

SAN JUAN COUNTY COMMUNITY HEALTH PROFILE

CREATED BY:
COMMUNITY HEALTH IMPROVEMENT COUNCIL
FOR SAN JUAN COUNTY
MAY, 2009

REVISION & UPDATE PREPARED BY:
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Maps/Figures 3.1 (*Land Status*), 3.2 (*Population Dot Density*), 3.8 (*Language Spoken at Home*), and 3.10 (*Regional and County Household Poverty*) were previously published and copywritten in *GIS Applications for Prevention and Evaluation*, by Natalie F. Salvatore, Ph.D. & Shannon R. Dee.

Figure 6.2 (*Poverty and Reported Stress*) was part of a GIS Analysis prepared for San Juan County Partnership, by Natalie F Salvatore, Ph.D., Center Point Consulting.

All other data visualization graphs and charts, with the exception of Figure 2.1 (*Wheel Model of Health*), prepared by Natalie F. Salvatore, Ph.D., Center Point Consulting.

EXECUTIVE SUMMARY

The purpose of this Community Health Profile is to summarize and integrate data pertaining to the community health and well-being of San Juan County. It includes a general description of the county demographics, and it outlines indicators related to maternal and infant child health, morality, leading cause of death, environmental issues and substance abuse. Access to care is described, including the capacity of the health care system, barriers to care, and utilization of services. This Profile is intended to serve as a guide for the Community Health Improvement Council in prioritizing community issues and strategic planning.

Synopsis of Findings

Highlighted in this Profile are important health issues and opportunities for improvement in San Juan County. These include:

Community, Health Status, and Disparities

- Reduce financial burden and related stress, recognizing disparities experienced by Race/Ethnicity, by persons in rural environments of the county, renters, and uninsured.
- Build on community assets, including the rural lifestyle and “small-town” atmosphere, and residents’ appreciation of key facilities and agencies.
- Improve capacity, access to and/or utilization of prenatal care.
- Reduce risk behaviors (e.g., obesity, tobacco use, poor nutrition and physical inactivity).
- Build on protective factors (e.g., community involvement by youth, community centers and neighborhood attachment, exercise and well-being programs, parenting support).
- Increase preventative health care behaviors, such as early screenings, routine check-ups, oral care for children and adults, and flu vaccinations.
- Reduce substance abuse, recognizing the preventable contribution that alcohol-involvement makes to a range of community health problems, including chronic liver disease, accidental injury deaths, domestic violence, suicide and homicide.
- Increase understanding of the effects of and reduce the exposure to environmental health hazards, such as ozone, mercury and pollution (PM) emissions.

Health Related Services

- Increase awareness of services and resources in San Juan County, including health care services and programs, youth and family support services, prevention programs, financial assistance programs, recreational and community networking and peer support opportunities, among others.
- Support the expansion of public transportation, agency-provided transportation, and alternatives to single-driver commuting, such as carpooling.
- Increase information sharing between service agencies.
- Gain a better understanding of the intertwining issues of capacity and access to care in San Juan County, including level of awareness and access by residents in different areas of the county, and the degree to which barriers to care are overlapping.

Health Priorities

The Community Health Improvement Council has identified the following priorities for FY11:

1. Health Priority One: Access to Care
2. Health Priority Two: Healthy Infant Practices

Given the overarching mission of the Council to have a comprehensive impact on community health and well-being, and to serve as an information hub about resources and care, these health priorities are congruent with the findings herein.

INTRODUCTION

2.1 HEALTH COUNCIL DESCRIPTION

The Community Health Council for San Juan County (C.H.I.C.), by resolution of the San Juan County Board of Commissioners, serves as the comprehensive community health improvement council for San Juan County. The C.H.I.C. has received formal recognition from the San Juan County Board of Commissioners as the comprehensive health council for San Juan County and will work with County, City, Tribal and State governments on health planning and addressing issues as they relate to the C.H.I.C.'S broad definition of health.

The Council is a non-hierarchical, participatory advocacy organization with open membership. It is composed of individual citizens, groups, service providers and other agencies committed to the Mission and Vision of the C.H.I.C. The C.H.I.C. will work collaboratively to ensure that the best interests of the entire community are served as we assess needs, plan and affect policy.

Operational Philosophy

The Council carries out its mission and moves toward its vision of community health through implementing the following values, working relationships; and leadership structure:

Values

We are committed to embodying and promoting these values:

- Partnership and collaboration as our modus operandi and our primary role as a catalyst for the promotion of health indicator improvement in the county.
- Justice and equity as essential underpinnings of our collective work, as critical screens for our priorities, and as guides for our advocacy on behalf of consumers.
- A commitment to honoring the diversity of our membership, of our constituencies and of the populations comprising the county community as a whole, balanced and reinforced by our commitment to seeking unity and collaboration among diverse groups and individuals.
- A broad and inclusive definition of "health" as embodied in our Vision Statement, with a focus on the promotion of wellness and the prevention of illness and disease, as well as support for lifelong learning and personal development for all citizens.
- A commitment to honor and support in its broadest sense, i.e., the relatedness between and among people within nuclear, extended and clan families, within communities of place and of interest, and within organization, neighborhoods and communities.
- A commitment to the expression of honesty and mutual support in our consultative processes and in our relations with one another, with our various constituencies and fellow community members.
- The spirit of commitment and activism in engaging and solving problems and in advocating on behalf of our constituents.

Internal Relationships

The Council meets the needs of its membership and works as a collaborative of citizens, providers and other parties through providing a forum, consultative process and activist mechanism for:

- Networking
- Learning, supporting and challenging each other
- Solving problems collectively
- Coordinating efforts and information and working together on issues and activities
- Decreasing duplication of services, identifying and filling unmet needs and gaps in services
- Transforming service systems to become more humane, adequate, functional and accessible

Leadership Structure

The Council operates according to principles of shared leadership, drawing upon the expertise of its members to carry out needed function and actions and establishing task groups as necessary to pursue Council initiatives. A small Core Group is composed of the Council facilitators and volunteers from among the membership to help lead the work of the Council through building meeting agendas, ensuring timely communications, assisting with actions plans and follow-through on Council decisions, facilitating strategic and tactical planning, serving as a clearinghouse for information of value to the Council, and sustaining the engagement and involvement of the membership. Core Group meetings are open to the Council membership.

Meetings

The C.H.I.C. meets monthly on the third Thursday of each month at 3:30pm. For more information on meetings contact the C.H.I.C. Coordinator at 505-566-5877 or cpc@sjcpartnership.org.

2.2 MISSION, VISION, AND PURPOSE OF HEALTH COUNCIL

Mission

The mission of the C.H.I.C. is: to promote the health and well-being of all people in San Juan County and neighboring areas through broad-based dialogue, partnership, advocacy and unified action.

Vision

The San Juan Community Health Improvement Council envisions healthy communities in which the following elements are increasingly evident:

- **Individual and Family Wellness** - Families and individuals are characterized by a high degree of wellness, as reflected in personal health and self-respect, inter-generational activities and relationships, family cohesiveness, family structures in which individual members find respect, nurturance and support, and ample opportunities for family activities in the community;
- **Community Wellness** - Community life is characterized by an overall condition of wellness, as reflected in a sense of inclusion and strong participation in the democratic process; public safety; the absence of violence, exploitation, discrimination, crime and substance abuse; protection of public health and the environment; cooperative leadership; and economic security and sustainability;
- **Cultural Respect** - There is a positive valuing, respect and inclusion of the diversity of cultures that comprise the county's communities; there is proportionate representation of those cultures in the benefits and responsibilities of community life.

- **Educational Quality** - Priority is placed on quality education for all residents, in recognition of the correlation between educational attainment and lifelong health, and with an emphasis on asset-based and success-oriented approaches to teaching and learning.
- **Access to Services** – Families and individuals have access to: food and housing; affordable and quality medical, dental and behavioral health services; and, socioeconomic support services.
- **Cooperative Spirit** - Value is placed on the "ethic of collaboration" as reflected in cooperation and partnership between and among agencies and governments, civic activity and service by citizens, commitment to participatory decision making and problem solving in the spirit of openness, inclusion, and goodwill between groups and individuals, and a shared commitment to ecological and economic sustainability.

2.3 DEFINITION OF HEALTH

The World Health Organization defines health as “a state of complete physical, mental, and social well-being and not merely the absence of disease or infirmity.” The C.H.I.C. believes in this definition and uses the wheel model (Figure 2.1) to help expand this definition to include a broad range of community wellness issues. The C.H.I.C. works to include representation from each spoke of the wheel in the C.H.I.C. membership roster and at monthly meetings.

Figure 2.1: Wheel Model of Health, Community Health Improvement Council, San Juan County, NM



2.4 PROFILE PURPOSE

The purpose of the San Juan County Health Profile is to guide the Community Health Improvement Council in its focus on community issues and priorities. This document will provide broad information on the overall health and wellness of San Juan County. The profile will be a resource to be utilized by the Council as it plans activities and sets goals.

2.5 PROFILE DEVELOPMENT

The 2009 San Juan County Profile was compiled from data collected by the C.H.I.C. Coordinator. Core Team members, C.H.I.C. participants and C.H.I.C. members were given opportunities to review and make changes to the document and then final approval was given by the C.H.I.C. membership at the September 2009 monthly C.H.I.C. meeting.

The 2010 updated revision was compiled by consultants, Natalie F. Salvatore, Ph.D. and Shannon Dee, in preparation for the FY11 Community Health Proposal submission.

