IDAHO ORAL HEALTH WORKFORCE ASSESSMENT

2021

PREPARED FOR:

Idaho Oral Health Program, Division of Public Health, Idaho Department of Health and Welfare

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- Idaho North Central Public Health (PHD2)
- Southwest Health District (PHD3)
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EXECUTIVE SUMMARY

As the Surgeon General acknowledged in 2000, oral health has significant impact on systemic health – both for the individual and for the greater community. To reduce the social and economic costs of oral diseases and the impact on society, it is critical that Idahoans receive appropriate and equitable oral healthcare at every stage of life. For this to happen, Idaho must have an oral health workforce that is aware of the needs and distribution of residents and providers.

This document commences Idaho's first oral health workforce assessment. Through this document, and future discussions, changes will be essential to reaching a desired outcome for accessible and equitable oral healthcare. Ones that are rooted in sustainable, innovative, and competent oral health workforce. This assessment and report were completed to identify the current workforce and to promote future discussions on areas of improvement, strategies for continued successes, and how the entire oral health workforce can serve the oral health needs of all Idahoans. It is with optimism, that this document and its results will be used collaboratively and innovatively to improve access leading to improved health outcomes.

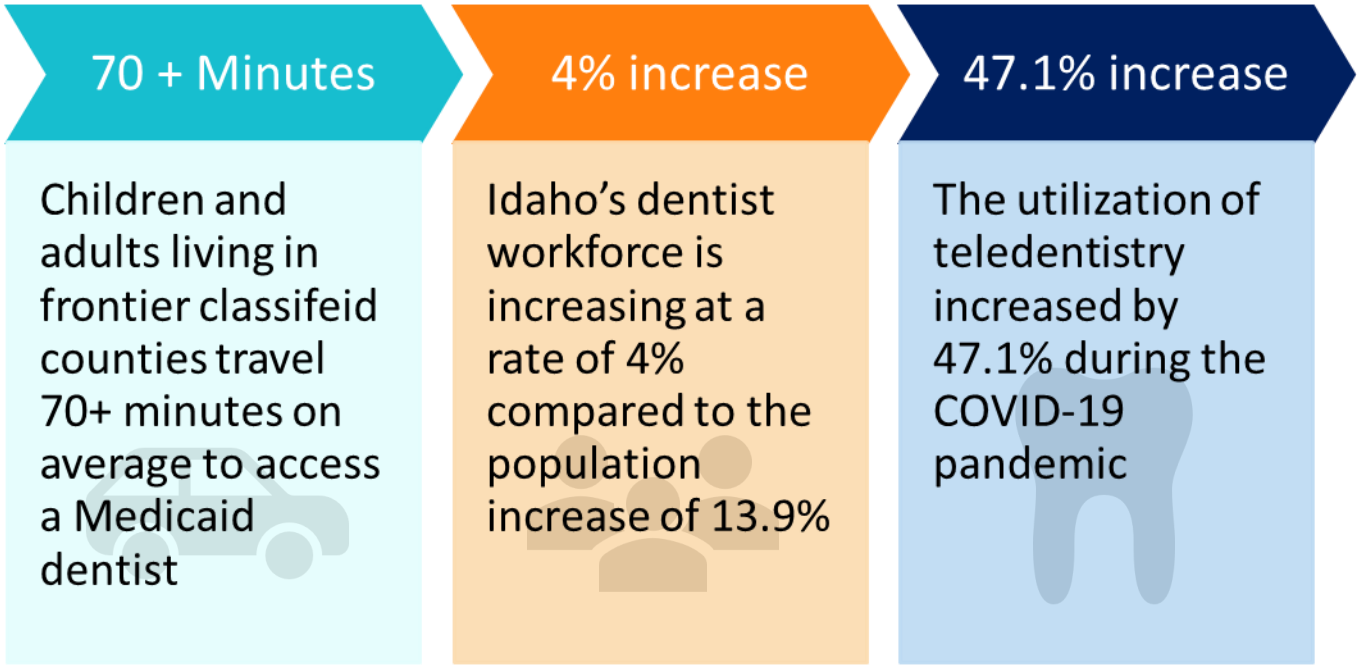
Between 2010 and 2019, Idaho experienced a 13.9% population increase; and a 4% increase in the number of practicing dentists from 2009 to 2019. This was one of the smallest growth rates in the country and the smallest in the region. The population of Idaho's residents is increasing at a rate faster than that of the dentist workforce. Almost three quarters of Idaho's population is concentrated in nine urban counties, leaving more than one-quarter of the population in rural and frontier counties where oral healthcare services are challenged with access, both geographical and care centered. To account for this, stakeholders must work together and position the workforce to strategically serve the communities of Idaho.

It is vital for the overall health of these communities to be rooted in the desire for Idahoans to obtain optimal, equitable, and affordable oral healthcare services. This assessment encompasses perspectives, data, and comparisons, not only for the dental provider, but for other medical professionals. It reviews several components of the workforce associated with oral healthcare and reiterates the actions of those involved as an important consideration in understanding the oral health workforce in its entirety. This report considers innovative means and thought-provoking applications to reach residents who have increased challenges accessing equitable oral healthcare.

As Idaho's first oral health workforce assessment, it is important to maintain a dialogue that promotes continued conversations, data-driven objectives, and collaborations to reach shared visions and the development and sustainability of an adequate and competent workforce. Through a team-based approach, the Idaho oral health workforce can optimize the delivery of oral healthcare to all Idahoans.

KEY FINDINGS

- The supply of dentists in Idaho is not keeping pace with the population growth.
- Idaho ranks 29th in the nation for the number of dentists per 100,000 population.
  - There are 52.2 dentists per 100,000 population, compared to the national average of 61.6 dentists per 100,000 population in the U.S.
- Dentists reported greater challenges recruiting dental assistants compared to dental hygienists.
- 13.5% of dental hygienists do not believe they are working at the top of their education and 34.8% of dental hygienists would like to advance their career.
- 35.2% of extended access dental hygiene endorsement holders have not utilized their endorsement.
- In general, Idaho has an oversupply of dental hygienists.
  - Health Resources and Services Administration (HRSA) predicts a 13% oversupply of dental hygienists nation-wide by 2030.
- 36.2% of dentists serve adult patients with Medicaid.
  - Of these dentists, 36.0% are at capacity and are not accepting new adult patients with Medicaid.
- 46.6% of dentists serve child patients with Medicaid.
  - Of these dentists, 22.2% are at capacity and are not accepting new child patients with Medicaid.
- 90% of adult Medicaid members have access to dental care within 60 minutes of their home.
- 91% of child Medicaid members have access to dental care within 60 minutes of their home.
- The typical wait time for a new patient to be seen for a dental service is 8.7 days and 18.3 days for a preventive service.



INTRODUCTION

Although oral healthcare access has improved over the past few decades, many still face disparities and geographical barriers to oral healthcare services. Low-income families, minorities, people with special healthcare needs, and those living in rural areas are more likely to suffer challenges and limitations to access and receiving basic oral healthcare compared to those living in urban areas. This can be remedied by evaluating the current oral health workforce, engaging in collaborative discussions, and prioritizing solutions to improve equity.

Through continued data collection and state-specific oral health workforce assessment(s), decision-makers and oral health champions can collaboratively aim to review findings, determine areas of improvement, and assess new models of workforce delivery. By doing so, the collective oral health workforce can improve the engagement of the workforce to reach their full potential and scope of work, and foster collaborations for sustainable success. The Health Resources and Services Administration and other national organizations are urging the prioritization of oral health workforce improvement strategies as a model of change to improve equity and access to oral healthcare services.

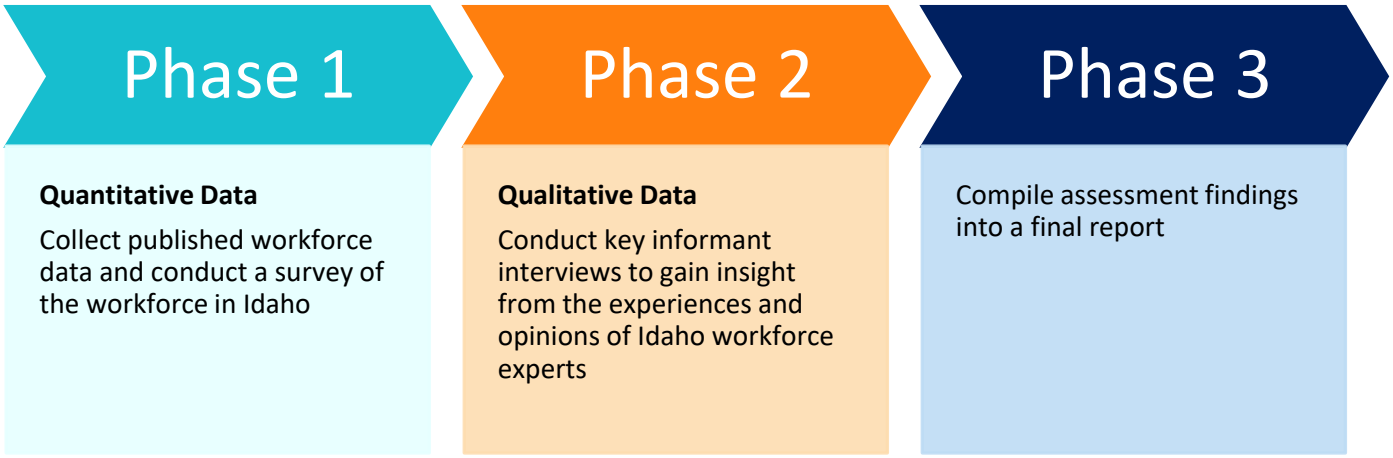
This report on Idaho's oral health workforce commences Idaho's first oral health workforce assessment and summarizes its findings. It was prepared under contract by WIM Tracking, LLC with the Idaho Oral Health Program (IOHP), Bureau of Community and Environmental Health, Division of Public Health of the Idaho Department of Health and Welfare. It was developed in consideration of ongoing local, statewide, and national dialogue surrounding the importance of and access to oral healthcare. The assessment evaluates the supply and distribution of the oral health workforce, the workforce capacity for the underserved, and workforce projections. The report will function as a reference for state leaders, policy makers, workforce planners, and future analysis.

> ***The competency, adaptability, and sustainability of the oral health workforce should be driven by partnerships, education, dialogue, and efforts to reduce health disparities through promotion of health equity. A transparent and adaptive module of care, including providers, community members, and public health professions, will be essential for sustainability. Through continued research, evolution, and collaborations, Idahoans can experience improved oral health. – Idaho Oral Health Program***

The assessment was developed in three phases. Phase 1 included gathering quantitative data from the Idaho Board of Dentistry, Idaho State Dental Association, American Dental Association's Health Policy Institute, Idaho Medicaid claims data, and a survey of dentists, dental hygienists, and physicians.

Phase 2 expanded with gathering qualitative data through key informant interviews. Twenty-one key (21) informant interviews were held over video conference and one written interview was administered. Key informants were identified by WIM Tracking, the IOHP, and partners. Each semi-structured interview centered around three workforce-related themes: supply and distribution, recruitment and retention, and challenges and opportunities.

Phase 3 incorporated assembling and analyzing the data collected in Phase 1 and Phase 2. In which, the following assessment report is organized into three sections: Idaho's Current Oral Health Workforce, Workforce Capacity for the Underserved, and The Future of Idaho's Oral Health Workforce.



The IOHP, in collaboration with partners, will host an oral health summit in which the findings from the Idaho Oral Health Workforce Assessment will be shared, allowing for an opportunity for discussion. Beyond this event, the IOHP is committed to supporting public and private partnerships and envisions this report will enhance existing and develop new collaborations across the state. As the state oral health program, they are leading the promotion and support of oral health prevention services and improving access to quality oral healthcare across the state of Idaho.

AUTHOR'S NOTE: SURVEY INSIGHT CALLOUTS

Survey insight callouts reflect data captured in the dentist, dental hygienist, and physician surveys conducted during Phase 1 of the assessment (February 2021). The collection of data and development of this assessment took place during the COVID-19 pandemic. The focus of the assessment was on the workforce as it operates under typical circumstances. However, data contain a comparison between how the workforce was operating at the time of the report and how the workforce operates under typical circumstances.

SECTION I: IDAHO'S CURRENT ORAL HEALTH WORKFORCE

CHARACTERISTICS OF IDAHO

Idaho is the 14th largest state in the U.S. by square mile yet ranks 39th in population (1,787,065). The Idaho Bureau of Rural Health and Primary Care utilizes an urban, rural, and frontier definition of Idaho's 44 counties [1]. This classification is based on population per square mile[i] and concludes Idaho has nine urban, 19 rural, and 16 frontier counties.

The nine urban counties, Ada, Bannock, Bonneville, Canyon, Kootenai, Latah, Madison, Nez Perce, and Twin Falls, account for 72.3% of the state's population. Ada County, the most populated county in the state, has a population of 481,587 or 26.9% of that state's population. Three other counties, Bonneville, Canyon, and Kootenai, each have over 100,000 residents.

Idaho is one of the fastest growing states in the nation. Between 2018 and 2019, the state experienced a 2.1% population increase, which was the highest of any state. From 2010 to 2019, Idaho was 6th in the nation in population increase per capita, growing by 13.9%. During this time, Ada County experienced the greatest increase with 22.4% while six frontier counties and one rural county experienced population decreases (Butte, Camas, Clark, Custer, Fremont, Gooding, and Power).

ACCESS TO ORAL HEALTHCARE

Oral healthcare is accessed through independent dental clinics, dental service organizations, federally qualified health centers, school-based programs, dental resident and dental hygiene training clinics, public health facilities, long-term care facilities, free clinics, state hospitals, correctional facilities, Indian Health Services, Veterans Affairs, refugee services, and community outreach programs. Patients may also seek oral healthcare through an emergency room or an urgent care facility when experiencing pain or an emergent complaint.

Oral healthcare services in Idaho are primarily provided by dentists, dental hygienists, dental assistants, and denturists. Table 1 categorizes the members of Idaho's oral health workforce and their current scope of practice. Although not the primary method for oral healthcare services, medical providers are able to provide preventive oral healthcare services, screenings, and referrals to oral healthcare providers. Community dental health coordinators (CDHC) are emerging into Idaho's workforce. Dental therapists have legal authorization to practice within Idaho's tribal reservations, but none have been licensed yet.

[i] The rural definitions used by the Bureau of Rural Health and Primary Care were established by the Idaho Department of Commerce. Urban is a county with a population center of at least 20,000. Rural is a county with greater than 6.0 persons per square mile without a population center of 20,000. Frontier is a county with 6.0 or fewer persons per square mile.

Table 1: Oral Healthcare Providers in Idaho

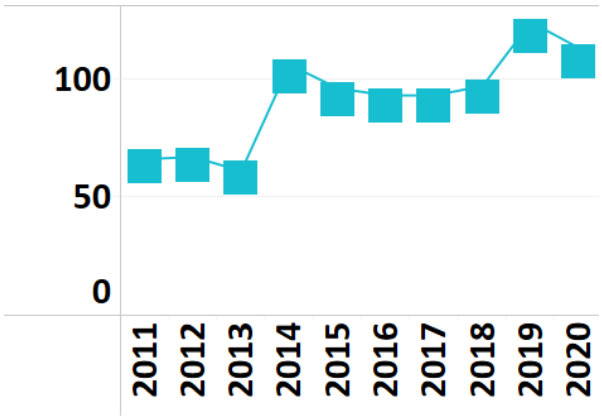
Provider Type	Education	Scope of Practice
Dentist Licensed by the Idaho Board of Dentistry	**8-14 years;** Bachelor's degree program, 4 years; Dental School, 4 years; Residency, 2-6 years	• Examining for diagnosis, treatment, extraction, repair, replacement, substitution, or correction • Diagnosing disease, pain, injury, deficiency, deformity, or physical condition • Treating, operating, prescribing, extracting, repairing, taking impressions, fitting, replacing, substituting, or correcting • Administering anesthetics or medicaments
Dental Hygienist Licensed by the Idaho Board of Dentistry	**3-4 years;** Pre-Requisite Coursework, 1-2 years; Dental Hygiene School, 2 years	• Cleaning, polishing, removing stains, or concretions • Performing nonsurgical periodontal therapy • Administering prescribed anesthetics or medicaments • Applying preventive agents • Performing nonsurgical, clinical, and laboratory oral diagnostic tests for interpretation by a dentist • Preparing preliminary records of oral conditions
Dental Hygienist with **Extended Access Endorsement**	**5-6 years;** Pre-Requisite Coursework, 1-2 years; Dental Hygiene School, 2 years; Clinical Hours, 1,000 within 2 years	• Working in an extended access oral healthcare setting • Performing dental hygiene procedures under general supervision of a dentist and by written authorization of the supervising dentist • The supervising dentist is responsible to treat the patient's dental needs or refer the patient to another dentist for treatment
Dental Hygienist with **Extended Access with Restorative Endorsement**	**5-6 years;** Pre-Requisite Coursework, 1-2 years; Dental Hygiene School, 2 years; Clinical Hours, 1,000 within 2 years	• Working in an extended access oral healthcare setting • Placing a restoration into a tooth prepared by a dentist • Performing dental hygiene procedures under general supervision of a dentist and by written authorization of the supervising dentist • Carving, contouring, and adjusting the contacts and occlusion of the restoration while under direct supervision of the dentist • The supervising dentist is responsible to treat the patient's dental needs or refer the patient to another dentist for treatment
Dental Hygienist with **Extended Access Restorative Only Endorsement**	**3-4 years;** Pre-Requisite Coursework, 1-2 years; Dental Hygiene School, 2 years	• Working in an extended access oral healthcare setting • Placing a restoration into a tooth prepared by a dentist • Carving, contouring, and adjusting the contacts and occlusion of the restoration while under direct supervision of the dentist • The supervising dentist is responsible to treat the patient's dental needs or refer the patient to another dentist for treatment.
Dental Assistant Dental assistants are not licensed in Idaho.	**0-2 years;** On the job training or Dental Assistant School, 2 years	• Setting up equipment and preparing patients for treatment by the dentist • Supporting the dentist in patient care procedures • Making radiographic exposures and taking dental impressions • Applying topical anesthetic and fluoride agents • Removing excess cement from coronal surfaces and coronal polishing
Denturist Licensed by the Idaho Board of Denturitry	**3 years;** Denturist Program, 2 years; Internship, 1 year	• Making, fitting, or repairing of a removable prosthetic denture, repairing a removable prosthetic denture, supplying of a denture to a person, or advising the use of a denture
Dental Therapist Licensed by the Idaho Board of Dentistry	**3 years;** Dental Therapy School, 3 years; Preceptorship, 3 months	• Operating under the supervision of a dentist • Identifying oral and systemic conditions • Performing dental prophylaxis • Dispensing and administering nonnarcotic analgesics, anti-inflammatory and antibiotic medications as prescribed by a licensed dentist • Applying preventive agents • Preparing and placing direct restorations in primary and permanent teeth • Indirect and direct pulp capping on permanent teeth and indirect pulp capping on primary teeth
Community Dental Health Coordinator (CDHC)	**1-5 years;** Pre-requisite as a Dental Hygienist or Dental Assistant, 1-4 years; CDHC Training Program, 0.5-1 year	• Educating patients about oral health and prevention • Providing minimal preventive services such as fluoride and sealants • Coordinating care • Providing behavior coaching

SUPPLY AND DISTRIBUTION OF DENTISTS

LICENSURE TRENDS

Licensure datasets do not consider whether a dentist is in active practice and therefore may overestimate the true practicing workforce. However, this dataset does provide insight into workforce trends.

