2016 NEEDS AND ASSETS REPORT

FIRST THINGS FIRST

White Mountain Apache Tribe Region

White Mountain Apache Tribe Regional Partnership Council

2016

Needs and Assets Report

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Regional Description

The boundaries of the First Things First White Mountain Apache Tribe Region are the same as the White Mountain Apache Reservation (sometimes called Fort Apache). The region covers more than 2,500 square miles in Apache, Gila, and Navajo counties. The larger communities in the region are Whiteriver, Cibecue, North Fork, and Canyon Day.

Data Sources

The data contained in this report come from a variety of sources. Some data were provided to First Things First by state agencies, such as the Arizona Department of Economic Security (DES), the Arizona Department of Education (ADE), and the Arizona Department of Health Services (ADHS). Other data were obtained from publically available sources, including the 2010 U.S. Census, the American Community Survey (ACS), and the Arizona Department of Administration (ADOA). In addition, regional data from the 2014 First Things First Parent and Caregiver Survey are included.

Where available, tables and figures in this report include data for all Arizona reservations combined in addition to data for the state of Arizona to allow for appropriate comparisons between the region and other relevant geographies.

Population Characteristics

According to the U.S. Census, the White Mountain Apache Tribe Region had a population of 13,409 in 2010, of whom 2,003 (15%) were children ages birth to 5 years. Thirty-eight percent of households in the region included a young child.

Over half (54%) of the households with young children (birth to 5) in the region are single-parent households (43% single-female households and 11% single-male households). The proportion of young children living in a grandparent's household in the region (41%) is substantially higher than the percentage statewide (14%), but similar to the percentage in all Arizona reservations combined (40%). Of those children (0-17) living in a grandparent's household, 81 percent live with a grandparent who is financially responsible for them, but only nine percent of the children have no parent present in the home.

The vast majority (97%) of young children (ages 0-4) in the White Mountain Apache Tribe Region are American Indian. This proportion is slightly higher than that of all Arizona reservations combined (92%), and differs greatly from the statewide proportion of six percent. The race and ethnicity breakdown among adults in the region is similar to that of young children, with most residents identifying as American Indian (94%). A Native North American language is spoken in just over half of the households in the White Mountain Apache Tribe Region (52%), a much higher proportion than households statewide (2%). This proportion is similar to the rate in all Arizona reservations combined (51%).

Economic Circumstances

Poverty rates for the total (of all ages) population and for young children in the White Mountain Apache Tribe Region are higher than those across all Arizona reservations combined and the state as a whole. For the total population, 47 percent of people in the region live in poverty, compared to 42 percent across all Arizona reservations and 18 percent statewide. In all these geographies, young children are consistently more likely to be in poverty than members of the total population. Almost two-thirds (63%) of the children in the region live in poverty, a higher proportion than that in all Arizona reservations combined and the state (56% and 28%, respectively). In addition to the families whose incomes fall below the federal poverty level, a substantial proportion of households in the region, and across all Arizona reservations are low income (i.e., near but not below the federal poverty level [FPL]). Eighty percent of families with children aged four and under are living below 185 percent of the FPL in the region (i.e., earned less than $3,677[1] a month for a family of four), compared to 77 percent in all Arizona reservations combined, and 48 percent across the state. The median family income in the region ($30,938) is almost than half of the median family income in the state of Arizona ($58,897).

The average unemployment rate in the region for the 2009-2013 period was 40.8 percent, substantially higher that the estimated 25 percent across all Arizona reservations combined and approximately four times the average state rate of 10.4 percent.

Given the high poverty levels in the region, safety net programs such as Temporary Assistance for Needy Families (TANF), the Supplemental Nutrition Assistance Program (SNAP) and the school-based free or reduced-price lunch program, are used by many families. In January of 2014, an estimated 19 percent of children in the region received TANF benefits. The number of young children in the region receiving SNAP benefits in 2012 and 2013 (2,044 and 2,026 respectively) represented more than 100 percent of the children reported to be living in the region according to the 2010 U.S. Census. Although the number young children who were SNAP recipients decreased slightly in 2014, it still represented almost all of the young children in the region (99%). The vast majority (86%) of children attending Whiteriver Unified School District, the only Arizona Department of Education district with boundaries wholly contained within in the region, are eligible for free or reduced lunch.

Educational Indicators

Children from the White Mountain Apache Tribe Region attend schools in a number of Arizona Department of Education (ADE) districts and Bureau of Indian Education schools. Data are provided for the one ADE district wholly contained within tribal lands, Whiteriver Unified School District. Students "pass" Arizona's Instrument to Measure Standards (AIMS) if they meet or exceed the standard. In the White Mountain Apache Tribe Region, 40 percent of third grade students passed the AIMS Math test and just over half (52%) passed the AIMS reading

[1] Based on 2014 FPL Guidelines, see http://aspe.hhs.gov/2014-poverty-guidelines

test. Eighteen percent of third graders in the region scored "falls far below" in math; five percent scored "falls far below" on the reading test, putting them at risk of grade retention.

Early Learning

Center-based care is provided in the region by Chaghache Day Care and Alchesay Beginnings Child Development Center (also known as ABC Day Care).

Chaghache Day Care, located in Whiteriver, operates Monday to Friday from 6:45 am to 5:30 pm and it has a total licensed capacity to serve 115 children from 6 months to 12 years of age. Of those, 85 are children under the age of six. Chaghache Day Care has four classrooms for young children with the following typical distribution: 10 infants (6-22 months), 22 toddlers (22-36 months), 25 preschoolers (ages 3 and 4) and 25 children in the pre-k classroom (ages 4 and 5). Chaghache Day Care has a waiting list of children in all age groups. Staff from the center indicated that parents must go through an established process of staying in touch with the center continuously so that they are able to remain in the waiting list after completing an application. A high proportion of the parents who submit an application end up dropping out of the waiting list because of failure to meet the requirements of this program.

In the past, a home-based care provider program was also administered by Chaghache Day Care. Since 2011, however, no home-based providers have been available in the region. Key informants indicated that this may be due to new safety regulations set in place by the Arizona Department of Economic Security that may have had an impact on the providers' ability to continue participating in the program. Currently, there are no licensed home-based providers available in the region.

Alchesay Beginnings Child Development Center (or ABC Day Care) is the other center-based child care provider in the region. It operates Monday to Friday from 7:00 am to 5:30 pm and it serves children ages 0 to 10. As of May 2014, there were 88 children ages 0-5 enrolled in the program. Only four children in the same age range were on the waiting list (the program has a total capacity to serve 102 children under the age of six, but is currently understaffed and thus serving a smaller number of children). ABC Day Care has four classrooms with a total of four teachers and two teacher's assistants in the morning and two in the afternoon.

White Mountain Apache Tribe Head Start

Head Start is a comprehensive early childhood education program for pre-school aged children whose families meet income eligibility criteria. The program addresses a wide range of early childhood needs such as education and child development, special education, health services, nutrition, and parent and family development. The White Mountain Apache Tribe Region is served by the White Mountain Apache Tribe Head Start, which provides services to children in the region who are four years old in Whiteriver, Cibecue and McNary. In 2012-2013 the program enrolled 252 children.

John F. Kennedy Day School FACE Program

Family and Child Education (FACE) is an early childhood and parental involvement program for American Indian families in schools sponsored by the Office of Indian Education Programs,

Bureau of Indian Affairs. The goals of the FACE program include increasing family literacy; strengthening family-school-community connections; promoting the early identification and provision of services to children with special needs; and promoting the preservation of the unique cultural and linguistic diversity of the communities served by the program. In the White Mountain Apache Tribe Region, a FACE Program has been available at John F. Kennedy Day School in Cedar Creek since school year 2005-2006.

FACE has both a center-based and a home-based component. The home-based component includes personal visits and screenings by parent educators and is aimed at families with children from birth to age three, although families can join the program from pregnancy on. As of December of 2013, the FACE Program at John F. Kennedy Day School had 20 families enrolled in the home-based component.

The FACE center-based preschool component includes an early childhood education program for children aged three to five, adult education for the children's parents, and Parent and Child Time (PACT). The FACE preschool program at John F. Kennedy Day School serves about 12 children ages three to five.

The adult education component can be tailored to each participant's needs: some may work on getting their GED, or if they are looking for a job they can work on their resume, job and interview skills, etc.

The program goes from 8 am to 2 pm Monday to Thursday. Breakfast and lunch is served to all participants and transportation to and from the program is also available. As of December of 2013, most of the program participants were transported every day. Although the program is open to all families in the region, most participants reside in the communities of Whiteriver and Cibecue.

Another important characteristic of FACE programs is their emphasis on traditional Native culture and language preservation. Children at the John F. Kennedy Day School FACE program receive lessons on Apache language from the same teacher that imparts the Apache courses at the elementary school (where the FACE program is based).

Regarding families with children with special needs, in the White Mountain Apache Tribe Region, the Division of Developmental Disabilities (DDD) paid about 90 visits per year to children aged 0-2 years in 2013 and 2014 (91 and 95, respectively). In those same years, no children in the 3-5 age range were served in the region by DDD.

Parent perceptions of their children's developmental needs

The First Things First Family and Community Survey is a phone-based survey designed to measure many critical areas of parents' knowledge, skills, and behaviors related to their young children. In 2014, First Things First conducted a modified version of the Family and Community survey in six tribal regions including the White Mountain Apache Tribe Region, known as the 2014 First Things First Parent and Caregiver Survey. This survey, conducted face-to-face with parents and caregivers of young children living in the region, included a sub-set of items from the First Things First Family and Community Survey, as well as additional questions that

explored health needs in tribal communities. A total of 278 parents and other caregivers responded to the survey at a variety of locations across the White Mountain Apache Tribe Region.

The 2014 First Things First Parent and Caregiver Survey included a set of questions aimed at gauging parents' and caregivers' concerns about their children's development. Respondents were asked to indicate how concerned they were about several developmental events and stages in eight key areas. The three areas which revealed the greatest degree of concern for respondents were "How well your child behaves" (47% worried), "How well your child talks and makes speech sounds (37%), and "How well your child gets along with others" (36% worried).

Across the eight questions, 20 percent of the respondents reported being "worried a lot" about one or more, and 31 percent were "not worried at all" about all eight. (The remaining 49 percent were "worried a little" about at least one of the eight).

Child Health

In 2013, there were 288 babies born to women residing in the White Mountain Apache Tribe Region. About one third (33%-35%) of pregnant women in the region had no prenatal care during the first trimester. This rate is much higher than the rate across the state as a whole (19%), and does not meet the Healthy People 2020 objective of fewer than 22.1 percent without care. Fourteen percent of pregnant women in the region had fewer than five prenatal care visits, compared to five percent in the state. A higher proportion of babies born in 2013 in the region (13%) were premature (less than 37 weeks) compared to the state (9%). Nine percent of infants had low birth weight (2.5 kg or less), a higher rate than the statewide rate of seven percent, and over the Healthy People 2020 objective of fewer than 7.8 percent.

The majority of births in the region (94%) were paid for by a public payor (i.e., either Arizona Health Care Cost Containment System (AHCCCS, Arizona's Medicaid) or the Indian Health Service), while just over half (55%) of births in the state fall into that category. A similar proportion of babies in the region and the state were placed in neonatal intensive care, (4% and 5%, respectively).

According to the American Community Survey (ACS) data, an estimated thirteen percent of the young children in the White Mountain Apache Tribe Region are uninsured. This rate is lower than that of all Arizona reservations combined (20%) but slightly higher than the statewide rate (10%). The uninsured rates for the total (of all ages) population in the region and across all Arizona reservations combined are similar (25% and 27%, respectively); both rates, however, are higher than the state rate of 17 percent.

While immunization rates vary by vaccine, for each of the three key vaccines tracked, over 95 percent of children in school-based preschool in the school year 2014-2015 were immunized; these rates were higher than those of the state. The Healthy People 2020 objective for vaccination coverage for children ages 19-35 months for the DTAP, polio and MMR vaccines is 90 percent, so children in the reporting schools meet the objective. However, because of immunization requirements, the rates of immunization for children in child care may be higher than immunization rates for children not in child care, so the rates across all children in the

region may not be as high. Similarly, over 95 percent of children enrolled in kindergarten at Cradleboard Elementary were vaccinated. The rates of religious (0%) and personal belief (0.3%) exemptions from immunizations in the preschools and school for which data were available were quite low (and lower than the state overall).

A set of questions on the 2014 First Things First Parent and Caregiver Survey asked participants whether various health care services that their child had required in the past year were delayed or never received. Half (50%) of the survey participants in the region reported that their child (or children) had not received timely health care at least once during the previous year. Most frequently, it was dental care (34%), medical care (25%), or vision care (21%) that was delayed or not received.

Family Support and Literacy

The 2014 First Things First Parent and Caregiver Survey collected data about parent and caregiver knowledge of children's early development and their involvement in a variety of behaviors known to contribute positively to healthy development, including two items about home literacy events.

Eighteen percent of the respondents in the White Mountain Apache Tribe Region reported that someone in the home read to their child six or seven days in the week prior to the survey. More parents and caregivers (43%) reported that the child was not read to, or only once or twice during the week. In comparison, telling stories or singing songs was somewhat more frequent. In more than two-thirds of the homes (68%), children are hearing stories or songs three or more days per week (Figure 16). The average respondent reported reading stories 3.1 days per week, and singing songs or telling stories 3.7 days per week.

The 2014 First Things First Parent and Caregiver Survey also included an item aimed at eliciting information about parents' and caregivers' awareness of their influence on a child's brain development.

More than half (52%) of the survey participants in the region recognized that they could influence brain development prenatally or right from birth. Still, a sizeable proportion (12%) responded that a parent's influence would not begin until after the infant was 7 months old (see Figure 17).

Raising young children in the region: positive aspects and challenges

Parents and caregivers of young children who participated in the 2014 First Things First Parent and Caregiver Survey were asked what they liked best about raising young children in their community.

The majority responded that being close to family and enjoying the support of relatives in extended families is one of the things they appreciate most. "I enjoy the sense of family and the support they provide," one of the respondents said. And another stated: "There's family everywhere, someone to always help you."

The opportunity for children to be in touch with their Native culture and tradition was another important theme among survey respondents; as one of them pointed out, “Being around the culture and being able to do stuff that my father was able to do with me.”

The natural environment in the community that provides children with an open space to run and explore was another aspect of raising children in the region mentioned by a few parents.

Although parents reported that their extended families and the local traditional culture are important resources for them when it comes to raising children, they also indicated that one of the hardest things about being a parent in the community is the lack of resources that often comes with living in rural isolated communities. They also pointed out a lack of facilities and activities for young children and their families.

In addition, parents and caregivers indicated that one of the main challenges about raising children in the region is the high prevalence of alcohol and substance use in the community.

Most important things that would improve young children’s lives

Parents and caregivers were also asked to consider what would improve the lives of young children (ages birth to five) and their families in the region. In response to this question, most parents and caregivers said that increasing safety, primarily by reducing the use of drugs and alcohol, would be a priority for them. Parents also suggested that creating better employment opportunities would make a significant difference in the lives of families with young children. In the words of one respondent, “Create more jobs so people can at least have a stable household.” Additionally, survey respondents pointed out that more parent involvement in school and community events would be important. Parents and caregivers also emphasized the need for additional parent education opportunities, including parenting classes that focus on positive discipline. As one respondent summarized it: “More parent training, since most parents are very young. More job skills training for parents. More training on drug and alcohol abuse in the community.”

Parents and caregivers also suggested having more community events that can bring families together.

Other specific community resources that were mentioned by survey participants included:

- A library
- A children’s learning center
- A children’s gym
- A safe park
- A juvenile detention center
- Additional Head Start and preschool openings or child care

Communication, Public Information and Awareness and Systems Coordination among Early Childhood Programs and Services

Key informants interviewed for this report agreed that the wide range of services and programs available to families with young children in the region represent an asset in the community. Parents appear to be increasingly aware of the importance of early childhood education and of a child's early years in general. Nevertheless, key informants also agreed that many parents in the community still do not know about the services available to them and their young children, particularly for those with special needs. In addition, there is still some stigma associated with children being identified in need of help because of developmental delay. Continued parent education and outreach may be necessary so parents feel more comfortable accessing the resources available to them.

Key informants also emphasized the importance of service providers establishing a good relationship of trust among community members in order for families to utilize existing programs. This may be challenging when services are being provided from limited grant funding and are no longer available after the grant period is finalized.

Data from key informants in the region indicate that the level of coordination among the different programs serving young children and their families tends to vary depending on the specific area of service. Some programs appear to have a closer working relationship than others. For instance, key informants pointed out that services for families in crisis including Apache Behavioral Health, Tribal Social Services Department, Indian Health Service Whiteriver Hospital collaborate well with each other.

Coordination of services also exist among several agencies that provide to children with special needs such as Whiteriver Unified District, White Mountain Apache Tribe Child Find and Head Start. Key informants offered examples of this sort of inter-agency collaboration can be mutually beneficial: by being present at the Head Start screenings, WIC staff can help Head Start in its mission to increase healthy weight and physical activity among participating families; WIC staff can, in turn, be in touch with families that were formerly WIC clients but dropped out, inviting them to return to the program.

Some key informants indicated that two or three years ago there were regular community meetings for providers of services to children birth to five; this enabled them to discuss the different resources available and network. These meetings seemed to have been useful, but have not taken place in some time. Key informants concurred that it would be helpful for programs serving young children to have an opportunity to meet and network regularly so they could be aware of what other services are available and establish mutual referral systems.

In addition, awareness of the role that the First Things First White Mountain Apache Tribe Regional Partnership Council plays in the early childhood system in the region could be improved. Some key informants pointed out that local programs or agencies think positively and benefit from First Things First-funded services but are unaware of the fact that funding for these services is provided by the White Mountain Apache Tribe Regional Partnership Council.

Others indicated that although they had known about First Things First activities in the region in the past, they were unsure of what programs were being offered more recently.

Key informants emphasized the importance of enhanced coordination and collaboration among services providers in the region in order to avoid duplication of services and to make sure that families are not 'falling through the cracks.'