MAJOR DATA SOURCES: For the 2010 update, the following community surveys, documents and online sources of data were consulted:

- San Juan County Partnership, Needs Assessment, 2008. Available online at <http://www.sjcpartnership.org>. Includes extensive summary of social indicator data, summary of random household survey of 400 residents, and key informant survey of 30 business owners, government and social service/health agency representatives.
- San Juan Regional Medical Center Community Health Assessment, 2008. Available online at <http://www.sanjuanregional.com> > Resources for the Community. Includes an extensive review of health data from CDC, NM Dept of Health, as well as data from a random, Community Health Survey of over 1,000 residents.
- San Juan County's Growth Management Plan, Services & Planning Survey. Available online at <http://www.sjcounty.net/>. Document provides a thorough description and analysis of San Juan County's demographics, geography, economic growth and recommendations. Also includes summary of data from a survey of 2,850 residents.
- Farmington New Mexico 2009 Consolidated Plan: HUD Community Development Block Grant. Available online at: http://www.fmtn.org/city_government > Community Development Block Grant. Includes 2008 Housing Needs Assessment and strategic priorities for City of Farmington.
- San Juan Youth & Family Resource Directory. Prepared and published by San Juan County Partnership. Available directly from SJCP.
- New Mexico Department of Health Bureau of Vital Records and Health Statistics, Epidemiology and Response Division: NM-IBIS, Health Status Highlights for San Juan County, Selected Health Statistics Annual Reports, including 2007 (Vol 1), 2006 Annual Report, and previous years for trend data.
- Youth, Risk and Resiliency Survey (NM YRRS), New Mexico YRRS state and San Juan County reports for 2007 and previous years'. NM Depts of Health and Public Education.
- Behavioral Risk Factor Surveillance System (BRFSS), from CDC SmartBRFSS 2006 and 2007 for New Mexico, U.S. and San Juan County (Farmington MSA).

COMMUNITY DESCRIPTION

3.1 GEOGRAPHY OF SAN JUAN COUNTY

San Juan County is situated on 5,500 square miles in the northwestern corner of New Mexico. In the heart of the Four Corners region, San Juan is bordered by Colorado to the North, Arizona to the West, and Utah at its northwestern tip.

Geography

San Juan County is characterized by high desert plateau cut by rivers draining into the Colorado River system. Riparian areas and floodplains exist along the river systems, along with nearby uplands and high desert mesas which are primarily piñon-juniper.

The Navajo Reservoir is a large body of water located in the northeast corner, and is a destination for boating and other recreational activities. The Chuska Mountains, which are the highest elevation of the county, lie along the county's western border. Volcanic peaks represent unique physical features, including the Shiprock (one of the most recognized volcanic peaks in the nation) and Angel Peak south of Bloomfield. The *hogback* is a unique geological structure that for many residents signals the boundary of the Navajo Nation when traveling between Shiprock and Farmington on Hwy 64.

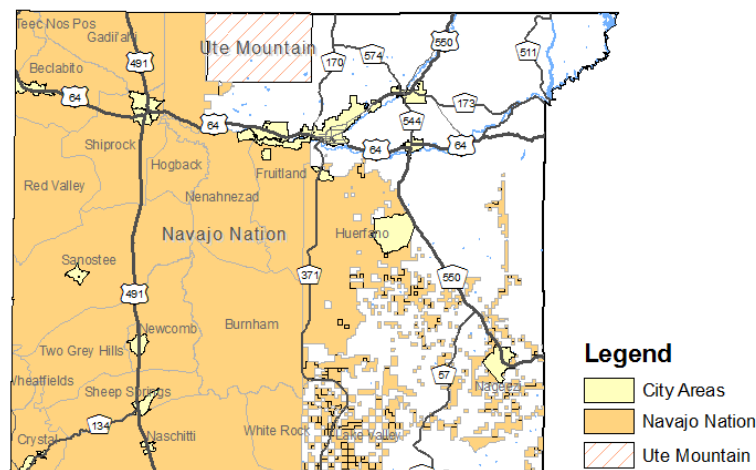
Historical settlement patterns include a history of Navajo herding and farming, Hispanic and White farming and ranching, and, more recently, extensive development to extract oil, gas and coal reserves. Currently, the mining industry is one of the leading employment industries.

Land Status

The western portion and areas of southeastern San Juan County are occupied by the Navajo Indian Reservation. The total land area owned by Navajo Nation is equal to approximately 60% of San Juan County. Another 5% is occupied by the Ute Mountain Indian Reservation in the north-central area of the county, bordering southern Colorado. Together, these Indian Reservation-owned lands comprise approximately 3,600 square miles (Figure 3.1). State- and Federal-owned BLM lands comprise 29%. A relatively small portion (6.5%) is private land (San Juan County, Growth Management Plan, 2007).

Figure 3.1: Land Status Map, San Juan County

Navajo and Ute Mountain Native American Indian Reservations comprise 65% of the land area in San Juan County, NM



Data Sources: US Census TIGER Line & USGS | GIS Mapping, Natalie F Salvatore, Ph.D.

Population Density

The population density of San Juan County, NM is 20.3 persons per square mile. San Juan is the 4th most populous county in New Mexico, and is one of four Census-designated Metropolitan Statistical Areas in the state. Farmington is the principal urban area that serves as a retail hub to much of northwestern NM and the Four Corners. It has an estimated population (US Census, 2006) of 44,000 which swells to twice that or more on weekends.

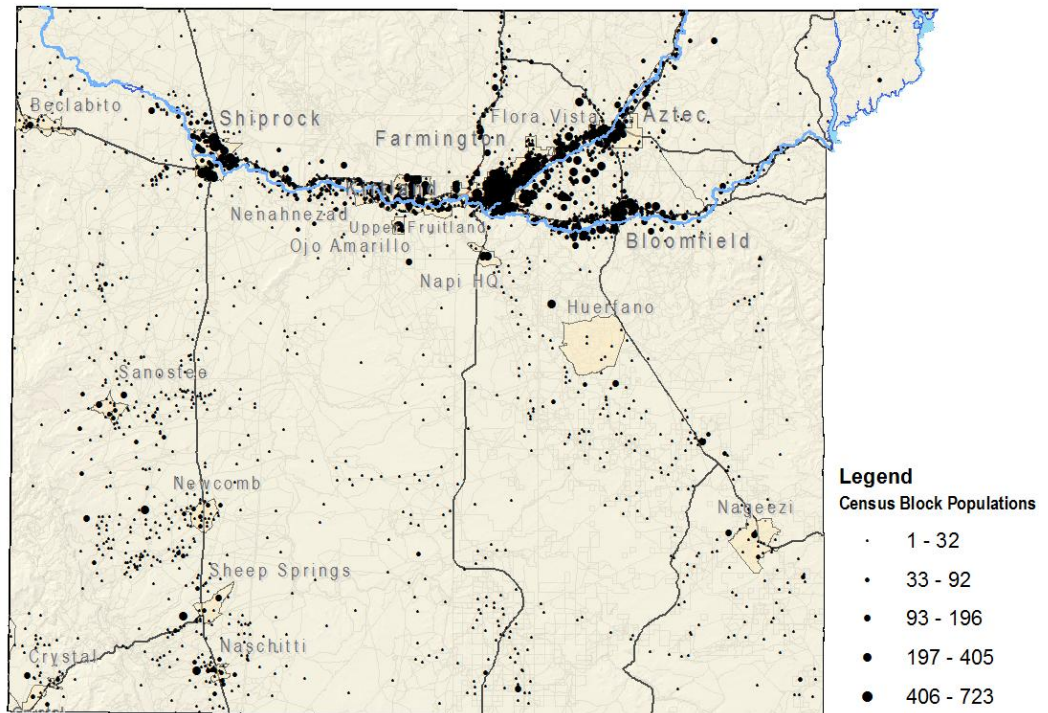
The population dot-density map below (Figure 3.2) depicts the county's settlement patterns. The urbanized portions of San Juan County are primarily along the three rivers that trisect the northern county, the San Juan, the Animas, and the La Plata Rivers. Farmington, the largest urban area of the county, and Aztec, the county seat, are both located along the Animas River; Bloomfield and Shiprock lie along the San Juan River that crosses the county east to west.

Approximately 40% of San Juan County residents are classified as living in rural environments. Several key documents have pointed to the importance of transportation as a critical factor that determines the extent to which San Juan County's "residents are able to access services, gain employment and participate in recreational and community activities" (US Census, 2008).

Moreover, access to resources from rural, remote areas, and transporting emergency supplies is at the mercy of driving conditions, which in winter and early spring leave people living in rural areas of the county particularly vulnerable when poorly maintained dirt roads become impassable, except to four-wheel drive vehicles.

Figure 3.2: Population Dot Density Map

The most densely populated areas in San Juan County are along northern river valleys
Population Dot Density Map, Census Block Group Centroids, 2000



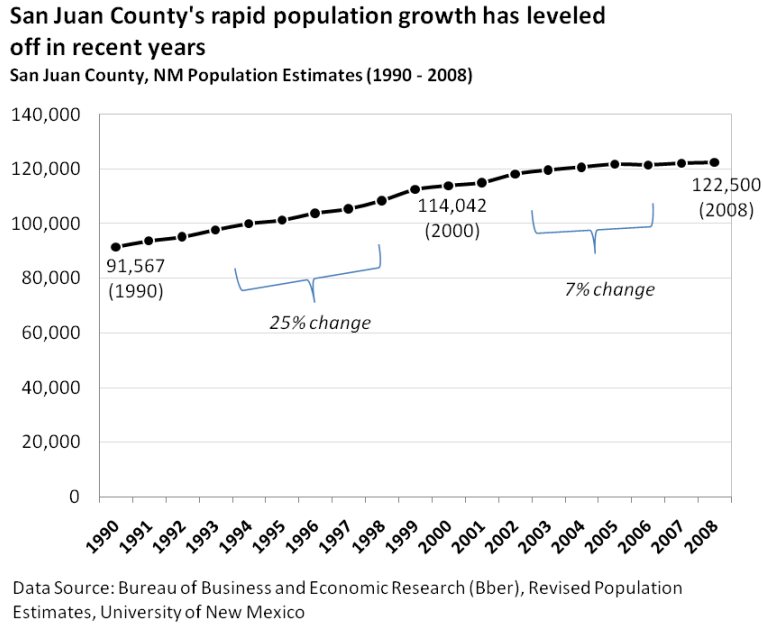
Data Source: 2000 US Census of Population and Housing | GIS Mapping, Natalie F Salvatore, Ph.D.

3.2 POPULATION

Population & Growth

POPULATION ESTIMATES: In 2008, the population of San Juan County was estimated to be 122,500, 51% female and 49% male (Bber, UNM). In the 1990s the county experienced relatively rapid population growth, with a 25% percent increase from 1990 to 2000. The relatively rapid population growth has leveled off in recent years, with a 7% change between 2000 and 2008.