Figure 1: New Dentist Licenses Issued



Data Source: Idaho Board of Dentistry

Every November, the Idaho Board of Dentistry (IBOD) submits a Performance Report to the State of Idaho with a count of renewed and newly instated licenses. Dentist licenses are renewed on a biennial cycle and renewal counts are reflected as such in the annual report. The 2019 IBOD report reflects an 8.2% decrease in dentist license renewals between 2011 (1,539) and 2019 (1,413). However, there was a 46.8% increase in newly issued dentist licenses from 2011 (66) to 2019 (124), as visualized in Figure 1.

There have been 803 new dentist licenses issued from 2011 to 2019. In 2021, the IBOD annual report began reflecting a total dentist license count. From 2016 (1,637) to 2020 (1,618), there was a 1.2% decrease in the total number of dentists licensed in Idaho. So, despite the increasing number of new dentists becoming licensed in Idaho, the overall number of dentists licensed in Idaho is decreasing [2]. Of the dentists licensed in Idaho, 78.8% have an Idaho address associated with their license (Table 2).

Table 2: Dentists with an Idaho License by Address

State	Number	Percentage*	State	Number	Percentage
Idaho	1154	78.8%	**Montana**	14	1.0%
Washington	76	5.2%	**Colorado**	9	0.6%
California	38	2.6%	**Wyoming**	6	0.4%
Oregon	29	2.0%	**Canada**	5	0.3%
Utah	27	1.8%	**Other**	90	6.0%
Texas	16	1.1%			

Data Source: Idaho Board of Dentistry, 2020
*Due to rounding, percentages may not sum to 100.

SURVEY INSIGHT: DENTIST

- 50.5% of Idaho dentists are in private practice (independent).
- 15.2% of dentists practice in more than one location. 1.9% practice at more than two locations.
- The average hours per week a dentist works at a primary practice is 32.

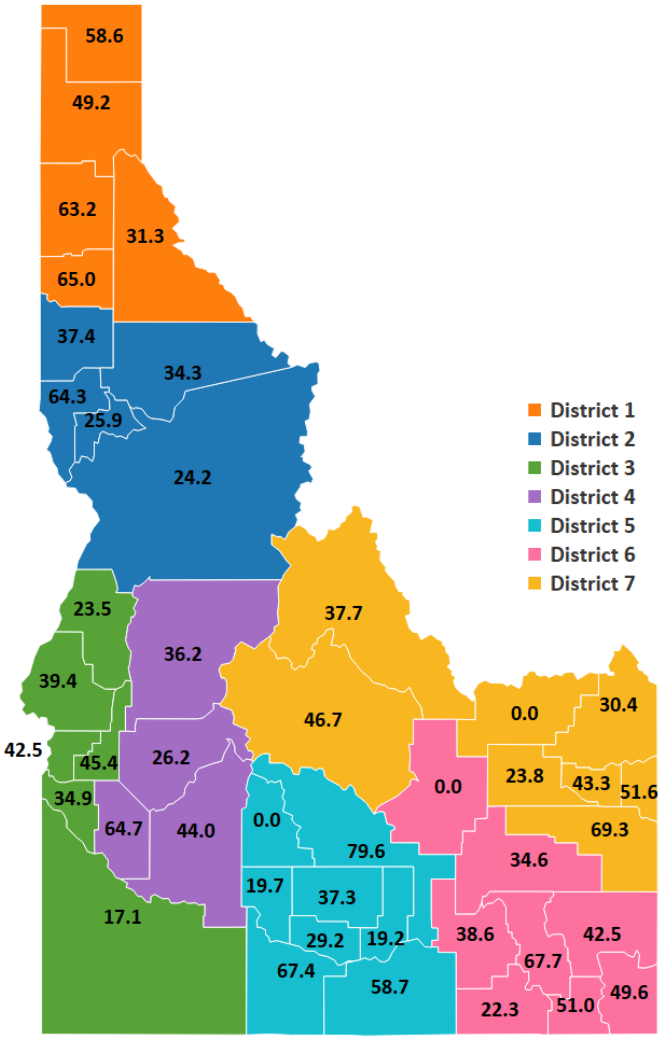
PRACTICING IN IDAHO

There are approximately 933 dentists actively practicing in Idaho. These dentists are general (78.8%), pediatric (5.7%), and specialists[i] (15.5%) [3]. The dentists per 100,000 population in Idaho is 52.2, ranking Idaho 29th in the nation. There are 61.6 dentists per 100,000 population practicing in the U.S. The population to dentist ratio in Idaho is 1915:1.

Overall, there is a higher concentration of dentists in Idaho's urban counties (Table 3). However, Blaine, a rural county has the highest concentration of dentists (79.6 per 100,000 population). Benewah, also a rural county, has a high concentration of dentists (65.0 per 100,000 population).

Butte and Clark are the two counties without a dentist. The populations of these frontier counties are 2,597 and 845, respectively. Camas County does not have a full-time dentist. However, a dentist serves residents in Fairfield two days a week through a Federally Qualified Health Center (FQHC). Rural and frontier counties ranking the lowest in concentration of dentists are Owyhee (pop. 11,823), Minidoka (pop. 21,039), and Gooding (pop. 15,179).

Figure 2: Dentists per 100,000 Population by County and Public Health District



Data Source: ADA Health Policy Institute, 2019

Idaho is divided into seven public health districts. Each district functions as a public health resource to a contiguous section of counties [4]. At the time of this report and under recent changes, six out of the seven districts provide some form of oral healthcare services within their communities. As seen in Figure 2, Health District 4 (Central) has the greatest concentration of dentists (62.4 dentists per 100,000 population) and Health District 3 (Southwest) has the lowest (35.4 dentists per 100,000).

[i] Orthodontists, Oral and Maxillofacial Surgeons, Endodontists, Periodontists, Prosthodontists, and Dental Anesthesiologists.

Table 3: Dentists per 100,000 Population by County

County	Dentists per 100,000	Population to Dentist Ratio	Urban/ Rural/ Frontier	County	Dentists per 100,000	Population to Dentist Ratio	Urban/ Rural/ Frontier
Butte	0.0	2611:0	Frontier	**Power**	38.6	2560:1	Frontier
Camas	0.0*	1127:0	Frontier	**Washington**	39.4	2549:1	Rural
Clark	0.0	852:0	Frontier	**Payette**	42.5	2395:1	Rural
Owyhee	17.1	5911:1	Frontier	**Caribou**	42.5	2385:1	Frontier
Minidoka	19.2	5260:1	Rural	**Madison**	43.3	2347:1	Urban
Gooding	19.7	5060:1	Rural	**Elmore**	44.0	2293:1	Rural
Oneida	22.3	4531:1	Frontier	**Gem**	45.4	2264:1	Rural
Adams	23.5	4294:1	Frontier	**Custer**	46.7	2158:1	Frontier
Jefferson †	23.8	4267:1	Rural	**Bonner** †	49.2	2079:1	Rural
Idaho	24.2	4167:1	Frontier	**Bear Lake**	49.6	2041:1	Rural
Lewis	25.9	3838:1	Rural	**Franklin**	51.0	1982:1	Rural
Boise †	26.2	3916:1	Frontier	**Teton** †	51.6	2024:1	Rural
Jerome	29.2	3487:1	Rural	**Boundary**†	58.6	1749:1	Rural
Fremont	30.4	3274:1	Rural	**Cassia**	58.7	1716:1	Rural
Shoshone	31.3	3221:1	Frontier	**Kootenai** †	63.2	1624:1	Urban
Clearwater	34.3	2919:1	Frontier	**Nez Perce**	64.3	1554:1	Urban
Bingham	34.6	2926:1	Rural	**Ada** †	64.7	1584:1	Urban
Canyon †	34.9	2947:1	Urban	**Benewah**	65.0	1550:1	Rural
Valley †	36.2	2848:1	Frontier	**Twin Falls** †	67.4	1498:1	Urban
Lincoln	37.3	2683:1	Frontier	**Bannock**	67.7	1488:1	Urban
Latah	37.4	2674:1	Urban	**Bonneville** †	69.3	1470:1	Urban
Lemhi	37.7	2676:1	Frontier	**Blaine**	79.6	1279:1	Rural

Data Source: American Dental Association Health Policy Institute, 2019

*Camas county residents are served by Family Health Services in Fairfield with one or more visiting dentists on Tuesdays and Thursdays.

†County is one of 11 counties with a higher than 10% population growth 2009 -2019.

SUPPLY AND DISTRIBUTION OF DENTAL HYGIENISTS

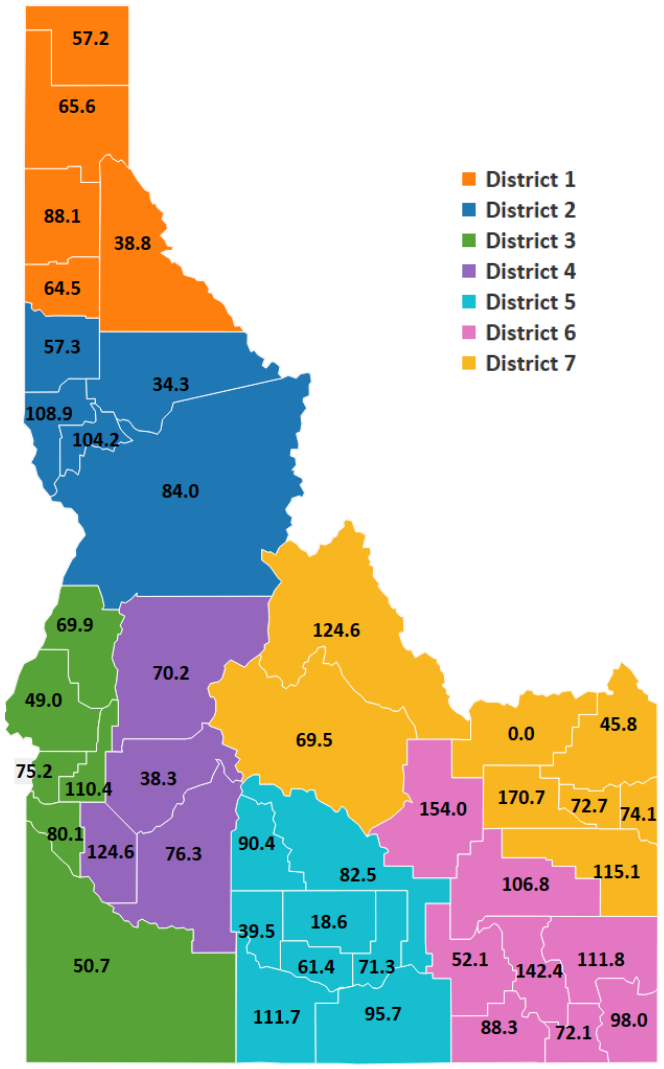
LICENSURE TRENDS

The 2019 IBOD Performance Report reflects a 21.9% increase in dental hygienist license renewals and a 56.0% increase in new licenses between 2011 and 2019. From 2016 to 2020, there was a 12.1% increase in the total number of dental hygienists licensed in Idaho. The number of new dental hygienists licensed in Idaho and the overall number of licensed dental hygienists is increasing [2].

As licenses are renewed biennially, counts will vary based on the time of year the licensure dataset is acquired. Data pulled in 2020 reflects 1,783 active dental hygienist license holders. These data show 87.3% of license holders have an Idaho address on file. Of the dental hygienists with an out-of-state address on file, the address is most often associated to Washington (4.1%), Oregon (1.5%), and California (1.3%).

As with dentists, dental hygienists are concentrated in urban areas. There are, however, a few variations compared to dentist practice locations[i]. Butte County, where there is no practicing dentist, has four licensed dental hygienists and ranks second in dental hygienists per 100,000 population. Similarly, the highest concentration of dental hygienists is in Jefferson, which is another rural county (pop. 29,871) with a lower-than-average concentration of dentists. Clark, Lincoln, Clearwater, Boise, and Shoshone have the lowest concentration of dental hygienists (Table 4). Public Health Districts 2 and 3 have the lowest concentration of dental hygienists (Figure 3).

Figure 3: Dental Hygienists per 100,000 Population by County and Public Health District



Data Source: Idaho Board of Dentistry, 2020 and U.S. Census Bureau, 2019

i The dental hygienist per 100,000 population in Idaho is 99.8. The dental hygienists per 100,000 ratio is based on licensure address rather than practice location, whereas the dentists per 100,000 population is based on practice location.

Table 4: Dental Hygienists per 100,000 Population by County

County	Dental Hygienists per 100,000	Population to Dental Hygienist Ratio	Urban/ Rural/ Frontier	County	Dental Hygienists per 100,000	Population to Dental Hygienist Ratio	Urban/ Rural/ Frontier
Clark	0.0	845:0	Frontier	**Payette**	75.2	1331:1	Rural
Lincoln	18.6	5366:1	Frontier	**Elmore**	76.3	1310:1	Rural
Clearwater	34.3	2919:1	Frontier	**Canyon**	80.1	1249:1	Urban
Boise	38.3	2610:1	Frontier	**Blaine**	82.5	1212:1	Rural
Shoshone	38.8	2576:1	Frontier	**Idaho**	84.0	1191:1	Frontier
Gooding	39.5	2530:1	Rural	**Kootenai**	88.1	1135:1	Urban
Fremont	45.8	2183:1	Rural	**Oneida**	88.3	1133:1	Frontier
Washington	49.0	2039:1	Rural	**Camas**	90.4	1106:1	Frontier
Owyhee	50.7	1971:1	Frontier	**Cassia**	95.7	1045:1	Rural
Power	52.1	1920:1	Frontier	**Bear Lake**	98.0	1021:1	Rural
Boundary	57.2	1749:1	Rural	**Lewis**	104.2	960:1	Rural
Latah	57.3	1744:1	Urban	**Bingham**	106.8	936:1	Rural
Jerome	61.4	1627:1	Rural	**Nez Perce**	108.9	918:1	Urban
Benewah	64.5	1550:1	Rural	**Gem**	110.4	906:1	Rural
Bonner	65.6	1524:1	Rural	**Twin Falls**	111.7	896:1	Urban
Custer	69.5	1438:1	Frontier	**Caribou**	111.8	894:1	Frontier
Adams	69.9	1431:1	Frontier	**Bonneville**	115.1	869:1	Urban
Valley	70.2	1424:1	Frontier	**Lemhi**	124.6	803:1	Frontier
Minidoka	71.3	1403:1	Rural	**Ada**	124.6	803:1	Urban
Franklin	72.1	1388:1	Rural	**Bannock**	142.4	702:1	Urban
Madison	72.7	1376:1	Urban	**Butte**	154.0	649:1	Frontier
Teton	74.1	1349:1	Rural	**Jefferson**	170.7	586:1	Rural

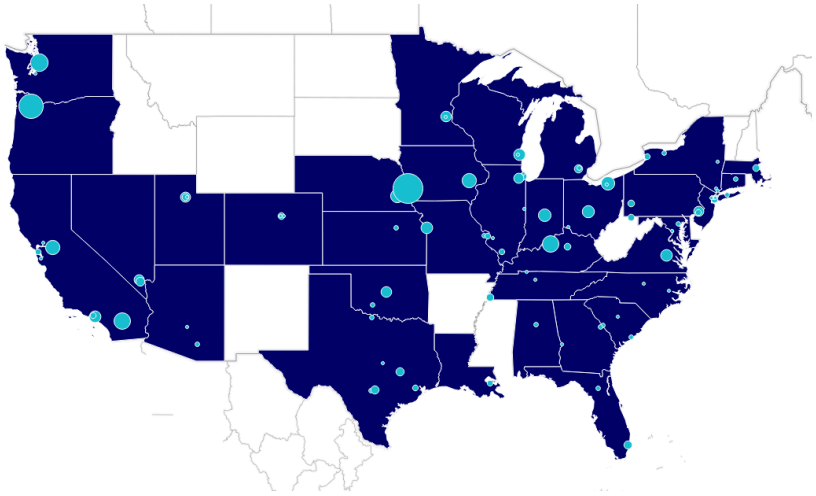
Source: Idaho Board of Dentistry, 2020 and U.S. Census Bureau, 2019

EDUCATION AND TRAINING

DENTAL EDUCATION

There are 67 accredited dental education programs in the United States and ten in Canada. The most recent accreditation was in 2020 for a dental school in El Paso, Texas. Before this, the last accreditation was in 2016. Nine dental schools earned accreditation from 2010 to 2020. Figure 4 demonstrates the lack of dental schools in the mountain west region and where Idaho's current dentists attended dental school.