The White Mountain Apache Tribe Region

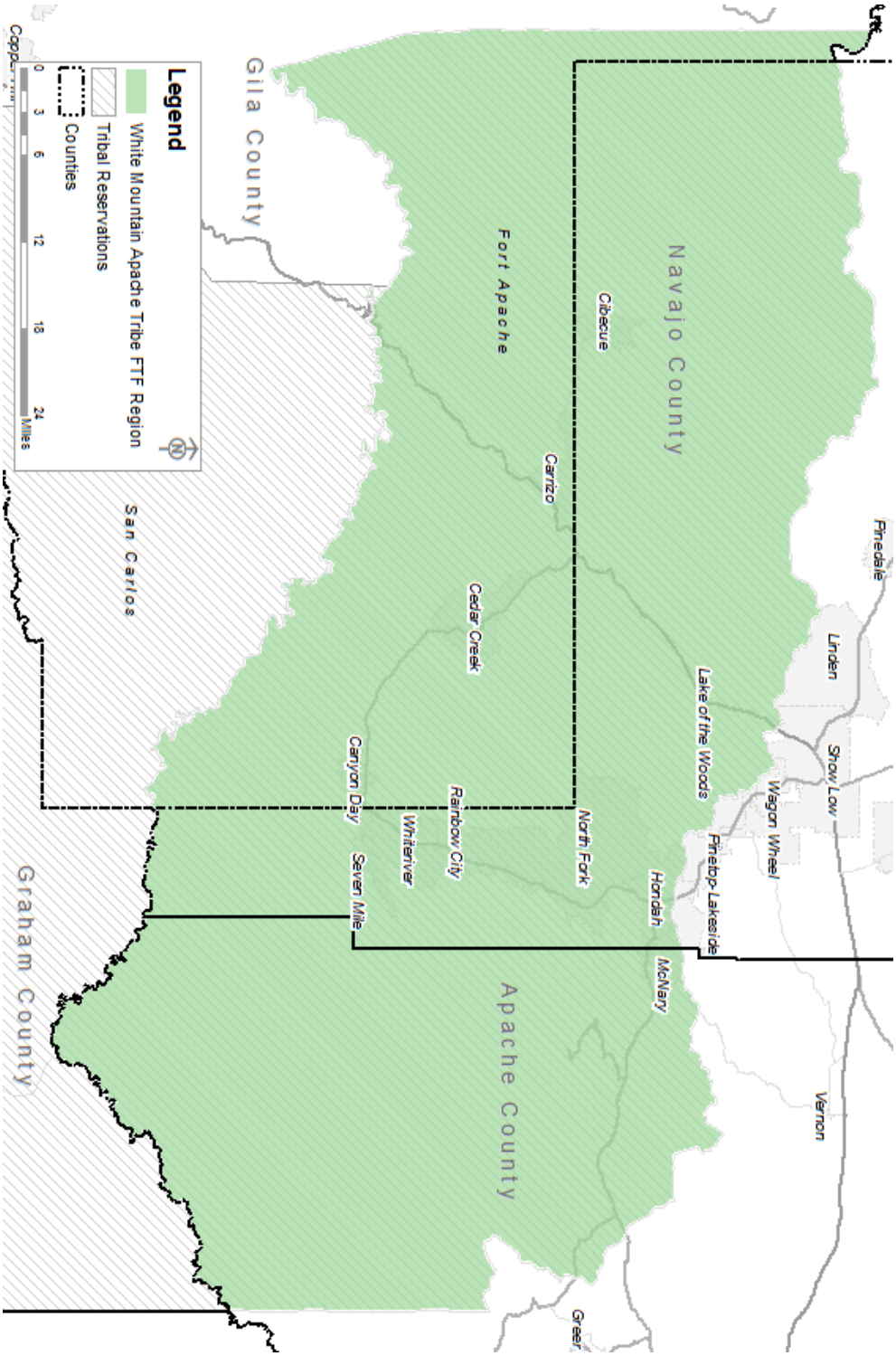
Regional Description

When First Things First was established by the passage of Proposition 203 in November 2006, the government-to-government relationship with federally-recognized tribes was acknowledged. Each tribe with tribal lands located in Arizona was given the opportunity to participate within a First Things First designated region or elect to be designated as a separate region. The White Mountain Apache Tribe was one of 10 tribes that chose to be designated as its own region. This decision must be ratified every two years, and the White Mountain Apache Tribe has opted to continue to be designated as its own region.

The boundaries of the First Things First White Mountain Apache Tribe Region are the same as the White Mountain Apache Reservation (sometimes called Fort Apache). The region covers more than 2,500 square miles in Apache, Gila, and Navajo counties. The larger communities in the region are Whiteriver, Cibecue, North Fork, and Canyon Day.

Figure 1 shows the geographical area covered by the White Mountain Apache Tribe Region. Additional information available at the end of this report includes a map of the region by zip code in Appendix 1, a table listing zip codes for the region in Appendix 2, and a map of school districts in the region in Appendix 3.

Figure 1. The White Mountain Apache Tribe Region



Source: U.S. Census Bureau (2010). TIGER/Line Shapefiles: TabBlocks, Streets, Counties, American Indian/Alaska Native Homelands. Retrieved from http://www.census.gov/geo/maps-data/data/tiger-line.html

Data Sources

The data contained in this report come from a variety of sources. Some data were provided to First Things First by state agencies, such as the Arizona Department of Economic Security (DES), the Arizona Department of Education (ADE), and the Arizona Department of Health Services (ADHS). Other data were obtained from publically available sources, including the 2010 U.S. Census, the American Community Survey (ACS), and the Arizona Department of Administration (ADOA). In addition, regional data from the 2014 First Things First Parent and Caregiver Survey were included.

The U.S. Census[2] is an enumeration of the population of the United States. It is conducted every ten years, and includes information about housing, race, and ethnicity. The 2010 U.S. Census data are available by census block. There are about 115,000 inhabited blocks in Arizona, with an average population of 56 people each. The Census data for the White Mountain Apache Tribe Region presented in this report were calculated by identifying each block in the region, and aggregating the data over all of those blocks.

The American Community Survey[3] is a survey conducted by the U.S. Census Bureau each month by mail, telephone, and face-to-face interviews. It covers many different topics, including income, language, education, employment, and housing. The ACS data are available by census tract. Arizona is divided into about 1,500 census tracts, with an average of about 4,200 people in each. The ACS data for the White Mountain Apache Tribe Region were calculated by aggregating over the census tracts which are wholly or partially contained in the region. The data from partial census tracts were apportioned according to the percentage of the 2010 Census population in that tract living inside the White Mountain Apache Tribe Region. The most recent and most reliable ACS data are averaged over the past five years; those are the data included in this report. They are based on surveys conducted from 2009 to 2013. In general, the reliability of ACS estimates is greater for more populated areas. Statewide estimates, for example, are more reliable than county-level estimates.

To protect the confidentiality of program participants, the First Things First Data Dissemination and Suppression Guidelines preclude our reporting social service and early education programming data if the count is less than ten, and preclude our reporting data related to health or developmental delay if the count is less than twenty-five. In addition, some data received from state agencies may be suppressed according to their own guidelines. The

[2] U.S. Census Bureau. (May, 2000). *Factfinder for the Nation*. Retrieved from http://www.census.gov/history/pdf/cff4.pdf

[3] U.S. Census Bureau. (April, 2013). *American Community Survey Information Guide*. Retrieved from http://www.census.gov/content/dam/Census/programs-surveys/acs/about/ACS_Information_Guide.pdf

Arizona Department of Health Services, for example, does not report counts less than six. Throughout this report, information which is not available because of suppression guidelines will be indicated by entries of "N/A" in the data tables.

A note on the Census and American Community Survey data included in this report:

In this report we use two main sources of data to describe the demographic and socio-economic characteristics of families and children in the region: U.S. Census 2010 and the American Community Survey. These data sources are important for the unique information they are able to provide about children and families across the United States, but both of them have acknowledged limitations for their use on tribal lands. Although the Census Bureau asserted that the 2010 Census count was quite accurate in general, they estimate that "American Indians and Alaska Natives living on reservations were undercounted by 4.9 percent."[4] In the past, the decennial census was the only accessible source of wide-area demographic information. Starting in 2005, the Census Bureau replaced the "long form" questionnaire that was used to gather socio-economic data with the American Community Survey (ACS). As noted above, the ACS is an ongoing survey that is conducted by distributing questionnaires to a sample of households every month of every year. Annual results from the ACS are available but they are aggregated over five years for smaller communities, to try to correct for the increased chance of sampling errors due to the smaller samples used.

According to the State of Indian Country Arizona Report[5] this has brought up new challenges when using and interpreting ACS data from tribal communities and American Indians in general. There is no major outreach effort to familiarize the population with the survey (as it is the case with the decennial census), and the small sample size of the ACS makes it more likely that the survey may not accurately represent the characteristics of the population on a reservation. The State of Indian Country Arizona Report indicates that at the National level, in 2010 the ACS failed to account for 14% of the American Indian/Alaska Native (alone, not in combination with other races) population that was actually counted in the 2010 decennial census. In Arizona the undercount was smaller (4%), but according to the State of Indian Country Arizona report, ACS may be particularly unreliable for the smaller reservations in the state.

While recognizing that estimates provided by ACS data may not be fully reliable, we have elected to include them in this report because they still are the most comprehensive publically-

[4] U.S. Census Bureau. (May, 2012). *Estimates of Undercount and Overcount in the 2010 Census.* www.census.gov/newsroom/releases/archives/2010_census/cb12-95.html

[5] Inter Tribal Council of Arizona, Inc., ASU Office of the President on American Indian Initiatives, ASU Office of Public Affairs (2013). *The State of Indian Country Arizona. Volume 1.* Retrieved from http://outreach.asu.edu/sites/default/files/SICAZ_report_20130828.pdf

available data that can help begin to describe the families that First Things First serve. Considering the important planning, funding and policy decisions that are made in tribal communities based on these data, however, the State of Indian Country report recommend a concerted tribal-federal government effort to develop the tribes' capacity to gather relevant information on their populations. This information could be based on the numerous records that tribes currently keep on the services provided to their members (records that various systems must report to the federal agencies providing funding but that are not currently organized in a systematic way) and on data kept by tribal enrollment offices.

A current initiative that aims at addressing some of these challenges has been started by the American Indian Policy Institute, the Center for Population Dynamics and the American Indian Studies Department at Arizona State University. The Tribal Indicators Project[6] begun at the request of tribal leaders interested in the development of tools that can help them gather and utilize meaningful and accurate data for governmental decision-making. An important part of this effort is the analysis of Census and ACS data in collaboration with tribal stakeholders. We hope that in the future these more reliable and tribally-relevant data will become available for use in these community assessments.

[6] http://aipi.clas.asu.edu/Tribal_Indicators

Population Characteristics

Why it Matters

The characteristics of families living within a region can influence the availability of resources and supports for those families.[7] Population characteristics and trends in family composition are often considered by policymakers when making decisions about the type and location of services to be provided within a region such as schools, health care facilities and services, and social services and programs. As a result of these decisions, families with young children may have very different experiences within and across regions regarding access to employment, food resources, schools, health care facilities and providers, and social services. It is important, therefore, that decision-makers understand who their constituents are so that they can prioritize policies that address the needs of diverse families with young children. Accurate and up-to-date information about population characteristics such as the number of children and families in a geographic region, their ethnic composition, living arrangements and languages spoken can support the development or continuation of resources that are linguistically, culturally, and geographically most appropriate for a given locale.

In addition to being affected by community resources, the likelihood of a child reaching his or her optimal development can also be affected by the supports and resources available within the family.[8,9] The availability of family resources can be influenced by the characteristics of the family structure, such as who resides in a household and who is responsible for a child's care.

Children living with and being cared for by relatives or caregivers other than parents, is increasingly common.[10] Extended, multigenerational families and kinship care are more typical in Native communities.[11,12] The strengths associated with this open family structure -mutual

[7] U.S. Department of Health and Human Services. Health Resources and Services Administration, Maternal and Child Health Bureau. (2014). *Child Health USA 2014. Population Characteristics*. Retrieved from: http://mchb.hrsa.gov/chusa14/population-characteristics.html

[8] Center for American Progress. (2015). V*aluing All Our Families. Progressive Policies that Strengthen Family Commitments and Reduce Family Disparities*. Retrieved from: https://cdn.americanprogress.org/wp-content/uploads/2015/01/FamilyStructure-report.pdf

[9] Kidsdata.org. (n.d.). *Summary: Family Structure*. Retrieved from: http://www.kidsdata.org/topic/8/family-structure/summary

[10] U.S. Department of Health and Human Services. (2012). *ASPE Report. Children in Nonparental Care: A Review of the Literature and Analysis of Data Gaps*. Retrieved from http://aspe.hhs.gov/basic-report/children-nonparental-care-review-literature-and-analysis-data-gaps

[11] Harrison, A. O., Wilson, M. N., Pine, C. J., Chan, S. Q., & Buriel, R. (1990). Family ecologies of ethnic minority children. *Child Development, 61*(2), 347-362.

[12] Red Horse, J. (1997). Traditional American Indian family systems. *Families, Systems, & Health, 15*(3), 243.

help and respect- can provide members of these families with a network of support which can be very valuable when dealing with socio-economic hardships.[13] Grandparents are often central to these mutigenerational households. However, when caring for children not because of choice, but because parents become unable to provide care due to the parent's death, physical or mental illness, substance abuse, incarceration, unemployment or underemployment or because of domestic violence or child neglect in the family, grandparents may be in need of specialized assistance and resources to support their grandchildren.[14]

Understanding language use in the region can also contribute to being better able to serve the needs of families with young children. Language preservation and revitalization have been recognized by the U.S. Department of Health & Human Services as keys to strengthening culture in Native communities and to encouraging communities to move toward social unity and self-sufficiency.[15] Special consideration should be given to respecting and supporting the numerous Native languages spoken by families, particularly in tribal communities.

What the Data Tell Us

According to the U.S. Census, the White Mountain Apache Tribe Region had a population of 13,409 in 2010, of whom 2,003 (15%) were children ages birth to 5 years (see Table 1). Thirty-eight percent of households in the region included a young child.

Over half (54%) of the households with young children (birth to 5) in the region are single-parent households (43% single-female households and 11% single-male households) (Figure 3). The proportion of young children living in a grandparent's household in the region (41%) is substantially higher than the percentage statewide (14%), but similar to the percentage in all Arizona reservations combined (40%) (see Table 4). Of those children (0-17) living in a grandparent's household, 81 percent live with a grandparent who is financially responsible for them, but only nine percent of the children have no parent present in the home (see Table 5).

The vast majority (97%) of young children (ages 0-4) in the White Mountain Apache Tribe Region are American Indian. This proportion is slightly higher than that of all Arizona reservations combined (92%), and differs greatly from the statewide proportion of six percent

[13] Hoffman, F. (Ed.). (1981). *The American Indian Family: Strengths and Stresses*. Isleta, NM: American Indian Social Research and Development Associates.

[14] Population Reference Bureau. (2012). *More U.S. Children Raised by Grandparents*. Retrieved from http://www.prb.org/Publications/Articles/2012/US-children-grandparents.aspx

[15] U.S. Department of Health & Human Services, Administration for Native Americans. (n.d.). *Native Languages* http://www.acf.hhs.gov/programs/ana/programs/native-language-preservation-maintenance

(see Table 6). The race and ethnicity breakdown among adults in the region is similar to that of young children, with most residents identifying as American Indian (94%). In the state, however, only four percent of adults identified as American Indian (Table 7). A Native North American language is spoken by just over half of people aged 5 years and older in the White Mountain Apache Tribe Region (52%), a much higher proportion than statewide (2%). This proportion is similar to the rate in all Arizona reservations combined (51%) (see Figure 4).

Population and Households

Table 1. Population and households, 2010

	TOTAL POPULATION	POPULATION (AGES 0-5)	TOTAL NUMBER OF HOUSEHOLDS	HOUSEHOLDS WITH ONE OR MORE CHILDREN (AGES 0-5)	
White Mountain Apache Tribe Region	**13,409**	**2,003**	**3,301**	**1,267**	**38%**
All Arizona Reservations	178,131	20,511	50,140	13,115	26%
Arizona	6,392,017	546,609	2,380,990	384,441	16%

Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Tables P1, P14, P20.
Retrieved from: http://factfinder.census.gov

Table 2. Population of children by single year-of-age, 2010

	AGES 0-5	AGE 0	AGE 1	AGE 2	AGE 3	AGE 4	AGE 5
White Mountain Apache Tribe Region	**2,003**	**333**	**344**	**369**	**326**	**321**	**310**
All Arizona Reservations	20,511	3,390	3,347	3,443	3,451	3,430	3,450
Arizona	546,609	87,557	89,746	93,216	93,880	91,316	90,894

Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Table P14.
Retrieved from: http://factfinder.census.gov
Note: Children age 0 were born between April 2009 and March 2010; children age 5 were born between April 2004 and March 2005.