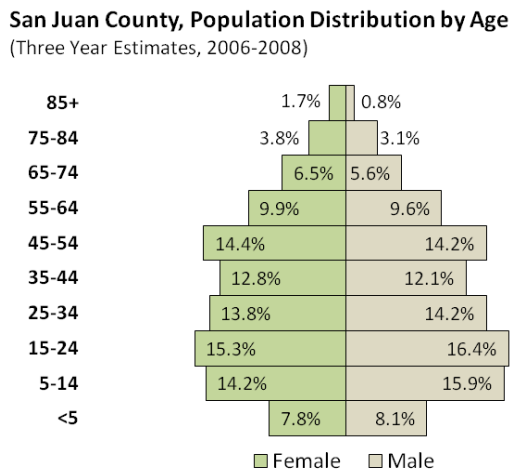
Figure 3.3: Trends, Population Growth



Population Distribution by Gender and Age

AGE DISTRIBUTION: The median age of persons in San Juan County is 32.6 years, somewhat younger than New Mexico's median age of 36, with 28% of the population under the age 18 and 11% of the population 65 or older. The overall age/gender population distribution (Figure 3.4) of the county is generally similar to New Mexico's.

Figure 3.4: Population Pyramid, All Races



Data Source: American Community Survey, 2006-2008, US Census Bureau

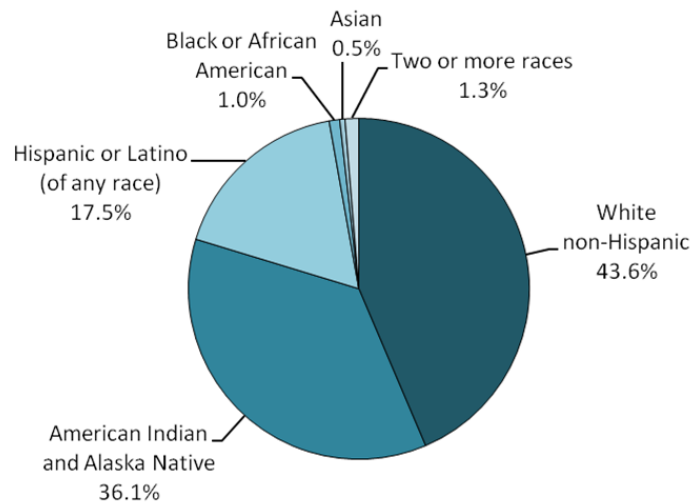
Race/Ethnicity

RACE/ETHNICITY ESTIMATES: According to American Community Survey 3-year estimates for 2006-2008, 56% of the county's population was White, 36% American Indian/Alaska Native, and 17.5% reported Hispanic heritage (Figure 3.5). The Navajo Tribal grouping represented 95% of the total within the American Indian/Alaska Native category. San Juan County has the second largest population of Native Americans in the state, second only to McKinley County.

In keeping with the NM Department of Health practice of combining race and ethnicity for reporting purposes, the pie chart and accompanying Table 3.1 below show San Juan County's population by race/ethnicity in a combined manner. Three-year estimates are used to maximize accuracy for subpopulations estimates.

Figure 3.5: Population Proportion

**Population Distribution by Race/Ethnicity
San Juan County, NM (2006-2008)**



Data Source: American Community Survey, 3-Year Estimates (2006-2008), US Census

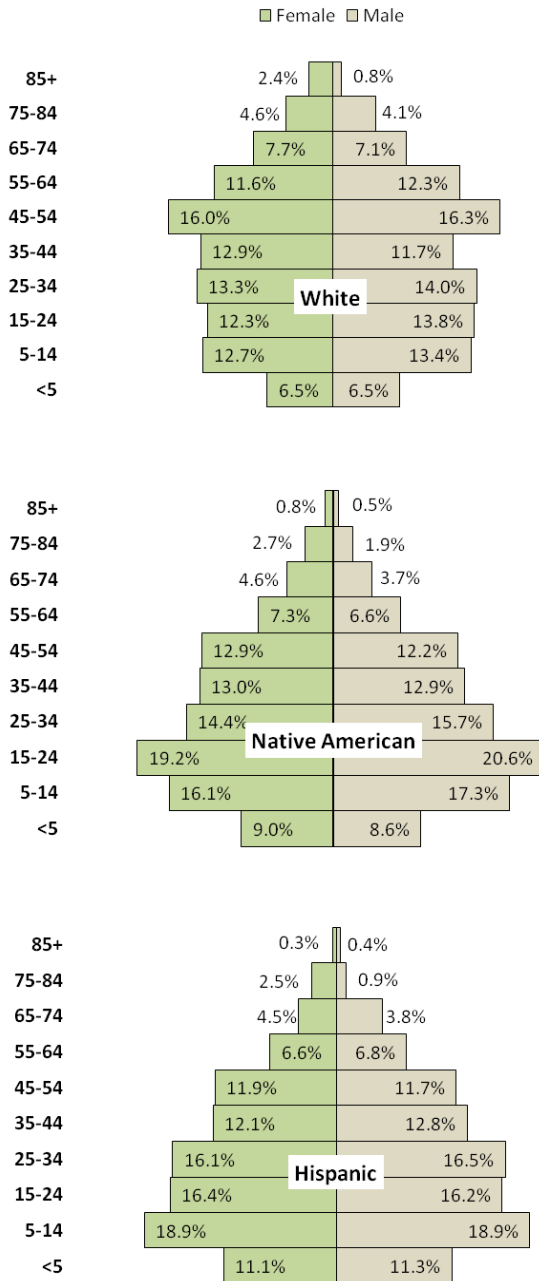
Table 3.1: Population of San Juan County by Race/Ethnicity

| Total population | 122,120 | Percent |
|--|----------------|----------------|
| <i>Not Hispanic or Latino</i> | <i>100,790</i> | <i>82.5%</i> |
| White alone | 53,202 | 43.6% |
| Black or African American alone | 1,182 | 1.0% |
| American Indian and Alaska Native alone | 44,094 | 36.1% |
| Asian alone | 665 | 0.5% |
| Native Hawaiian and Other Pacific Islander alone | 0 | 0.0% |
| Some other race alone | 38 | 0.0% |
| Two or more races | 1,609 | 1.3% |
| <i>Hispanic or Latino (of any race)</i> | <i>21,330</i> | <i>17.5%</i> |

Data Source: American Community Survey, 3-Year Estimates, 2006-2008

Population Distribution by Gender and Age within Race/Ethnicity Categories

Figure 3.6: Population Pyramids by Race/Ethnicity



AGE BY ETHNICITY: Figure 3.6 shows the proportion of age groups by gender within the three largest race/ethnicity categories. Consistent with New Mexico overall, the Native American and Hispanic populations had higher proportions of individuals under 35, whereas the White population had higher proportions of those 55 and older.

These population differences are important when planning strategies and when needing to ensure demographic representation by race/ethnicity within age groups. For example, a prevention strategy targeting 15 to 24 year olds must take into account that Native Americans are 36% of the county's population, but are 46% of the 15 to 24 year olds in the county.

Households & Families

HOUSEHOLD ESTIMATES: In 2008, there were approximately 40,000 households in San Juan County, with an average household size of 3 people, slightly larger than the New Mexico and US average size of 2.6.

FAMILIES: Families comprised 72% of the households, including married-couple families (50%), male-headed households (7%) and female-headed households (15%). Non-family households made up 28% of all households, most of which (25%) were people living alone.

Data Source: American Community Survey 2006-2008, US Census Bureau

Housing

DWELLINGS AND TYPE: In 2008, of the 40,000 occupied housing units, 76% were owner-occupied, 24% were renter-occupied, and an additional 6,000 units were vacant. In 2008, the majority of housing units in the county (56%) were single detached structures, followed by a relatively large proportion of mobile homes (33%). Approximately 3% of all housing units lacked plumbing, 3% lacked complete kitchen facilities and 11% lacked telephone service (American Community Survey, 2008).

HOUSING COST BURDEN: Approximately 1 of 3 San Juan County residents is considered housing cost-burdened: 27% of home owners with a mortgage are paying 30% or more of their income on housing; 35% of renters are doing so.

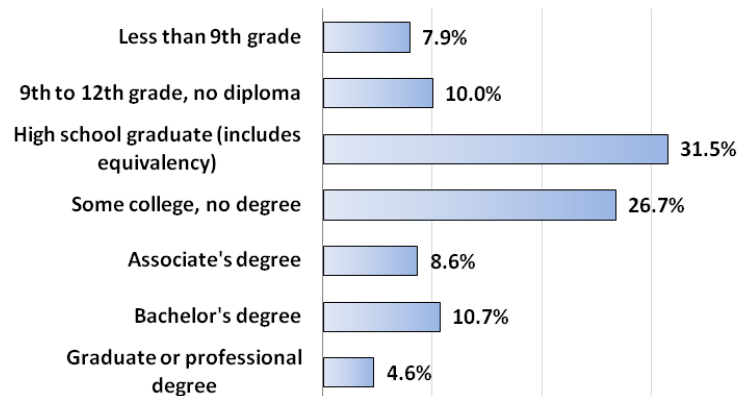
RENTERS AND COST BURDEN: Renters are particularly cost-burdened, and this is especially true in urbanized areas of Farmington where a relatively short supply of rental housing is in high demand. According to HUD, households that pay greater than 50% of their income are considered in greatest need: 18% of renters in San Juan pay 50% or more of their income on housing costs (Farmington New Mexico 2009 Consolidated Plan: HUD Community Development Block Grant). Housing cost burden by renters is further discussed below in Health Disparities.

Education

EDUCATIONAL ATTAINMENT: Of those over 25 years old, 82% of people residing in the county in 2008 had achieved at least a high school diploma or equivalent. Among San Juan residents, 15% had achieved a Bachelor's degree or higher, significantly *less* than New Mexico's 25% overall. And 35% San Juan County residents reported they attended "some college" or had completed an Associate's or 2-year technical degree.

Figure 3.7: Educational Attainment

San Juan County, Educational Attainment, 2008



Data Source: American Community Survey (2008)

PLANS TO PURSUE EDUCATION AFTER HIGH SCHOOL: When asked about future plans on the 2007 NM YRRS, 86% of San Juan County High School students indicated they planned to continue to pursue their education after high school.

GRADUATION RATE: The four-year cohort graduation rate for San Juan County was 57%, for the class of 2008. This is similar to the New Mexico rate of 60%, and less than the national rate of approximately 68% (NM Public Education Department, Certified, 10/2009).