Figure 4: Dental School Locations of Idaho Dentists



◯ The placement of marker represents the dental school location of Idaho dentists. The size of the marker represents the count of Idaho dentists who attended the dental school.
Data Source: Idaho State Dental Association Membership Masterfile, 2020

Enrollment in dental school is at an all-time high. In 2018, 6,250 first year dental students enrolled. Of these students, 37 reported a home location in Idaho and eight (21.6%) were enrolled in Creighton University in Nebraska [5]. Other Idaho students were enrolled in Midwestern University (Arizona), Roseman University (Utah), University of Utah, Ohio State University, and thirteen other programs (Table 5).

Creighton University is the most attended dental school of Idaho dentists. Thirteen percent of Idaho's currently practicing dentists graduated from Creighton University (Table 6). Almost half (47%) of Idaho's dentists went to dental school in either Nebraska, California, Oregon, Ohio, or Kentucky.

Table 5: Idaho Dental Students Enrolled in Dental School by Program

State	Program	N	State	Program	N
AZ	Midwestern University	5	**OH**	Ohio State University	3
IL	Midwestern University	1	**OH**	Case Western Reserve University	1
KY	University of Louisville	2	**OK**	University of Oklahoma	1
ME	University of New England	1	**TX**	Texas A&M University	1
MI	University of Michigan	1	**TX**	University of Texas At Houston	1
MO	Missouri School of Dentistry & Oral Health	1	**UT**	Roseman University of Health Sciences	4
NE	Creighton University	8	**UT**	University of Utah	3
NY	Columbia University	1	**WA**	University of Washington	1
NY	Touro College of Dental Medicine	1	**WV**	West Virginia University	1

Data Source: American Dental Association Health Policy Institute, 2018

Idaho is not home to a dental school. However, it is home to the Idaho Dental Education Program (IDEP), a training track operated through Idaho State University in conjunction with Creighton University. IDEP was established in 1982 with five participants, growing to eight participants in 1998. Going on 40 years, the program has educated 275 participants. Historically, 66% of graduates have returned to practice in Idaho.

The Idaho Advanced General Dentistry (IAGD) residency program is also operated by Idaho State University. This one-year certificate program aims to increase the knowledge and skills of a general dentist beyond the education received through pre-doctoral training.

IAGD trains eight residents per year from across the U.S. To apply to the program, an applicant does not need to have a connection to Idaho or be required to practice in Idaho upon completion. The program assists graduates in evaluating opportunities to practice in Idaho. The IAGD has had 140 participants since its inauguration in 1999.

Table 6: Top 5 Dental Schools of Idaho Dentists

Dental School	N	Percent of All Schools
Creighton University, Nebraska	78	13.3%
Oregon Health and Science University School of Dentistry, Oregon	52	8.9%
University of Louisville School of Dentistry, Kentucky	29	4.9%
University of Washington Medical Center Department of Dentistry, Washington	27	4.6%
Loma Linda University School of Dentistry, California	24	4.1%

Data Source: Idaho State Dental Association Membership Masterfile, 2020. Idaho State University College of Health Professions was listed as a dental school by 27 dentists in the Idaho State Dental Association Membership Masterfile. This program is a dental residency program; therefore these 27 records were excluded from the analysis.

DENTAL HYGIENE EDUCATION

There are 326 accredited dental hygiene training programs in the U.S. and Canada. Idaho has local training programs for dental hygienists through Idaho State University, Carrington College, North Idaho College, and College of Southern Idaho.

Idaho State University's (ISU) Bachelor of Science in Dental Hygiene program averages 47 applicants per year, with an average graduating class size of 28. ISU also offers a Master of Science in Dental Hygiene.

SURVEY INSIGHT: DENTAL HYGIENIST

- 55.0% of survey respondents reported attending high school in Idaho.
- 59.6% of survey respondents reported attending dental hygiene school in Idaho.

Idaho's newest dental hygiene training program at North Idaho College began in the fall of 2020. Openings to the training program are offered every other year. Students are trained in either Coeur d' Alene or Lewiston.

The College of Southern Idaho's Dental Hygiene School in Twin Falls receives an estimated 48 applicants every year, with an average graduating class size of 10. The school estimates that on average, 60% of graduates practice in Idaho. In some years, retention has been as high as 90%.

DENTAL ASSISTING EDUCATION

Idaho does not license dental assistants or require them to complete a formal training program. The Idaho Occupational Employment Statistics estimate 2,660 dental assistants were practicing in Idaho in 2019. Dental assistants may attend a training program or may be trained on the job. There are sufficient opportunities for dental assistants to complete a training program prior to beginning their career.

Idaho dental assisting training programs include College of Western Idaho (Nampa), College of Eastern Idaho (Idaho Falls), Eastern Idaho Technical College (Idaho Falls), All About You Dental (Boise), Nampa Smiles (Nampa), Mainspring Dental Training Center (Boise), Assist to Succeed (Idaho Falls), College of Southern Idaho (Twin Falls), Idaho State University (Pocatello), Carrington College (Boise), and Milan Institute (Boise and Nampa). Local dental clinics may also offer training programs for dental assistants prior to their employment.

SURVEY INSIGHT: DENTIST

- 21.4% of dentists reported it is typically very difficult to recruit dental assistants and even more so currently (33.5% responded it is currently very difficult).
- 12.4% of dentists reported it is typically very difficult to recruit dental hygienists and even more so currently (22.0% responded it is currently very difficult).
- How difficult is it to recruit the following?

	Very Difficult		Somewhat Difficult		Not Difficult		Not Applicable	
	Typically	Currently	Typically	Currently	Typically	Currently	Typically	Currently
Dental Hygienist	12.4%	22.0%	43.5%	39.0%	29.7%	18.5%	14.4%	20.5%
Dental Assistant	21.4%	33.5%	45.7%	42.9%	27.6%	12.8%	5.2%	10.8%

The same question was asked for differing time periods. Typically: Respond to how your practice operates under typical circumstances (prior to the COVID-19 pandemic). Currently: Respond to how your practice is operating at the time of completing this survey.

SECTION II: WORKFORCE CAPACITY FOR THE UNDERSERVED

UNDERSERVED POPULATIONS

Populations whose circumstances limit their access to medical and oral healthcare are known as underserved populations. Traditionally underserved populations include rural, low-income, uninsured, underinsured, place-bound, homeless, migrant/seasonal workers, American Indian/Alaska Native, and residents of public housing. On average, 27.5% of adults in the U.S. do not have dental coverage [6].

DENTAL HEALTH PROFESSIONAL SHORTAGE AREAS

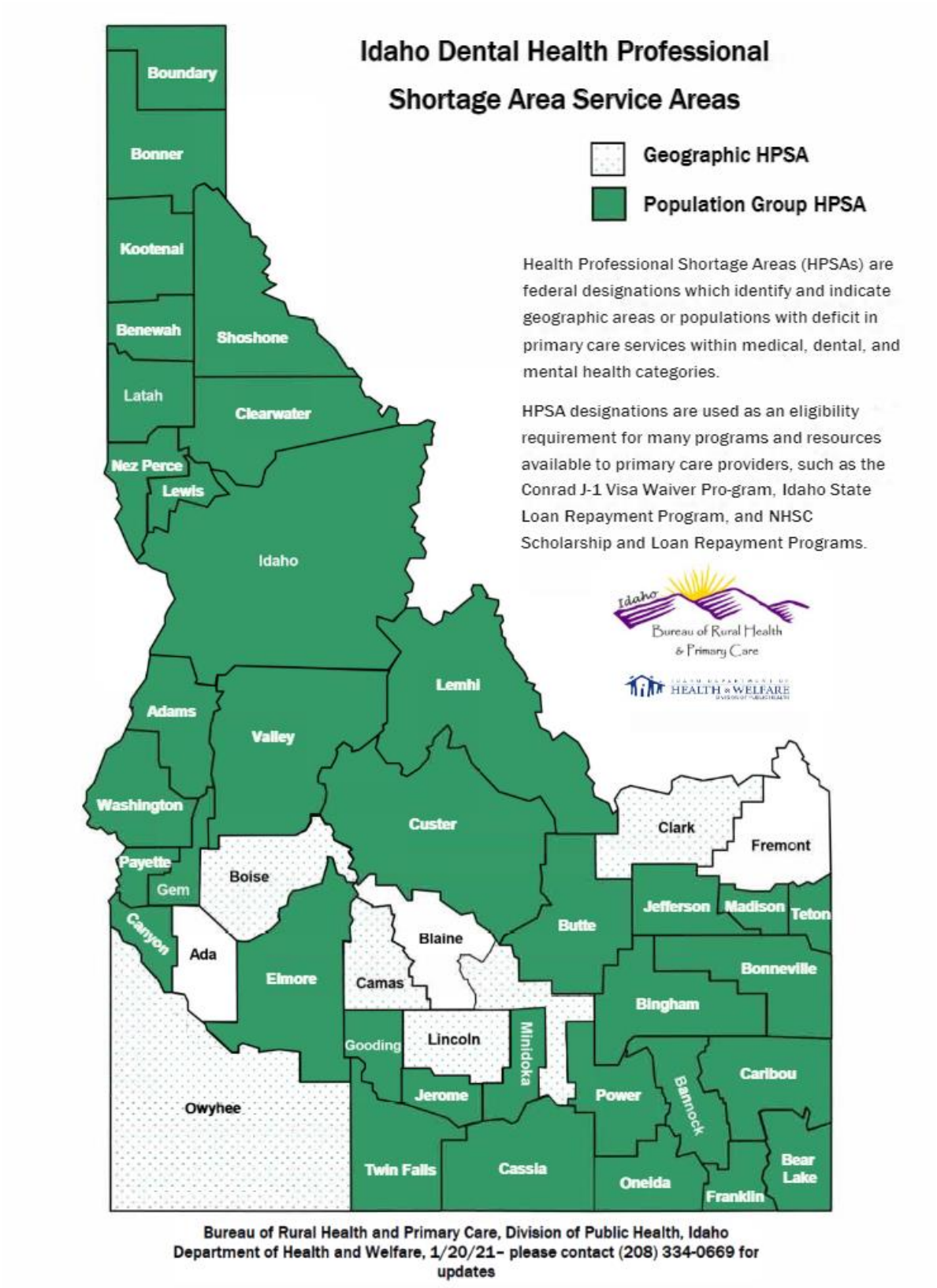
The U.S. Department of Health and Human Services (HHS) works to determine if geographic areas, population groups, or medical facilities qualify as Health Professional Shortage Areas (HPSAs) or Medically Unserved Areas or Populations (MUA/Ps). Federal shortage designations document areas of greatest need to prioritize additional healthcare professionals and resources.

Dental Health Professional Shortage Areas (HPSAs) identify geographic areas or populations (groups of people) with a shortage of dental services to meet the needs specific to the population. The designations are used to determine eligibility for programs designed to recruit and retain dental providers to serve those living in that area.

Dental HPSAs are scored on a point system that considers the population-to-dentist ratio, percent of the county below 100% of the federal poverty level, water fluoridation status, and travel time to the nearest source of care outside of the designation.

Figure 5 is a map of Idaho, showing of the 44 counties, 41 are designated as a dental HPSA (6 geographic and 35 population based). At the time of this report, a national dental HPSA update process was underway. The updated dental HPSA scores are scheduled to be released in September of 2021.

Figure 5: Idaho Dental Health Professional Shortage Areas



HEALTH POLICY INSTITUTE: GEOGRAPHIC ACCESS TO ORAL HEALTHCARE

The dental HPSA is a widely cited identifier of geographic access to care. In 2017, the American Dental Association's Health Policy Institute (HPI) launched a new analysis to examine geographic access to dental care. This study evaluates a 15-minute drive time between child Medicaid patients and dentists registered as a Medicaid-network dentist. The datasets utilized in this study included a proprietary database of all dentist practice locations, Census tract population data, transportation networks, and dentists identified by the Centers for Medicare and Medicaid Services[i] as serving Medicaid clients.

The analysis was completed for each state and concludes that, in Idaho, 88% of publicly insured children live within 15 minutes of a Medicaid dentist. The analysis also breaks down the Child Medicaid Client-to-Medicaid Dentist ratio. The ADA offers this ratio breakdown to allow state policy advisors to determine what adequacy standard is appropriate for their state. The resulting data for Idaho:

- 61% of publicly insured children live within a 15-minute travel time to a Medicaid dentist where the Child Medicaid Client-to-Medicaid dentist ratio is <500 (500 child Medicaid clients for every 1 Medicaid dentist)
- 25% of publicly insured children live within a 15-minute travel time to a Medicaid dentist where the Child Medicaid Client-to-Medicaid dentist ratio is 500-2,000 (500-2,000 child Medicaid clients for every 1 Medicaid dentist)
- 3% of publicly insured children live within a 15-minute travel time to a Medicaid dentist where the Child Medicaid Client-to-Medicaid dentist ratio is >2,000 (2,000 child Medicaid clients for every 1 Medicaid dentist)
- 12% of publicly insured children do not live within a 15-minute travel time to a Medicaid dentist.[ii]

Noted limitations to this analysis, as indicated by the HPI, are that the data do not consider providers who are verified to be serving Medicaid clients, if the dentist is accepting new clients, or the percentage of publicly insured clients utilizing or seeking dental services [7].

SURVEY INSIGHT: DENTIST

- 36.2% of dentists reported accepting adult Medicaid. Of the 36.2% of dentists that accept adult Medicaid, 64% are accepting *new* adult Medicaid clients.
- 46.6% of dentists reported accepting child Medicaid. Of the 46.6% of dentists that accept child Medicaid, 77.8% are accepting *new* child Medicaid clients.
- 99.5% reported accepting *new* private insurance or self-pay clients.

[i] Insure Kids Now database was utilized to identify dentists serving Medicaid clients.

[ii] Due to rounding numbers may not sum to 100.

IDAHO'S MEDICAID WORKFORCE

An estimated 13.5% of the U.S. population is covered by Medicaid (coverage may or may not include dental benefits). Under the Affordable Care Act, dental coverage is considered essential for children 18 years or younger. Medicaid, however, does not traditionally cover dental benefits for adults; 35 states offer some dental benefits to adults. In the U.S., 38.5% of children have dental benefits through Medicaid or the Children's Health Insurance Program (CHIP), and 7.4% of adults have dental benefits through Medicaid [8].

In 2018, coverage of preventive dental benefits for adults was restored to Idaho's Medicaid program. Eligible adults and children in Idaho may receive dental coverage through the state's Medicaid dental plan known as Idaho Smiles. The benefit program has been administered by Managed Care North America (MCNA) since February 2017.

In November 2020, Idaho's Medicaid program had 368,497 enrolled members: 164,846 adults (age 21+) and 203,651 children (age 0-20)[i] [9]. This demonstrates an estimated 20% of Idaho's population is enrolled in Medicaid. MCNA's active network provider directory reveals 466[ii] dentists participate as a Medicaid dentist in Idaho. This equates to 791 Medicaid members for every one Medicaid dentist statewide.

Data from the American Dental Association Masterfile (2016) indicate 43.0% of dentists in the U.S. and 38.2% of dentists in Idaho accept Medicaid or CHIP [10]. MCNA's provider directory show that approximately 49.9% of dentists in Idaho are registered as Medicaid network dentists. Six of Idaho's frontier and rural counties do not have a registered Medicaid network provider, Boise, Clark, Idaho, Lewis, Lincoln, and Shoshone. Figure 6 shows the Medicaid population by county and Medicaid dentists registered as an MCNA provider.

ACCESS TO IDAHO'S MEDICAID WORKFORCE

With the low participation of Idaho dentists in Medicaid, it can be a challenge for Medicaid members to locate a dentist that has the capacity to accept new Medicaid clients. Medicaid members are likely to drive further than individuals with private insurance.

Medicaid claims data from 2019 show 163,382 (17% adult and 83% child) dental claims. With a few exceptions, dental Medicaid claims were not filed within Boise[iii], Clark, Idaho, Lewis, Lincoln, Shoshone, and Valley counties. The combined Medicaid population for these seven counties is 12,151. Lewis County has the highest concentration of Medicaid members per capita with 41.7%. In 2019, 87% of

[i] The MCNA Medicaid claims and Medicaid enrollee data used in this report defines members in two groups, members age 0-20 and age 21+.
[ii] 38 additional providers (not included in the 466) participate as an Idaho Smiles network provider in Washington.
[iii] Two claims were filed in Boise County, one in Idaho County (the member was from Lemhi County), and one claim was filed in Valley County.

adult and 91% of child Medicaid members from Lewis County travelled over 60 minutes[i] to access a dentist [11]. A full travel time summary is provided in Table 7.