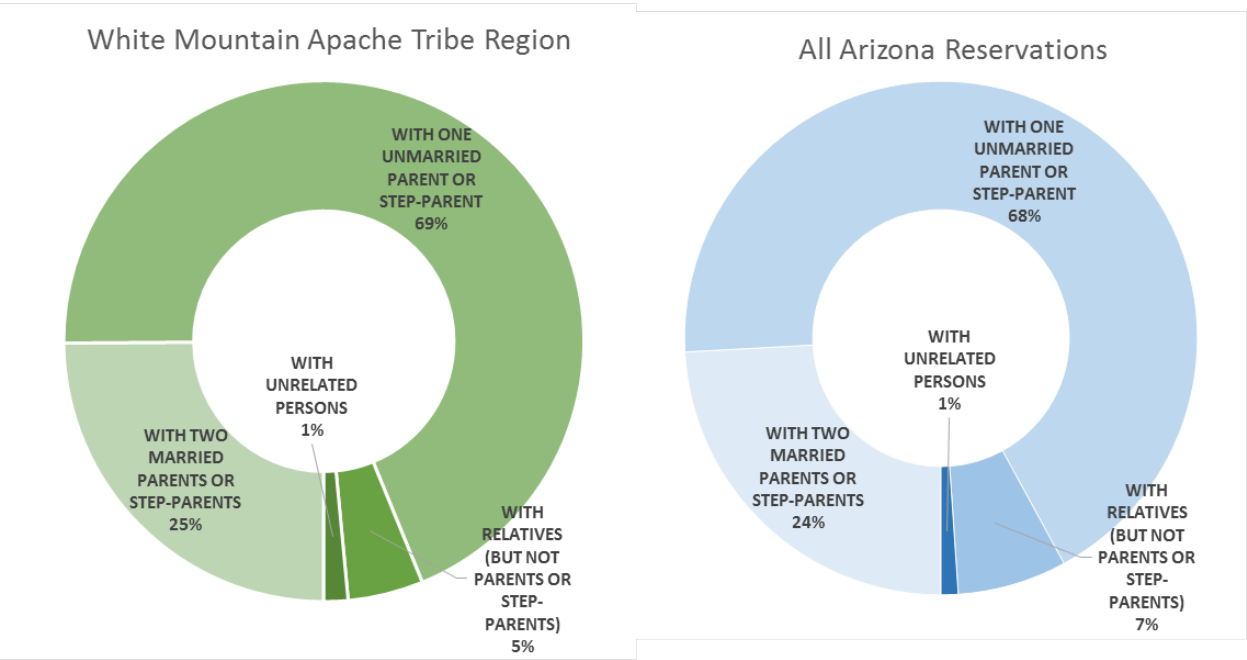
Table 3. State and county population projections, 2015 & 2020

	POPULATION (AGES 0-5) IN 2010 CENSUS	PROJECTED POPULATION (AGES 0-5) IN 2015	PROJECTED POPULATION (AGES 0-5) IN 2020	PROJECTED CHANGE FROM 2010 TO 2020
Arizona	546,609	537,200	610,400	12%

Sources: Arizona Dept. of Administration, Employment and Population Statistics, "2012-2050 State and county population projections" & 2010 U.S. Census
Note: Regional data were not available for this indicator.

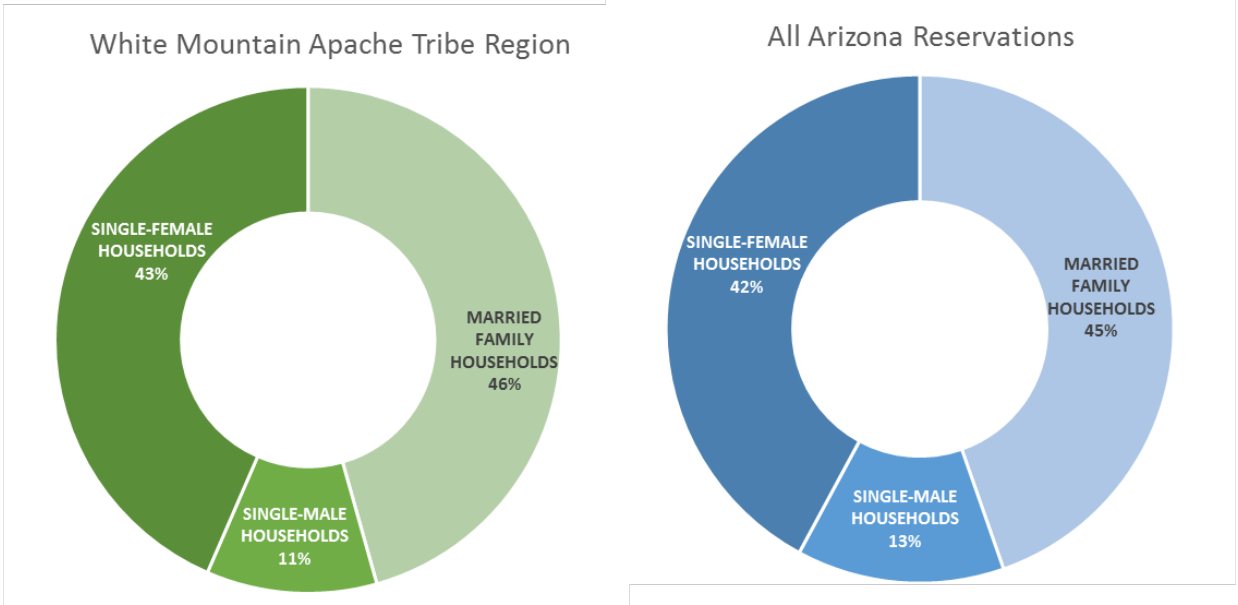
Living Arrangements for Young Children

Figure 2. Living arrangements for children (ages 0-5), 2009-2013 five-year estimate



Source: American Community Survey, 5-year estimates (2009-2013), Tables B05009, B09001, B17006.
Retrieved from: http://factfinder.census.gov

Figure 3. Heads of households in which young children (ages 0-5) live, 2010



Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Tables P20, P32.
Retrieved from: http://factfinder.census.gov

Table 4. Children (ages 0-5) living in the household of a grandparent, 2010

	CHILDREN (0-5) LIVING IN A GRANDPARENT'S HOUSEHOLD
White Mountain Apache Tribe Region	**41%**
All Arizona Reservations	40%
Arizona	14%

Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Table P41
Retrieved from: http://factfinder.census.gov

Table 5. Grandparents responsible for grandchildren (ages 0-17) living with them, 2009-2013 five-year estimate

	GRANDCHILDREN (0-17) LIVING WITH GRANDPARENT HOUSEHOLDER	GRANDPARENT HOUSEHOLDER RESPONSIBLE FOR OWN GRANDCHILDREN (0-17)		GRANDPARENT HOUSEHOLDER RESPONSIBLE FOR OWN GRANDCHILDREN (0-17) WITH NO PARENT PRESENT	
White Mountain Apache Tribe Region	**1,687**	**1,365**	**81%**	**157**	**9%**
All Arizona Reservations	17,142	10,120	59%	2,013	12%
Arizona	137,753	73,467	53%	20,102	15%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B10002.
Retrieved from: http://factfinder.census.gov

Race, Ethnicity, and Language

Table 6. Race and ethnicity of the population of young children (ages 0-4), 2010

	Total Population (ages 0-4)	Hispanic or Latino	White, not Hispanic	Black or African American	American Indian	Asian or Pacific Islander
White Mountain Apache Tribe Region	**1,693**	**3%**	**1%**	**0%**	**97%**	**0%**
All Arizona Reservations	17,061	9%	1%	0%	92%	0%
Arizona	455,715	45%	40%	5%	6%	3%

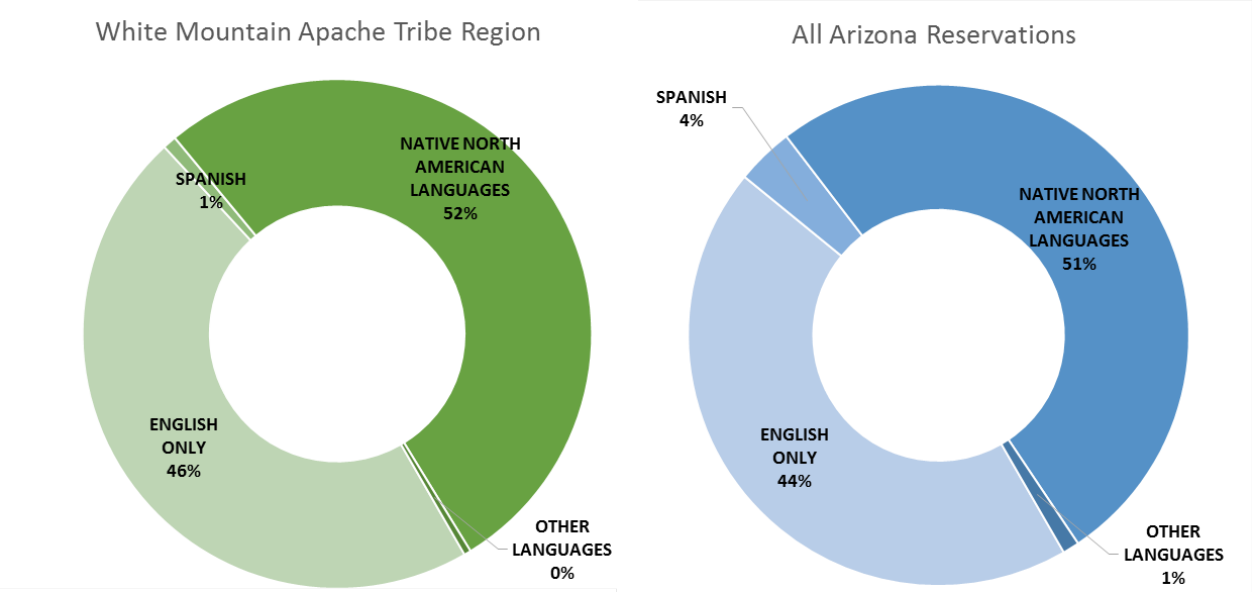
Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Tables P12A-H.
Retrieved from: http://factfinder.census.gov

Table 7. Race and ethnicity of the adult population (ages 18 and older), 2010

			Not Hispanic or Latino				
	Total Population (ages 18+)	Hispanic or Latino	White	Black or African American	American Indian	Asian or Pacific Islander	Other
White Mountain Apache Tribe Region	**8,341**	**2%**	**2%**	**0%**	**94%**	**1%**	**1%**
All Arizona Reservations	117,049	5%	5%	0%	88%	0%	1%
Arizona	4,763,003	25%	63%	4%	4%	3%	1%

Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Table P11
Retrieved from: http://factfinder.census.gov.

Figure 4. Language spoken at home, by persons ages 5 and older, 2009-2013 five-year estimate



Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B16001.
Retrieved from: http://factfinder.census.gov

Table 8. Household use of languages other than English, 2009-2013 five-year estimate

	NUMBER OF HOUSEHOLDS	HOUSEHOLDS IN WHICH A LANGUAGE OTHER THAN ENGLISH IS SPOKEN	LIMITED ENGLISH SPEAKING HOUSEHOLDS (TOTAL)	LIMITED ENGLISH SPEAKING HOUSEHOLDS (SPANISH)	LIMITED ENGLISH SPEAKING HOUSEHOLDS (NOT SPANISH)
White Mountain Apache Tribe Region	**3,376**	**80%**	**1%**	**0%**	**1%**
All Arizona Reservations	47,351	80%	1%	0%	1%
Arizona	2,370,289	27%	5%	4%	1%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B16002.
Retrieved from: http://factfinder.census.gov

Economic Circumstances

Why it Matters

Many economic factors contribute to a child's well-being, including family income, parent employment status, and the availability of safety-net programs such as housing and nutrition assistance.[16,17] Understanding the economic context in which families with young children live is crucial when designing programs and policies intended to assist them.

Employment rates and income are common indicators of economic well-being. Unemployment and job loss often results in families having fewer resources to meet their regular monthly expenses and support their children's development. Family dynamics can be negatively impacted by job loss as reflected in higher levels of parental stress, family conflict and more punitive parental behaviors.[18] Parental job loss can also impact children's school performance (shown by lower test scores, poorer attendance, higher risk of grade repetition, suspension or expulsion among children whose parents have lost their jobs.)[19] Unemployment rates, therefore, can be an indicator of family stress, and are also an important indicator of regional economic vitality.

Employment rates and job opportunities contribute to the income families have available. It is estimated that families need an income of about twice the federal poverty level (FPL)[20] to meet basic needs.[21] Families earning less may experience unstable access to basic resources like food and housing. Food insecurity – the lack of reliable access to affordable, nutritious food – negatively impacts the health and well-being of children, including a heightened risk for developmental delays.[22] High housing costs, relative to income, are associated with increased risk for homelessness, overcrowding, poor nutrition, frequent moving, lack of supervision while

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[16] Annie E Casey Foundation. (2015). *Kids Count 2015 Data Book – State Trends in Child Well-being*. Retrieved from http://www.aecf.org/m/databook/aecf-2015kidscountdatabook-2015-em.pdf

[17] Kalil, A. (2013). Effects of the Great Recession on Child Development. *The Annals of the American Academy of Political and Social Science, 650*(1), 232-250. Retrieved from http://ann.sagepub.com/content/650/1/232.full.pdf+html

[18] Isaacs, J. (2013). *Unemployment from a child's perspective.* Retrieved from http://www.urban.org/UploadedPDF/1001671-Unemployment-from-a-Childs-Perspective.pdf

[19] Ibid

[20] The 2015 FPL for a family of four is $24,250. Source: U.S. Department of Health and Human Services. (2015). *2015 Poverty Guidelines.* Retrieved from: http://aspe.hhs.gov/2015-poverty-guidelines

[21] National Center for Children in Poverty. (2015). *Arizona Demographics of Low-income Children*. Retrieved from http://www.nccp.org/profiles/AZ_profile_6.html

[22] Rose-Jacobs, R., Black, M. M., Casey, P. H., Cook, J. T., Cutts, D. B., Chilton, M., Heeren, T., Levenson, S. M., Meyers, A. F., & Frank, D. A. (2008). Household food insecurity: associations with at-risk infant and toddler development. *Pediatrics, 121*(1), 65-72. Retrieved from http://pediatrics.aappublications.org/content/121/1/65.full.pdf

parents are at work, and low cognitive achievement.[23] Even when housing is affordable, housing *availability* is typically lower on tribal land, due to the legal complexities of land ownership and the lack of rental properties, often leading to a shortage of safe, quality housing.[24] Low income and poverty, especially among children, can have far reaching negative consequences, including an effect on brain development and later cognitive ability.[25]

Public assistance programs are one way of combating the effects of poverty and providing supports to children and families in need. Temporary Assistance for Needy Families[26] (TANF, which has replaced previous welfare programs) provides cash assistance and services to the very poor and can help offset some of the economic circumstances of families that may have a detrimental effect on young children. In recognition of tribal sovereignty, the federal agency in charge of overseeing the TANF program, the U.S. Department of Health and Human Services, Administration for Children and Families (ACF), gives federally-recognized tribes the option to administer their own TANF program. The White Mountain Apache Tribe is one of the six Arizona tribes that operate a Tribal TANF program. Some Tribal TANF program requirements are different from those in state programs (e.g. time limit on receipt of TANF cash assistance). Tribal TANF programs also have more flexibility in determining program requirements, which allows them, for instance, to incorporate socially and culturally appropriate activities into their self-sufficiency plans for clients.[27]

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[23] The Federal Interagency Forum on Child and Family Statistics. (2015). *America's Children: Key National Indicators of Well-Being, 2015*. http://www.childstats.gov/pdf/ac2015/ac_15.pdf

[24] Housing Assistance Council. (2013). *Housing on Native American Lands*. Retrieved from http://www.ruralhome.org/storage/documents/rpts_pubs/ts10_native_lands.pdf

[25] Noble, K.G., Houston, S.M., Brito, N.H., Bartsch, H. Kan E., et. al. (2015). Family Income, parental education and brain structure in children and adolescents. *Nature Neuroscience, 18*, 773–778. Retrieved from http://www.nature.com/neuro/journal/v18/n5/full/nn.3983.html#close

[26] In Arizona, TANF eligibility is capped at $335 per month, or $4020 annually for a family of four, and has recently undergone significant changes. Beginning in 2016, Arizona will become the first and only state that limits a person's lifetime benefit to 12 months. In addition, since 2009, a steadily decreasing percentage of Arizona TANF funds have been spent on three of the key assistance categories: cash assistance to meet basic needs, helping connect parents to employment opportunities, and child care; in 2013, Arizona ranked 51st, 47th, and 46th respectively in proportional spending in those categories across all states and the District of Columbia. Meanwhile, since 2009, an increasing percentage of Arizona TANF funds have been spent on other costs such as child protection, foster care, and adoption. [Sources: Reilly, T., and Vitek, K. (2015). *TANF cuts: Is Arizona shortsighted in its dwindling support for poor families?* Retrieved from: https://morrisoninstitute.asu.edu/sites/default/files/content/products/TANF.doc_0.pdf ; Floyd, I., Pavetti, L., and Schott, L. (2015). *How states use federal and state funds under the TANF block grant.* Retrieved from: http://www.cbpp.org/research/family-income-support/how-states-use-federal-and-state-funds-under-the-tanf-block-grant;

[27] Hahn, H., Olivia Healy, Walter Hillabrant, and Chris Narducci (2013). *A Descriptive Study of Tribal Temporary Assistance for Needy Families (TANF) Programs.* OPRE Report # 2013-34, Washington, DC: Office of Planning, Research and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services.

Another safety net program, the Supplemental Nutrition Assistance Program (SNAP, also referred to as "Nutrition Assistance" and "food stamps") has been shown to help reduce hunger and improve access to healthier food.[28] SNAP benefits support working families whose incomes simply do not provide for all their needs. For low-income working families, the additional income from SNAP is substantial. For example, for a three-person family with one person whose wage is $10 per hour, SNAP benefits boost take-home income by ten to 20 percent.[29] Similarly, the National School Lunch Program[30] provides free and reduced-price meals at school for students whose families meet income criteria. These income criteria are 130 percent of the federal poverty level (FPL) for free lunch, and 185 percent of the FPL for reduced price lunch.

What the Data Tell Us

Poverty rates for the total population (of all ages) and for young children in the White Mountain Apache Tribe Region are higher than those across all Arizona reservations combined and the state as a whole. Forty-seven percent of people (all ages) in the region live in poverty, compared to 42 percent across all Arizona reservations and 18 percent statewide (see Figure 5). In all these geographies, young children are consistently more likely to be in poverty than members of the total population. Almost two-thirds (63%) of the children in the region live in poverty, a higher proportion than that in all Arizona reservations combined and the state (56% and 28%, respectively). In addition to the families whose incomes fall below the federal poverty level, a substantial proportion of households in the region, and across all Arizona reservations are low income (i.e., near but not below the federal poverty level [FPL]). Eighty percent of families with children aged four and under are living below 185 percent of the FPL in the region (i.e., earned less than $3,677[31] a month for a family of four), compared to 77 percent in all Arizona reservations combined, and 48 percent across the state (see Table 9). The median family income in the region ($30,938) is about half of the median family income in the state of Arizona ($58,897) (see Figure 6).