Literacy

DIFFICULTY READING: The literacy of a population is an important social indicator of the ability to learn about, understand and access services. In SJCP's Needs Assessment, 2008, survey respondents were asked was the extent to which "reading well enough to get along" posed a major, moderate, or minor problem for them or for someone on their household. In response, 19% indicated that reading was a major or moderate problem for them. An additional 9% indicated that it was a minor problem. Together, this suggests that about 1 of 4 San Juan County residents experience reading as a challenge.

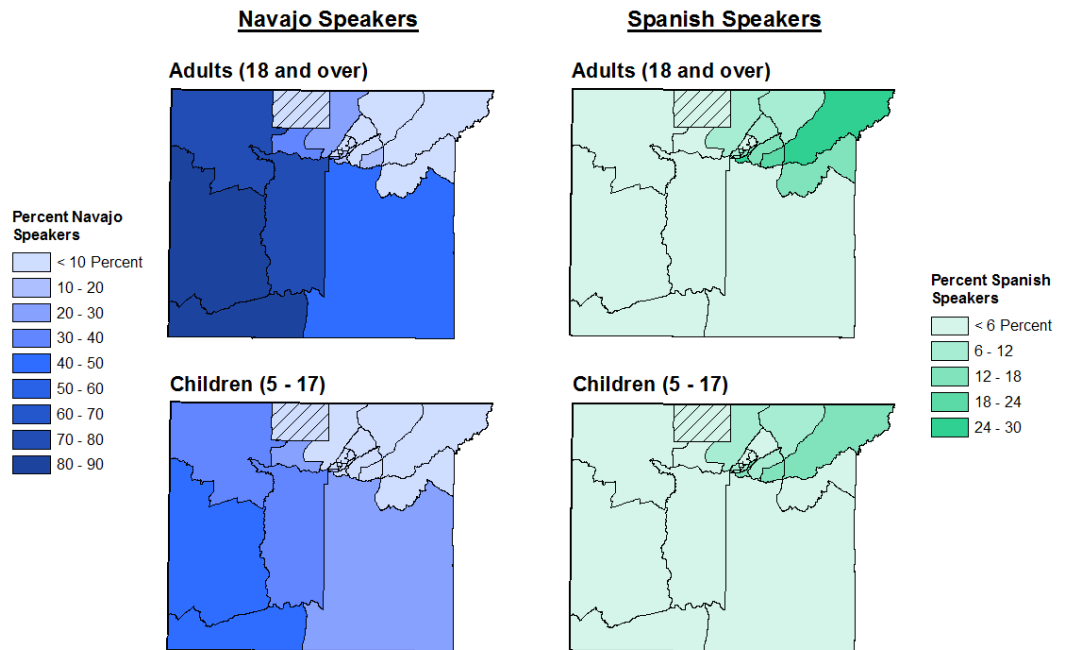
Language

LINGUISTIC DIVERSITY: Of the population 5 years or older, 34% reported that they spoke a language other than English at home; 9% are Spanish speakers, 24% are Navajo speakers. A total of 5% percent reported they "do not speak English very well." Of the 10,000 people in San Juan who speak Spanish at home, over 2,000 do not speak English well; of the 27,000 who speak Navajo at home, 3,500 reported they do not speak English well (US Census, 2000).

The map below (Figure 3.8) depicts Navajo and Spanish speakers, by census tract and age group. In the southwest area of the county, over 85% of adults are Navajo speakers; among children, 45% speak Navajo in those areas. In the northeast area of the county, approximately 13% of the adults are Spanish speakers. Among children, 2% speak Spanish. (*Note: Not visible in the map are three Census tracts, two of which are in Farmington in which there is a larger percent of Spanish speaking children than adults.*)

Figure 3.8: Map, Language Spoken at Home: Spanish and Navajo, by Age

Linguistic Diversity Among Adults and Children, San Juan County, NM, by Census Tract



Data Source: 2000 Census of Population and Housing, Table PCT 10 | GIS Mapping, Natalie F. Salvatore, Ph.D.

Income

PER CAPITA PERSONAL INCOME: According to the NM Bureau of Economic analysis, in 2007, San Juan County ranked 10th in the state with a per capita personal income of \$28,598 compared to the New Mexico average of \$30,706 and the national average of \$38,615.

HOUSEHOLD INCOME TRENDS: Despite economic challenges, there is an indication that San Juan County's income level is showing signs of relative improvement. As an example, in 2005, San Juan County median household income of 36,797 was 98% of the state average and 80% of the national average. In 2008, with an estimated median household income of \$45,971 San Juan was 105% of the state average and 88% of the national average (Small Area Income & Population Estimates, 2008).

ROBIN HOOD INDEX: As a measure of income inequality, the Robin Hood Index of San Juan County is reported to be 31.39%, and is ranked 22nd (*with a rank of 1 being the worst*) in the state on this indicator, compared to New Mexico's average of 32.72% (*Social Determinants of Health, NM Dept of Health, 2005*).

Employment

LEADING EMPLOYMENT SECTORS: Mining (*oil and gas*) is the leading base industry in the county, and one of the largest employment industries. Leading employment sectors are: Services, Retail, Mining, Manufacturing and Agriculture.

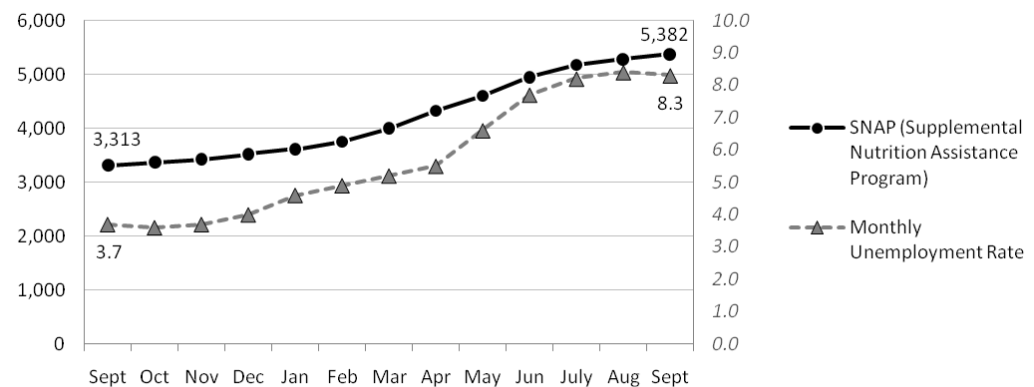
UNEMPLOYMENT: Along with national and state rates, the county's unemployment rate climbed rapidly during 2009, from an annual average of 3.7% in 2008 to 8.7% by October, 2009. (US Bureau of Labor Statistics, accessed Jan, 2010).

SNAP/FOOD STAMPS: It is striking the degree to which the number of SNAP recipients (Supplemental Nutrition Assistance Program, formerly known as Foot Stamps) mirrors the unemployment rate (Figure 3.9). In September 2008, when the monthly unemployment was 3.7%, there were 3,300 SNAP recipients; by September 2009, when unemployment had climbed to just over 8%, the number of SNAP recipients had grown to almost 5,400 (New Mexico Human Services Department).

Figure 3.9: Trends, Unemployment and Nutritional Supplement Program

Unemployment Rate & SNAP Recipients - San Juan County, NM

(Sept, 2008 to Sept, 2009)



Data Sources: Unemployment Rates, US Bureau of Labor Statistics (<http://data.bls.gov>)
SNAP Recipients, NM Human Services Dept. (<http://www.hsd.state.nm.us/isd/reports.html>)

Poverty

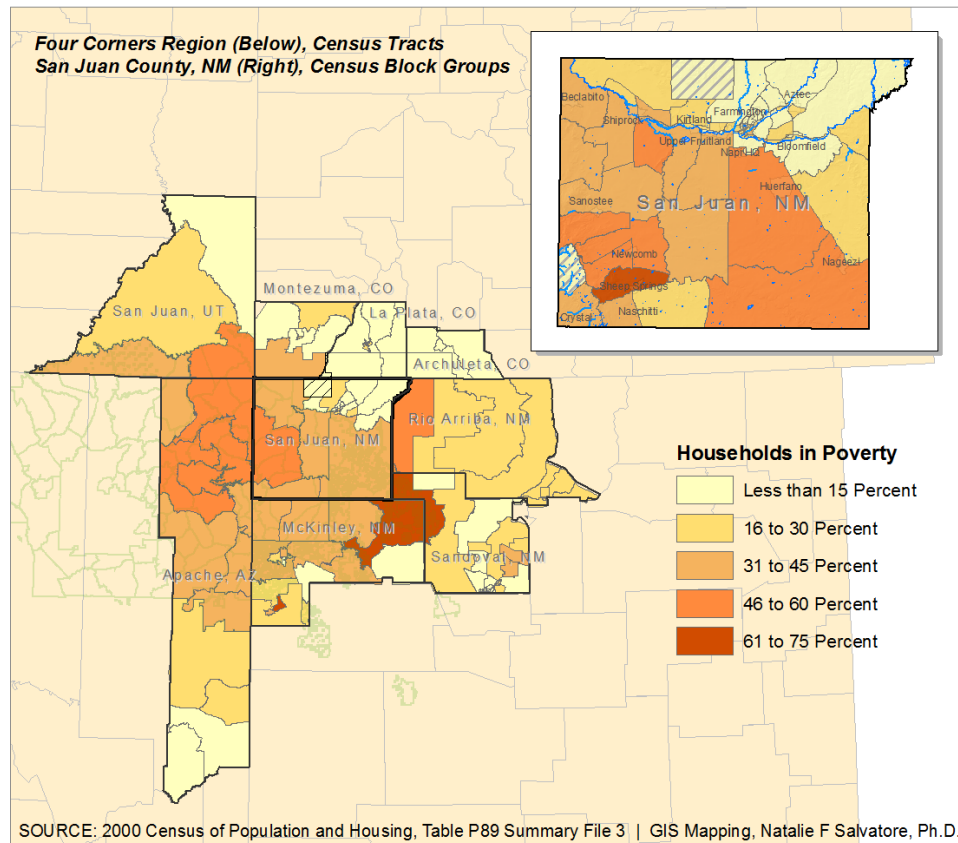
POVERTY ESTIMATES: According to 3-year estimates (American Community Survey, 2006-2008), 17% of people, all ages, in San Juan County were living below the poverty level. This includes 22.5% of all children, and 19% of people 65 years and older.