The average travel time for the 12,151 (3.3%) Medicaid members living in a county without a Medicaid dentist was 93.1 minutes for adults and 95.3 for children in 2019. Aside from those 7 counties, Medicaid members who travelled the farthest (60 minutes or more) to access a Medicaid dentist were from Clearwater, Blaine, Custer, and Butte counties (combined adult Medicaid population of 2,610). Children who travelled the farthest were from Benewah, Teton, Shoshone, Lemhi, and Camas counties (combined child Medicaid population of 4,691).

Statewide, 90% of Medicaid adults traveled less than 60 minutes to access a Medicaid dentist. The average travel time to a Medicaid dentist was 25.6 minutes. For a rural adult, the average travel time to a Medicaid dentist was 36.1 minutes, 70.1 minutes for a frontier adult, and 23.7 minutes for an urban adult. For children, it was 40.1 minutes, 77.9 minutes, and 23.4 minutes, respectively. Statewide, 91% of Medicaid children traveled less than 60 minutes to access a Medicaid dentist.[ii]

Table 7: Counties Without a Medicaid Dentist: Member Travel Time

		Member Age 21+			Member Age 0 - 20		
County	Medicaid Enrollees	Average Travel Time (minutes)*	Shortest Travel Time (minutes)	% Members Travel Time More than 60 minutes†	Average Travel Time (minutes)*	Shortest Travel Time (minutes)	% Members Travel Time More than 60 minutes†
Boise	1,225	76.5	42.1	53%	71.6	37.1	52%
Clark	191	73.2	52.5	86%	64.5	50.5	58%
Idaho	2,558	129.8	68.0	100%	125.9	63.5	100%
Lewis	1,602	82.7	47.4	87%	102.9	49.1	91%
Lincoln	1,305	57.7	29.5	52%	62.1	25.0	83%
Shoshone	3,654	64.4	40.5	41%	66.7	40.5	61%
Valley	1,616	167.6	97.3	100%	173.5	97.3‡	100%

Data Source: Idaho Smiles dental claims data was extracted by the Idaho Department of Health and Welfare Division of Medicaid and analyzed by WIM Tracking LLC. See Appendices B and C for the statewide breakdown by county.

*The average travel time in minutes between the zip code of the Medicaid member and the zip code where the Medicaid claim was filed. Travel times were derived using the Google Distance Matrix API.

† The percent of claims for Members with a zip code in the county whose Medicaid claim was filed in a zip code with a drive time of 60+ minutes.

‡ One claim filed in Valley County in 2019 was excluded from the analysis.

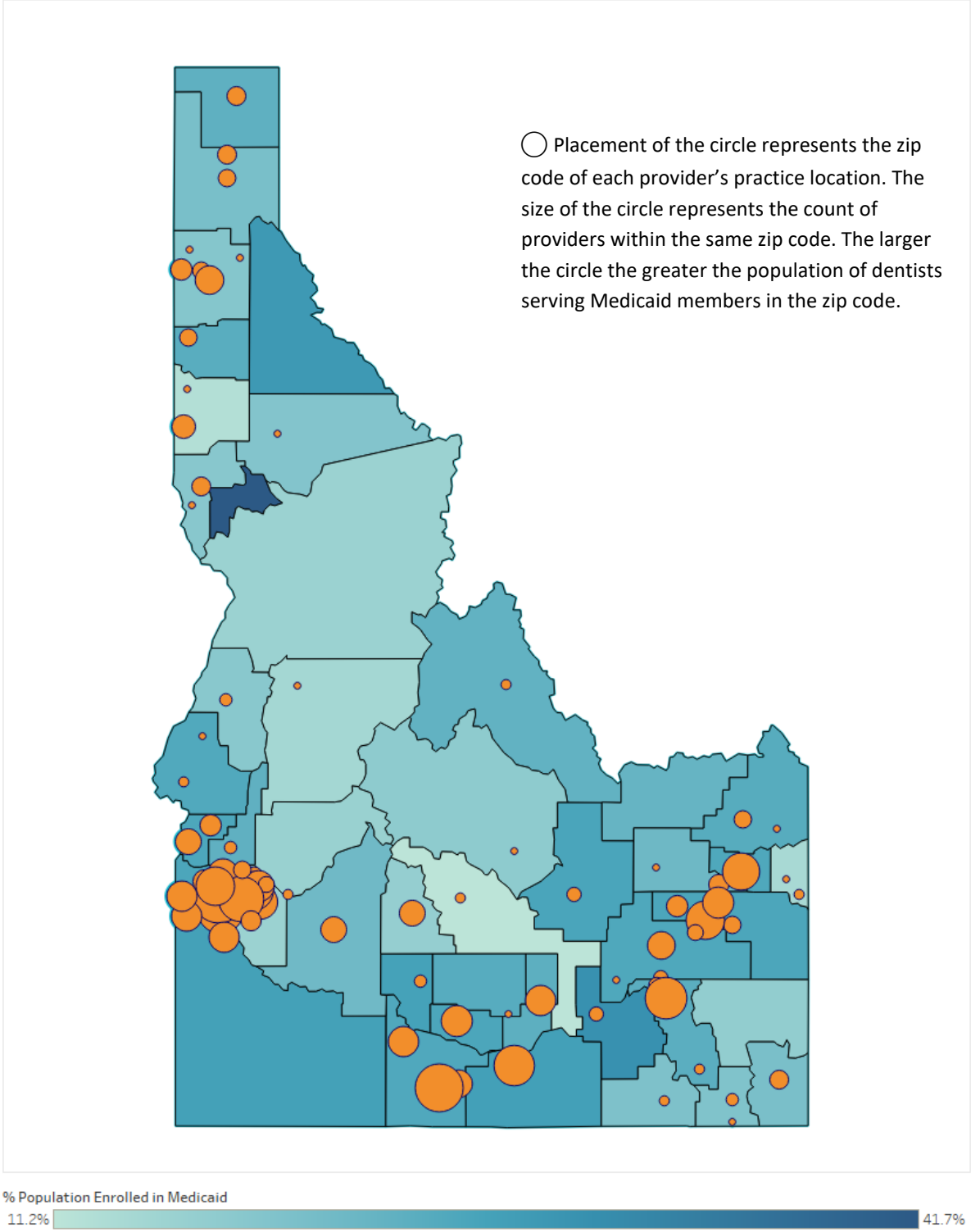
Disclaimer: 32 claims were filed with an absent facility zip code and were excluded from the analysis. 426 claims had either a missing zip code or their travel distance could not be computed through the Google Distance Matrix API. 100 of these claims were for members with an Idaho zip code.

Limitation: It is possible for a patient to receive care in a zip code other than the zip code the claim is filed under. An example is an FQHC who files all claims through the parent facility but serves patients through multiple satellite clinics.

[i] A 60-minute drive time is not an indicator of adequate access to care. The metric was a common measure used by key informant interviewees during Phase II of the assessment to describe the supply and distribution of the oral health workforce in Idaho.

[ii] See Appendix B and Appendix C for a full travel time report by county.

Figure 6: Percentage of Population Enrolled in Medicaid by County and Medicaid Provider Locations

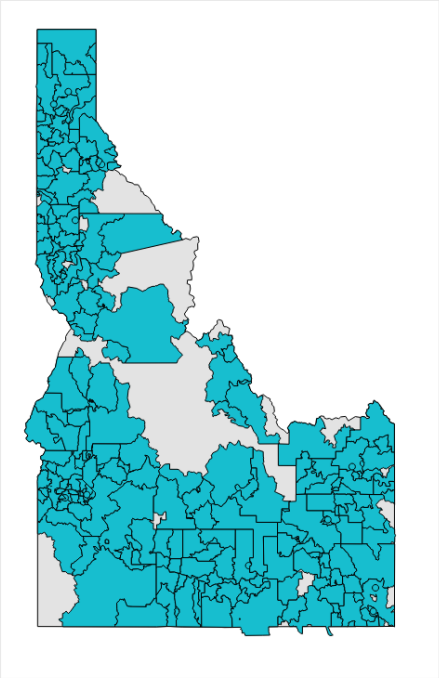


Data Source: Idaho Department of Health and Welfare Division of Medicaid, 2020 and MCNA Idaho Dental Medicaid Provider Directory

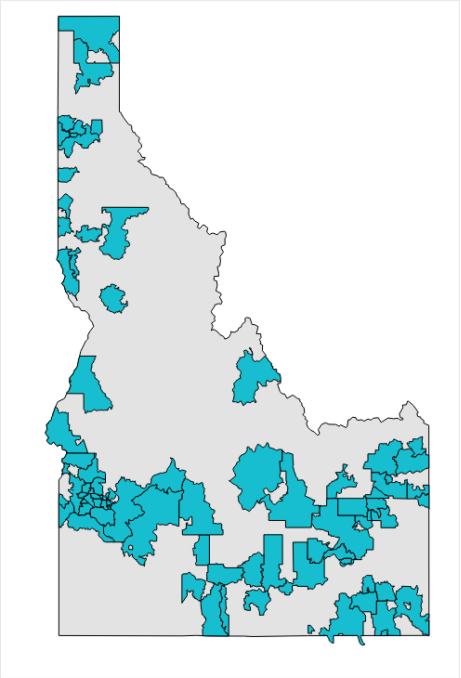
Figure 7 is a map plotting the zip codes of all Medicaid members who received care in 2019 and the zip codes in which Medicaid claims were filed that same year.

Figure 7: Comparison of Medicaid Patient Zip Codes and Claim Zip Codes

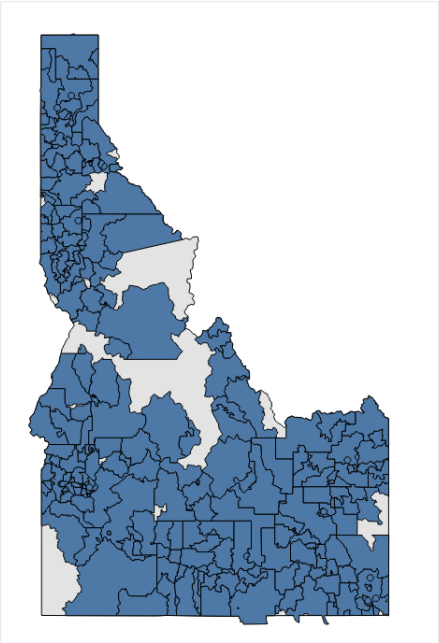
Zip Codes of Adult Patients



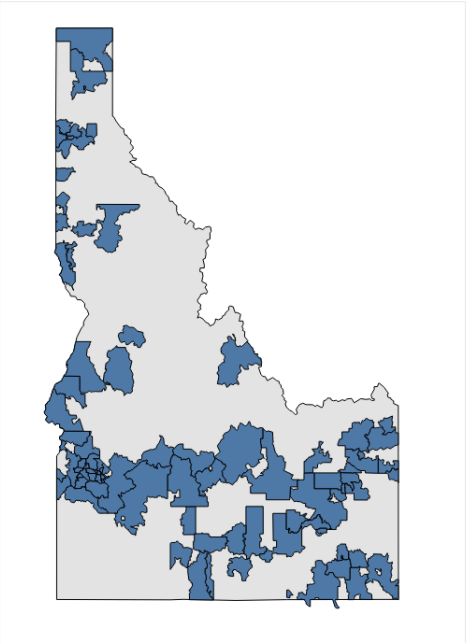
Zip Codes Where Adult Claims Filed



Zip Codes of Child Patients



Zip Codes Where Child Claims Filed



Data Source: MCNA claims data extracted by the Idaho Department of Health and Welfare Division of Medicaid, 2019

FEDERALLY QUALIFIED HEALTH CENTERS

Federally Qualified Health Centers (FQHCs) provide preventive and primary care services to populations with limited access to healthcare. In Idaho, 87.3% of patients receiving care at an FQHC are at or below 200% of the federal poverty level, 31.9% are uninsured, and 25.4% utilize Medicaid [12]. The centers are eligible to receive federal funds by operating under a set of guidelines which ensure individuals are served regardless of their ability to pay.

Eleven of Idaho's 15 FQHCs provide dental services. In 2019, the FQHCs served 204,221 patients; 21.3% of these patients were dental (43,522). Idaho's FQHC workforce includes 66 dentist Full Time Equivalent (FTE), 47 dental hygienist FTE, and 159 dental assistant FTE (Table 8) [13]. FQHCs are often the nearest point of access for those without private insurance and are highly utilized by Public Health Districts as a point of client referral.

Table 8: Federally Qualified Health Center Workforce

Federally Qualified Health Center	Counties Served	Dentist FTEs	Dental Hygienist FTEs	Dental Assistants FTEs
Adams County Health Center	Adams	0.82	1.03	1.42
Challis Area Health Center*	Custer	0	0	0
CHAS Health†	Latah	22.84	15.55	67.91
Community Family Clinic*	Bonneville	0	0	0
Desert Sage Health Centers	Elmore	1.97	1.65	3.98
Family Medicine Residency of Idaho*	Ada/Canyon	0	0	0
Family Health Services	Twin Falls/Camas/ Cassia/Jerome	10.8	9.13	16.07
Grand Peaks Medical & Dental	Fremont/Madison	3.07	1.86	7.68
Health West	Bannock	2.18	2.67	4.49
Heritage Health	Kootenai	2.51	1.85	6.84
Kaniksu Health	Boundary	3.13	2	7.07
Marimn Health	Benewah	4	2.6	10.09
Valley Family Health Care	Payette	4.4	3.64	9.47
Terry Reilly Health Services	Ada/Canyon/Owyhee	10.15	5.13	23.72
Shoshone Bannock Health Center*	Bannock	0	0	0

Data Source: Idaho Primary Care Association, 2021

*Dental services are not provided onsite. Patients are referred out for care.

†Includes workforce for all CHAS locations (including Washington state).

CHARITY CARE, COMMUNITY OUTREACH PROGRAMS, AND INITIATIVES

It is a challenge to quantify the workforce dedicated to charity care and community outreach. Idaho does, however, have a network of outreach platforms and innovative delivery models to which the workforce devotes time.

CLUB 32: SELF-PAY AND MEDICAID CLINIC

Club 32, a new Nampa dental clinic operated by independent dentists, caters only to self-pay and Medicaid clients. About 90% of this clinic's patients utilize Medicaid. The goal of the clinic is to lower the cost of services, making them more affordable for those paying out-of-pocket. Traditional overhead costs are eliminated by only offering online scheduling, removing office personnel, and utilizing dentists for all preventive services. Also, by removing traditional insurance as a payment option, the clinic does not incur expenses related to the collection of 3rd party payments.

DENTAL HYGIENE SCHOOL CLINICS

Idaho's dental hygiene schools operate clinics in a teaching and learning environment. These clinics may serve as an access point to oral healthcare for individuals who are uninsured. As an example, the College of Southern Idaho may serve up to 950 patients in their dental hygiene clinic over a two-semester period. Ninety-eight percent of which are uninsured. Supervised by eight rotating dentists, the services available through this clinic include prophylaxis, radiographs, and oral exams. Idaho's dental hygiene school clinics are in Boise, Twin Falls, Pocatello, Lewiston, and Coeur d'Alene.

FREE CLINICS

Free clinics provide oral healthcare services and education to low-income populations, mostly adults. In Idaho, these clinics include Genesis (Garden City), Snake River Community Clinic (Lewiston), Wellness Tree (Twin Falls), Pocatello Free Clinic, and Love Heals Boise Free Clinic (Boise). As an example, Genesis, a faith-based free clinic, has one dentist who is paid to work 1.5 days per week. Another eight to ten dentists volunteer one or two days a month to serve in the clinic. The clinic serves those 18 – 64 who are uninsured, at or below 200% below the federal poverty level, and do not qualify for Medicaid. They provide basic dental care such as restorations, extractions, and root canals. The clinic recently partnered with Saint Alphonsus Regional Medical Center and has since doubled the number of patients they are able to serve in a year.

IDAHO ORAL HEALTH PROGRAM

The Idaho Department of Health and Welfare's Oral Health Program supports collaborative efforts geared toward improved oral health outcomes across the state. The IOHP promotes preventive oral health services, educational outreach, community engagement, and oral health surveillance, including developing the oral health workforce in Idaho. The Idaho Oral Health Program also supports and participates in national discussions through the Association of State and Territorial Dental Directors to

remain actively engaged in innovation strategies, programmatic competencies (Appendix E), workforce development initiatives, and fostering equity by reducing health disparities.

IDAHO PUBLIC HEALTH DISTRICTS

The IOHP has historically contracted with the seven local Public Health Districts (PHD) as part of its role to monitor and collect data on Idaho's residents' oral health status. This partnership is a crucial component of the outreach available to Idahoans across the state. Oral healthcare services and education are available through the Public Health Districts. The districts have a strong focus on serving children and pregnant women through school-based and community clinics. However, many are continuing to expand and incorporate innovative strategies to promote improved oral health outcomes.

IDAHO STATE DENTAL ASSOCIATION: GIVE KIDS A SMILE

The Idaho State Dental Association (ISDA) participates in the American Dental Association Foundation's Give Kids a Smile program. During these annual events, dentists, and other members of the workforce volunteer to provide eligible uninsured children (3 – 18 years old) with free oral health screenings, cleanings, treatments, and education. The ISDA recruits dentists across the state to set aside a day to serve these children. Local dental societies, universities, and public health districts partner with the ISDA to administer the event.

SURVEY INSIGHT: DENTIST AND DENTAL HYGIENIST

- 80.8% of dentists reported offering pro bono services. On average, these dentists complete 33.8 pro bono cases per year.
- 46.9% of dentists and 30.1% of dental hygienists reported offering oral healthcare as a volunteer.