[28] Food Research and Action Center. (2013). *SNAP and Public Health: The Role of the Supplemental Nutrition Assistance Program in Improving the Health and Well-Being of Americans*. Retrieved from http://frac.org/pdf/snap_and_public_health_2013.pdf

[29] Ibid

[30] United States Department of Agriculture, Food and Nutrition Service. (2015). *National School Lunch Program (NSLP).* Retrieved from http://www.fns.usda.gov/nslp/national-school-lunch-program-nslp

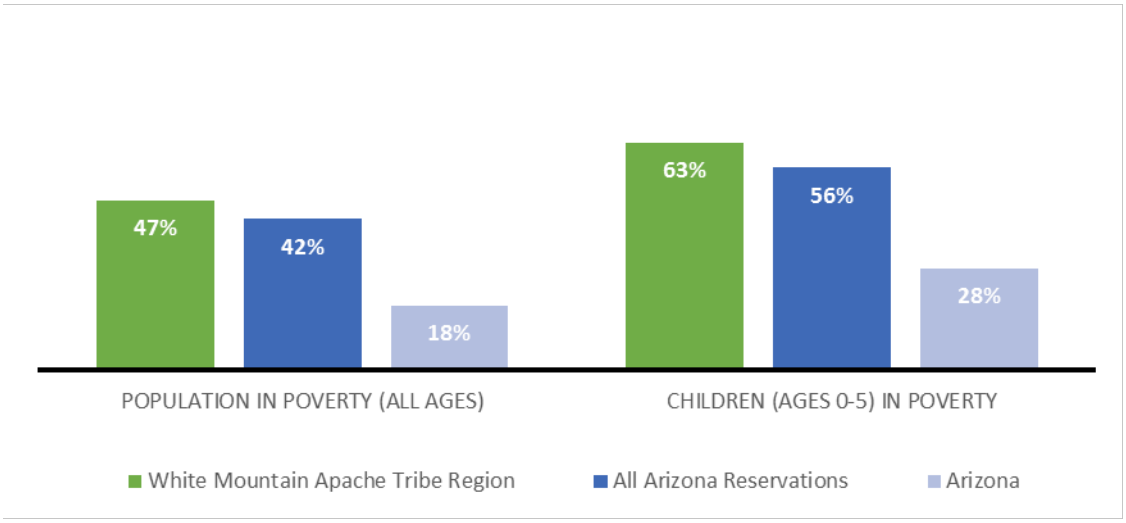
[31] Based on 2014 FPL Guidelines, see http://aspe.hhs.gov/2014-poverty-guidelines

The average unemployment rate in the region for the 2009-2013 period was 40.8 percent, substantially higher that the estimated 25 percent across all Arizona reservations combined and approximately four times the average state rate of 10.4 percent (see Figure 7).

Given the high poverty levels in the region, safety net programs such as Temporary Assistance for Needy Families (TANF), the Supplemental Nutrition Assistance Program (SNAP) and the school-based free or reduced-price lunch program, are used by many families. In January of 2014, an estimated 19 percent of children in the region received TANF benefits. The number of young children in the region receiving SNAP benefits in 2012 and 2013 (2,044 and 2,026 respectively) represented more than 100 percent of the children reported to be living in the region according to the 2010 U.S. Census. Although the number of young children who were SNAP recipients decreased slightly in 2014, it still represented almost all of the young children in the region (99%) (Table 14). The majority (86%) of children attending Whiteriver Unified School District, the only Arizona Department of Education district with boundaries wholly contained within in the region, are eligible for free or reduced lunch (Table 15).

Poverty and Income

Figure 5. Percent of population in poverty, 2009-2013 five-year estimate



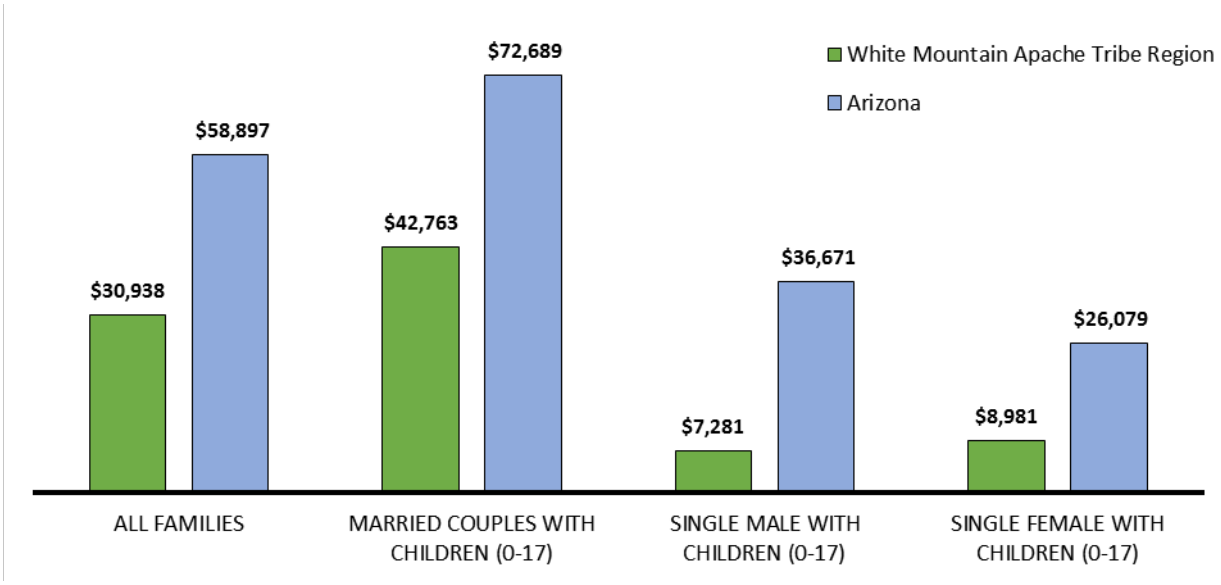
Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B17001. Retrieved from: http://factfinder.census.gov

Table 9. Federal poverty levels for families with young children (ages 0-4), 2009-2013 five-year estimate

		FAMILIES WITH CHILDREN 0-4			
	FAMILIES WITH CHILDREN 0-4	BELOW POVERTY	BELOW 130% POVERTY	BELOW 150% POVERTY	BELOW 185% POVERTY
White Mountain Apache Tribe Region	**1,044**	**60%**	**66%**	**72%**	**80%**
All Arizona Reservations	9,660	52%	63%	69%	77%
Arizona	307,126	26%	35%	40%	48%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table 17010 & 17022.
Retrieved from: http://factfinder.census.gov

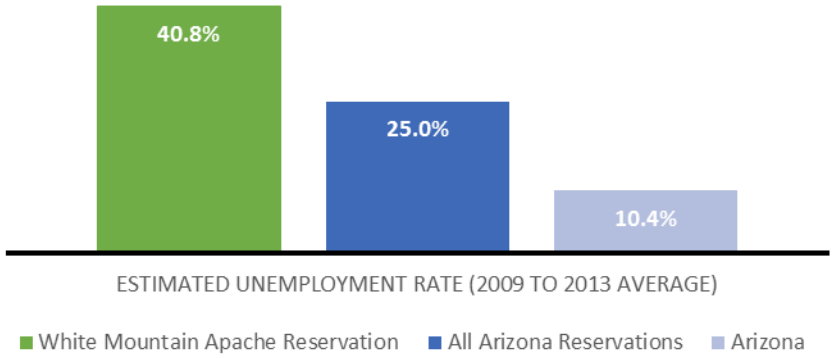
Figure 6. Median annual family incomes, 2009-2013 five-year estimate



Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B19126.
Retrieved from: http://factfinder.census.gov

Employment and Housing

Figure 7. Average annual unemployment rates, 2009 to 2013[32]



Source: U.S. Census Bureau (2015). 2009-2013 American Community Survey 5-Year Estimates, Table S2301. Retrieved from http://factfinder.census.gov

Table 10. Parents of young children (ages 0-5) who are or are not in the labor force, 2009-2013 five-year estimate

	ESTIMATED NUMBER OF CHILDREN (AGES 0-5) LIVING WITH ONE OR TWO PARENTS	CHILDREN (0-5) LIVING WITH TWO PARENTS			CHILDREN (0-5) LIVING WITH ONE PARENT	
		BOTH PARENTS IN LABOR FORCE	ONE PARENT IN LABOR FORCE	NEITHER PARENT IN LABOR FORCE	PARENT IN LABOR FORCE	PARENT NOT IN LABOR FORCE
White Mountain Apache Tribe Region	**1,887**	**14%**	**11%**	**2%**	**48%**	**26%**
All Arizona Reservations	18,682	13%	11%	2%	40%	34%
Arizona	517,766	31%	29%	1%	29%	10%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B23008.
Retrieved from: http://factfinder.census.gov
Note: Persons who are unemployed but looking for work are considered to be "in the labor force."

[32] Please note that the source for the unemployment data presented in this report is different than that used in previous Needs and Assets Reports for the region. The previous estimates are no longer be available, so the data in this figure are the most recent available for the region. According to the Arizona Department of Administration Office of Employment and Population Statistics, these unemployment rates are calculated using a fixed ratio method derived from the 2009-2013 American Community Survey. Previous unemployment statistics for Arizona reservations were obtained using a fixed ratio derived from the 2000 Decennial Census. Source: Arizona Department of Administration, Office of Employment and Population Statistics (2014). *Special Unemployment Report, 2009-2014;* Arizona Department of Administration, Office of Employment and Population Statistics (2015*). 2009 to 2015 Special Unemployment Report.* Retrieved from https://laborstats.az.gov/local-area-unemployment-statistics

Table 11. Vacant and occupied housing units, 2009-2013 five-year estimate

	TOTAL HOUSING UNITS	OCCUPIED HOUSING UNITS	VACANT HOUSING UNITS (NON-SEASONAL)	VACANT HOUSING UNITS (SEASONAL)
White Mountain Apache Tribe Region	**3,916**	**86%**	**7%**	**7%**
All Arizona Reservations	68,118	70%	15%	15%
Arizona	2,859,768	83%	10%	7%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B25002, B25106. Retrieved from: http://factfinder.census.gov
Note: Seasonal units are intended for use only in certain seasons or for weekends or other occasional use.

Table 12. Occupied housing units and costs relative to income, 2009-2013 five-year estimate

	NUMBER OF OCCUPIED HOUSING UNITS	UNITS WHICH COST THE OWNER OR RENTER MORE THAN 30% OF THEIR INCOME	
White Mountain Apache Tribe Region	**3,383**	**612**	**18%**
All Arizona Reservations	47,351	8,030	17%
Arizona	2,370,289	847,315	36%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B25002, B25106. Retrieved from: http://factfinder.census.gov; http://www.realtytrac.com/statsandtrends/az

Economic Supports

Table 13. Monthly snapshots of children (ages 0-5) receiving tribal TANF (Temporary Assistance for Needy Families, 2011 - 2014

	POPULATION (AGES 0-5)	JANUARY 2011		JAUNARY 2013		JANUARY 2014		CHANGE 2011-2014
White Mountain Apache Tribe	**2,003**	**81**	**4%**	**382**	**19%**	**381**	**19%**	**370%**

Source: U.S. Census (2010). Table P14. Retrieved from http://factfinder2.census.gov/faces/nav/jsf/pages/index.xhtml
White Mountain Apache Tribe Social Services Department. (2014). TANF data. Unpublished data provided by the White Mountain Apache Tribe Social Services Department for the First Things First White Mountain Apache Tribe Regional Partnership Council 2014 Needs and Assets Report.

Table 14. Children (ages 0-5) in the Supplemental Nutrition Assistance Program (SNAP)

	CHILDREN (AGES 0-5) RECEIVING SNAP			CHANGE FROM 2012 TO 2014
	2012	2013	2014	
White Mountain Apache Tribe Region	**2,044**	**2,026**	**1,989**	**-3%**
All Arizona Reservations	N/A	N/A	N/A	N/A
Arizona	296,686	290,513	277,345	-7%

Source: The Arizona Department of Economic Security (July 2015)
Note: The data reflect unduplicated counts of children served during each calendar year.
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

Table 15. Students eligible for free or reduced-price lunch, 2012-2014

	STUDENTS ELIGIBLE FOR FREE OR REDUCED-PRICE LUNCH		
	2012	2013	2014
McNary Elementary District	94%	95%	92%
Whiteriver Unified School District	86%	86%	86%
Arizona	57%	57%	58%

Source: The Arizona Department of Education (July 2015). [Education Dataset]. Unpublished data.
Note: Regional data were not available for this indicator.

Educational Indicators

Why it Matters

Characteristics of educational involvement and achievement in a region, such as school attendance, standardized tests scores, graduation rates, and the overall level of education of adults, all impact the developmental and economic resources available to young children and their families. Education, in and of itself, is an important factor in how able parents and caregivers are to provide for the children in their care. Parents who graduate from high school earn more and are less likely to rely on public assistance programs than those without high school degrees.[33,34] Higher levels of education are associated with better housing, neighborhood of residence, and working conditions, all of which are important for the health and well-being of children.[35,36]

By third grade, reading ability is strongly associated with high school completion. One in six third graders who do not read proficiently will not graduate from high school on time, and the rates are even higher (23%) for children who were both not reading proficiently in third grade and living in poverty for at least a year.[37] In recognition of the importance of assuring that children are reading by the third grade, legislators enacted the Arizona Revised Statute §15-701 (also known as the *Move on When Reading* law) which states that as of school year 2013-2014 a student shall not be promoted from the third grade if the student obtains a score on the statewide reading assessment "that demonstrates that the pupil's reading falls far below the third-grade level." Exceptions exist for students identified with or being evaluated for learning disabilities, English language learners, and those with reading impairments.

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[33] Planty, M., Hussar, W., Snyder, T., Provasnik, S., Kena, G., Dinkes, R., KewalRamani, A., & Kemp, J. (2008). *The Condition of Education 2008* (NCES 2008-031). National Center for Education Statistics, Institute of Education Sciences, U.S. Department of Education, Washington, D.C. Retrieved from: http://nces.ed.gov/pubs2008/2008031.pdf

[34] Waldfogel, J., Garfinkel, I. and Kelly, B. (2007). Welfare and the costs of public assistance. In C.R. Belfield and H.M. Levin (Eds.). *The price we pay: Economic and social consequences for inadequate education*. Washington, DC: The Brookings Institution, 160-174.

[35] Annie E. Casey Foundation. (2013). *The First Eight Years. Giving kids a foundation for lifelong success*. Retrieved from http://www.aecf.org/m/resourcedoc/AECF-TheFirstEightYearsKCpolicyreport-2013.pdf

[36] Lynch, J., & Kaplan, G. (2000). Socioeconomic position (pp. 13-35). In *Social Epidemiology*. Berkman, L. F. & Kawachi, I. (Eds.). New York: Oxford University Press. Retrieved from http://deepblue.lib.umich.edu/bitstream/handle/2027.42/51520/Lynch;jsessionid=6B74BA11DC47266133239FB7703042DD?sequence=1

[37] Hernandez, D. (2011). *Double jeopardy: How third-grade reading skills and poverty influence high school graduation*. The Annie E. Casey Foundation. Retrieved from http://files.eric.ed.gov/fulltext/ED518818.pdf.

From 2000-2014, the primary in-school performance of students in the public elementary schools in the state has been measured by Arizona's Instrument to Measure Standards (AIMS).[38] AIMS scores were used to meet the requirement of *Move on When Reading*.

However, a new summative assessment system which reflects Arizona's K-12 academic standards, Arizona's Measurement of Educational Readiness to Inform Teaching (AzMERIT), was implemented in the 2014-2015 school year. [39] This assessment replaced the reading and mathematics portions of the AIMS test. Although it is not a graduation requirement, it will still be used to determine promotion from the third grade in accordance with Arizona Revised Statute §15-701.[40]

AIMS results are included in this report, but future reports will use AzMERIT scores as they become available.

In order for children to be prepared to succeed on tests such as the AIMS or AzMERIT, research shows that early reading experiences, opportunities to build vocabularies and literacy rich environments are the most effective ways to support the literacy development of young children.[41]

What the Data Tell Us

Children from the White Mountain Apache Tribe Region attend schools in a number of Arizona Department of Education (ADE) districts (see Appendix 3) and Bureau of Indian Education schools. Data are provided for the one ADE district wholly contained within tribal lands, Whiteriver Unified School District. Students "pass" Arizona's Instrument to Measure Standards (AIMS) if they meet or exceed the standard. In the White Mountain Apache Tribe Region, 40 percent of third grade students passed the AIMS Math test and just over half (52%) passed the AIMS reading test (see Figure 9 and Figure 10). Eighteen percent of third graders in the region scored "falls far below" in math; five percent scored "falls far below" on the reading test, putting them at risk of grade retention.