HOUSEHOLDS: Among family households, 13.5% are living below poverty. A particularly vulnerable population is female-headed households, of which 33.5% are living below poverty. Of female-headed households with dependent children, 43% are in poverty. Eight percent of married couples, and 9% of married couples with children, are living in poverty.

Maps below (Figure 3.10) depict household poverty (from Census, 2000) by Tract (*Four Corners Regional*) and by Block Group (*San Juan County*). The regional map is beneficial for glimpsing how San Juan fits in the larger context.

Figure 3.10: Household Poverty San Juan and Regional Map

In the poorest areas of San Juan County and the Four Corners Region, over half of the households are living in poverty



3.3 COMMUNITY ASSETS AND WELLNESS

Community Input

STRENGTHS OF THE COUNTY: The following is a summary is based on a San Juan County Services and Planning Survey administered as part of the data collected for the Management Plan 2007. A sample of 2,866 residents completed the survey. While the survey achieved less than ideal representation from the western, Navajo area of the county, the results do provide a preliminary snapshot of what respondents consider to be some of the strengths of the county.

The strongest positive responses were:

- Overall quality of life
- Good place to raise a family
- Inviting place to do business
- "I feel safe"
- Good volunteer fire departments
- Good Sherriff's Department
- Good landfill, transfer stations, trash pick-up

GREATEST TREASURES: In addition to the survey, ten meetings were conducted across the county with approximately 50-60 residents. The following "Greatest Treasures" were identified through this process.

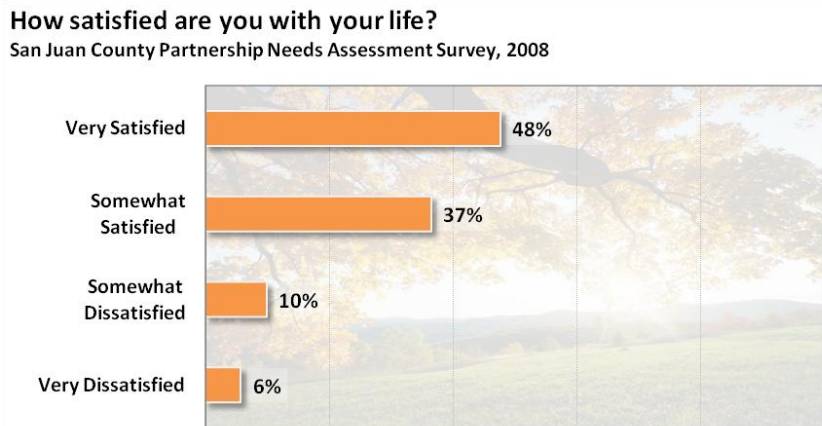
Greatest treasures were:

- Climate
- Recreational activities
- Good people
- Rural lifestyle/quality of life
- San Juan College
- Medical facilities
- Scenery

Life Satisfaction

On the SCJP county-wide Needs Assessment survey, when asked how satisfied they are with their life overall, most respondents indicated they are Very (48%) or Somewhat Satisfied (37%).

Figure 3.11: Reported Life Satisfaction



Data Source: SJCP Needs Assessment Household Survey, 2008 (n=402)

Community Engagement Among Youth

On three separate questions, approximately 70% of youth completing the NM YRRS (2007) in San Juan County responded that “outside of their home and school, they are involved in music, art literature, sports or a hobby,” that they “help other people,” and that they “try to understand what other people feel and think.”

Community Gathering Places

The following is a brief summary of just some of the county’s assets in the area of gathering places. Additional research and mapping projects will expand upon this section with the intention of creating a resource.

CHAPTER HOUSES: Navajo Nation Chapter Houses represent central community gathering places. There are 20 Chapters within the bounds of San Juan County. The Restoring and Celebrating Family Wellness program which meets at the Shiprock Chapter House offers monthly workshops. Historically, Chapter Houses played a more central role, and many contemporary Navajo residents currently strive to inspire increased interest in community gathering at the Chapter level on the Nation.

COMMUNITY CENTERS & LIBRARIES: The Sycamore Park Community Center is a new gathering place in Farmington, offering a variety of activities for families and community members. The new Farmington Public Library and Aztec Public Library are sources of pride for the respective cities, as well as for the county. The Bloomfield Multicultural Center, which houses the recreation center and library, similarly offers a variety of activities to community members. The county has supportive Senior Centers, at least one of which offers a community gardening program for participating seniors.

Additional community centers and venues include the Farmington Civic Center, the Gateway Park Museum and Visitors Center, the E3 Children’s Museum & Science Center, Riverside Nature Center, Farmington Aquatic Center, and the San Juan County Farmer’s Market - Harvest Grove Farm and Orchards in Animas Park, and the Animas Valley Mall. As listed above, San Juan College with its Henderson Fine Arts Center is considered a treasure in the community and provides a forum for conferences, events and entertainment.

ANNUAL EVENTS: Ricketts Park, operated by the City of Farmington, is host to the Connie Mack World Series, with divisions from the US, Canada and Puerto Rico. The annual Shiprock Fair, held in October, is a major week-long event which draws thousands of visitors from the Navajo Nation and Four Corners region.

3.4 INTERPRETATION

Highlights

- San Juan County is a unique mixture which serves as a retail hub for northwest New Mexico and the Four Corners. Two thirds of the county area is Navajo Nation, one of the largest indigenous cultures in the United States with its own language, rich cultural heritage and government.
- The Farmington area, and more generally, the tri-city area of Farmington-Aztec-Bloomfield, is a growing urban area. On the Navajo Nation, the community of Shiprock is a population center for the Shiprock Agency. However, much of the county is highly rural, with inherent challenges of access to services, as well as, the benefits of a rural lifestyle appreciated by many residents. Additional studies should be done to better understand poverty, rural transportation, and access to resources and services, including neighborhood poverty in urban areas.
- For disseminating information about health and services, particularly to Navajo Nation, it should be highlighted that 30% of the residents speak a language other than English at home; as many as 80% of households are Navajo-spoken, in the southwestern quadrant of the county. Radio, specifically, KNDN Radio with a daytime audience of over 200,000 listeners across the Four Corners and Navajo Nation, has been identified as an effective method of education and outreach – a strategy used by SJCP and SJRMC.
- San Juan’s median age is younger overall than New Mexico and the nation, and has higher proportions of young people among Native American and Hispanic populations. In addition, as we shall see in subsequent sections, higher birth rates among Native American and Hispanic populations translate to ongoing higher proportion of services needed for young Navajo and Hispanic parents to address and avert disparities.
- Graduation level and college preparedness is a state-wide concern. San Juan County has fewer residents who have achieved 4-year college and graduate degrees, despite the majority of high school student’s intention to continue their education. The county also has a high school graduation rate that is below state and national benchmarks. It is not clear whether the two-year and technical degrees required by the mining industry are deemed sufficient and desirable, given a relatively comfortable wage, or whether people who move to the county are those with degrees that match the industry. It is likely a combination of the two.
- Poverty affects all areas of life, including health, educational attainment, stress and general well-being. San Juan County encompasses areas of extreme household and child poverty, coupled with unemployment and transportation challenges. This is especially true for rural areas and parts of the Navajo Nation where poverty is 30% or higher, as well as poorer neighborhoods in Farmington. Female-heads of household are a particularly vulnerable subpopulation when it comes to poverty. And like many areas in the U.S., the cost of housing, particularly rental housing, is financially demanding, as it takes up at least a third of the income for 1 out of 3 households.

COMMUNITY HEALTH STATUS

4.1 MATERNAL CHILD HEALTH INDICATORS

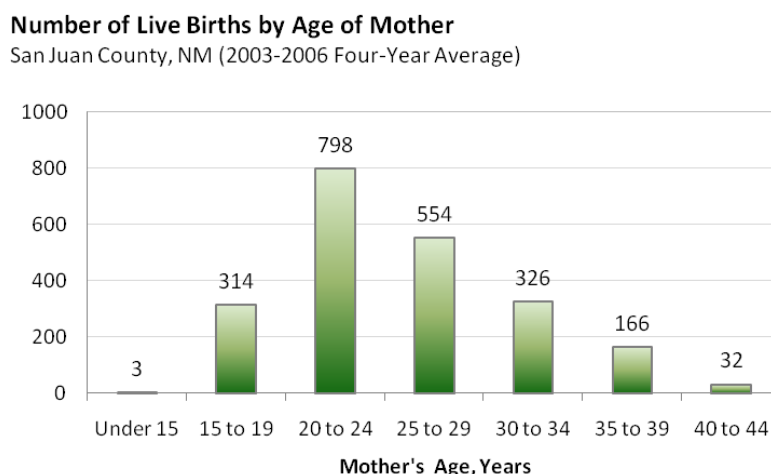
Natality

BIRTHS AND BIRTHWEIGHT: In 2007, with 2,242 births, San Juan County's crude birth rate was 17.4 per 1,000 people, somewhat higher than New Mexico's rate of 14.9 and the national rate of 14.2. Approximately 8% of the births were *low birthweight* (weighed less than 2500 grams); 6% were *high birthweight* (weighed more than 4000 grams). These percentages are similar to national and state values (NM Dept of Health, Selected Health Statistics, 2007, Vol. 1).

BIRTHS BY ETHNICITY: Of the 2,242 live births, 997 (44.5%) were to Native American mothers, 445 (19.8%) were to Hispanic mothers, and 767 (34.2%) were to White mothers. Crude birth rates are higher among the Hispanic and Native American populations in San Juan County. For years 2004-2006, the birth rate among White non-Hispanic was 13.3; among Native Americans it was 18.2; and among Hispanics it was 21.5 per 1,000.

BIRTHS BY AGE OF MOTHER: Using CDC four year-averages (2003-2006) of 2,193 live births in San Juan County, Figure 4.1 below shows the average number of live births by age of mother.

Figure 4.1: Births by Age of Mother



Data Source: Centers for Disease Control & Prevention (CDC), US Dept of Health & Human Services (CDC Wonder, public use data 2003-2006).