IDAHO STATE UNIVERSITY DENTAL HYGIENE CLINIC

The ISU Dental Hygiene Clinic offers oral cancer screenings at Gateway Transitional Care Center (skilled nursing facility), ISU Health Fair, and Homeless Stand Downs. The dental hygiene students also provide fluoride varnish applications at Gateway, Lincoln Early Learning Center (Head Start), ISU Health Fair, rotations at the Public Health District, and the Bengal Smiles for Life program. Prophylaxis and oral health education are also part of the program's outreach. The Bengal Smiles for Life program is currently awarded a subgrant from the Department of Health & Welfare's Oral Health Program through their HRSA funding to deliver a teledentistry and silver diamine fluoride project in assisted living facility (Caring Hearts). Dental hygiene students use portable dental equipment under the supervision of faculty members.

MILES OF SMILES: MOBILE CLINIC FOR CHILDREN

The Children's Free Dental Clinic began Miles of Smiles in 2006. Miles of Smiles is a self-contained, two-chair dental clinic within a motor home. The program utilizes volunteer dentists and other dental professionals to provide dental services to underserved children at no cost. The mobile clinic travels to select elementary schools throughout the Treasure Valley.

GENERATIONS DENTAL: OPERATION VET SMILES

Generations Dental, alongside many other area volunteers, hosts an annual day of free dental care for veterans who do not qualify for VA dental benefits. On this day, Generations Dental closes the Coeur d'Alene dental office to normal operations and serves veterans. Other area dentists and dental hygienists join the office to volunteer their time. Twelve other dentists in the area often donate vouchers for follow-up care or provide volunteer care to veterans in their office on the same day. The office manager secures donated materials and equipment from vendors.

YOUR SPECIAL SMILES: HOSPITAL DENTISTRY AND MOBILE DENTISTRY FOR SPECIAL NEEDS PATIENTS

Your Special Smiles operates a hospital dentistry program to treat special needs patients (who cannot travel) under general anesthesia. The program also has a portable dentistry unit to bring care to geriatric patients and adults with special needs living in long-term care and group homes. Your Special Smiles, LLC is currently awarded a subgrant from the Department of Health & Welfare's Oral Health Program through their HRSA funding to deliver a teledentistry and silver diamine project in long-term care facilities. In which, they utilize a mobile unit and teledentistry to have a dental hygienist take pictures and videos from the facility and sends them remotely to a dentist.

Two other components to this program include their model of Assisted Oral Hygiene and Guided Oral Hygiene. "Assisted" refers to a hygiene assistant visiting a long-term facility and supporting residents with preventive oral health techniques, such as brushing and flossing. "Guided" refers to a dental professional directing a long-term care facility care giver, such as a certified nursing assistant, in helping patients with oral hygiene practices. Through the collaboration of Your Special Smiles, LLC, the Idaho State University Dental Hygiene Department's project, a teledentistry subject matter expert, and the Idaho Oral Health Program, a Guided Oral Hygiene workgroup has formed.

DELTA DENTAL OF IDAHO: BENEFIT PROGRAMS FOR UNDERSERVED POPULATIONS

Delta Dental of Idaho operates a series of programs designed to help underserved populations access oral healthcare. These programs include dental benefit programs that provide individuals age 60+ or youth at or below 200% of the federal poverty level access to dental services, school-based sealant clinics, fluoride and education clinics, pop-up education events, early childhood programs support, and education to citizens through the food bank.

SECTION III: THE FUTURE OF IDAHO'S ORAL HEALTH WORKFORCE

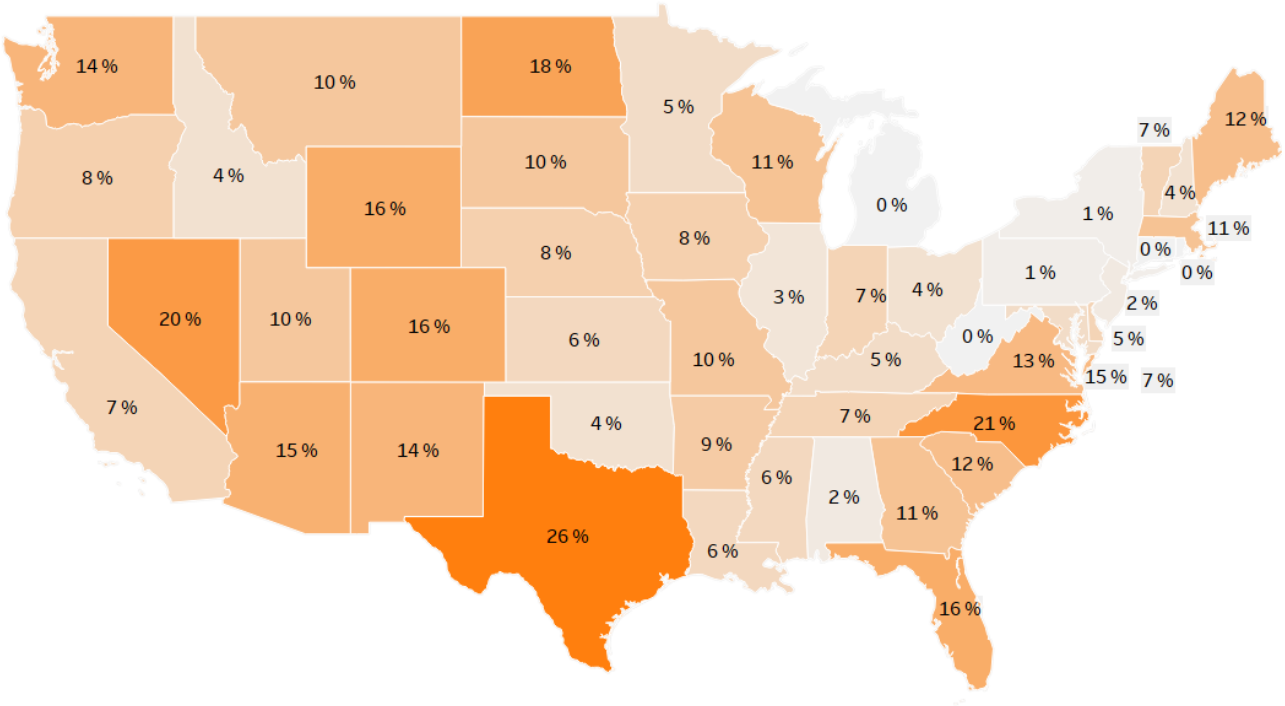
WORKFORCE PROJECTIONS

DENTISTS

Idaho experienced a 4% increase in the number of practicing dentists from 2009 to 2019. This was one of the smallest growth rates in the country and the smallest in the region (Figure 8). Neighboring states experienced growth rates from 8% to 20% and the average increase in the U.S. was 9% [2]. From 2010 to 2019, Idaho's population increased by 13.9%. The dentist supply in Idaho is increasing slower than the population.

According to a proprietary health workforce database[i], over the last three years (2018 to 2021), there has been a growth in practicing Idaho dentists by 2.3%. During this time, the specialty dentist workforce grew by 6.6%, general dentistry grew by 1.9%, and pediatric dentistry decreased by 3.6% (Table 9).

Figure 8: Change in Dentists Practicing in the U.S.



Data Source: ADA Health Policy Institute, 2009 - 2019. Alaska: 8%; Hawaii: 5%.

[i] WIM Tracking Dentist Masterfile

Table 9: Change in the Number of General, Pediatric, and Specialty Dentists Practicing in Idaho

Specialty	2018	Percent of all Dentists	2021	Percent of all Dentists	Change from 2018 to 2021
General Dentists	723	79.1%	737	78.8%	1.9%
Pediatric Dentists	55	6.0%	53	5.7%	(3.6%)
Specialists*	136	14.9%	145	15.5%	6.6%
Total	914		935		2.3%

Data Source: WIM Tracking LLC Dentist Masterfile 2018 – 2021.

*2018: Orthodontists 64, Oral and Maxillofacial Surgeons 28, Endodontists 24, Periodontists 13, Prosthodontists 4, Dental Anesthesiologists 3.

*2021: Orthodontists 67, Oral and Maxillofacial Surgeons 30, Endodontists 28, Periodontists 12, Prosthodontists 5, Dental Anesthesiologists 3.

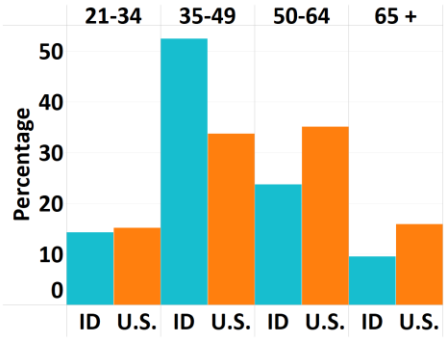
The Health Resources and Services Administration's (HRSA) National Center for Workforce Analysis predicts the total supply of all dentists across the U.S. to increase by 9% by 2030. This is similar to the projected growth of the U.S. population. HRSA predicts the growth for specialty dentists and pediatric dentists to be adequate, but the growth for general dentists to be inadequate to meet the projected growth in demand. These national supply and demand projections are as follows:

- General Dentists: Supply 6% increase; Demand 9% increase.
- Pediatric Dentists: Supply 50% increase; Demand 2% increase.
- Endodontists: Supply 17% increase; Demand 7% increase.
- Orthodontists: Supply 16% increase; Demand 1% decrease.
- Oral Surgeons: Supply 13% increase; Demand 7% increase.
- Periodontists: Supply 0%; Demand 11% increase.
- Other dentists: Supply 20% increase; Demand 12% increase [14].

As seen in Figure 9, Idaho has a younger dentist workforce compared to the national average. In Idaho, 66.8% of the dentist workforce is under the age of 50. The average age of retirement for a dentist is 69 [15]. In Idaho, 9.5% of the dentist population is in the 65+ category, which is within four years of reaching the average age of retirement for dentists. The national average in the 65+ category is 15.9% [2]. The remaining 23.7% of dentists in Idaho are in the 50-64 age category.

Counties in Idaho with the highest percentage of dentists over 59 and therefore, potentially within ten years of retirement are Benewah (6 dentists), Clearwater (3), Custer (2), Owyhee (2), Oneida (1), Power (3), and Teton (6).

Figure 9: Average Age of Dentists in Idaho and U.S.



Data Source: American Dental Association Health Policy Institute, 2019

DENTAL HYGIENISTS

HRSA predicts a growth in the dental hygienist workforce of 20% nationally, but only a 7% increase in demand by 2030 [16]. With the addition of the new dental hygiene school in Northern Idaho, Idaho's supply of dental hygienists will increase. Producing a large number of graduates in an area can cause job market saturation. The North Idaho College program has a small class size of 15 students per year.

Similar to the dentist workforce, 66.7% of the dental hygiene workforce is under the age of 50. Some dental hygienists (13.5%) do not believe they are working at the top of their education and 34.8% of dental hygienists would like to advance their career (Idaho Oral Health Workforce Assessment Survey, February 2021).

SURVEY INSIGHT: DENTIST

- Sex: Male 88.5%, Female 11.5%
- Hispanic or Latino/a origin: Yes 1.3%, No 93.1%, Prefer not to answer 5.6%
- Race (choose one or more): White 90.7%, Black or African American 0.4%, American Indian or Alaska Native 0.4%, Prefer not to answer 7.6%
- Describe your plans for retirement:

Retirement plans	%
Already retired	8.5%
Within the next 2 years	5.5%
Within the next 3-5 years	10.2%
Within the next 6-10 years	12.3%
More than 10 years from now	53.8%
Uncertain	9.7%

SURVEY INSIGHT: DENTAL HYGIENIST

- The average age of dental hygienists practicing in Idaho is 44 years. Over half of the dental hygienists are under the age of 50 (66.7%).

Age Range	%
23 - 34	23.1%
35 - 49	43.6%
50 - 64	29.1%
65+	4.3%

- Of survey respondents actively serving patients in Idaho, 31.7% plan to retire within the next ten years.

Retirement plan	%
Within the next 2 years	7.2%
Within the next 3-5 years	10.0%
Within the next 6-10 years	14.5%
More than 10 years from now	53.5%
Uncertain	14.2%

Due to rounding numbers may not sum to 100.

- Do you agree or disagree with the following statements as they relate to your current practice as a dental hygienist?

	Agree	Disagree	Neither Agree nor Disagree
I am working at the top of my education	67.9%	13.5%	18.7%
I am working at my full employment capacity (I have no further hours to devote to patient care)	59.7%	27.9%	12.3%
I am seeking further employment	7.4%	81.1%	11.5%
I have more training than what I am currently utilizing	32.1%	56.2%	11.8%
I would like to advance my career as a dental hygienist	34.8%	38.4%	26.8%
I am aware of opportunities to advance my career as a dental hygienist	54.0%	22.2%	23.8%

- The average number of years practicing as a dental hygienist is 18. Of respondents, 15.2% have practiced 5 or fewer years, 18.0% have practiced 6 to 10 years, 31.5% have practiced 11 to 20 years, and 35.1% have practiced 21 or more years.

OPPORTUNITIES FOR WORKFORCE ADVANCEMENT

MEDICAL-DENTAL INTEGRATION AND REFERRALS

Primary care medical providers (pediatrics, family medicine, and urgent care) offer a unique opportunity for patients to receive additional oral health screenings and preventive oral health services through integrative strategies within the medical office. In addition, there are developing efforts with medical-dental integration through referrals of patients to seek necessary care.

SURVEY INSIGHT: PHYSICIAN

- Physicians were asked if they have provided oral health services in the last year (select all that apply*):
  - No, 44.3% (of respondents)
  - Yes – children, 42.3%
  - Yes – adults, 13.4%
- Payment types accepted by physicians for oral health services:
  - Self-pay, 29.3%
  - Private insurance, 31.1%
  - Medicaid, 32.3%
  - Other, 7.2%
- Physicians were asked to rank the barriers to providing oral health preventive services as a major barrier, minor barrier, not a barrier, or unsure:
  - Limited time rated as a major barrier, 61.4%
  - Limited knowledge and training in oral health rated as a major barrier, 29.9%
  - Difficulty incorporating it into current process rated as a major barrier, 25.3%
- Indicate the frequency of which you provide the following oral health preventive services:

	Never	Rarely	Sometimes	Always	Not Applicable
Take a patient's oral health history	8.0%	21.6%	46.6%	22.7%	1.1%
Assess a patient's oral health risk	8.0%	21.6%	53.4%	15.9%	1.1%
Examine a patient for signs of oral health disease	2.2%	6.7%	58.4%	31.5%	1.1%
Provide a patient with a fluoride varnish	60.7%	9.1%	24.7%	2.2%	3.4%
Educate a patient on oral health and hygiene	8.0%	14.8%	51.1%	25.0%	1.1%

*Providers were given the option to select more than one answer, however, not one physician selected both children and adults.

The Idaho Oral Health Alliance (IOHA) is leading efforts to integrate oral health into primary care settings across the state. The IOHA is piloting a statewide, bi-directional medical-dental, closed loop referral network that addresses the un-insured and underinsured population. The pilot began in April 2019. The first 18 months of the project were managed with in-kind support from Delta Dental of Idaho in the form of a loaned network manager.

Approximately 10 medical and dental clinics agreed to participate in the initial phase of the pilot network and provide referrals to their patients who indicated they did not have a medical/dental home or were identified as having a treatment need. The providers who are participating have given feedback to the IOHA on the process. The providers also have been communicating with the provider whom they referred their patient to, with the end goal of improved health outcomes and total patient care. In 2021, the IOHA received its first-ever grants to support this program. By stewarding collaborative medical-dental partnerships and supporting integration efforts across the state, health issues like diabetes, obesity, heart disease, and oral cancers could be detected earlier and managed more efficiently.

SURVEY INSIGHT: DENTIST AND PHYSICIAN

- Dentists reported referring patients to primary care medical providers more often than receiving referrals from medical providers. 15.7% reported they do not refer patients to medical providers and 36.3% reported they never receive referrals. 60.5% reported giving 1-3 referrals per month.

Dentists: Please indicate the frequency of patient referrals per month:	Never	N	1-3	N	4-6	N	7+	N
I receive referrals from primary care providers	36.3%	77	50.0%	106	9.0%	19	4.7%	10
I refer patients to primary care providers	15.7%	33	60.5%	127	12.4%	26	11.4%	24

- Physicians reported referring patients to dentists more often than receiving referrals from dentists. 13.3% reported they do not refer patients out to dentists and 42.4% reported they never receive referrals. 43.3% reported giving 1-3 referrals per month.

Physicians: Please indicate the frequency of patient referrals per month:	Never	N	1-3	N	4-6	N	7+	N
I receive referrals from dentists	42.4%	36	47.1%	40	9.4%	8	1.2%	1
I refer patients to dentists	13.3%	12	43.3%	39	22.2%	20	21.1%	19

South Carolina, Colorado, and Pennsylvania have functioned as pilot sites of the CareQuest Institute of Oral Health's MORE Care (Medical Oral Expanded Care) medical-dental integration effort. Oregon is now working alongside CareQuest, formerly known as DentaQuest, to pilot the program. These pilot programs have identified education of the dental community and medical providers as a key component to achieve successful integration. Following the lead of MORE Care, the IOHA has plans to undertake two educational campaigns to help the dental community understand the importance of considering themselves part of a patient's team of providers and help medical providers understand the rationale for adding oral health into their workflows.