[38] For more information on the AIMS test, see http://arizonaindicators.org/education/aims

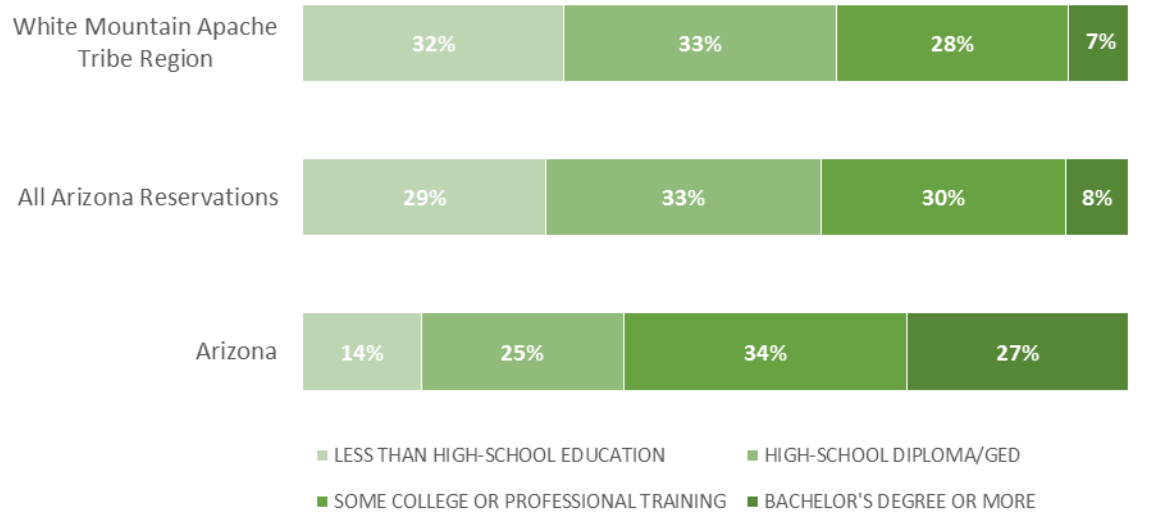
[39] For more information on AzMERIT, see http://www.azed.gov/assessment/azmerit/

[40] For more information on Move on When Reading, see http://www.azed.gov/mowr/

[41] First Things First. (2012). *Read All About It: School Success Rooted in Early Language and Literacy*. Retrieved from http://www.azftf.gov/WhoWeAre/Board/Documents/Policy_Brief_Q1-2012.pdf (April, 2012)

Educational Attainment of the Adult Population

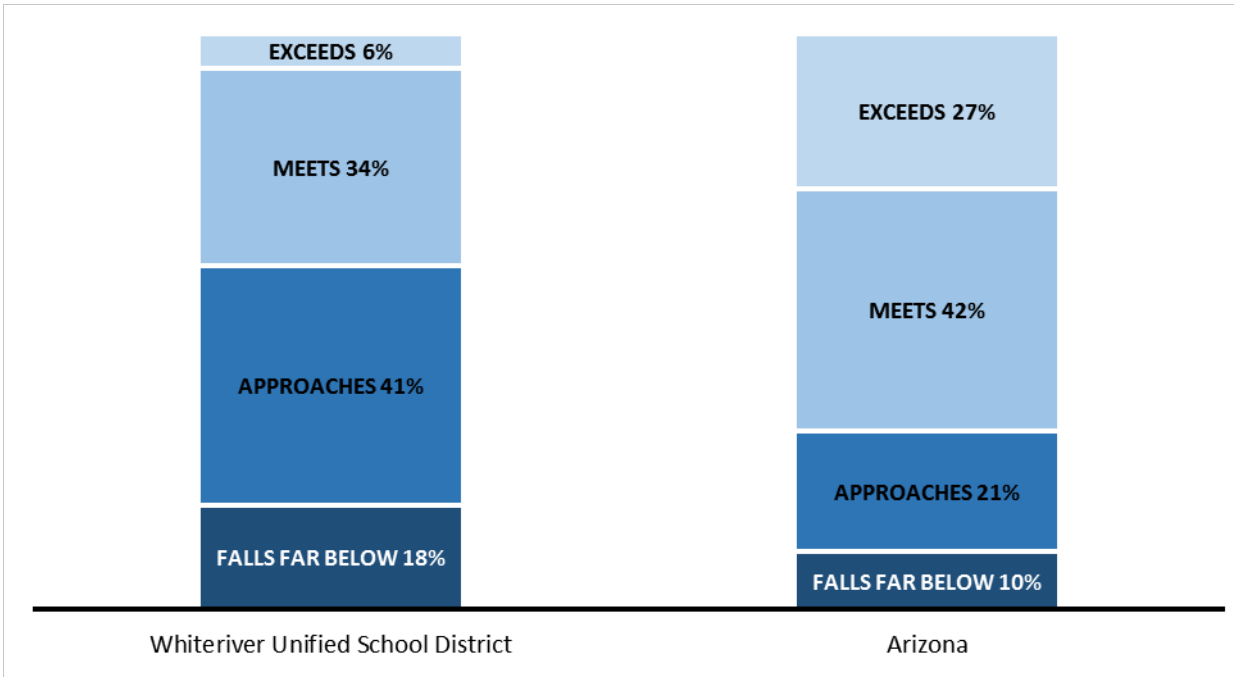
Figure 8. Level of education for the population ages 25 and older, 2009-2013 five-year estimate



Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B15002. Retrieved from: http://factfinder.census.gov

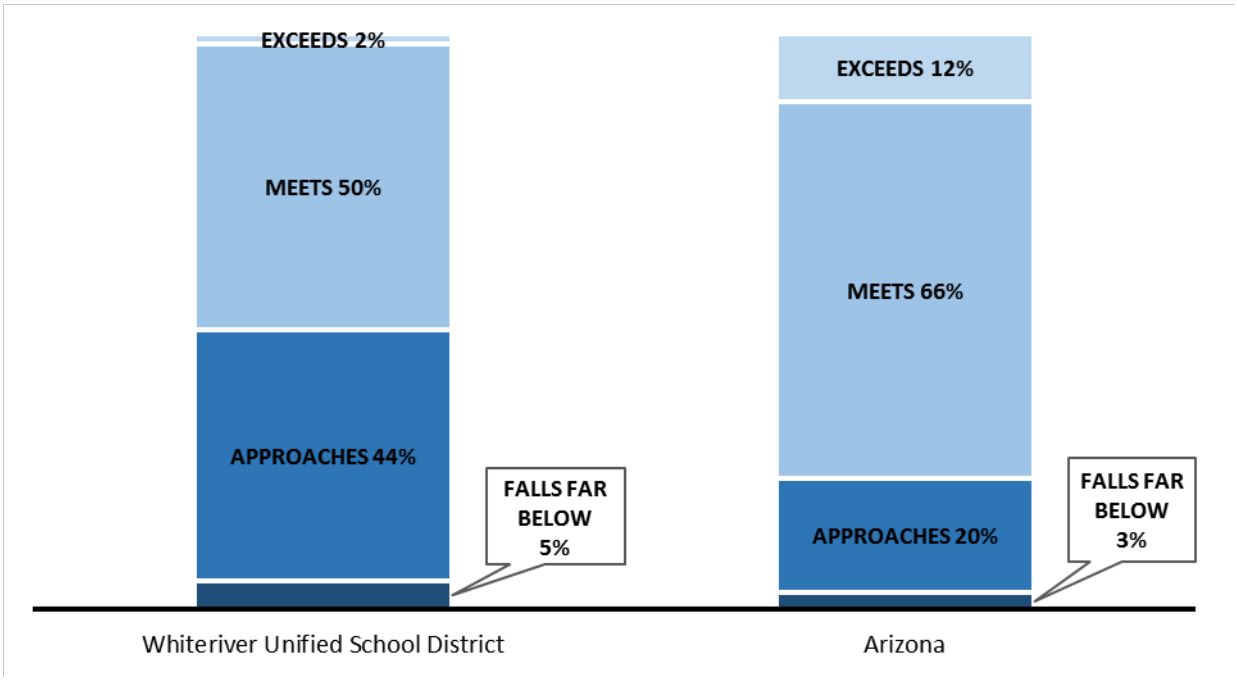
Third-grade Test Scores

Figure 9. Results of the 2014 third-grade AIMS Math test



Source: Arizona Department of Education, Research and Evaluation (2015). AIMS Assessment Results.
Retrieved from: www.azed.gov/research-evaluation/aims-assessment-results

Figure 10. Results of the 2014 third-grade AIMS Reading test



Source: Arizona Department of Education, Research and Evaluation (2015). AIMS Assessment Results. Retrieved from: www.azed.gov/research-evaluation/aims-assessment-results

Early Learning

Why it Matters

Early childhood marks a time of peak plasticity in the brain, and early adversity can weaken the foundation upon which future learning will be built; in other words, positive developmental experiences in early life are crucial.[42] Research has shown that the experiences that children have from birth to five years of age influence future health and well-being, and that supporting children during this time has a great return on investment.[43] Investing in high-quality early childhood programs, particularly for disadvantaged children, provides substantial benefits to society through increased educational achievement and employment, reductions in crime, and better overall health of those children as they mature into adults.[44,45] Children whose education begins with high-quality preschool repeat grades less frequently, obtain higher scores on standardized tests, experience fewer behavior problems, and are more likely to graduate high school.[46]

The ability of families to access quality, affordable early care and education opportunities, however, can be limited. The annual cost of full-time center-based care for a young child in Arizona is only slightly less than a year of tuition and fees at a public college.[47] Although the Department of Health and Human Services recommends that parents spend no more than 10 percent of their family income on child care,[48] the cost of center-based care for a single infant,

[42] Center on the Developing Child at Harvard University. (2010). *The Foundations of Lifelong Health Are Built in Early Childhood*. Retrieved from http://developingchild.harvard.edu/wp-content/uploads/2015/05/Foundations-of-Lifelong-Health.pdf

[43] Executive Office of the President of the United States. (2014). *The Economics of Early Childhood Investments*. Retrieved from https://www.whitehouse.gov/sites/default/files/docs/early_childhood_report1.pdf

[44] The Heckman Equation. (2013). *The Heckman Equation Brochure.* Retrieved from http://heckmanequation.org/content/resource/heckman-equation-brochure-0

[45] The Heckman Equation. (n.d.). *Research Summary: Abecedarian & Health.* Retrieved from http://heckmanequation.org/content/resource/research-summary-abecedarian-health

[46] Annie E. Casey Foundation. (2013). *The First Eight Years. Giving kids a foundation for lifelong success*. Retrieved from http://www.aecf.org/m/resourcedoc/AECF-TheFirstEightYearsKCpolicyreport-2013.pdf

[47] Child Care Aware® of America. (2014). *Parents and the High Cost of Child Care. 2014 Report*. Retrieved from https://www.ncsl.org/documents/cyf/2014_Parents_and_the_High_Cost_of_Child_Care.pdf

[48] U.S. Department of Health and Human Services, Child Care Bureau (2008). *Child Care and Development Fund: Report of state and territory plans: FY 2008-2009*. Section 3.5.5 – Affordable co-payments, p. 89. Retrieved from http://www.researchconnections.org/childcare/resources/14784/pdf

toddler, or 3-5 year old is an estimated 17, 15 and 11 percent, respectively, of an average Arizona family's income.[49]

Child care subsidies can help families who otherwise would be unable to access early learning services.[50] However, the availability of this type of support is also limited. The number of children receiving Child Care and Development Fund (CCDF) subsidies in Arizona is low. In 2014, only 26,685 children aged birth to 5 (about 5% of Arizona's children in this age range) received CCDF vouchers. With half of young children in Arizona living below the federal poverty level, the number in need of these subsidies is likely much higher than those receiving them.

The availability of services for young children with special needs is an ongoing concern across the state, particularly in more geographically remote communities. The services available to families include early intervention screening and intervention services provided through the Arizona Department of Education AZ FIND (Child Find),[51] the Arizona Early Intervention Program (AzEIP)[52] and the Division of Developmental Disabilities (DDD).[53] These programs help identify and assist families with young children who may need additional support to meet their potential. Timely intervention can help young children with, or at risk for, developmental delays improve language, cognitive, and social/emotional development. It also reduces educational costs by decreasing the need for special education. [54,55,56]

[49] The cost of center-based care as a percentage of income is based on the Arizona median annual family income of $58,900.

[50] For more information on child care subsidies see https://www.azdes.gov/child care/

[51] For more information on AZ FIND see http://www.azed.gov/special-education/az-find/

[52] For more information on AzEIP see https://www.azdes.gov/azeip/

[53] For more information on DDD see https://www.azdes.gov/developmental_disabilities/

[54] The National Early Childhood Technical Assistance Center. (2011). *The Importance of Early Intervention for Infants and Toddlers with Disabilities and their Families*. Retrieved from http://www.nectac.org/~pdfs/pubs/importanceofearlyintervention.pdf

[55] Hebbeler, K, Spiker, D, Bailey, D, Scarborough, A, Mallik, S, Simeonsson, R, Singer, M & Nelson, L. (2007). *Early intervention for infants and toddlers with disabilities and their families: Participants, services and outcomes. Final Report of the National Early Intervention Longitudinal Study (NEILS*). Retrieved from http://www.sri.com/sites/default/files/publications/neils_finalreport_200702.pdf

[56] NECTAC Clearinghouse on Early Intervention and Early Childhood Special Education. (2005). *The long term economic benefits of high quality early childhood intervention programs*. Retrieved from http://ectacenter.org/~pdfs/pubs/econbene.pdf

What the Data Tell Us

Center-based care is provided in the region by Chaghache Day Care and Alchesay Beginnings Child Development Center (also known as ABC Day Care).

Chaghache Day Care, located in Whiteriver, operates Monday to Friday from 6:45 am to 5:30 pm and it has a total licensed capacity to serve 115 children from 6 months to 12 years of age. Of those, 85 are children under the age of six. Chaghache Day Care has four classrooms for young children with the following typical distribution: 10 infants (6-22 months), 22 toddlers (22-36 months), 25 preschoolers (ages 3 and 4) and 25 children in the pre-k classroom (ages 4 and 5). Chaghache Day Care has a waiting list of children in all age groups. Staff from the center indicated that parents must go through an established process of staying in touch with the center continuously so that they are able to remain in the waiting list after completing an application. A high proportion of the parents who submit an application end up dropping out of the waiting list because of failure to meet the requirements of this program.[57]

In the past, a home-based care provider program was also administered by Chaghache Day Care. Since 2011, however, no home-based providers have been available in the region. Key informants indicated that this may be due to new safety regulations set in place by the Arizona Department of Economic Security that may have had an impact on the providers' ability to continue participating in the program. Currently, there are no licensed home-based providers available in the region.[58]

Alchesay Beginnings Child Development Center (or ABC Day Care) is the other center-based child care provider in the region. It operates Monday to Friday from 7:00 am to 5:30 pm and it serves children ages 0 to 10. As of May 2014, there were 88 children ages 0-5 enrolled in the program. Only four children in the same age range were on the waiting list (the program has a total capacity to serve 102 children under the age of six, but is currently understaffed and thus serving a smaller number of children). ABC Day Care has four classrooms with a total of four teachers and two teacher's assistants in the morning and two in the afternoon.[59]

[57] First Things First White Mountain Apache Tribe Regional Partnership Council 2014 Needs and Assets Report retrieved from: http://www.azftf.gov/RPCCouncilPublicationsCenter/Regional%20Needs%20and%20Assets%20Report%20-%202014%20-%20White%20Mountain%20Apache%20Tribe.pdf

[58] Ibid

[59] Ibid

White Mountain Apache Tribe Head Start

Head Start is a comprehensive early childhood education program for pre-school aged children whose families meet income eligibility criteria. The program addresses a wide range of early childhood needs such as education and child development, special education, health services, nutrition, and parent and family development. The White Mountain Apache Tribe Region is served by the White Mountain Apache Tribe Head Start, which provides services to children in the region who are four years old in Whiteriver, Cibecue and McNary. In 2012-2013 the program enrolled 252 children.[60]

John F. Kennedy Day School FACE Program

Family and Child Education (FACE) is an early childhood and parental involvement program for American Indian families in schools sponsored by the Office of Indian Education Programs, Bureau of Indian Affairs. The goals of the FACE program include increasing family literacy; strengthening family-school-community connections; promoting the early identification and provision of services to children with special needs; and promoting the preservation of the unique cultural and linguistic diversity of the communities served by the program. In the White Mountain Apache Tribe Region, a FACE Program has been available at John F. Kennedy Day School in Cedar Creek since school year 2005-2006.[61]

FACE has both a center-based and a home-based component. The home-based component includes personal visits and screenings by parent educators and is aimed at families with children from birth to age three, although families can join the program from pregnancy on. As of December of 2013, the FACE Program at John F. Kennedy Day School had 20 families enrolled in the home-based component.[62]

The FACE center-based preschool component includes an early childhood education program for children aged three to five, adult education for the children's parents, and Parent and Child Time (PACT). The FACE preschool program at John F. Kennedy Day School serves about 12 children ages three to five.[63]

[60] Ibid

[61] Ibid

[62] Ibid

[63] Ibid

The adult education component can be tailored to each participant's needs: some may work on getting their GED, or if they are looking for a job they can work on their resume, job and interview skills, etc.[64]

The program goes from 8 am to 2 pm Monday to Thursday. Breakfast and lunch is served to all participants and transportation to and from the program is also available. As of December of 2013, most of the program participants were transported every day. Although the program is open to all families in the region, most participants reside in the communities of Whiteriver and Cibecue.[65]

Another important characteristic of FACE programs is their emphasis on traditional Native culture and language preservation. Children at the John F. Kennedy Day School FACE program receive lessons on Apache language from the same teacher that imparts the Apache courses at the elementary school (where the FACE program is based).[66]

Regarding families with children with special needs, in the White Mountain Apache Tribe Region, the Division of Developmental Disabilities (DDD) paid about 90 visits per year to children aged 0-2 years in 2013 and 2014 (91 and 95, respectively). In those same years, no children in the 3-5 age range were served in the region by DDD (see Table 19 and Table 20).

Parent perceptions of their children's developmental needs

The First Things First Family and Community Survey is a phone-based survey designed to measure many critical areas of parents' knowledge, skills, and behaviors related to their young children. In 2014, First Things First conducted a modified version of the Family and Community survey in six tribal regions including the White Mountain Apache Tribe Region, known as the 2014 First Things First Parent and Caregiver Survey. This survey, conducted face-to-face with parents and caregivers of young children living in the region, included a sub-set of items from the First Things First Family and Community Survey, as well as additional questions that explored health needs in tribal communities. A total of 278 parents and other caregivers responded to the survey at a variety of locations across the White Mountain Apache Tribe Region.

The 2014 First Things First Parent and Caregiver Survey included a set of questions aimed at gauging parents' and caregivers' concerns about their children's development. Respondents were asked to indicate how concerned they were about several developmental events and

[64] Ibid

[65] Ibid

[66] Ibid

stages in eight key areas. The three areas which revealed the greatest degree of concern for respondents were "How well your child behaves" (47% worried), "How well your child talks and makes speech sounds (37%), and "How well your child gets along with others" (36% worried) (see Figure 11).