Teen Pregnancy

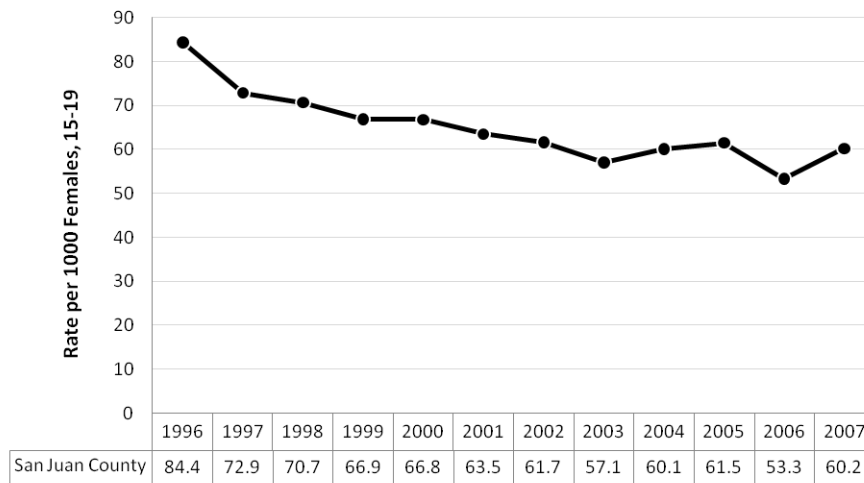
BIRTHS TO TEENS: In 2007, of the 2,242 births, 377 (16.9%) were to adolescent teen mothers, under age 20. This is somewhat higher than New Mexico's 2007 value of 15.6%, but overall the rate of births to teen mothers under 20 is not different in San Juan County compared to New Mexico (Figure 4.2). There does seem to be a difference, though, among teen mothers in the youngest age category (15 to 17 year olds), with San Juan County looking significantly better than the state on this measure (Health Status Highlights for San Juan County, NM-IBIS).

Births to Teens, Trends: Given the connection of teen pregnancy to a host of other health and social challenges, from lower educational attainment to child poverty and overall child health, it is promising to see downward trends, Figure 4.2 below illustrates the steady, downward trend of the teen birth rate in San Juan County, from a high of 84.4 births per 1,000 teen females, to a current range in the mid-50s to low 60s. State and national trends are similar; although state and county teen birth rates are significantly *higher* than the U.S. rate of 42 (in 2006).

Figure 4.2: Teen Birth Rate, Trends

Trends, Teen Birth Rate

San Juan County, NM (1996 - 2007)



Data Source: Selected Health Statistics, Vol. 1, 2007 (and previous years' reports). Bureau of Vital Records and Health Statistics, New Mexico Dept of Health

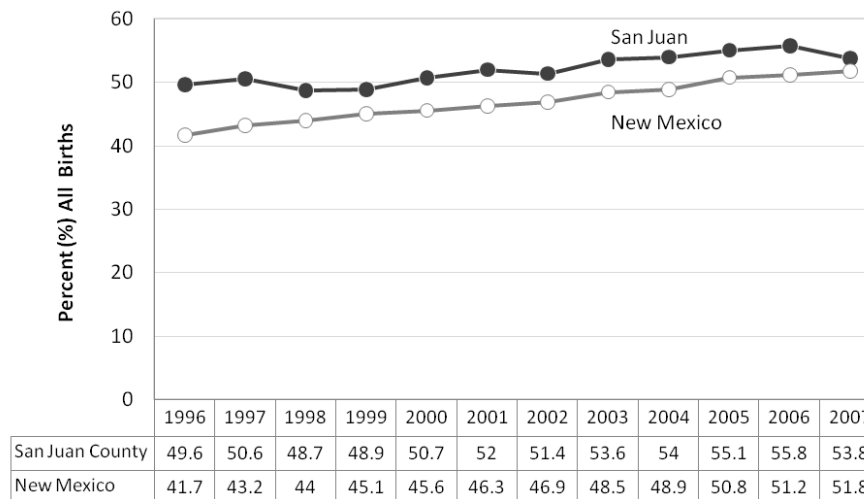
Single Mothers

TRENDS, BIRTHS TO SINGLE MOTHERS: Whereas births to adolescent females has been decreasing during the past decade, the percentage of births to single mothers has been gradually increasing, across the nation as well as the state, and to a somewhat lesser extent, the county. Over 50% of all live births, in the county and New Mexico, are to single mothers (Figure 4.3). Nationally, that number was 38.5% (in 2006).

Figure 4.3: Percent Births to Single Mothers

Trends, Percent Births to Single Mothers

San Juan County and New Mexico (1996-2007)



Data Source: Selected Health Statistics, Vol. 1, 2007 (and previous years' reports). Bureau of Vital Records and Health Statistics, New Mexico Dept of Health

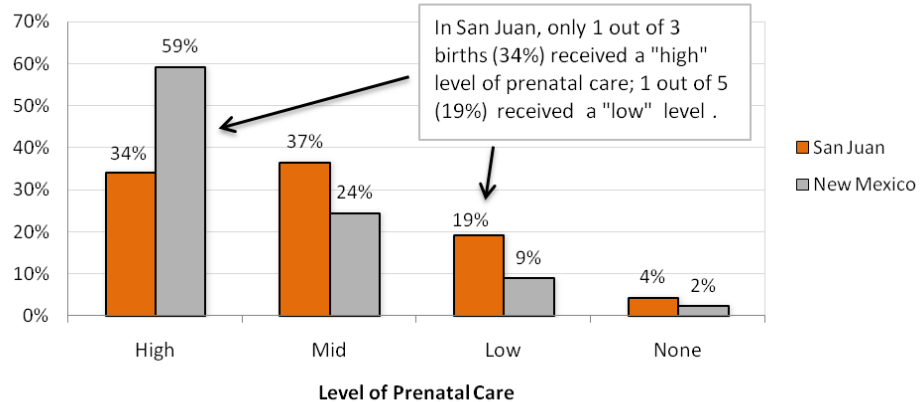
Prenatal Care

LEVEL OF PRENATAL CARE: Figure 4.4 shows the percent of births by level of prenatal care. In 2007, San Juan ranked 33rd out of 33 NM counties for percent of births receiving a high level of prenatal care. For “low” prenatal care as well, San Juan ranked 33rd (with 33 being the *worst*.)

Figure 4.4: Levels of Prenatal Care

San Juan County is Ranked among Worst in State for Prenatal Care

Percent of Births by Level of Prenatal Care, San Juan and New Mexico (2007)



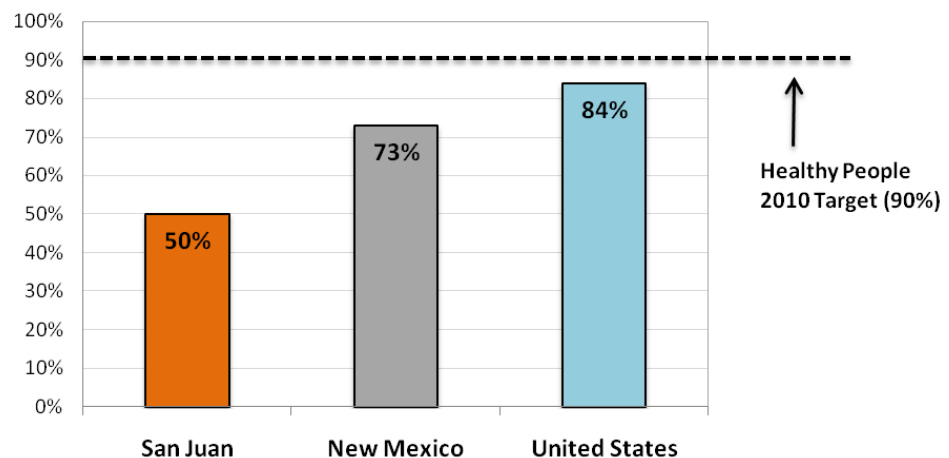
Data Source: Selected Health Statistics, Vol. 1, 2007. Published Oct. 2009. Bureau of Vital Records and Health Statistics, New Mexico Dept of Health

PRENATAL CARE IN FIRST TRIMESTER: Early prenatal care is a predictor of continuous care, as well as one of the best assurances of infant health. San Juan County compares very poorly to both the state and the nation on this indicator. In 2007, 50% of mothers received prenatal care in the first trimester, compared with 73% in the state and 84% in the nation (Figure 4.5.) The CDC 2010 Healthy People target is 90%. Moreover, the proportion of mothers receiving first trimester care has been progressively *decreasing* in the past 15 years, according to San Juan Regional’s Community Health Assessment Report, 2008.

Figure 4.5: Timely (First Trimester) Prenatal Care

Fewer Mothers in San Juan County Recieve First Trimester Prenatal Care

San Juan County and New Mexico (2007), and National (2006)



Data Source: Selected Health Statistics, Vol. 1, 2007. Published Oct. 2009. Bureau of Vital Records and Health Statistics, New Mexico Dept of Health

4.2 MORTALITY

DEATHS AND DEATH RATE: In 2006, there were 820 deaths, (437 males, 383 females) in San Juan County. The age-adjusted death rate (for all causes) was 809.8 deaths per 100,000 people (NM Dept of Health, Selected Health Statistics Annual Report, 2006).

INFANT MORTALITY: For years 2002-2006, there were an average number of 11 infant deaths, with a rate of 5.6, a rate similar to New Mexico's rate of 5.9, but somewhat lower than the national rate of 6.9 (NM-IBIS).

LIFE EXPECTANCY: The average life expectancy (as of 2006) for males was 73.9, for females 78.9, and for all ages 76.4 years. The county has a slightly shorter life expectancy than persons in New Mexico (77.1) which in turn is slightly shorter than the U.S. overall (78.1).

Leading Causes of Death

Table 4.1 below lists six of the leading causes of death in San Juan County. Note the different measurement periods. Rates selected are most recently available multi-year averages, selected to optimize accuracy, and are age-adjusted to U.S. 2000 population. U.S. rates are for 2005.