Another notable medical/dental integration effort is the Genesis Free Clinic. The clinic is addressing integration efforts between their medical and dental clinics. Unless a patient is experiencing tooth pain, they are requested to have their first visit in the medical clinic. A dental hygienist is available in the medical clinic to meet the patient and provide education. This approach helps educate the patients on the correlation between medical and dental health. A notable success within the clinic's integration effort is with diabetic patients. In FY 2020, 69% of Genesis diabetic patients were seen at least once by a dentist. The dental coordinator originally called these patients to set up an appointment with a dentist but experienced little success. After enlisting the help of the medical staff to reiterate the importance of oral care in controlling their A1C[i], the perception of the patient's oral healthcare differed, and they begin transitioning into the dental clinic.

TELEDENTISTRY

According to the Idaho Telehealth Access Act, telehealth services enhance access to healthcare, lower healthcare costs, and distribute resources more efficiently. Residents with limited access to traditional healthcare services, such as those facing geographic barriers, may experience improved health outcomes through the use of telehealth [17]. Telehealth services may be healthcare services, evaluations, consultations, or education delivered through electronic communications, information technology, and synchronous or asynchronous interaction between a provider and patient [18].

The workforce in Idaho continues to adopt teledentistry within independent dental practices, outreach programs, and Federally Qualified Health Centers, especially considering the response of the COVID-19 pandemic. During the Idaho Oral Health Workforce Assessment Survey (February 2021), 16.4% of dentists reported typical[ii] utilization of synchronous teledentistry and 25.3% reported current utilization. This is an increase of 47.1% in teledentistry utilization in response to the COVID-19 pandemic.

[i] The A1C test provides a picture of a patient's average blood glucose (blood sugar) control for the past two to three months. The results give the patient and diabetes care team a good idea of how well the diabetes treatment plan is working. – American Diabetes Association (www.diabetes.org)

[ii] Survey respondents were asked to respond for varying time periods. Typically: Respond to how your practice operates under typical circumstances (prior to the COVID-19 pandemic). Currently: Respond to how your practice is operating at the time of completing this survey (February 2021).

The continued exploration of team-based teledentistry in Idaho presents an opportunity to explore new ways in which members of the workforce may be utilized. This provides great potential for expanded patient conversations for providers and greater access to education, services, and opportunities for increased awareness of the importance of oral health.

SURVEY INSIGHT: DENTIST

- Use of teledentistry* was most often reported by Idaho dentists located in:
  - Synchronous: Boise (26.5%), Meridian (8.8%), and Caldwell (8.8%).
  - Asynchronous: Boise (24.3%), Idaho Falls (13.5%), and Meridian (10.8%).
  - Mobile Health: Meridian (14.3%), Pocatello (9.5%), and Caldwell (9.5%).
- When asked if they would utilize teledentistry more if it was more widely covered by insurance, 33.0% of dentists responded yes, 33.0% responded uncertain, and 34.0% responded no.
- Of those utilizing teledentistry, 88% are not submitting to insurance companies, 6.7% are, and 5.3% are uncertain if they are.
- The utilization of synchronous teledentistry has increased 47.1% from the typical number of dentists using this method (34) to the current number (50), while asynchronous teledentistry increased 10.8% and mobile health increased 2.4%.
- Do you utilize any of the following modalities of teledentistry at any of your practice locations?

	Synchronous	Asynchronous	Mobile Health
Independent (private) practice	55.9%	56.8%	61.9%
Independent practice with associate(s)	8.8%	10.8%	14.3%
Group practice (multiple dentist owners)	20.6%	24.3%	9.5%
Dental Services Organization (DSO)	2.9%	2.7%	0.0%
State Hospital	0.0%	0.0%	0.0%
Correctional Facility	0.0%	0.0%	0.0%
Federally Qualified Health Center	5.9%	0.0%	9.5%
Indian Health Services	0.0%	0.0%	0.0%
Veterans Affairs	0.0%	0.0%	0.0%
Other (specify)	0.0%	2.7%	0.0%

How to interpret this table: 61.9% of dentists who utilize mobile health do so through an independent (private) practice.

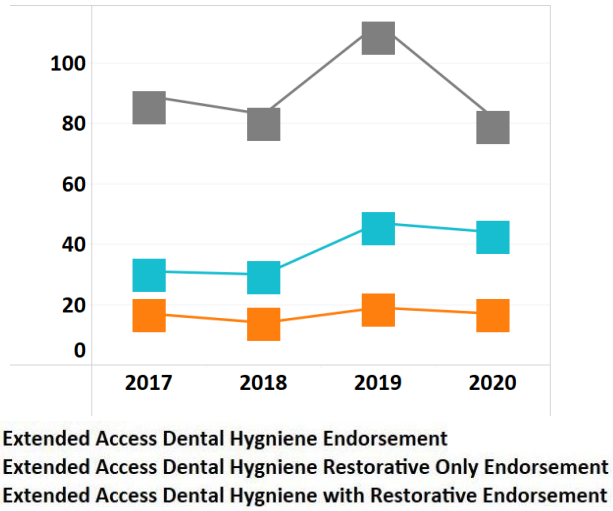
*The definitions of teledentistry provided to respondents of the survey were those of the American Dental Association:

- Synchronous: Real time interaction between patient and provider
- Asynchronous: Collecting patient information and later forwarding via electronic means to the provider for evaluation
- Mobile Health: Health care, public health practice, and education supported by mobile communication devices such as cell phones, tablet computers, and personal digital assistants

DENTAL HYGIENISTS EXTENDED ACCESS

In Idaho, a dental hygienist may hold an Extended Access Endorsement allowing them to serve patients in settings such as a public health district, school district, tribal clinic, FQHC, or other setting as allowed by the Idaho Board of Dentistry. In these settings, with this endorsement, a dental hygienist may perform dental hygiene procedures under the general supervision of a dentist and by written authorization of the supervising dentist. Rather, the Extended Access Restorative Only Endorsement permits a dental hygienist to place a restoration into a tooth prepared by a dentist. With the direct supervision of the dentist, they can also carve, contour, and adjust the contacts and occlusion of the restoration. Finally, an Extended Access with Restorative Endorsement allows the dental hygienist to perform the tasks outlined in both of the other endorsements. In each case, the supervising dentist is responsible to treat the patient's dental needs or refer the patient to another dentist for treatment.

Figure 10: Number of Idaho Dental Hygienists with Extended Access Endorsements



Data Source: Idaho Board of Dentistry

In 2020, 82 dental hygienists held an Extended Access Endorsement, 45 held a Restorative Only Endorsement, and 17 held an Extended Access with Restorative Endorsement (Figure 10). These 144 endorsement holders are located throughout 26 counties. Figure 11 gives insight into the locations of endorsement holders by plotting the address on file with the endorsement. Over half of the endorsement holders (51%) are in Ada, Bannock, and Canyon counties. The remaining 23 counties have anywhere between 1 and 19 endorsement holders. Counties without a Medicaid dentist were identified in section two of this report. There are dental hygienists in all but one of these counties with an active license (Boise 3, Clark 0, Idaho 14, Lewis 4, Shoshone 5, Valley 8). One dental hygienist in Lewis County also holds an extended access endorsement, as does one in Idaho County.

In June 2020, the Idaho Board of Dentistry surveyed 147 Idaho Dental Hygienists who hold an active Extended Access Endorsement. An estimated 71 of these hygienists completed the survey, of which, 35.2% responded that they have not worked in an extended access setting. Those that have worked in an extended access setting in the past year, practiced in a public health district (23.9%), dental or dental hygiene school (19.7%), school district (18.3%), FQHC (15.5%), long term care facility (15.5%), nonprofit oral healthcare program (14.1%), county, state, or federal agency (7%), tribal clinic (4.2%), other (4.2%), hospital (1.4%), or medical office (1.4%).

In an effort to increase capacity for the underserved, some states have passed legislation to allow dental hygienists with extended access to operate under public health supervision and bill for their services independent of a dentist.

SURVEY INSIGHT: DENTAL HYGIENIST

- 44 respondents reported holding an Extended Access Endorsement.
- Of the 295 respondents that reported not holding an Extended Access Endorsement, 9.2% reported they are planning to obtain one in the next 1-3 years.
- Those not planning to obtain an endorsement in the next 1-3 years were asked to select the option that best describes their reason for not obtaining an endorsement:

Response	%
I am satisfied in my current role	54.1%
Lack of opportunities to utilize	8.2%
Inability to find a supervising dentist	0.4%
Lack of reimbursement	0.0%
I am uncertain as to how an endorsement may benefit my career	24.9%
Other (specify)	12.0%
Lack of funding	0.4%

UTILIZATION OF DENTAL HYGIENISTS IN THE U.S.

OREGON: EXPANDED PRACTICE PERMIT (EPP)

In Oregon, an expanded practice dental hygienist (EPDH) can practice without the supervision of a dentist, if serving the following populations: nursing homes, adult foster homes, residential care facilities, adult congregate living facilities, mental health residential programs, facilities for persons with mental illness, facilities for persons with developmental disabilities, local correctional and juvenile detention facilities, regional correctional facilities, youth care centers, the Department of Corrections, public and nonprofit community health clinics, and homebound adults.

A collaborative agreement between a licensed dentist and licensed EPDH is encouraged, but only required when the EPDH will administer local anesthesia, place temporary restorations, prescribe prophylactic antibiotics, or prescribe non-steroidal anti-inflammatory drugs. EPDHs are required to refer patients to a dentist at least once a year for examination and treatment [19]. There are 919 EPPs held by Oregon dental hygienists [20]. An example of a collaborative approach, dentists and EPDHs in Oregon are teaming up to reach underserved populations. A cooperative group of 19 dentists, three denturists, and five expanded practice dental hygienists provide care to long-term care residents in

Oregon. This outreach program is called Exceptional Needs Dental Services (E.N.D.S.). The program has been operating since 1995 and provides care in over 900 facilities.

COLORADO

In Colorado, a dental hygienist does not need to be supervised by a dentist to prescribe/administer/dispense fluoride, fluoride varnish, silver diamine fluoride (SDF), antimicrobial solutions for mouth rinsing, other non-systemic antimicrobial agents, related emergency drugs, and reversal agents. With a permit and under indirect supervision of a dentist, a dental hygienist may place interim therapeutic restorations (ITR) and administer local anesthesia. The hygienist must collaborate with a dentist and refer patients to a dentist for treatment [21]. The dental hygienist may own their own practice and file claims under their National Provider Identifier (NPI). Colorado law was revised in April of 2021 to extend the dental hygienist's ability to place ITRs and SDF until September 2025.

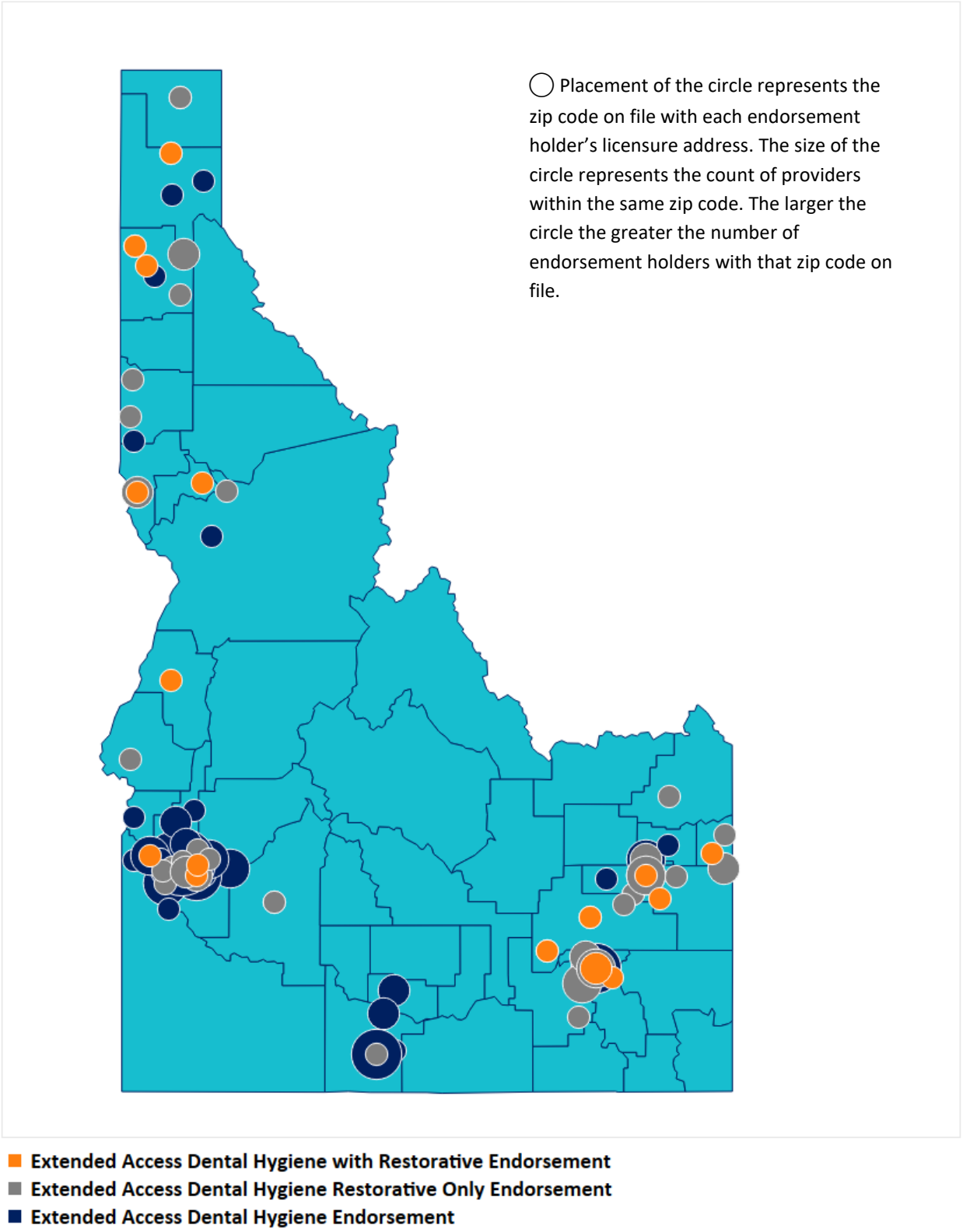
MONTANA: LIMITED ACCESS PERMIT (LAP)

Through a Limited Access Permit (LAP), a dental hygienist can work with patients under public health supervision (without supervision or preauthorization of a dentist). Public health supervision may be performed in federally qualified health centers, migrant worker facilities, healthcare for the homeless clinics, nursing homes, or other public health facilities identified by the Board of Dentistry [22]. There are currently 91 LAP holders in Montana. A 2018 survey of LAP holders conducted by the Montana Oral Health Program found that 37% are actively utilizing the LAP and mostly serving long-term care residents in urban areas [23].

UTAH

In March of 2021, legislation was passed in Utah allowing dental hygienists to be directly reimbursed by Medicaid when operating in a public health setting. The dental hygienist has been able to practice in a public health setting under a written agreement with a dentist, however, could not bill Medicaid directly for services performed. In Utah, the dentist in agreement needs to be available in person, by phone, or by electronic communication. The dental hygienist is also required to refer patients out to a dentist when the dental need is beyond the scope of the dental hygienist. A component of the new legislation includes the collection of data regarding the number of services billed, types of services billed, and geographic distribution of the dental hygienists [24].

Figure 11: License Addresses of Dental Hygienist Endorsement Holders



Data Source: Idaho Board of Dentistry

COMMUNITY DENTAL HEALTH COORDINATOR (CDHC)

Low-income adults are more likely to utilize acute care such as an emergency room for treatment of dental disease. In certain cases, the emergency room is the first source of care for low-income adults. A 2014 study identified that 1% of all emergency department visits between 2008 and 2010 in the U.S. accounted for dental-related visits. Of these visits, 30% were Medicaid-enrolled adults and over 40% were uninsured [6].

The American Dental Association developed the community dental health coordinator (CDHC) program in 2006 to help connect populations with the greatest barriers to access into the oral healthcare system. The major components of the program are prevention, patient navigation, and oral health education.

SURVEY INSIGHT: DENTAL HYGIENIST (IDAHO)

- Sex: Female 98.1%, Male 1.9%
- Hispanic or Latino/a Origin: Yes 5.5%, No 91.1%, Prefer not to answer 3.4%
- Race (choose one or more): White 90.1%, Black or African American 0.5%, American Indian or Alaska Native 1.6%, Asian 1.6%, Pacific Islander 0.2%, Don't know/Unsure 0.2%, Prefer not to answer 4.5%, and Other 1.2%.
- Dental Hygienists generally practice in independent dental clinics with one or more associations and/or owners (90.9%). Other practice locations include dental services organizations (1.4%), correctional facilities (0.3%), FQHCs (3.3%), Indian Health Services (0.06%), Veterans Affairs (0.3%) and Other (3.3%).

The ADA's description of CDHCs:

- Work under a dentist's supervision (within the confines of state dental practice acts) in clinics, schools, and other public health settings with people of similar ethnic and cultural backgrounds
- Collect information to assist dentists in triaging patients
- Address social, environmental, and health literacy issues
- Provide dental health education and help people develop goals to enhance their oral health
- Coordinate care in accordance with a dentist's instructions
- Help patients navigate the complexities of the healthcare system
- Provide limited clinical services, including:
    - Screenings
    - Fluoride treatments
    - Placements of sealants
    - Coronal polishings
    - Radiographs

Terry Reilly Health Services, a Federally Qualified Health Center, employs one full time CDHC. This employee began functions as a full time CDHC in January of 2021. Prior to the official launch of the role, the CDHC worked as a hybrid dental hygienist/CDHC. Terry Reilly also has one dental assistant that has completed the CDHC training program and currently works as a patient navigator for the clinic.