Across the eight questions, 20 percent of the respondents reported being "worried a lot" about one or more, and 31 percent were "not worried at all" about all eight. (The remaining 49 percent were "worried a little" about at least one of the eight).

Early Care and Education

Table 16. Cost of full-time child care by percent of median income, 2014

	MEDIAN FAMILY INCOME	COST OF CHILDCARE FOR ONE CHILD (AGES 0-5)
Alchesay Beginnings Child Development Center	$32,473.00	13%
Chaghache Day Care Center	$32,473.00	10%

Source: U.S. Census (2013). American Community Survey 5-year estimates, 2008-2012. Retrieved from http://factfinder2.census.gov/faces/nav/jsf/pages/index.xhtml; Arizona Department of Economic Security (2014). [Childcare Resource and Referral Guide]. Unpublished raw data received from the First Things First State Agency Data Request for the First Things First White Mountain Apache Tribe Regional Partnership Council 2014 Needs and Assets Report.

Table 17. Estimated number of children (ages 3 and 4) enrolled in nursery school, preschool or kindergarten, 2009-2013 five-year estimate

	ESTIMATED POPULATION (AGES 3-4)	ENROLLED IN SCHOOL (AGES 3-4)	
White Mountain Apache Tribe Region	**681**	**258**	**38%**
All Arizona Reservations	6,940	2,849	41%
Arizona	185,310	65,591	35%

Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B14003. Retrieved from: http://factfinder.census.gov

Families with Children Who Have Special Needs

Table 18. AzEIP referrals and children served, 2014

	NUMBER OF AzEIP REFERRALS DURING FISCAL YEAR 2014			NUMBER OF CHILDREN BEING SERVED BY AzEIP ON OCTOBER 1, 2014		
	LESS THAN 1 YEAR OLD	FROM 13 TO 24 MONTHS OLD	FROM 25 TO 35 MONTHS OLD	LESS THAN 1 YEAR OLD	FROM 13 TO 24 MONTHS OLD	FROM 25 TO 35 MONTHS OLD
White Mountain Apache Tribe Region	**N/A**	**N/A**	**N/A**	**N/A**	**N/A**	**N/A**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A	N/A
Arizona	2,651	3,669	5,421	746	1,659	2,843

Source: The Arizona Department of Economic Security (July 2015). [Special needs dataset]. Unpublished data.
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

Table 19. Division of Developmental Disabilities (DDD) services to children (ages 0-2), 2013-2014

	CHILDREN (AGES 0-2) REFERRED TO DDD		CHILDREN (AGES 0-2) SCREENED BY DDD		CHILDREN (AGES 0-2) SERVED BY DDD		NUMBER OF DDD SERVICE VISITS TO CHILDREN (AGES 0-2)	
	FY 2013	FY 2014	FY 2013	FY 2014	FY 2013	FY 2014	FY 2013	FY 2014
White Mountain Apache Tribe Region	**N/A**	**N/A**	**0**	**0**	**N/A**	**N/A**	**91**	**95**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Arizona	2,186	2,479	314	216	2,693	2,341	158,496	130,486

Source: The Arizona Department of Economic Security, Division of Developmental Disabilities (July 2015). [Special needs dataset]. Unpublished data.
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

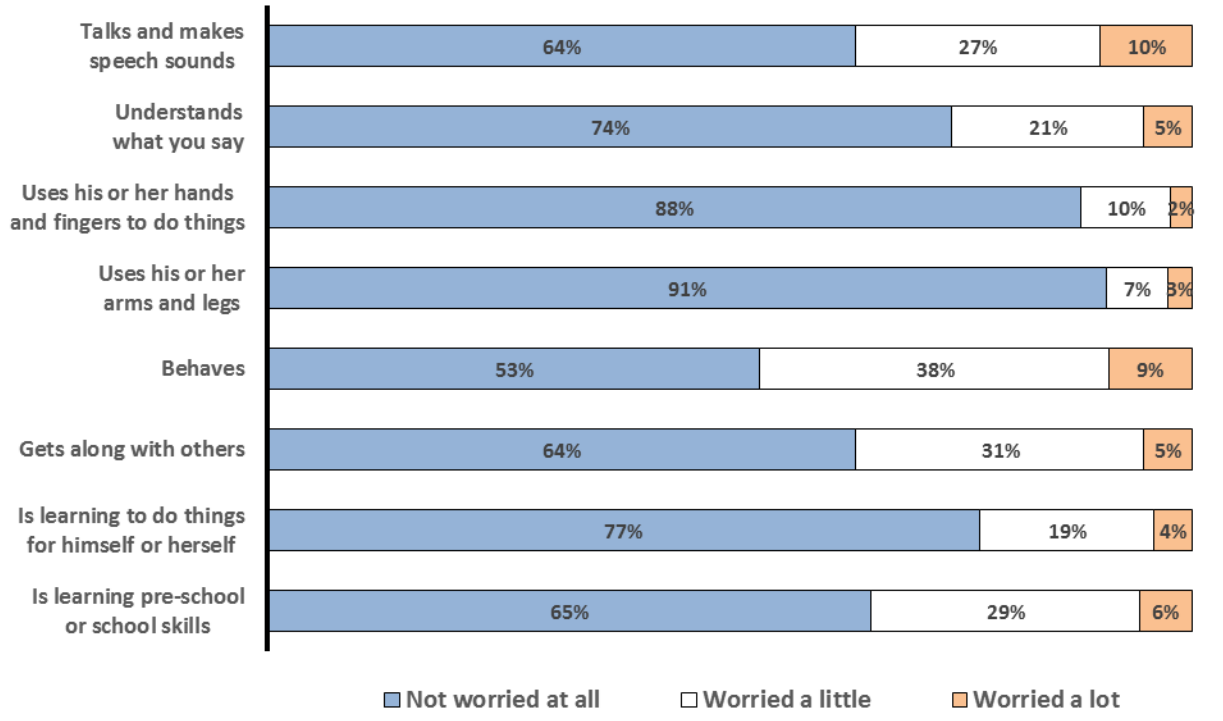
Table 20. Division of Developmental Disabilities (DDD) services to children (ages 3-5), 2013-2014

	CHILDREN (AGES 3-5) REFERRED TO DDD		CHILDREN (AGES 3-5) SCREENED BY DDD		CHILDREN (AGES 3-5) SERVED BY DDD		NUMBER OF DDD SERVICE VISITS TO CHILDREN (AGES 3-5)	
	FY 2013	FY 2014	FY 2013	FY 2014	FY 2013	FY 2014	FY 2013	FY 2014
White Mountain Apache Tribe Region	**N/A**	**N/A**	**0**	**0**	**0**	**0**	**0**	**0**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Arizona	1,401	1,804	731	727	2,600	2,533	374,440	367,590

Source: The Arizona Department of Economic Security, Division of Developmental Disabilities (July 2015). [Special needs dataset]. Unpublished data.

Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

Figure 11. Parents' and caregivers' reported levels of concern for how well their children are meeting developmental milestones (Parent and Caregiver Survey, 2014).



Source: FTF Parent and Caregiver Survey, 2014

Child Health

Why it Matters

The Institute of Medicine defines children's health as the extent to which children are able or enabled to develop and realize their potential, satisfy their needs, and develop the capacities that allow them to successfully interact with their biological, physical, and social environments.[67] Health therefore encompasses not only physical health, but also mental, intellectual, social, and emotional well-being. Children's health can be influenced by their mother's health and the environment into which they are born and raised.[68,69] The health of a child in utero, at birth, and in early life can impact many aspects of a child's development and later life. Factors such as a mother's prenatal care, access to health care and health insurance, and receipt of preventive care such as immunizations and oral health care all influence not only a child's current health, but long-term development and success as well.[70,71,72]

Healthy People is a science-based government initiative which provides 10-year national objectives for improving the health of Americans. Healthy People 2020 targets are developed with the use of current health data, baseline measures, and areas for specific improvement. Understanding where Arizona mothers and children fall in relation to these national benchmarks can help highlight areas of strength in relation to young children's health and those in need of improvement in the state. The Arizona Department of Health Services monitors state level progress towards a number of maternal, infant and child health objectives for which data are available at the regional level, including increasing the proportion of

[67] National Research Council and Institute of Medicine. (2004). *Children's Health, the Nation's Wealth: Assessing and Improving Child Health*. Washington, DC: National Academies Press. Retrieved from http://www.ncbi.nlm.nih.gov/books/NBK92198/#ch2.s3

[68] The Future of Children. (2015). *Policies to Promote Child Health*, *25*(1). Retrieved from http://www.princeton.edu/futureofchildren/publications/docs/FOC-spring-2015.pdf

[69] Center on the Developing Child at Harvard University (2010). *The Foundations of Lifelong Health Are Built in Early Childhood*. Retrieved from http://developingchild.harvard.edu/wp-content/uploads/2015/05/Foundations-of-Lifelong-Health.pdf

[70] Maternal and Child Health Bureau, Health Resources and Services Administration, U.S. Department of Health and Human Services. (n.d.). *Prenatal services*. Retrieved from http://mchb.hrsa.gov/programs/womeninfants/prenatal.html

[71] Patrick, D. L., Lee, R. S., Nucci, M., Grembowski, D., Jolles, C. Z., & Milgrom, P. (2006). Reducing oral health disparities: A focus on social and cultural determinants. *BMC Oral Health, 6*(Suppl 1), S4. Retrieved from http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2147600/

[72] Council on Children With Disabilities, Section on Developmental Behavioral Pediatrics, Bright Futures Steering Committee, and Medical Home Initiatives for Children With Special Needs Project Advisory Committee. (2006). Identifying infants and young children with developmental disorders in the medical home: An algorithm for developmental surveillance and screening. *Pediatrics*, *118*s(1), 405-420. Retrieved from http://pediatrics.aappublications.org/content/118/1/405.full

pregnant women who receive prenatal care in the first trimester; reducing low birth weight; reducing preterm births; and increasing abstinence from cigarette smoking among pregnant women.[73] Although not a target of a Healthy People 2020 objective, high-birth weight, or macrosomia, is also associated with health risks for both the mother and infant during birth. These children are also at increased risk for obesity and metabolic syndrome (which is linked to an increase risk of heart disease, stroke, and diabetes).[74]

The ability to obtain health care is critical for supporting the health of young children. In the early years of a child's life, well-baby and well-child visits allow clinicians to offer developmentally appropriate information and guidance to parents and provide a chance for health professionals to assess the child's development and administer preventative care measures like vaccines and developmental screenings. Without health insurance, each visit can be prohibitively expensive and may be skipped.[75] Health care services to members of federally-recognized Indian tribes are available from Indian Health Service (IHS) facilities and other tribally-administered health care facilities.[76] Being eligible for IHS services alone, however, does not meet the minimum essential coverage requirement under the Affordable Care Act.[77]

What the Data Tell Us

In 2013, there were 288 babies born to women residing in the White Mountain Apache Tribe Region. About one third (33%-35%) of pregnant women in the region had no prenatal care during the first trimester (see Table 21).[78] This rate is much higher than the rate across the state as a whole (19%), and does not meet the Healthy People 2020 objective of fewer than 22.1 percent without care (see Figure 12). Fourteen percent of pregnant women in the region

[73] Arizona Department of Health Services. (2013). *Arizona Health Status and Vital Statistics 2013 Annual Report. Table 6A: Monitoring Progress Toward Arizona and Selected Healthy People 2020 Objectives: Statewide Trends*. Retrieved from: http://www.azdhs.gov/plan/report/ahs/ahs2013/pdf/6a1_10.pdf

[74] Mayo Clinic Staff. (2015). *Fetal macrosomia*. Retrieved from http://www.mayoclinic.org/diseases-conditions/fetal-macrosomia/basics/complications/con-20035423

[75] Yeung, LF, Coates, RJ, Seeff, L, Monroe, JA, Lu, MC, & Boyle, CA. (2014). Conclusions and future directions for periodic reporting on the use of selected clinical preventive services to improve the health of infants, children, and adolescents—United States. *Morbidity and Mortality Weekly Report 2014, 63*(Suppl-2), 99-107. Retrieved from http://www.cdc.gov/mmwr/pdf/other/su6302.pdf

[76] As a result of the Indian Self-Determination and Education Assistance Act (PL-93-638) (ISDEAA), federally recognized tribes have the option to receive the funds that the Indian Health Service (IHS) would have used to provide health care services to their members. The tribes can then utilize these funds to directly provide services to tribal members. This process is often known as 638 contracts or compacts. Rainie, S., Jorgensen, M., Cornell, S., & Arsenault, J. (2015). The Changing Landscape of Health Care Provision to American Indian Nations. *American Indian Culture and Research Journal*, *39*(1), 1-24.

[77] https://www.ihs.gov/aca/index.cfm/thingstoknow/

[78] Note that due to data suppression policies, exact numbers cannot be calculated for the region for this indicator.

had fewer than five prenatal care visits, compared to five percent in the state. A higher proportion of babies born in 2013 in the region (13%) were premature (less than 37 weeks) compared to the state (9%) (see Table 22). Nine percent of infants had low birth weight (2.5 kg or less), a higher rate than the statewide rate of seven percent, and over the Healthy People 2020 objective of fewer than 7.8 percent (see Figure 13).

The majority of births in the region (94%) were paid for by a public payor (i.e., either Arizona Health Care Cost Containment System (AHCCCS, Arizona's Medicaid) or the Indian Health Service), while just over half (55%) of births in the state fall into that category (see Table 21). A similar proportion of babies in the region and the state were placed in neonatal intensive care, (4% and 5%, respectively) (Table 22).

According to the American Community Survey (ACS) data, an estimated thirteen percent of the young children in the White Mountain Apache Tribe Region are uninsured. This rate is lower than that of all Arizona reservations combined (20%) but slightly higher than the statewide rate (10%). The uninsured rates for the total (of all ages) population in the region and across all Arizona reservations combined are similar (25% and 27%, respectively); both rates, however, are higher than the state rate of 17 percent (Figure 14).

While immunization rates vary by vaccine, for each of the three key vaccines tracked, over 95 percent of children in school-based preschool in the school year 2014-2015 were immunized; these rates were higher than those of the state (see Table 23). The Healthy People 2020 objective for vaccination coverage for children ages 19-35 months for the DTAP, polio and MMR vaccines is 90 percent,[79] so children in the reporting schools meet the objective. However, because of immunization requirements, the rates of immunization for children in child care may be higher than immunization rates for children not in child care,[80] so the rates across all children in the region may not be as high. Similarly, over 95 percent of children enrolled in kindergarten at Cradleboard Elementary were vaccinated (Table 24). The rates of religious (0%) and personal belief (0.3%) exemptions from immunizations in the preschools and school for which data were available were quite low (and lower than the state overall).

[79] U.S. Department of Health and Human Services, Office of Disease Prevention and Health Promotion. (2015). Healthy People 2020 [Internet]. Washington, DC. Retrieved from: https://www.healthypeople.gov/2020/topics-objectives/topic/immunization-and-infectious-diseases/objectives.

[80] For example, the National Immunization Survey (NIS) monitors vaccination coverage among U.S. children aged 19–35 months, and estimates the Arizona statewide rate for DTAP (Diptheria, Tetanus, Pertussis, 4 or more doses) to be about 81 percent, and the statewide rate for MMR (Measles, Mumps and Rubella, 1 or more doses) to be about 84 percent. Source: Hill, H., Elam-Evans, L., Yankey, D., Singleton, J., Kolasa, M. (2015). National, state, and selected local area vaccination coverage among children aged 19–35 months — United States, 2014. *Morbidity and Mortality Weekly Report, 64*(33), 889-896. Retrieved from: http://www.cdc.gov/mmwr/preview/mmwrhtml/mm6433a1.htm

A set of questions on the 2014 First Things First Parent and Caregiver Survey asked participants whether various health care services that their child had required in the past year were delayed or never received. Half (50%) of the survey participants in the region reported that their child (or children) had not received timely health care at least once during the previous year (see Figure 15). Most frequently, it was dental care (34%), medical care (25%), or vision care (21%) that was delayed or not received.