Table 4.1 Age-Adjusted Death Rates for Leading Causes of Death

| Cause of Death | San Juan County | New Mexico | U.S. |
|---|------------------------|-------------------|-------------|
| Heart Disease <i>(Measurement Period: 2004-2006)</i> | 172.8 | 172.4 | 211.1 |
| Cancer (Malignant Neoplasms) <i>(Measurement Period: 2002-2006)</i> | 157.5 | 161.2 | 183.8 |
| Accidents (Unintentional Injury) <i>(Measurement Period: 2003-2007)</i> | 78.4 | 62.3 | 37.2 |
| Chronic Lower Respiratory Disease <i>(Measurement Period: 2003-2005)</i> | 55.7 | 46.4 | 42.6 |
| Stroke (Cerebrovascular Disease) <i>(Measurement Period: 2003-2005)</i> | 40.9 | 40.7 | 48 |
| Diabetes Mellitus <i>(Measurement Period: 2002-2006)</i> | 37.8 | 32.1 | 24.6 |
| Influenza & Pneumonia <i>(Measurement Period: 2003-2005)</i> | 24.6 | 18.9 | 21.5 |
| Chronic Liver Disease/Cirrhosis <i>(Measurement Period: 2003-2005)</i> | 16.4 | 15.8 | 9.3 |
| Suicide (Intentional Self-harm) <i>(Measurement Period: 2002-2006)</i> | 16.0 | 18.0 | 10.9 |

Data Sources: 2002-2006 and 2004-2006 estimates from NM DOH, NM-IBIS, Health Status Highlights Report; 2003-2005 CDC Wonder, as reported by SJRMC Community Health Assessment.

4.3 CHRONIC DISEASE INDICATORS

Unless otherwise specified, data sources below are New Mexico Dept of Health Selected Health Statistics Annual Report, 2005 and 2006, and NM-IBIS (<http://ibis.health.state.nm.us>).

HEART DISEASE & STROKE: Like New Mexico and the Nation, Diseases of the Heart, or Cardiovascular Disease, is the leading cause of death in San Juan County. For the years 2004-2006, the average number of deaths in the county resulting from heart disease was 158 deaths. Stroke, or Cerebrovascular Disease, is the 4th leading cause of death. In 2006, 37 county residents died of stroke. As can be seen from Table 4.1, above, San Juan's death rates for both of these leading killers are similar to New Mexico rates, but are *lower* than national rates

Cardio/Cerebrovascular Risk Factors: According to San Juan Regional Medical Center's Community Health Assessment (2008), 88.5% of their Community Health Survey respondents reported one or more cardiovascular risk factors. Risk factors included tobacco use, obesity, poor nutrition and inactivity.

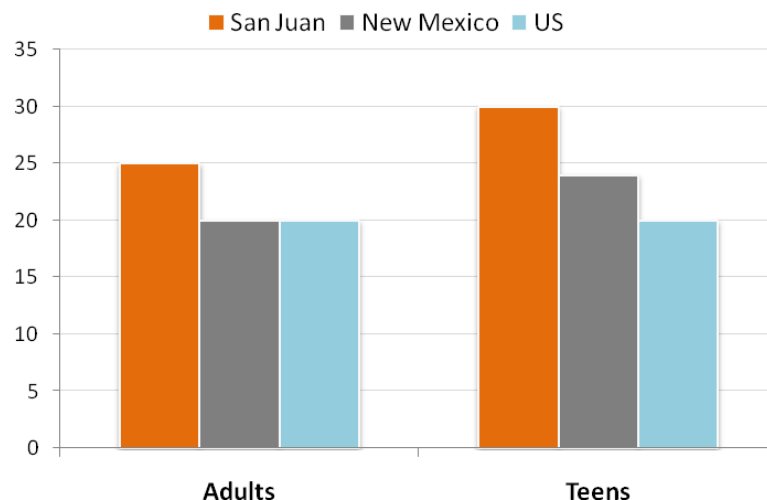
Subpopulations: As is true of most locations, males in San Juan are at a higher risk of death from heart disease, with a rate of 231 per 100,000 in 2006, compared to females in San Juan with a rate of 156. The San Juan Regional reported noted that in addition to men being a high-risk subpopulation, adults over 40 and people below poverty are more likely to report risk factors.

CHRONIC LOWER RESPIRATORY DISEASE: San Juan County's rate of CLRD is *higher* than both New Mexico's rate of 46.4 and the U.S. rate of 42.6. Of the three diseases that comprise CLRD (chronic bronchitis, asthma, and emphysema), asthma is a recognized concern in San Juan County, and has been connected to high levels of ozone in the county.

Cigarette Smoking: Tobacco use is a leading risk factor of CLRD. According to BRFSS data (2006), San Juan County's rate of smoking was 25%, somewhat higher than both New Mexico's and the national rate of 20%. Similarly among youth, San Juan County's rate of teen smoking, at 29.6%, is higher than New Mexico's rate, 24.2%, and the national value of 20.0%. Note that the 5% difference between rates for adults is not *statistically* significant. The rate of smoking among teens in San Juan County is statistically *higher* than the nation's, and according to the NM-IBIS Health Status Highlights for San Juan County Report, is also "significantly worse than the state."

Figure 4.6: Comparison, Rates of Cigarette Smoking

Rates of Cigarette Smoking, Adults and Teens, Higher in San Juan County



Data Sources: Adults, SmartBRFSS (2006); Teens, NM-YRRS (2007) & New Mexico Dept of Health, ERD, NM-IBIS Health Status Highlights for San Juan County

Asthma: The lifetime prevalence rate of asthma among adults in San Juan County is 12%, according to BRFSS data (2006/2007); current asthma prevalence is 8%. According to NM YRRS data, lifetime prevalence among youth in San Juan is 21%; current prevalence is 17%. When asked on the SJCP Needs Assessment survey, 18% of the respondents reported they had experienced a “problem with asthma in the past year,” and asthma was the most common reported health concern their children had had in the past 12 months. According to San Juan Regional’s Community Health Survey, 7.6% of children were reportedly diagnosed with asthma. As noted below in the section on Environmental Health Indicators, asthma, or more specifically, emergency visits for asthma, is associated with high ozone levels of great concern in the county.

CANCER: San Juan County’s rate of deaths due to cancer, or formally, Malignant Neoplasms, is 157.5 deaths per 100,000, aggregated across years 2002-2006. This rate is similar to New Mexico’s rate of 161.2, but somewhat *lower* than the national rate of 183.8. As in the state and nation, lung cancer is the most common of the malignant neoplasms.

Gender & Cancer: While the rate of deaths due to cancer among men is higher (171 in 2006) than among women (136 in 2006), the years of potential life lost (YPLL) is higher for females (1,345 years) than for males (1,157 years) in San Juan County, suggesting that when women die of cancer in San Juan, they may do so earlier in life, compared to men. The opposite trend is true for both New Mexico and the U.S. for YPLL due to cancer deaths.

DIABETES: The rate of Diabetes Mellitus is higher in San Juan, with 37.8 deaths per 100,000, compared to New Mexico, 32.1, which is in turn significantly higher than the national rate of 24.6.

Diabetes and Race: This county-wide rate is largely due to the higher prevalence of diabetes among Native Americans. In New Mexico, the prevalence of Diabetes among American Indians/Native Alaskans is reported to be 19.3%, significantly higher compared to all other race/ethnicity categories which range from 6.7 (White non-Hispanics) to 12.2 (Hispanics).

CHRONIC LIVER DISEASE/CIRRHOSIS: The rate of Liver Disease/Cirrhosis in San Juan County of 16.4 deaths per 100,000 is similar to New Mexico’s rate of 15.8. In turn, New Mexico’s rate is significantly higher than the national rate of 9.3.

Alcohol Use: An associated risk factor is the rate of chronic, heavy alcohol use; although San Juan County residents’ self-reported chronic, heavy drinking (3%) does not generally differ from or is lower than state and national self-report data (BRFSS, 2007).

ORAL HEALTH: According to BRFSS data (2006), 62% of San Juan County residents had been to the dentist at some point in the past year. This is somewhat lower than the national average of 70% for the same year. Among pregnant women in the county, 13% reported having a dental problem; 24% reported receiving dental care, somewhat below the number for New Mexico overall of 28% (PRAMS, 1998-2003, 5-Year Averages).

Risk Factors – Oral Health: According to the CDC, “tooth decay affects children in the U.S. more than any other chronic infectious disease.” (www.CDC.gov/OralHealth/topics/child.htm). Untreated tooth decay causes pain and infections that may lead to behavioral and health problems in a variety of other areas. Risk factors include inadequate daily tooth brushing and exams, not getting regular teeth cleaning and exams, and eating a lot of sugary foods or liquids.

4.4 INFECTIOUS DISEASE INDICATORS

INFLUENZA AND PNEUMONIA: In 2006 there were 19 deaths due to Influenza and Pneumonia. With an age-adjusted rate of 20.5 deaths per 100,000 for 2006, it was the 7th leading cause of death in San Juan County.

Flu Shot: According to data collected by San Juan Regional Medical Center, 63% of adults 65 and older had received a flu shot in the previous year. This value is similar to New Mexico findings overall, but less than national rate of 73%.

Pneumonia Vaccine: San Juan Regional's report notes that 73% of adults aged 65 or older had received a pneumonia vaccination at some point in their lives, a value similar to national findings.

HIV/AIDS: The average number of AIDS cases for years 2005-2007 in the county was 2.4. The county's age-adjusted aggregated rate of .8 deaths per 100,000 (for years 2001-2003) due to HIV/AIDS was less than the statewide rate of 1.8, and well below the national rate of 4.7 deaths per 100,000. Of the deaths due to HIV/AIDS in San Juan, the majority were among Whites. On San Juan Regional's Community Health Survey, 50% of San Juan County respondents reported having been tested for HIV, a finding similar to the U.S. rate value of 47%.

CHLAMYDIA: The incidence rate of Chlamydia for years 2004 to 2006 was 473. This rate is similar to New Mexico (476), but significantly higher than the national rate of 318 per 100,000. A disproportionate number of cases are attributed to Hispanics (30%), compared to White non-Hispanics (23%). The incidence of Chlamydia has been increasing over the past 10 years in the county, as well as in New Mexico and the U.S.

HEPATITIS B: The incidence of Hepatitis B. for years 2005 to 2007, is somewhat lower in San Juan, at a rate of 6.6, than New Mexico, but is significantly higher than the national incidence of 2.2 cases per 100,000 (CDC Wonder). Across New Mexico and in San Juan, the incidence of Hepatitis B has been decreasing. Among San Juan Regional Medical Center's survey respondents, 40% reported they had received the Hepatitis B vaccine.