The Terry Reilly CDHC works alongside medical professionals in the co-located medical and dental clinics. Her focus is mostly on high-risk patients such as children, expecting mothers, and diabetics. She has scheduling privileges and can transition a client from the medical team to the dental team. The role is funded partially through grants and partially through billable medical and dental services. Terry Reilly is working to develop a mobile dental unit that will reach underserved populations such as community members completing detox treatment for addiction. This focus area is designed to address persons coming out of detox, where in many cases dental problems become more noticeable. This CDHC is also focusing on outreach to rural areas. As part of her role, this CDHC gathers data on social determinants of health and gains subjective input from clients about barriers to access.

Delta Dental of Idaho has five dental hygienists enrolled in the CDHC training program. The program is not sure how the certifications will be applied. Another dental hygienist in Idaho has completed the training but is not actively working in the role.

CDHCs have access to both in-person and online training. The CDHCs with Terry Reilly all completed their training through Rio Salado College in Arizona. The Delta Dental CDHCs are being trained at Catawba Valley Community College and are set to graduate in 2021.

DENTAL THERAPY

The dental health aide therapist, dental therapist, and advanced dental therapist are mid-level professionals who provide preventive, diagnostic, and restorative care to underserved populations. Dental therapists practice in tribal health clinics, rural health clinics, free clinics, schools, community events, correctional facilities, mobile health units, and independent dental clinics.

ALASKA: PRIMARY DENTAL HEALTH AIDE AND DENTAL HEALTH AIDE THERAPIST

The basis of dental therapy among Alaska Native/American Indian communities is to educate and integrate tribal members into the oral healthcare system. This provides rural communities with access to a professional who understands the culture and values of the population. There are two models of dental therapy in Alaska, the primary dental health aide (PDHA) and the dental health aide therapist (DHAT). PDHAs provide patient education and preventive services much like a Community Dental Health Coordinator.

DHATs are certified after graduating from a two-year dental therapy program. Dental health aide therapists have been utilized in Alaska's Tribal settings since 2004. The first DHATs were trained in New Zealand where the role was modeled after an international role, the dental nurse. Alaska is also the

home to the only Commission of Dental Accreditation (CODA) Accredited Dental Therapy School, Ilisagvik College Alaska Dental Therapy Education Program (ADTEP) [24]. The program earned accreditation in 2020. Those who graduated from the program prior to accreditation are not considered to have graduated from a CODA accredited program.

MINNESOTA: DENTAL THERAPIST (LICENSED) AND ADVANCED DENTAL THERAPIST (CERTIFICATE)

In 2009, Minnesota was the first state to enact dental therapy statewide. There are 117 licensed dental therapists in Minnesota. The University of Minnesota Dental School offers a Dental Therapy training program. In 2017, the Wilder Foundation completed two case studies on the use of dental therapy in a private, for-profit dental clinic setting. Successes reported include growth in the volume of patients using public insurance, high levels of patient satisfaction, the dental staff's satisfaction of the dental therapist's work, and increased revenues of the dental office. Challenges include dental staff not having the capacity to provide guidance to the dental therapist without compromising their own productivity, limits to the dental therapist's capacity (the therapist was not a licensed dental hygienist), low reimbursement rates from Medicaid, and the dental therapist saw fewer patients per hour and performed fewer procedures than the dentist. A higher number of no-show appointments as compared to appointments scheduled with the dentist was also reported. The key components attributing to success were physical space available within the clinic, desire to increase access to dental care for lower income patients, a supervising dentist who has the capacity and willingness to provide support, and the ability to hire additional staff to increase capacity for patient treatments [25].

OREGON: DENTAL HEALTH AIDE THERAPIST AND DENTAL THERAPIST PILOT PROJECTS

Oregon Health Authority has authorized a pilot project for both a dental health aide therapist (DHAT) program and a dental therapy program. The DHAT pilot project has been under way since 2016 and is sponsored by the Northwest Portland Area Indian Health Board. Select tribal communities in Oregon sent trainees to the two-year DHAT program in Alaska. Following graduation of the DHAT program, trainees moved into the utilization phase within three Oregon tribal sites. The program recently added new locations to the list of approved sites of delivery including daycare facilities, tribal preschool and Head Start programs, after school programs, wellness fairs, and tribal events. The project was scheduled to close in May of 2021 but has been extended to May of 2022.

The dental service organization sponsoring the Dental Therapy (dental hygiene model) pilot project, Willamette Dental Group, has locations in Oregon, Washington, and Idaho. The educational component of this new pilot will be developed and implemented by Pacific University. In the first and second years of the project, dental hygienists will be educated as dental therapists. The trainees will then be added to clinical practice sites where an evaluation of how the dental therapist trainees affect efficiency, cost, quality, patient satisfaction, and patient safety will be completed. This program extends to January of 2025 [26].

IDAHO: DENTAL THERAPIST

In 2019, dental therapy was recognized by law in Idaho. Services and procedures performed by dental therapists are limited to the United States Public Health Service, the Indian Health Service, or tribal health programs in a practice setting within the exterior boundaries of a tribal reservation.

Under the supervision of a dentist, the dental therapist may

- Identify oral and systemic conditions
- Perform dental prophylaxis
- Dispense and administer non-narcotic analgesics, anti-inflammatory, and antibiotic medications as prescribed by a licensed dentist
- Apply preventive agents
- Prepare and place direct restorations in primary and permanent teeth
- Indirect and direct pulp capping on permanent teeth
- Indirect pulp capping on primary teeth

Currently, there are no dental therapists licensed in Idaho. Marimn Health, owned by the Coeur d'Alene Tribe, has an individual working to complete the credits required to graduate from the recently CODA-accredited program.

WORKFORCE PLANNING

This assessment analyzed information collected from stakeholders, key informants, licensing boards, Idaho's Medicaid program, and surveys of dentists, dental hygienists, and physicians. This information exposed populations and counties in Idaho where workforce planning efforts may be directed to help improve access to care. Populations identified as facing the greatest barriers to access in Idaho include the uninsured, Medicaid members, geographically isolated, residents of long-term care facilities, refugees, and persons re-entering society after incarceration. Table 10: Counties of Interest for Workforce Planning summarizes the counties identified throughout the assessment where workforce planning efforts may provide the greatest impact.

Table 10: Counties of Interest for Workforce Planning

County	Lowest Concentration of Dentists	Highest % of Dentists Within 10 Years of Retirement	Lowest Concentration of Dental Hygienists	No Dentist Serving Medicaid	Adult Medicaid Members with Greatest Travel Time	Child Medicaid Members with Greatest Travel Time
Benewah		X				X
Blaine					X	
Boise			X	X		
Butte	X				X	
Camas	X					X
Clark	X		X	X		
Clearwater		X	X		X	
Custer		X			X	
Gooding	X					
Idaho				X		
Lemhi						X
Lewis				X		
Lincoln			X	X		
Minidoka	X					
Owyhee	X	X				
Oneida		X				
Power		X				
Shoshone			X	X		X
Teton		X				X
Valley				X		

It is suggested that the Idaho Oral Health Program utilize this assessment in collaboration with stakeholders to lead workforce planning efforts. For now, the author highlights the following areas for consideration:

Expand the workforce dedicated to underserved populations	• Idaho's dentist workforce is adequate to meet the needs of the general population. The access issue is in the lack of capacity the dentist workforce has for the underserved. Until systemic changes in Idaho's Medicaid program are made, the capacity of the dentist workforce to serve the Medicaid population will remain limited. • Workforce planning should be focused on outreach initiatives and members of the workforce dedicated to serving these populations.
Monitor the balance of Dentists	• HRSA predicts inadequate growth of general dentists through 2030 and Idaho's dentist population is experiencing a downward trend. • The balance of the general, pediatric, and specialty dentist populations should be monitored.
Micro-target recruitment efforts	• Counties identified as having the highest population of dentists nearing retirement age present an opportunity to micro-target the recruitment of dentists from programs offering unique training opportunities. • The Lee Specialty Clinic in Louisville, Kentucky trains dentists to serve the intellectually and developmentally disabled population. The University of Louisville is one of the most attended dental schools of Idaho dentists. • In 2016, there were four students from Idaho enrolled in dental schools offering a public health program (Missouri School of Dentistry and Oral Health, Columbia University, Case Western Reserve University, and Texas A&M). • New graduates of the University of Minnesota's School of Dentistry have experience working in cooperation with dental therapists.
Explore the role of the Dental Therapist	• Minimal support among stakeholders exists regarding utilization of the dental therapist. • Idaho is, however, in a unique position to observe and potentially collaborate with the Oregon Dental Therapy pilot project and the Willamette Group to learn how this role is utilized in a private practice setting. The Willamette Group has locations in Idaho Falls, Boise, Meridian, and Coeur d'Alene.
Utilize the Dental Hygienist workforce	• HRSA predicts an oversupply of dental hygienists by 2030 and areas in Idaho are already experiencing the same. • This workforce has the capacity to be utilized in innovative ways to reach Idaho's most vulnerable populations.
Support development of the CDHC	• The CDHC is a role dedicated to bringing underserved populations into the oral health system. • While organizational challenges must be overcome to fully introduce this role, support of the CDHC in Idaho is highly favored.

Appendix A: Dentist and Dental Hygienist Survey Insights on the COVID-19 Pandemic

SURVEY INSIGHT: DENTIST AND DENTAL HYGIENIST

- During the COVID-19 stay at home order, dentists averaged seeing only 25.4% of their typical patient volume.
- Dentists have returned to their normal operating hours. The average hours at a primary practice location is 32 per week.
- 13.1% of dentists reported having members of their workforce not return to work in response to the COVID-19 pandemic.
- Dentists and dental hygienists were asked if COVID-19 had changed their plans for retirement:

	Dentists		Dental Hygienists	
	%	Count	%	Count
Yes, I have retired early	0.0%	0	1.2%	5
Yes, I have come out of retirement	0.0%	0	0.2%	1
Yes, I will retire earlier than planned	3.4%	8	3.6%	15
Yes, I have extended my plans to retire	10.6%	25	5.6%	23
No	86.0%	203	89.4%	370

- 67 dental hygienists that took the survey responded that they are not currently working as a dental hygienist in Idaho. Of those, 7 respondents (10.4%) selected the reason for not currently working as "I have not returned to the workforce in response to the COVID-19 pandemic (personal or family health, lack of childcare, reduced employment hours, etc.)".
- Dentists reported the average wait time between when a patient requests a preventive services appointment and when they are seen is typically 18.3 days and currently 21.9 days.
- Dentists reported the average wait time between when a patient requests a dental services appointment and when they are seen is typically 8.7 days and currently 10.3 days.

Appendix B: Medicaid Data Travel Time by County for Adults, 2019

County	Average Travel Time (minutes)	Longest Travel Time (minutes)	Shortest Travel Time (minutes)	% Travelling More than 60 minutes	% Travelling More than 15 minutes
Ada*	22.0	437.5	0.0	2%	65%
Adams	59.7	185.1	0.0	50%	50%
Bannock*	16.5	495.1	0.0	3%	54%
Bear Lake	18.1	150.5	0.0	13%	36%
Benewah	52.5	110.8	0.0	66%	79%
Bingham	22.1	215.4	0.0	5%	50%
Blaine	97.0	214.6	31.9	81%	100%
Boise	76.5	150.3	42.1	53%	100%
Bonner	54.0	513.4	0.0	46%	90%
Bonneville*	29.0	288.3	0.0	5%	77%
Boundary	36.5	160.7	0.0	29%	48%
Butte	68.9	214.3	0.0	58%	84%
Camas	32.2	130.0	0.0	29%	29%
Canyon*	19.1	527.2	0.0	1%	65%
Caribou	50.7	170.9	0.0	28%	87%
Cassia	22.2	538.9	0.0	19%	35%
Clark	73.2	101.9	52.5	86%	100%
Clearwater	85.7	332.2	0.0	83%	88%
Custer	104.4	236.3	0.0	61%	92%
Elmore	23.5	210.5	0.0	20%	39%
Franklin	15.8	203.8	0.0	3%	34%
Fremont	18.4	212.8	0.0	3%	51%
Gem	29.2	294.4	0.0	3%	64%
Gooding	48.5	203.4	0.0	25%	94%
Idaho	129.8	484.6	68.0	100%	100%
Jefferson	20.4	431.0	0.0	4%	63%
Jerome	21.7	160.7	0.0	8%	41%
Kootenai*	25.1	485.8	0.0	6%	71%
Latah*	23.4	341.7	0.0	9%	39%
Lemhi	54.9	443.1	0.0	29%	30%
Lewis	82.7	409.5	47.4	87%	100%
Lincoln	57.7	166.5	29.5	52%	100%
Madison*	10.1	263.2	0.0	2%	31%
Minidoka	36.4	181.7	0.0	13%	83%
Nez Perce*	44.0	514.2	0.0	8%	84%
Oneida	40.4	125.3	0.0	37%	59%
Owyhee	36.7	178.0	0.0	12%	76%
Payette	20.0	300.6	0.0	5%	62%
Power	18.8	82.7	0.0	3%	41%
Shoshone	64.4	463.2	40.5	41%	100%
Teton	36.8	129.7	0.0	39%	57%
Twin Falls*	24.1	187.9	0.0	10%	40%
Valley	167.6	377.6	97.3	100%	100%
Washington	30.0	127.2	0.0	14%	57%

*Urban county

Data Source: MCNA claims data extracted by the Idaho Department of Health and Welfare Division of Medicaid, 2019 and analyzed by WIM Tracking.

Appendix C: Medicaid Data Travel Time by County for Children, 2019

County	Average Travel Time (minutes)	Longest Travel Time (minutes)	Shortest Travel Time (minutes)	% Travelling More than 60 minutes	% Travelling More than 15 minutes
Ada*	17.2	540.1	0.0	1%	59%
Adams	58.9	189.6	0.0	49%	50%
Bannock*	16.6	515.0	0.0	2%	55%
Bear Lake	35.2	203.9	0.0	30%	58%
Benewah	67.2	135.5	0.0	69%	85%
Bingham	22.6	246.6	0.0	4%	54%
Blaine	42.2	208.5	0.0	38%	53%
Boise	71.6	160.2	37.1	52%	100%
Bonner	54.9	499.6	0.0	46%	86%
Bonneville*	24.2	441.8	0.0	1%	69%
Boundary	33.1	411.0	0.0	29%	41%
Butte	62.2	214.3	0.0	63%	78%
Camas	42.8	169.7	0.0	51%	51%
Canyon*	17.0	453.1	0.0	1%	64%
Caribou	54.2	124.0	0.0	56%	82%
Cassia	16.2	248.5	0.0	12%	31%
Clark	64.5	109.8	50.5	58%	100%
Clearwater	94.0	520.1	0.0	78%	83%
Custer	142.3	421.8	0.0	88%	94%
Elmore	21.3	501.7	0.0	9%	39%
Franklin	36.9	152.4	0.0	20%	64%
Fremont	24.8	353.0	0.0	6%	69%
Gem	35.1	260.7	0.0	2%	84%
Gooding	50.7	186.1	0.0	35%	99%
Idaho	125.9	498.8	63.5	100%	100%
Jefferson	24.9	500.0	0.0	3%	75%
Jerome	31.3	530.9	0.0	2%	73%
Kootenai*	25.4	467.8	0.0	6%	73%
Latah*	34.4	538.3	0.0	14%	59%
Lemhi	90.6	443.1	0.0	51%	55%
Lewis	102.9	482.9	49.1	91%	100%
Lincoln	62.1	212.7	25.0	83%	100%
Madison*	7.4	466.9	0.0	1%	23%
Minidoka	38.7	240.4	0.0	8%	92%
Nez Perce*	53.0	348.6	0.0	21%	83%
Oneida	54.3	243.3	0.0	56%	75%
Owyhee	44.0	248.4	0.0	17%	93%
Payette	25.2	368.9	0.0	11%	67%
Power	39.5	525.1	0.0	3%	84%
Shoshone	66.7	474.0	40.5	61%	100%
Teton	61.0	265.6	0.0	62%	76%
Twin Falls*	15.8	443.9	0.0	4%	36%
Valley	173.5	411.5	97.3	100%	100%
Washington	37.3	344.4	0.0	28%	57%

*Urban county

Data Source: MCNA claims data extracted by the Idaho Department of Health and Welfare Division of Medicaid, 2019 and analyzed by WIM Tracking.

Appendix D: Survey Methods

Three survey instruments were developed and administered by WIM Tracking under the oversight of the Idaho Oral Health Program. Prior to the distribution of the surveys, the Idaho State Dental Association, Idaho Dental Hygienists' Association, Idaho Association of Family Physicians, and Idaho Chapter of the American Academy of Pediatrics reviewed and submitted input on the instrument applicable to each organization's membership. A combined 3,825 providers received paper surveys through U.S.P.S mail: 1,097 dentists, 1,631 dental hygienists, and 1,097 family medicine and pediatric physicians. The providers who received the surveys were identified by the Idaho Board of Dentistry or Idaho Board of Medical Examiners as holding an active professional license with an Idaho address. The recipients of the paper survey were offered the option to complete the survey online or to hand write in responses and return the form through the mail. The survey was conducted in February of 2021.

Recipients of the paper survey who belong to a professional association were notified by email of the survey and encouraged to participate from their corresponding association; the Idaho State Dental Association, Idaho Dental Hygienist Association, Idaho Chapter of the American Academy of Pediatrics, and the Idaho Academy of Family Physicians participated in sending correspondence to their members. The response rates are as follows: dentists 23% (N 253), dental hygienists 25% (N 430), and physicians 10% (N 112).