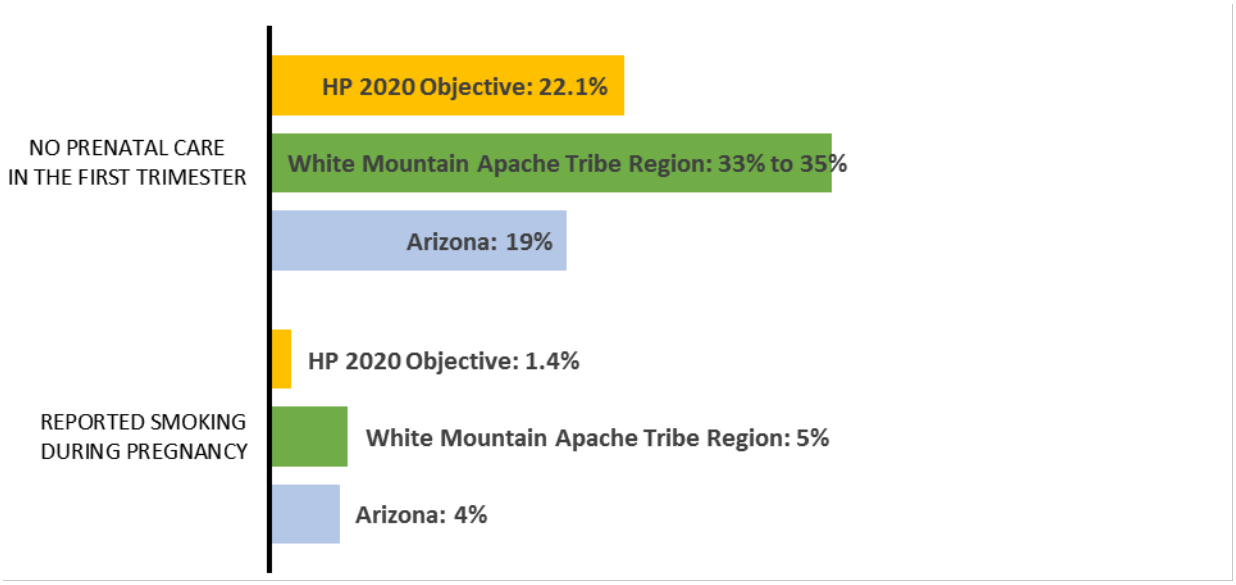
Mothers Giving Birth

Table 21. Selected characteristics of mothers giving birth, 2013

	TOTAL NUMBER BIRTHS TO ARIZONA-RESIDENT MOTHERS, 2013	HAD FEWER THAN 5 PRENATAL VISITS	HAD NO PRENATAL CARE IN FIRST TRI-MESTER*	MOTHER REPORTED SMOKING DURING PREG-NANCY	MOTHER REPORTED DRINKING DURING PREG-NANCY	MOTHER HAD LESS THAN A HIGH SCHOOL-EDU-CATION*	MOTHERS YOUNGER THAN 20 YEARS OLD	BIRTH WAS PAID FOR BY AHCCCS OR IHS (PUBLIC PAYOR)
White Mountain Apache Tribe Region	**288**	**14%**	**33% to 35%**	**5%**	**4%**	**33% to 34%**	**18%**	**94%**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Arizona	84,963	5%	19%	4%	0%	18%	9%	55%

Source: The Arizona Department of Health Services, Bureau of Public Health Statistics (July 2015). [Vital statistics dataset]. Unpublished data.
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.
** Due to data suppression policies, exact numbers cannot be calculated for the region for this indicator.*

Figure 12. Healthy People 2020 objective for mothers, compared to 2013 region and state data



Sources: The Arizona Department of Health Services, Bureau of Public Health Statistics (July 2015). [Vital statistics dataset]. Unpublished data. Healthy People 2020 objectives from ADHS, "Arizona Health Status and Vital Statistics 2013 Annual Report," Table 6A. Retrieved from http://www.azdhs.gov/plan/menu/info/status.php

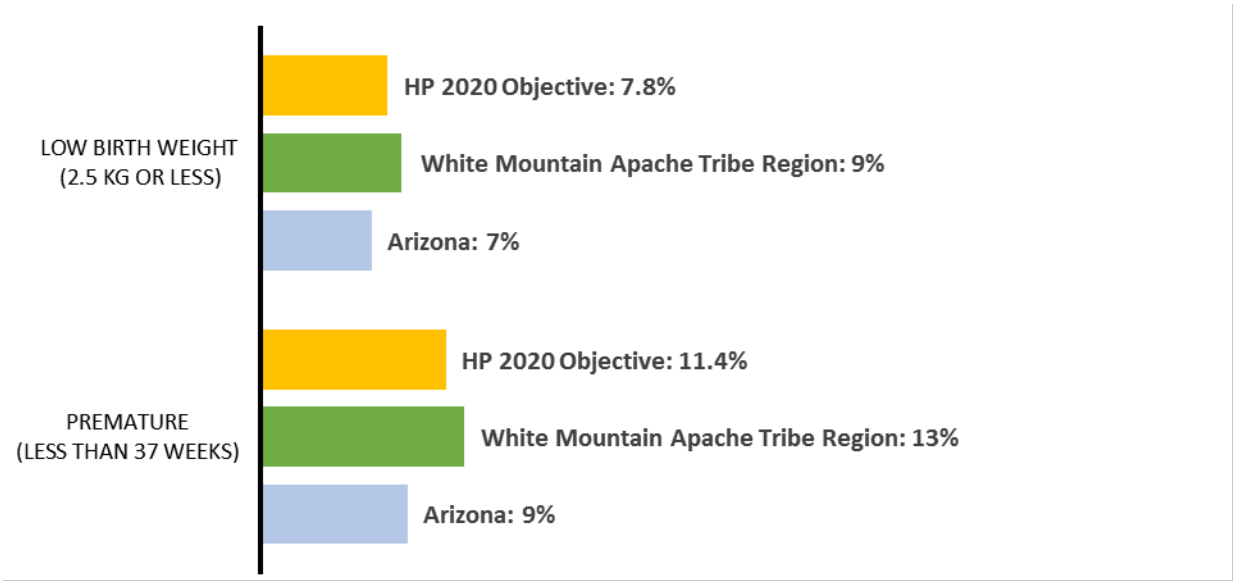
Infant Health

Table 22. Selected characteristics of babies born, 2013

	TOTAL NUMBER OF BIRTHS TO ARIZONA-RESIDENT MOTHERS, 2013	BABY HAD LOW BIRTH WEIGHT (2.5 kg OR LESS)	BABY HAD HIGH BIRTH WEIGHT (4 kg OR MORE)	BABY WAS PREMATURE (LESS THAN 37 WEEKS)	BABY WAS IN NEONATAL INTENSIVE CARE
White Mountain Apache Tribe Region	**288**	**9%**	**6%**	**13%**	**4%**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A
Arizona	84,963	7%	8%	9%	5%

Source: The Arizona Department of Health Services, Bureau of Public Health Statistics (July 2015). [Vital statistics dataset]. Unpublished data.
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

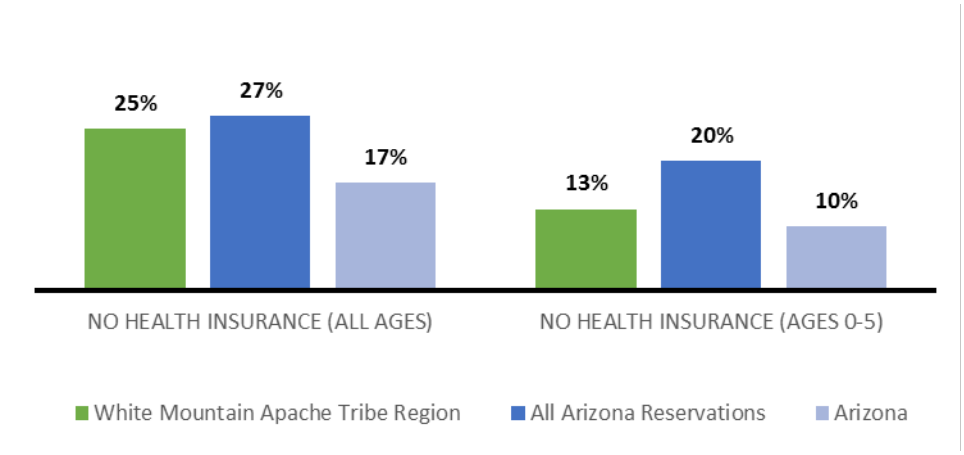
Figure 13. Healthy People 2020 objectives for babies, compared to 2013 region and state data



Sources: The Arizona Department of Health Services, Bureau of Public Health Statistics (July 2015). [Vital statistics dataset]. Unpublished data. Healthy People 2020 objectives from ADHS, "Arizona Health Status and Vital Statistics 2013 Annual Report," Table 6A. Retrieved from http://www.azdhs.gov/plan/menu/info/status.php

Health Insurance

Figure 14. Estimated percent of population without health insurance, 2009-2013 five-year estimate



Source: U.S. Census Bureau (2014). 2009-2013 American Community Survey 5 Year Estimates, Table B27001. Retrieved from: http://factfinder.census.gov

Immunizations

*Table 23. Immunizations for children in child care, school year 2014-15**

	NUMBER OF STUDENTS	DTAP (DIPHTHERIA, TETANUS, PERTUSSIS), 4 OR MORE DOSES	POLIO, 3 OR MORE DOSES	MMR (MEASLES, MUMPS, RUBELLA), 1 OR MORE DOSES	RELIGIOUS BELIEFS EXEMPTIONS	MEDICAL EXEMPTIONS
White Mountain Apache Tribe Region	**328**	**96%**	**99%**	**99%**	**0.0%**	**0.3%**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A	N/A
Arizona	84,778	93%	95%	96%	3.6%	0.5%

**Regional data included in this table are from Alchesay Beginnings Child Development Center, Seven Mile Elementary Preschool, White Mountain Apache Tribe Head Start and Whiteriver Elementary Preschool.*
Source: The Arizona Department of Health Services (2015). [Regional immunization dataset]. Unpublished data. Arizona Department of Health Services (2015). Arizona childcare immunization coverage. Retrieved from: http://azdhs.gov/preparedness/epidemiology-disease-control/immunization/index.php#reports-immunization-coverage
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

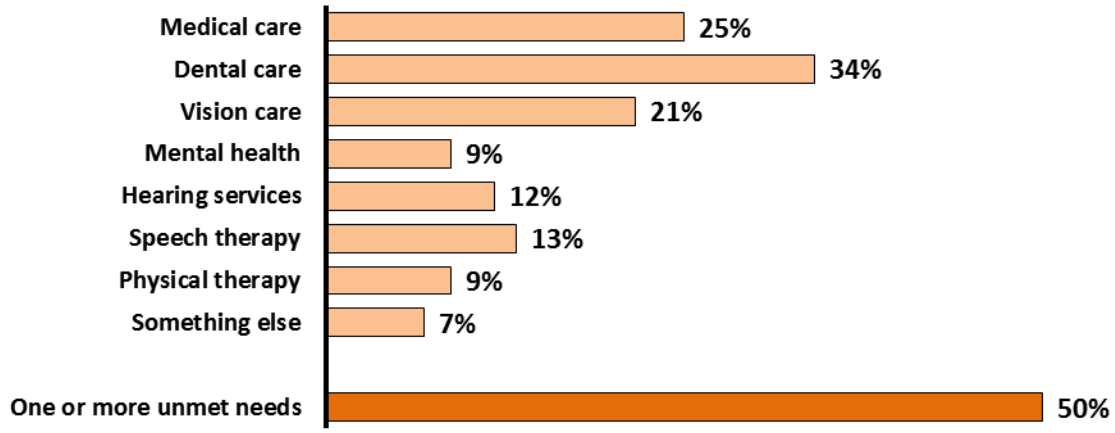
*Table 24. Immunizations for children in kindergarten, school year 2014-15**

	NUMBER OF STUDENTS	DTAP (DIPHTHERIA, TETANUS, PERTUSSIS), 4 OR MORE DOSES	POLIO, 3 OR MORE DOSES	MMR (MEASLES, MUMPS, RUBELLA), 1 OR MORE DOSES	PERSONAL BELIEFS EXEMPTIONS	MEDICAL EXEMPTIONS
White Mountain Apache Tribe Region	**340**	**98%**	**99%**	**97%**	**0.3%**	**0.3%**
All Arizona Reservations	N/A	N/A	N/A	N/A	N/A	N/A
Arizona	84,651	94%	95%	94%	4.6%	0.3%

**Regional data included in this table are from Cradleboard Elementary only*
Source: Arizona Department of Health Services (2015). [Regional immunization dataset]. Unpublished data. Arizona Department of Health Services (2015). Arizona kindergarten immunization coverage. Retrieved from: http://azdhs.gov/preparedness/epidemiology-disease-control/immunization/index.php#reports-immunization-coverage.
Note: Entries of "N/A" indicate percentages which cannot be reported because of data suppression, or are otherwise not available.

Access to care

Figure 15. Percent of respondents who reported that necessary health care was delayed or not received (Parent and Caregiver Survey, 2014).



Source: FTF Parent and Caregiver Survey, 2014

Family Support and Literacy

Why it Matters

Parents and families have a crucial role in providing nurturing and stable relationships for optimal brain development during their child's first years.[81,82,83] When children experience nurturing, responsive caregiving, they face better life prospects across a number of social, physical, academic and economic outcomes.[84,85] Consequently, healthy development depends on positive relationships between children and their caregivers from an early age. [86] For parents of young children, reading aloud, singings songs, practicing nursery rhymes, and engaging in conversation primes children to reach their full potential. Such interactions not only support literacy skills, but also offer exposure to a range of ideas, including recognizing and naming emotions, an important socio-emotional skill. Parents and family are children's first teachers; the most rapid expansion in vocabulary happens between ages one and three. [87] In fact, literacy promotion is so central to a child's development that the American Academy of Pediatrics has recently focused on it as a key issue in primary pediatric care, aiming to make parents more aware of their important role in literacy.[88]

Data on the amount and quality of the interaction parents typically have with their children can be useful to inform programs and policies to encourage positive engagement. Communities may employ many resources to support families in engaging with their children.

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[81] Evans, G. W., & Kim, P. (2013). Childhood Poverty, Chronic Stress, Self-Regulation, and Coping. *Child Development Perspectives, 7*(1), 43-48. Retrieved from http://onlinelibrary.wiley.com/doi/10.1111/cdep.12013/abstract

[82] Shonkoff, J. P., & Fisher, P. A. (2013). Rethinking evidence-based practice and two-generation programs to create the future of early childhood policy. *Development and Psychopathology, 25*, 1635- 1653. Retrieved from http://journals.cambridge.org/download.php?file=%2FDPP%2FDPP25_4pt2%2FS0954579413000813a.pdf&code=aeb62de3e0ea8214329e7a33e0a9df0e

[83] Shonkoff, J. P. & Phillips, D. A. (2000). *From Neurons to Neighborhoods: The Science of Early Childhood Development*. Washington, D.C.: National Academy Press. Retrieved from http://www.nap.edu/read/9824/chapter/1

[84] Magnuson, K. & Duncan, G. (2013). Parents in poverty (95-121) In Bornstein, M. *Handbook of Parenting: Biology and Ecology of Parenting Vol. 4: Social Conditions and Applied Parenting*. New Jersey: Lawrence Erlbaum.

[85] Center on the Developing Child at Harvard University. (2010). *The Foundations of Lifelong Health Are Built in Early Childhood*. Retrieved from http://www.developingchild.harvard.edu

[86] National Scientific Council on the Developing Child. (n.d.). Category: Working Papers. Retrieved from http://developingchild.harvard.edu/resourcecategory/working-papers/

[87] Read On Arizona. (n.d.). *As a parent what can I do at home to support early literacy?* Retrieved from http://readonarizona.org/about-us/faq/

[88] American Academy of Pediatrics. (n.d.). *Pediatric Professional Resource: Evidence Supporting Early Literacy and Early Learning*. Retrieved from https://www.aap.org/en-us/Documents/booksbuildconnections_evidencesupportingearlyliteracyandearlylearning.pdf

What the Data Tell Us[89]

The 2014 First Things First Parent and Caregiver Survey collected data about parent and caregiver knowledge of children's early development and their involvement in a variety of behaviors known to contribute positively to healthy development, including two items about home literacy events. Eighteen percent of the respondents in the White Mountain Apache Tribe Region reported that someone in the home read to their child six or seven days in the week prior to the survey. More parents and caregivers (43%) reported that the child was not read to, or only once or twice during the week. In comparison, telling stories or singing songs was somewhat more frequent. In more than two-thirds of the homes (68%), children are hearing stories or songs three or more days per week (Figure 16). The average respondent reported reading stories 3.1 days per week, and singing songs or telling stories 3.7 days per week.

The 2014 First Things First Parent and Caregiver Survey also included an item aimed at eliciting information about parents' and caregivers' awareness of their influence on a child's brain development.

More than half (52%) of the survey participants in the region recognized that they could influence brain development prenatally or right from birth. Still, a sizeable proportion (12%) responded that a parent's influence would not begin until after the infant was 7 months old (see Figure 17).

Raising young children in the region: positive aspects and challenges

Parents and caregivers of young children who participated in the 2014 First Things First Parent and Caregiver Survey were asked what they liked best about raising young children in their community.

The majority responded that being close to family and enjoying the support of relatives in extended families is one of the things they appreciate most. "I enjoy the sense of family and the support they provide," one of the respondents said. And another stated: "There's family everywhere, someone to always help you."

[89] Please note that the data presented in this section are from the 2014 White Mountain Apache Tribe Regional Partnership Council Needs and Assets Report and are the most recent data available. The report is available at http://www.azftf.gov/RPCCouncilPublicationsCenter/Regional%20Needs%20and%20Assets%20Report%20-%202014%20-%20White%20Mountain%20Apache%20Tribe.pdf

The opportunity for children to be in touch with their Native culture and tradition was another important theme among survey respondents; as one of them pointed out, “Being around the culture and being able to do stuff that my father was able to do with me.”

The natural environment in the community that provides children with an open space to run and explore was another aspect of raising children in the region mentioned by a few parents.

Although parents reported that their extended families and the local traditional culture are important resources for them when it comes to raising children, they also indicated that one of the hardest things about being a parent in the community is the lack of resources that often comes with living in rural isolated communities. They also pointed out a lack of facilities and activities for young children and their families.

In addition, parents and caregivers indicated that one of the main challenges about raising children in the region is the high prevalence of alcohol and substance use in the community.

Most important things that would improve young children’s lives

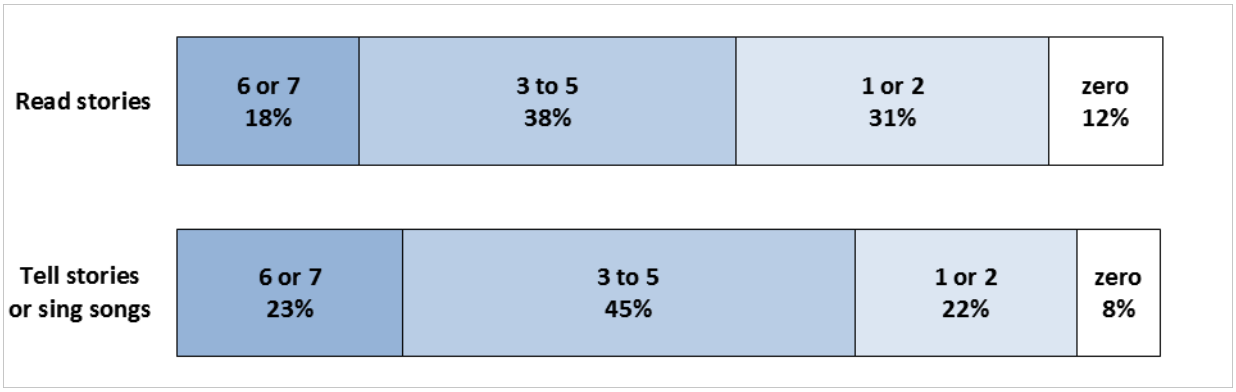
Parents and caregivers were also asked to consider what would improve the lives of young children (ages birth to five) and their families in the region. In response to this question, most parents and caregivers said that increasing safety, primarily by reducing the use of drugs and alcohol, would be a priority for them. Parents also suggested that creating better employment opportunities would make a significant difference in the lives of families with young children. In the words of one respondent, “Create more jobs so people can at least have a stable household.” Additionally, survey respondents pointed out that more parent involvement in school and community events would be important. Parents and caregivers also emphasized the need for additional parent education opportunities, including parenting classes that focus on positive discipline. As one respondent summarized it: “More parent training, since most parents are very young. More job skills training for parents. More training on drug and alcohol abuse in the community.”

