 and U.S. Census Bureau, American Community Survey, 2016	Not applicable	State, Region, and County
<i>Population to Specialized Dentist Ratio</i>	The ratio of total population to total specialized dentists.	Texas Department of State Health Services, Center for Health Statistics, 2017	Not applicable	State, Region, and County
<i>Population to Primary Care Physician Ratio</i>	The ratio of total population to total primary care physicians.	Texas Department of State Health Services, Center for Health Statistics, 2017	Not applicable	State, Region, and County
<i>Population to Dental Hygienist Ratio</i>	The ratio of total population to total dental hygienists.	Texas Department of State Health Services, Center for Health Statistics, 2017	Not applicable	State, Region, and County
<i>Population to Dental Assistant Ratio</i>	The ratio of total population to total dental assistants.	Texas Department of State Health Services, Center for Health Statistics, 2017	Not applicable	State, Region, and County
<i>Population to Nurse Practitioner Ratio</i>	The ratio of total population to total primary care nurse practitioners.	Texas Department of State Health Services, Center for Health Statistics, 2017	Not applicable	State, Region, and County
<i>FQHCs per 100,000 Population</i>	Number of FQHC sites per 100,000 population	Health Resources and Services Administration Data Warehouse, Health Centers and Look-alike Sites Site Directory, accessed through Texas Primary Care Office, 2016 and U.S. Census Bureau, American Community Survey, 2016	Not applicable	State, Region, and County

Risk Factors

Indicator Name	Definition & Methodology	Source	Age Group	Geographic Level
<i>Excessive Drinking</i>	Percent of adults who self-report either binge drinking (having five or more [men] or four or more [women] drinks on one occasion) or heavy drinking (having more than two drinks [men] or more than one drink [women] per day)	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region
<i>Smoking</i>	Percent of adults who self-report smoking every day or some days	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region
<i>Obesity</i>	Percent of adults who are obese by self-report, with a body mass index (BMI) of 30.0 or higher	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region
<i>Diabetes</i>	Percent of adults who self-report being told by a health professional they had diabetes (excludes pre-diabetes and gestational diabetes)	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region
<i>Cardiovascular Disease</i>	Percent of adults who self-report being told by a health professional they had had coronary heart disease, angina, heart attack, or stroke	Texas Department of State Health Services, Center for Health Statistics, Behavioral Risk Factor Surveillance System, 2016	18+ years	State and Region

Medicaid and CHIP

Indicator Name	Definition & Methodology	Source	Age Group	Geographic Level
<i>Population Enrolled in Medicaid</i>	Percent of total population enrolled in Medicaid	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	All ages	State, Region, and County
<i>Population Enrolled in Medicaid Dental</i>	Percent of total population enrolled in Medicaid dental benefits	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	0-20 years	State, Region, and County
<i>Children Enrolled in CHIP</i>	Percent of total child population under age 19 enrolled in CHIP	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	0-18 years	State, Region, and County
<i>Medicaid Non-dental Annual Expenses per Enrollee</i>	Average Medicaid non-dental expenditures per year per enrollee	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	All ages	State, Region, and County
<i>Medicaid Dental Annual Expenses per Enrollee</i>	Average Medicaid dental expenditures per year per enrollee	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	0-20 years	State, Region, and County
<i>CHIP Non-dental Annual Expenses per Enrollee</i>	Average CHIP non-dental expenditures per year per enrollee	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	0-18 years	State, Region, and County
<i>CHIP Dental Annual Expenses per Enrollee</i>	Average CHIP dental expenditures per year per enrollee	Texas Health and Human Services Commission, Texas Health Steps, FY 2016	0-18 years	State, Region, and County



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Appendix

Appendix A: Healthy People 2020: Oral Health Indicators - Target Levels and Current Status for the United States and Texas