Appendix E: 10 Essential Public Health Services to Promote Oral Health in the U.S. (2021) ASTDD[i]

Assessment	• Assess and monitor the population's oral health status, factors that influence oral health, and community needs and assets.
	• Investigate, diagnose, and address oral health problems and hazards affecting the population.
Policy Development	• Communicate effectively to inform and educate people about oral health and influencing factors and educate/empower them to achieve and maintain optimal oral health.
	• Mobilize community partners to leverage resources and advocate for/act on oral health issues.
	• Develop, champion, and implement policies, laws and systematic plans that support state and community oral heath efforts.
	• Review, educate about, and enforce laws and regulations that promote oral health and ensure safe oral health practices.
Assurance	• Reduce barriers to care and assure access to and use of personal and population-based oral health services.
	• Assure an adequate, culturally competent, and skilled public and private oral health workforce.
	• Improve and innovate dental public health functions through ongoing evaluation, research, and continuous quality improvement.
	• Build and maintain a strong organization infrastructure for dental public health.

[i] ASTDD Core Competencies: 10-essential-public-health-services-and-10-esphs-to-promote-oral-health.pdf (astdd.org)

Appendix F: Public Health District Workforce

Health District	Services	Workforce
District 1: Panhandle	❖ Serving eligible children and pregnant women at school and community-based clinics ❖ Offering screening, fluoride varnish, dental sealants, referrals, and education ❖ Dental Days – Free or low-cost teeth cleaning once per month	2 dental hygienists* 1 assistant
District 2: North Central	❖ Serving children through school-based sealant program and a WIC Early Childhood Caries Prevention Program	1 dental hygienist
District 3: Southwest	❖ School-based sealant program provides sealants, screenings, and fluoride varnish ❖ First Teeth Matter Program and Mini WIC visits offered twice per month ❖ Fluoride Varnish and Sealant Clinics provide preventive oral health services and education	1 dental hygienist
District 4: Central	❖ First Teeth Matter Program, School Sealant Clinics, and WIC Based Fluoride Varnish Clinics offered	2 dental hygienists (part-time)
District 5: Southcentral	❖ School based sealant clinics ❖ Head Start ❖ Early Head Start ❖ Migrant Head Start ❖ Varnish clinics	4 dental hygienists* (part-time)
District 6: Southeastern	❖ School based sealants, fluoride varnish clinic, education, and long-term care facility screenings	1 dental hygienist, 1 dental hygienist*
District 7: Eastern	❖ School based sealants, fluoride varnish clinics, and education offered**	0

*Contracted

**As of May 2021, these services are no longer offered.

Appendix G: Public Health District Summary Data

Public Health District Dentists per 100,000 Population

Health District	Population	Count of Dentists	Dentists per 100,000 Population	Count of Dental Hygienists	Dental Hygienists per 100,000 Population
District 1	240,202	141	58.7	194	80.8
District 2	109,674	49	44.7	88	80.24
District 3	290,788	103	35.4	236	81.2
District 4	515,900	322	62.4	632	122.5
District 5	199,069	106	53.3	177	88.9
District 6	175,077	92	52.6	211	120.5
District 7	223,498	120	53.7	245	109.6

Data Source: American Dental Association Health Policy Institute, 2019

Public Health District Medicaid Population and Provider Participation

Health District	Count of Dentists (HPI)	Medicaid Enrollees Age 21+	Medicaid Enrollees Age 0 - 20	Medicaid Enrollees Total	Dentists Participating in Medicaid*	Population enrolled in Medicaid	Medicaid Population to Dentist Ratio
District 1	141	23,331	24,875	48,206	47	20.1%	1,026:1
District 2	49	9,420	8,563	17,983	20	16.4%	899:1
District 3	103	31,517	44,409	75,926	111	26.1%	684:1
District 4	322	40,137	42,246	82,383	144	16.0%	572:1
District 5	106	18,789	28,833	47,622	62	23.9%	768:1
District 6	92	18,549	23,147	41,696	81	23.8%	514:1
District 7	120	23,103	31,578	54,681	92	24.5%	594:1

Data Source: MCNA Participating Dentist Directory, 2020

*Participating providers listed in the MCNA directory may be included up to nine times in cases where the provider serves clients through multiple locations. The statewide, county, and health district counts were derived by removing duplicates. Providers serving clients through multiple locations are counted once for each county and health district served. Therefore, Column F will not sum to 504 providers in Idaho and 38 in Washington.

Public Health District Medicaid Member Travel Time to Medicaid Dentist

Health District	Average Travel Time Ages 21+	% Travelling More than 60 minutes	Average Travel Time Ages 0 - 20	% Travelling More than 60 minutes
District 1	36.3	21%	35.3	21%
District 2	53.7	31%	63.5	39%
District 3	21.4	3%	20.3	3%
District 4	24.9	5%	20.4	3%
District 5	29.4	15%	27.0	12%
District 6	20.6	6%	24.6	9%
District 7	25.6	7%	26.1	6%

Data Source: Idaho Smiles claims data extracted by the Idaho Department of Health and Welfare Division of Medicaid, 2019 and analyzed by WIM Tracking

Appendix H: Key Informant Perspectives

Key informants offered the following perspectives during Phase 2 of the workforce assessment. These comments, collected during video conference interviews, are the opinions of workforce experts and do not represent the views of the author, Idaho Oral Health Program, or the Health Resources and Services Administration (HRSA).

SUPPLY AND DISTRIBUTION

- Overall, the supply and distribution of dentists in Idaho is good. Given the rural nature of Idaho, there are a few counties that are not heavily inhabited. Therefore, this is technically defined as having a shortage of dentists and a shortage of all types of services.
- Idaho is seeing an influx of dentists between new graduates and established dentists. However, Idaho is maintaining a state of equilibrium.
- Nationally, states are seeing an undersupply of dental hygienists and dental assistants. However, in Idaho we are not hearing from training programs that they are unable to keep up with demand. We may be getting ahead of a potential undersupply in Northern Idaho with the new North Idaho College program. We do need to keep our eye on what is happening nationally so we can continue to stay ahead of any potential workforce issues.
- Public Health District 6 has an abundance of dental hygienists, but not enough full-time positions available. Hygienists must work in multiple offices.
- Northern Idaho has an undersupply of dental hygienists, especially since the pandemic. We have seen hygienists on the verge of retirement decide to retire early. Dentists in Northern Idaho are eagerly waiting for the first graduating class of North Idaho College.

RECRUITMENT AND RETENTION

- It is a challenge for rural areas to recruit experienced dental hygienists and dental assistants. It is even more challenging to find those qualified to work with children. When encouraging candidates to enter training and return to our rural communities, we need to make sure they are qualified candidates.
- Opportunities exist to expand the Medicaid network of specialty dental care providers within Hailey, Lewiston, and Coeur d'Alene. MCNA is performing outreach in these areas. There is a lack of licensed providers to practice within Clark and Lemhi counties. These areas are typically served by neighboring communities.
- Dentists who do not participate in the Idaho Smiles program have cited low reimbursement rates, patient compliance, high missed appointment rates, and benefit limitations as barriers to participation.
- In terms of sheer numbers, Idaho has enough dentists to serve the standard population. However, the dentists don't have enough Medicaid appointment hours available. A dentist may only have the

capacity to add one new Medicaid patient a year. There are also instances in the state where the only dentist in a county does not accept Medicaid.

- Health District 6 has a shortage of dentists to serve adult Medicaid clients. Pregnant moms are unable to find a dentist. We know of one office who will always accept new Medicaid clients, but Idaho needs to incentivize every dentist to take a share of the Medicaid population. We only have five pediatric dentists. Rural residents will have to travel 1 – 2 hours to take a child to the dentist, meaning parents will have to take the full day off work.

CHALLENGES AND OPPORTUNITIES

- Free clinics reach Idaho's most vulnerable populations: seniors with a fixed and low income, refugees who no longer qualify for Medicaid, parents of refugees, undocumented immigrants, and people re-entering society after serving time in prison. Outside of the free clinic, I have not seen options for low-income adults improve in Southern Idaho.
- The more we learn about teledentistry, the more I believe it is highly feasible to have dentists place hygienists in smaller communities and then work through teledentistry. The dental hygienist can do films and cleaning, and the dentist comes in one or more days per month. I have read materials from other states where dental hygienists are sorting patients in rural hospitals and then sending them to the dentist.
- We need to educate dentists on the training extended access endorsement holders have. Permit holders need to be highly skilled and dentists must have confidence that the dental hygienist can perform desired outcomes.
- Accessing seniors in long term care is a huge problem. Utilization of the dental hygienist with an endorsement operating on an independent level does not solve the problem. Even if supervision requirements are waived for endorsement holders, the dental hygienist can't diagnose or set up treatment plans. These residents are high-risk populations who cannot drink water and have an extensive medical history. Medicaid only pays for a cleaning twice per year that is not enough for the amount of decay these patients are experiencing. The solution to accessing seniors in facilities needs to be team-based.
- Dental hygienists are a solution to accessing the elderly in Idaho. To increase access, hygienists could partner with medical providers or receive oral supervision from a dentist.
- A collaborative workgroup among the Idaho State Dental Association, Idaho Dental Hygienists Association, and Idaho Healthcare Association has been working to address the problem in access to care for residents of long-term care facilities. The group includes four dentists and three dental hygienists who hold extended access endorsements. The committee has brought forth a plan to the Idaho Board of Dentistry that outlines the problem, offers a collaborative model of care, and can be put into action as the Dental Care Act is currently defined. The plan also identifies dentists willing to supervise EAP holders and EAP holders interested in serving this population.

- There is great value in this role [CDHC], but it is not currently billable. Most public health sites are funding the role through grants. The goal of this workforce is to bring patients into the active patient count and become a recipient of dental services, therefore it could organically resolve into a sustainable role.
- CDHCs are helping keep patients out of the emergency rooms across the country. If we were to put a CDHC in every health system and health district, this person can triage clients and direct them to an oral healthcare provider.
- Extremely rural states have embraced the role of the Dental Therapist, but Idaho is not extremely rural. Our communities don't need access to care from providers with limited education.
- The role of the dental therapist lowers the standard of care. The need in Idaho is not enough for us to lower the threshold.
- Adding another layer to the workforce [dental therapist] is not going to fix the access to care issues we have in Idaho. The access issues in Idaho are driven by systemic issues of the financial sustainability of the Medicaid system. It still costs the same to deliver care whether it is delivered by a dental hygienist or a dentist; services funded remain the same. In areas where there is a cultural barrier I understand if you would rather seek care from someone from your same background. We see that in all aspects of care. If the issue is culturally competent care, I suggest getting dentists from those communities into dental school and deliver great care up and down the spectrum. The role of the CDHC is a better option for tribes whose greatest issue is funneling members into the oral healthcare system.

Appendix I: About WIM Tracking LLC

WIM Tracking LLC (WIM) is a health workforce information services company. WIM supports organizations in health workforce assessments, surveying, reporting, geospatial visualization, and data collection.

WIM Tracking's mission is to make health workforce data useful and accessible. WIM is the developer of comprehensive data sets that are used to power a variety of online resources. These data sets are created and maintained through a comprehensive tracking routine and managed within a relational database. In many ways, WIM's database functions as a data consortium. This functionality allows the workforce data collection efforts of collaborating organizations to benefit on another.

WIM originated in 2016 serving state agencies and nonprofits throughout Montana. The company has since expanded to serve Alaska, Idaho, Oregon, Utah, Washington, and Wyoming. The health workforce database maintained by WIM includes these seven states.

Jena Smith, Owner and CEO
WIM Tracking LLC
www.wimtracking.com

REFERENCES

[1] I. P. C. O. Alex Prado, "2021 Idaho Primary Care Needs Assessment," 2021. [Online]. Available: https://publicdocuments.dhw.idaho.gov/WebLink/DocView.aspx?id=17889&dbid=0&repo=PUBLIC-DOCUMENTS. [Accessed 11 May 2021].

[2] Idaho Board of Dentistry, "Idaho Division of Financial Management," 2011 - 2021. [Online]. Available: https://dfm.idaho.gov/publications/exec/budget/performance.php. [Accessed 12 8 2021].

[3] J. Smith, "2021 Dentist Masterfile," WIM Tracking LLC, East Helena, 2021.

[4] Idaho Department of Health and Welfare, "Public Health Districts," [Online]. Available: https://healthandwelfare.idaho.gov/health-wellness/community-health/public-health-districts. [Accessed 2 June 2021].

[5] American Dental Association, "Health Policy Institute Dental Eduation Statistics," [Online]. Available: https://www.ada.org/en/science-research/health-policy-institute/dental-statistics/education. [Accessed 26 January 2021].

[6] R. S. L. M. A. V. N. R. Allareddy V, "Hospital-based emergency department visits involving dental conditions: profile and predictors of poor outcomes and resource utilization.," J Am Dent Assoc., 2014.

[7] E. Y. V. M. Nasseh K., "ADA.org: HPI Geographic Access to Care by State," 11 1 2017. [Online]. Available: https://www.ada.org/~/media/ADA/Science%20and%20Research/HPI/AccesstoDentalCare-StateFacts/Idaho-Access-To-Dental-Care.pdf. [Accessed 22 3 2021].

[8] Health Policy Institute, "ADA Health Policy Institute," 2020. [Online]. Available: https://www.ada.org/en/science-research/health-policy-institute/dental-statistics/dental-benefits-and-medicaid. [Accessed 2021].

[9] Idaho Department of Health and Welfare Division of Medicaid, "Idaho Medicaid Management Information System: Current Idaho Medicaid Members.," 2020.

[10] Health Policy Institute, "American Dental Association," 2016. [Online]. Available: https://www.ada.org/~/media/ADA/Science%20and%20Research/HPI/Files/HPIGraphic_0318_1.pdf?la=en. [Accessed 12 January 2021].

[11] Idaho Department of Health and Welfare, "Idaho Medicaid Management Information System Idaho Medicaid Members by Age Group and County as of Nov 25, 2020," 2020.

[12] Health Resources and Services Administration, "HRSA Data Warehouse Idaho Health Center Data," 2019. [Online]. Available: https://data.hrsa.gov/tools/data-reporting/program-data/state/ID. [Accessed 12 April 2021].

[13] Idaho Primary Care Association, "Idaho FQHC Workforce Spreadsheet," 2020.

[14] National Center for Health Workforce Analysis, "Oral Health Workforce Projections 2017-2030," 2017. [Online]. Available: https://bhw.hrsa.gov/sites/default/files/bureau-health-workforce/data-research/oral-health-2017-2030.pdf. [Accessed 20 April 2021].

[15] American Dental Association Health Policy Institute, "ADA News," 2017. [Online]. Available: https://www.ada.org/en/publications/ada-news/2018-archive/august/hpi-average-dentist-retires-later. [Accessed 19 April 2021].

[16] National Center for Workforce Analysis, "Oral Health Workforce Projections, 2017-2030: Dentists and Dental Hygienists," [Online]. Available: https://bhw.hrsa.gov/sites/default/files/bureau-health-workforce/data-research/oral-health-2017-2030.pdf. [Accessed 29 March 2021].

[17] Idaho Legislature, "Idaho Statute. Title 54. Chapter 57. Idaho Telehealth Access Act," [Online]. Available: https://legislature.idaho.gov/statutesrules/idstat/Title54/T54CH57/SECT54-5702/. [Accessed 2 June 2021].

[18] Division of Occupational and Professional Licenses Idaho State Board of Dentistry, "24.31.01 Rules of the Idaho Board of Dentistry," [Online]. Available: https://adminrules.idaho.gov/rules/current/24/243101.pdf. [Accessed June2 2021].

[19] State of Oregon Board of Dentistry, "Dental Practice Act, Administrative Rules and Related Statutes," 1 January 2020. [Online]. Available: https://www.oregon.gov/dentistry/Documents/Dental_Practice_Act_2019_Legislative_Session.pdf. [Accessed 5 April 2021].

[20] Oregon Board of Dentistry, *Personal Communication,* 2021.

[21] State of Colorado, "Code of Colorado Regulations," 30 December 2020. [Online]. Available: https://www.sos.state.co.us/CCR/GenerateRulePdf.do?ruleVersionId=9389&fileName=3%20CCR%20709-1. [Accessed 5 April 2021].

[22] Montana Secretary of State, "24.138.509 DENTAL HYGIENE LIMITED ACCESS PERMIT," 28 December 2019. [Online]. Available: http://www.mtrules.org/gateway/ruleno.asp?RN=24%2E138%2E509. [Accessed 5 April 2021].

[23] Montana Oral Health Program, "2018 Oral Health Workforce Assessment," 2018. [Online]. Available: https://dphhs.mt.gov/Portals/85/ecfsd/documents/OralHealth/2018OHlWorkforceAssessment.pdf. [Accessed 16 April 2021].

[24] Utah Legislature, "S.B. 103 Dental Hygienist Amendments," [Online]. Available: https://le.utah.gov/~2021/bills/static/SB0103.html. [Accessed 23 August 2021].

[25] Commission of Dental Accreditation, "Search for Dental Programs," [Online]. Available: https://www.ada.org/en/coda/find-a-program/search-dental-programs#t=us&sort=%40codastatecitysort%20ascending&f:@programnamesubl_coveofacets_1=[Dental%20Therapy]. [Accessed 14 April 2021].

[26] Wilder Foundation, "Dental Therapy Increases Access in Rural Minnesota," 31 May 2017. [Online]. Available: https://www.wilder.org/articles/dental-therapy-increases-access-rural-minnesota. [Accessed 14 April 2021].

[27] Oregon Dental Authority, "Dental Pilot Project #300," [Online]. Available: https://www.oregon.gov/oha/PH/PREVENTIONWELLNESS/ORALHEALTH/DENTALPILOTPROJECTS/Pages/Dental-Pilot-Project-300.aspx. [Accessed 14 April 2021].