Parents and caregivers also suggested having more community events that can bring families together.

Other specific community resources that were mentioned by survey participants included:

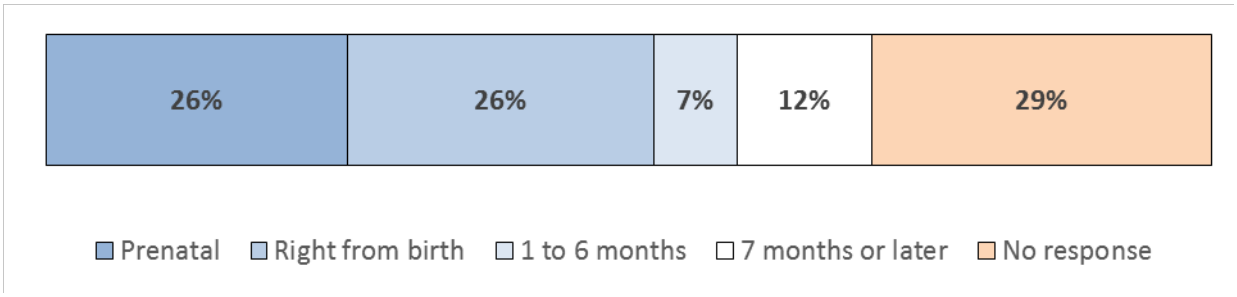
- A library
- A children’s learning center
- A children’s gym
- A safe park
- A juvenile detention center
- Additional Head Start and preschool openings or child care

Figure 16. Reported frequencies of home literacy events: How many days per week did someone read stories to your child? How many days per week did someone tell stories or sing songs to your child? (Parent and Caregiver Survey, 2014).



Source: FTF Parent and Caregiver Survey, 2014

Figure 17. Responses to the question "When do you think a parent can begin to make a big difference on a child's brain development?" (Parent and Caregiver Survey, 2014).



Source: FTF Parent and Caregiver Survey, 2014

Communication, Public Information and Awareness Systems Coordination among Early Childhood Programs and Services

Why it Matters

To create a strong, comprehensive, and sustainable early childhood system, communities need an awareness of the importance of the first five years in a child's life, and a commitment to align priorities and resources to programs and policies affecting these first years. Supporting public awareness by providing accessible information and resources on early childhood development and health, and educating community members about the benefits of committing resources to early childhood, are key to supporting and growing this system. Assessing the reach of these educational and informational efforts in First Things First regions across the state can help early childhood leadership and stakeholders refine, expand or re-direct these efforts.

What the Data Tell Us[90]

Key informants interviewed for this report agreed that the wide range of services and programs available to families with young children in the region represent an asset in the community. Parents appear to be increasingly aware of the importance of early childhood education and of a child's early years in general. Nevertheless, key informants also agreed that many parents in the community still do not know about the services available to them and their young children, particularly for those with special needs. In addition, there is still some stigma associated with children being identified in need of help because of developmental delay. Continued parent education and outreach may be necessary so parents feel more comfortable accessing the resources available to them.

Key informants also emphasized the importance of service providers establishing a good relationship of trust among community members in order for families to utilize existing programs. This may be challenging when services are being provided from limited grant funding and are no longer available after the grant period is finalized.

Data from key informants in the region indicate that the level of coordination among the different programs serving young children and their families tends to vary depending on the

[90] Please note that the data presented in this section are from the 2014 White Mountain Apache Tribe Regional Partnership Council Needs and Assets Report and are the most recent data available. The report is available at http://www.azftf.gov/RPCCouncilPublicationsCenter/Regional%20Needs%20and%20Assets%20Report%20-%202014%20-%20White%20Mountain%20Apache%20Tribe.pdf

specific area of service. Some programs appear to have a closer working relationship than others. For instance, key informants pointed out that services for families in crisis including Apache Behavioral Health, Tribal Social Services Department, Indian Health Service Whiteriver Hospital collaborate well with each other.

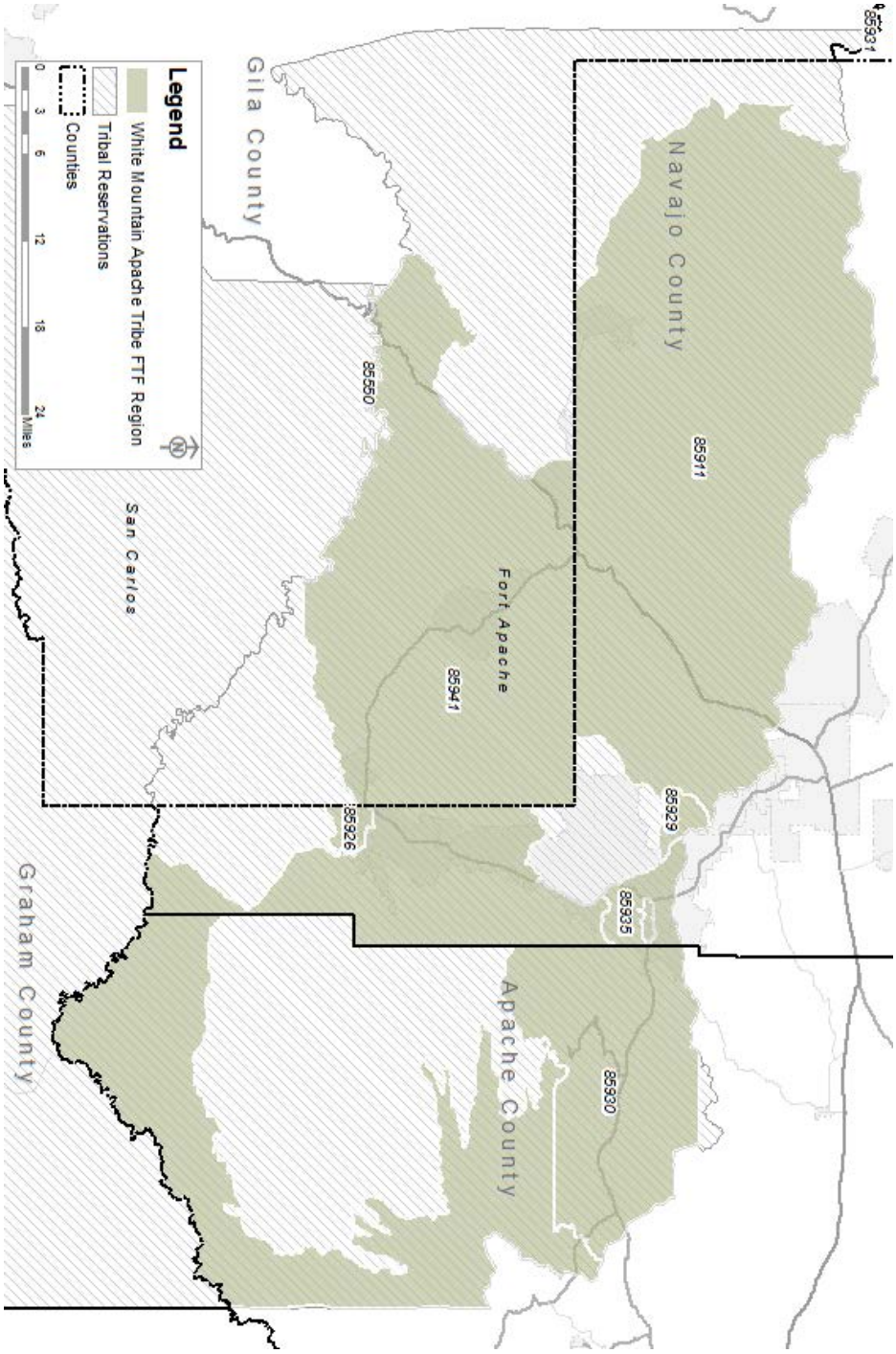
Coordination of services also exist among several agencies that provide to children with special needs such as Whiteriver Unified District, White Mountain Apache Tribe Child Find and Head Start. Key informants offered examples of this sort of inter-agency collaboration can be mutually beneficial: by being present at the Head Start screenings, WIC staff can help Head Start in its mission to increase healthy weight and physical activity among participating families; WIC staff can, in turn, be in touch with families that were formerly WIC clients but dropped out, inviting them to return to the program.

Some key informants indicated that two or three years ago there were regular community meetings for providers of services to children birth to five; this enabled them to discuss the different resources available and network. These meetings seemed to have been useful, but have not taken place in some time. Key informants concurred that it would be helpful for programs serving young children to have an opportunity to meet and network regularly so they could be aware of what other services are available and establish mutual referral systems.

In addition, awareness of the role that the First Things First White Mountain Apache Tribe Regional Partnership Council plays in the early childhood system in the region could be improved. Some key informants pointed out that local programs or agencies think positively and benefit from First Things First-funded services but are unaware of the fact that funding for these services is provided by the White Mountain Apache Tribe Regional Partnership Council. Others indicated that although they had known about First Things First activities in the region in the past, they were unsure of what programs were being offered more recently.

Key informants emphasized the importance of enhanced coordination and collaboration among services providers in the region in order to avoid duplication of services and to make sure that families are not ‘falling through the cracks.’

Appendix 1: Map of zip codes of the White Mountain Apache Tribe Region



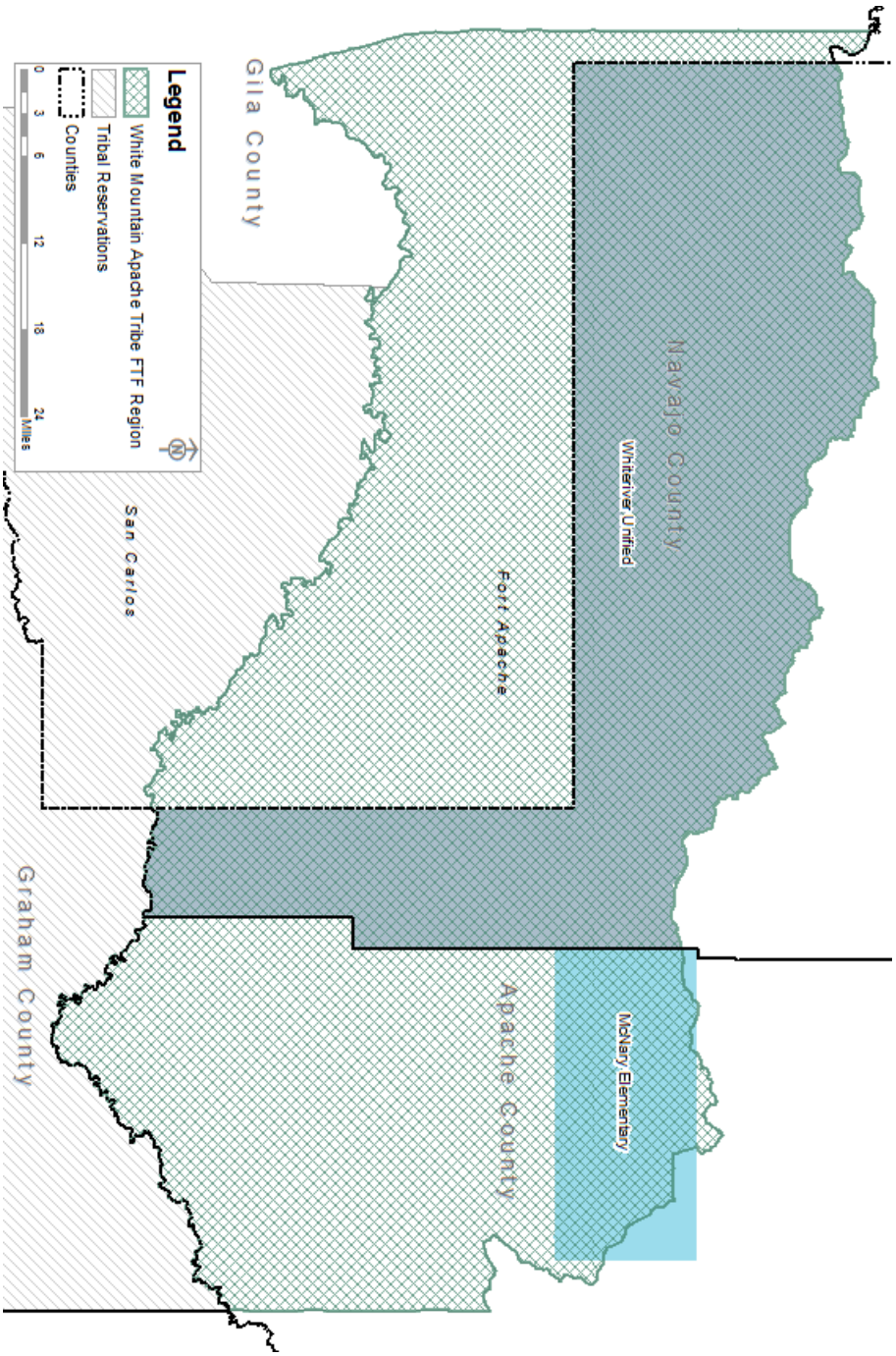
Source: U.S. Census Bureau (2010). TIGER/Line Shapefiles: ZCTAs, Counties, American Indian/Alaska Native Homelands. Retrieved from http://www.census.gov/geo/maps-data/data/tiger-line.html

Appendix 2: Zip codes of the White Mountain Apache Tribe Region

ZIP CODE TABULATION AREA (ZCTA)	TOTAL POPULATION	POPULATION (AGES 0-5)	TOTAL NUMBER OF HOUSEHOLDS	HOUSEHOLDS WITH ONE OR MORE CHILDREN (AGES 0-5)	PERCENT OF ZCTA'S TOTAL POPULATION LIVING IN THE WHITE MOUNTAIN APACHE TRIBE REGION	THIS ZCTA IS SHARED WITH
White Mountain Apache Region	**13,409**	**2,003**	**3,301**	**1,267**		
85911	1,800	269	441	178	100%	
85926	265	29	74	22	100%	
85929	14	1	6	1	0.2%	Navajo/Apache
85930	1,086	172	259	112	100%	
85935	303	23	95	20	6%	Navajo/Apache
85941	9,941	1,509	2,426	934	100%	

Source: U.S. Census Bureau (2010). 2010 Decennial Census, Summary File 1, Tables P1, P14, P20.

Appendix 3: Map of Elementary and Unified School Districts in the White Mountain Apache Tribe Region



Source: U.S. Census Bureau (2015). TIGER/Line Shapefiles: Elementary School Districts, Unified School Districts. Retrieved from http://www.census.gov/geo/maps-data/data/tiger-line.html

Appendix 4: Data Sources

Arizona Department of Administration, Office of Employment and Population Statistics (December 2012): "2012-2050 State and county population projections." Retrieved from http://www.workforce.az.gov/population-projections.aspx

Arizona Department of Administration, Office of Employment and Population Statistics (2014). Local area unemployment statistics (LAUS). Retrieved from https://laborstats.az.gov/local-area-unemployment-statistics

Arizona Department of Economic Security (2015). Child Care Market Rate Survey 2014. Data received from the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [Attendance data set]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [AzEIP Data]. Unpublished raw data received through the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [DDD Data]. Unpublished raw data received through the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [Drop-Out and Graduation data set]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [Homeless data set]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [SNAP data set]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Economic Security (2015). [TANF data set]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Education (2014). AIMS and AIMSA 2014. Retrieved from http://www.azed.gov/research-evaluation/aims-assessment-results/

Arizona Department of Education (2015). Percentage of children approved for free or reduced-price lunches, July 2015. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Health Services (2015). [Immunizations Dataset]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Health Services, Bureau of Public Health Statistics (2015). [Vital Statistics Dataset]. Unpublished raw data received from the First Things First State Agency Data Request

Arizona Department of Health Services, Office of Injury Prevention (2015). [Injuries Dataset]. Data received from the First Things First State Agency Data Request

Arizona Health Care Cost Containment System (2014). KidsCare Enrollment by County. Retrieved from http://www.azahcccs.gov/reporting/Downloads/KidsCareEnrollment/2014/Feb/KidsCareEnrollmentbyCounty.pdf

First Things First (2014). [2012 Family and Community Survey data]. Unpublished data received from First Things First

U.S. Census Bureau (2010). 2010 Decennial Census, Tables P1, P11, P12A, P12B, P12C, P12D, P12E, P12F, P12G, P12H, P14, P20, P32, P41. Retrieved from http://factfinder2.census.gov/faces/nav/jsf/pages/index.xhtml

U.S. Census Bureau (2010). 2010 Tiger/Line Shapefiles prepared by the U.S. Census. Retrieved from http://www.census.gov/geo/maps-data/data/tiger-line.html

U.S. Census Bureau (2014). American Community Survey 5-Year Estimates, 2009-2013, Table B05009, Table B10002, B14003, *B15002,* B16001, B16002, B17001, B17010, B17022, B19126, B23008, B25002, B25106. Retrieved from http://factfinder2.census.gov/faces/nav/jsf/pages/index.xhtml

U.S. Census Bureau (2015). 2015 Tiger/Line Shapefiles prepared by the U.S. Census. Retrieved from http://www.census.gov/geo/maps-data/data/tiger-line.html