Healthy People 2020 Objective		Target	National Status	National Source	Texas Status	Texas Source
OH 1	Reduce the proportion of children with dental caries experience in their primary teeth					
	Children with dental caries experience in their primary teeth (3-5 years)	30.0%	29.7%	NHANES 2013-2014	42.9%	Texas BSS Head Start 2013-2014
	Children with dental caries experience in their primary or permanent teeth (6-9 years)	49.0%	51.7%	NHANES 2013-2014	66.8%	Texas BSS Third Grade 2012-2013
	Adolescents with dental caries experience in their permanent teeth (13-15 years)	48.3%	49.9%	NHANES 2013-2014	NA	-
OH 2	Reduce the proportion of children with untreated dental decay in their primary teeth					
	Children with untreated dental decay in their primary teeth (3-5 years)	21.4%	14.1%	NHANES 2013-2014	20.4%	Texas BSS Head Start 2013-2014
	Children with untreated dental decay in their primary or permanent teeth (6-9 years)	25.9%	16.2%	NHANES 2013-2014	26.2%	Texas BSS Third grade 2012-2013
	Adolescents with untreated dental decay in their permanent teeth (13-15 years)	15.3%	17.9%	NHANES 2013-2014	NA	-
OH 3	Reduce the proportion of adults with untreated dental decay					
	Adults with untreated dental decay (35-44 years)	25.0%	31.3%	NHANES 2013-2014	NA	-
	Adults with untreated coronal caries (65-74 years)	15.4%	19.1%	NHANES 2013-2014	NA	-
	Adults with untreated root surface caries (75+ years)	34.1%	37.9%	NHANES 1999-2004	NA	-
OH 4	Reduce the proportion of adults who have ever had a permanent tooth extracted because of dental caries or periodontal disease					
	Adults with permanent tooth loss due to tooth decay or gum disease (45-64 years)	68.8%	72.0%	NHANES 2013-2014	54.1%	Texas BRFSS 2012-2016
	Older adults with complete tooth loss ¹	21.6%	15.2%	NHANES 2013-2014	13.1%	Texas BRFSS 2012-2016
OH 5	Reduce the proportion of adults with moderate or severe periodontitis (45 to 74 years)	40.8%	37.4%	NHANES 2013-2014	NA	-
OH 6	Increase the proportion of oral and pharyngeal cancers detected at the earliest stage	35.9%	30.9%	NPCR and SEER 2013	NA	-
OH 7	Increase the proportion of children, adolescents, and adults who used the oral health care system in the past year (2+ years)	49.0%	43.2%	MEPS 2014	NA	-
	Children (1-17 years) making a dental visit in the past year		81.2%	NSCH 2016	80.6%	NSCH 2016
	Adolescents (14-18 years) making a dental visit in the past year		74.4%	YRBSS 2015	70.0%	YRBSS 2017
	Adults (18+ years) making a dental visit in the past year		66.4%	BRFSS 2016	59.4%	Texas BRFSS 2016
OH 8	Increase the proportion of low-income children and adolescents who received any preventive dental service during the past year	33.2%	36.8%	MEPS 2014	68.7%	Form CMS-416 2016 ²
OH 9	Increase the proportion of school-based health centers with an oral health component					
	School-based health centers with an oral health component that includes dental sealants	18.8%	24.4%	SBHA 2010-2011	NA	-

	School-based health centers with an oral health component that includes dental care	7.0%	9.1%	SBHA 2010-2011	NA	-
	School-based health centers with an oral health component that includes topical fluoride	22.7%	33.1%	SBHA 2010-2011	NA	-
OH 10	Increase the proportion of Federally Qualified Health Centers (FQHCs) that have an oral health care program	69.0%	71.2%	UDS 2015	81.8%	UDS 2016 ³
OH 11	Increase the proportion of patients who receive oral health services at FQHCs each year	33.3%	21.9%	UDS 2016	16.5%	UDS 2016
OH 12	Increase the proportion of children and adolescents who have received dental sealants on their molar teeth					
	Children (3-5 years) receiving dental sealants on one or more of their primary molar teeth	1.5%	4.3%	NHANES 2013-2014	NA	-
	Children (6-9 years) receiving dental sealants on one or more of their permanent first molar teeth	28.1%	40.7%	NHANES 2013-2014	51.2%	Texas BSS Third Grade 2012-2013
	Adolescents (13-15 years) receiving dental sealants on one or more of their permanent molar teeth	21.9%	42.6%	NHANES 2013-2014	NA	NA
OH 13	Increase the proportion of the U.S. population served by community water systems with optimally fluoridated water	79.6%	74.7%	WFRS 2014	68.8%	WFRS 2017
OH14	Increase the proportion of adults who receive preventive interventions in dental offices					
	Adults (18+ years) who received information from a dentist or dental hygienist focused on reducing tobacco use or on smoking cessation in the past year	13.2%	9.7%	NHANES 2013-2014	NA	-
	Adults (18+ years) who received an oral and pharyngeal cancer screening from a dentist or dental hygienist in the past year	28.6%	22.6%	NHANES 2013-2014	NA	-
	Adults (18+ years) who were tested or referred for glycemic control from a dentist or dental hygienist in the past year	7.3%	6.4%	NHANES 2013-2014	NA	-
OH 15	Increase the number of states (including the District of Columbia) that have a system for recording and referring infants and children with cleft lips and cleft palates to craniofacial anomaly rehabilitative teams					
	Number of states (including the District of Columbia) with a recording system for cleft lips and cleft palates	39	39	ASTDD 2014	Yes	TBDR
	Number of states (including the District of Columbia) with a referral system for cleft lips and cleft palates	34	36	ASTDD 2014	Yes	TBDR
OH 16	Increase the number of States (including the District of Columbia) that have an oral and craniofacial health surveillance system	51	32	ASTDD 2009	Yes	TBDR
OH 17	Increase the proportion of States (including the District of Columbia) and local health agencies that serve jurisdictions of 250,000 or more persons with a dental public health program directed by a dental professional with public health training	25.7%	23.4%	ASTDD 2008	18.2%	ASTDD 2017

Data Sources:

ASTDD: Association of State and Territorial Dental Directors Survey
 CMS: Centers for Medicare and Medicaid Services
 MEPS: Medical Expenditure Panel Survey
 NA: Not Available
 NHANES: National Health and Nutrition Examination Survey
 NSCH: National Health Interview Survey
 SBHA: School Based Health Alliance

SEER: Surveillance, Epidemiology, and End Results

TBDR: Texas Birth Defects Registry

Texas BRFSS: Behavioral Risk Factor Surveillance System

Texas DSHS: Texas Department of State Health Services

Texas BSS: Basic Screening Survey, Texas Oral Health Program

UDS: Uniform Data System

WFRS: Water Fluoridation Reporting System

Footnotes

1 Older adults are defined as adults age 65-74 years in NHANES, and adults age 65+ in Texas BRFSS.

2 Form CMS-416 captures data only from low-income children enrolled in Medicaid and CHIP.

3 Texas UDS 2016 includes data from FQHCs treating 500 or more dental patients.

Appendix B: Regions Ranked by Population Size

Name	Population	Population Rank	Counties
North Central - Abilene	318,210	18	Brown, Callahan, Comanche, Eastland, Fisher, Haskell, Jones, Knox, Mitchell, Nolan, Palo Pinto, Shackelford, Stephens, Stonewall, Taylor
North Central - Wichita Falls	260,160	19	Archer, Baylor, Clay, Cooke, Foard, Hardeman, Jack, Montague, Throckmorton, Wichita, Wilbarger, Young
North - Dallas	3,379,534	2	Dallas, Denton, Kaufman
North - Fort Worth	2,602,696	3	Ellis, Erath, Hood, Johnson, Navarro, Parker, Somervell, Tarrant, Wise
North - Plano/Sherman	1,098,874	9	Collin, Grayson, Rockwall
North - Texarkana/Tyler	1,307,509	8	Anderson, Bowie, Camp, Cass, Cherokee, Delta, Fannin, Franklin, Freestone, Gregg, Harrison, Henderson, Hopkins, Houston, Hunt, Lamar, Marion, Morris, Panola, Rains, Red River, Rusk, Smith, Titus, Trinity, Upshur, Van Zandt, Wood
Southeast - Beaumont/Galveston	1,466,615	6	Angelina, Brazoria, Galveston, Hardin, Jasper, Jefferson, Liberty, Nacogdoches, Newton, Orange, Polk, Sabine, San Augustine, San Jacinto, Shelby, Tyler
Southeast - Brazos Valley	925,075	11	Brazos, Burleson, Grimes, Leon, Madison, Montgomery, Robertson, Walker, Washington
Southeast - Houston	5,352,934	1	Austin, Calhoun, Chambers, Colorado, Fort Bend, Harris, Matagorda, Waller, Wharton
South - Corpus Christi/Gulf Coast	780,545	14	Aransas, Bee, Brooks, DeWitt, Duval, Goliad, Gonzales, Jackson, Jim Wells, Karnes, Kennedy, Kleberg, Lavaca, Live Oak, Nueces, Refugio, San Patricio, Victoria
South - Laredo	342,389	17	Jim Hogg, Maverick, Webb, Zapata
South - Rio Grande Valley	1,332,071	7	Cameron, Hidalgo, Starr, Willacy
South - San Antonio	2,542,934	4	Atascosa, Bandera, Bexar, Comal, Dimmit, Edwards, Frio, Gillespie, Guadalupe, Kendall, Kerr, Kinney, La Salle, McMullen, Medina, Real, Uvalde, Val Verde, Wilson, Zavala
West - El Paso	837,073	13	El Paso, Hudspeth
West - Midland/Big Bend	432,079	15	Andrews, Brewster, Crane, Culberson, Ector, Glasscock, Howard, Jeff Davis, Loving, Martin, Midland, Presidio, Reeves, Upton, Ward, Winkler
West - Panhandle	915,590	12	Armstrong, Bailey, Borden, Briscoe, Carson, Castro, Childress, Cochran, Collingsworth, Cottle, Crosby, Dallam, Dawson, Deaf Smith, Dickens, Donley, Floyd, Gaines, Garza, Gray, Hale, Hall, Hansford, Hartley, Hemphill, Hockley, Hutchinson, Kent, King, Lamb, Lipscomb, Lubbock, Lynn, Moore, Motley, Ochiltree, Oldham, Parmer, Potter, Randall, Roberts, Scurry, Sherman, Swisher, Terry, Wheeler, Yoakum
West - San Angelo	195,479	20	Coke, Coleman, Concho, Crockett, Irion, Kimble, Mason, McCulloch, Menard, Pecos, Reagan, Runnels, Schleicher, Sterling, Sutton, Terrell, Tom Green
Central - Austin	1,493,659	5	Bastrop, Caldwell, Fayette, Hays, Lee, Travis
Central - Round Rock/Hill Country	952,085	10	Bell, Blanco, Burnet, Lampasas, Llano, Milam, Mills, San Saba, Williamson
Central - Waco	420,924	16	Bosque, Coryell, Falls, Hamilton, Hill, Limestone, McLennan





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