4.5 ENVIRONMENTAL HEALTH INDICATORS

According to the pollution information website, Scorecard, San Juan County is the worst county in New Mexico for release of toxic materials to the environment, and is ranked in the top 10% of worst counties in the United States for toxic releases to the environment.

Air Quality

Of the six “criteria” pollutants for which the U.S. Environmental Protection Agency (EPA) has established ambient air quality standards for, three are of particular concern in the Four Corners: ozone, nitrates, and particulate matter, due to oil and gas operations, regional power plants, and general growth.

OZONE: The Air Quality Bureau operates [three] monitoring stations in San Juan County that measure ozone, one station west of Farmington near PNM San Juan Generating Station, one north of Bloomfield near the Bloomfield Gas Corridor, and a newly installed station near Navajo Lake, which began monitoring on 3/23/06. The EPA’s “ozone standard” is .08 parts per million (ppm). Ozone measures at one of the three substations (Navajo Lake) included 8-hour daily measures which exceeded this standard, prompting the development of the “San Juan County Ozone Reduction Initiative” in 2009.

Asthma & Ozone: In San Juan County, a recent study highlights that exposure to ozone is associated with increased emergency room visits for asthma. Specifically, San Juan residents are “1.7 times more likely to have an asthma medical visit after being exposed to a 10 parts per billion increase in local ozone levels” (State of New Mexico 2008 Comprehensive Strategic Health Plan, p. 48; and The State of Health in New Mexico, 2009, p. 30; NM Dept of Health).

PARTICULATE MATTER: Particulate Matter (PM), or particle pollution, results from a variety of sources, including vehicle exhaust, wood burning, mining and utility smokestacks. Particulate matter air pollution is especially harmful to people with lung disease such as asthma, chronic bronchitis and emphysema. According to Scorecard, San Juan County is in the top 10% of the worst counties in the United States for PM-2.5 emissions, PM-10 emissions, and sulfur dioxide emissions. Area power plants are the major contributor of these three pollutants

Related Illness Attributions: Among San Juan Regional Medical Center’s survey respondents, 15% attributed an illness to “Outdoor Air Quality.” This is similar to national findings of 12%.

Water Quality

The Surface Water Quality Bureau has identified “all parts of the San Juan, Animas, and La Plata Rivers as being impaired by one or more pollutants.”

MERCURY: According to the Four Corners Air Quality Task Force, mercury is a pollutant that is of particular concern in the Four Corners region. Mercury is released into the environment from coal-fired power plants and from mining. The San Juan Watershed Group, a task force that began meeting in 2001, suggests that the primary sources of fish tissue mercury in the San Juan Basin are most likely atmospheric depositions, and runoff from areas impacted by historic and current mining. In support of this conclusion, according to the New Mexico Oil Conservation Division, there have been a total of 743 documented groundwater incidents related to the oil and gas industry in New Mexico.

Mercury is a heavy metal that builds up and remains in the ecosystem and can be found in toxic levels in fish in many areas in San Juan County. Even in small amounts, mercury can cause a variety of physiological problems, illness, and even death, according to Dr. Grossman, a Durango physician researching the effects of mercury on pregnant women and their newborn infants.

Safety

NEIGHBORHOOD PERCEPTIONS OF SAFETY: The SJCP Needs Assessment survey asked respondents to what extent they felt safe walking in the streets of their community or neighborhoods. Among the respondents, 32% reported that it was either a moderate or major problem, in other words, that they did not feel safe and secure walking in the streets. An additional 44% said it was “not a problem.”

Safety and Low-Income Neighborhoods: A survey conducted by San Juan Safe Communities Initiative targeting a low-income potential Weed & Seed project area found that while approximately 30% were highly concerned about high risk neighborhood activities such as gangs, drug dealing and crime, 88% felt that police were very or somewhat responsive to community concerns.

4.6 INJURY, VIOLENCE, SUBSTANCE ABUSE INDICATORS

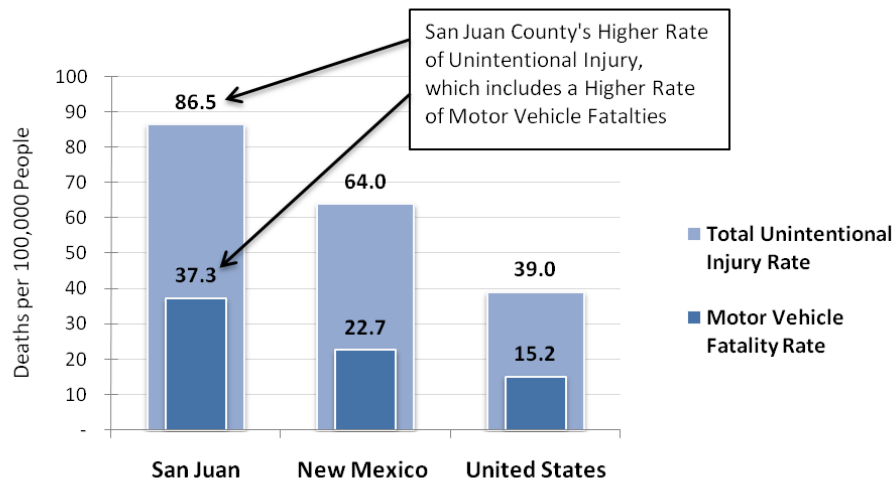
Injury Deaths

UNINTENTIONAL INJURY DEATH: Unintentional (accidental) injury deaths include deaths from accidental poisonings, falls, drowning, fatal motor vehicle crashes, and other injuries that result in death. As seen in Table 4.1 above, unintentional injury or accidents is the 3rd leading cause of death in San Juan County. In 2006, there were 100 unintentional injury deaths in San Juan County, 67 males and 33 females, with a rate of 86.5 for that year. The county's rate is significantly higher than state and national rates of 64 and 39 respectively (Figure 4.7). This pattern of results holds for rates aggregated across years, with a county rate of accidental death due to injury of 78.4 deaths per 100,000 for years 2003-2005, higher than New Mexico's rate of 62.3, and more than twice the national rate of 37.2.

Motor Vehicle Traffic Fatalities: A sub-set of unintentional injury deaths is motor vehicle accidents. Of the 100 injury deaths in 2006 in San Juan, 47 were motor vehicle accidents (males, 30 deaths; females, 17 deaths). San Juan County has a high rate of motor vehicle deaths, compared to New Mexico and the nation. With a rate of 37.3 deaths per 100,000 (in 2006), San Juan's rate of motor vehicle fatalities is significantly greater than New Mexico's rate of 22.7, and is well over twice the U.S. rate of 15.2 (in 2005).

Figure 4.7: Unintentional Injury Death Rates

Deaths due to Unintentional Injury, including Motor Vehicle Accidents
San Juan County & New Mexico (2006) and the U.S. (2005)



Data Source: New Mexico Dept of Health, Bureau of Vital Health Statistics, Selected Health Statistics Annual Report, 2006

Alcohol Involvement in Motor-Vehicle Fatalities: While San Juan County has a high rate of motor-vehicle fatalities overall, the relative level of alcohol-involvement is also markedly high. Of the 191 people killed on the roads in San Juan County over a period of five years, from 2004 to 2008, 104 of them were in alcohol-related crash fatalities – that is over 54% alcohol-involvement. In other words, over half of the traffic fatalities involved alcohol. New Mexico's average alcohol-involvement for these years was 40%.

Youth Risk & Protective Behaviors: On the NM YRRS, youth in San Juan County report behaviors that contribute to unintentional injury at a level similar to New Mexico overall. In San Juan, 12.8% reported that they drove after drinking in the past 30 days; 27.7% rode with a driver who had been drinking.

INTENTIONAL INJURY DEATH: Suicide is the 9th leading cause of death in San Juan County, which has a rate of suicide deaths of 16 deaths per 100,000 for years 2002-2006. This age-adjusted rate translates to an average of 19 suicide deaths per year in the county for years 2004 to 2006. San Juan’s rate is statistically similar to New Mexico’s rate of 18, and significantly higher than the national rate of 11 suicide deaths per 100,000. The homicide death rate over the past three to five years in San Juan County is in the range of 6 to 9.7, generally similar to New Mexico and the nation (NM-IBIS, Health Status Highlights San Juan County).

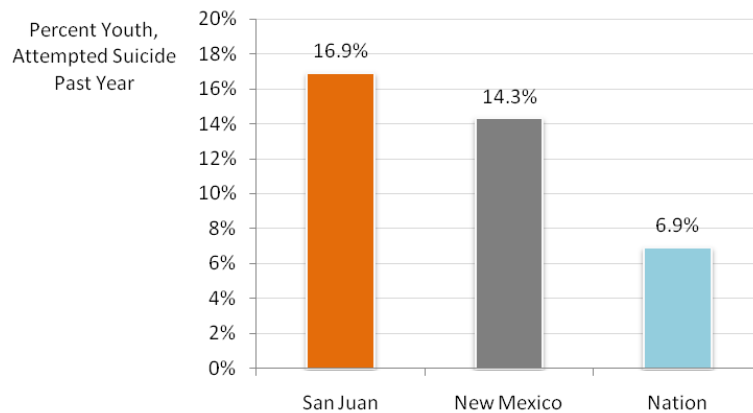
Alcohol Involvement: According to SJCP’s Needs Assessment summary of Office of the Medical Examiner data for San Juan County, of the suicide cases examined by the OMI in 2006, 44% of the suicide deaths and 55% of the homicide deaths in the San Juan tested positive for the presence of alcohol.

Suicide: On YRRS questions related to mental health, suicidal ideation and suicide attempts, all measures were somewhat higher among San Juan County youth. The only statistically significant difference between San Juan and New Mexico youth is seen on self-reported sadness and hopelessness. Among San Juan youth, 38.7% reported feelings of sadness and hopelessness, compared to 30.8% of New Mexico youth. When analyzed by gender, females across the board are higher on all measures of self-reported suicidal ideation, feelings and attempts, including making a suicide plan, attempting suicide, and seriously considering suicide.

In 2007, New Mexico ranked #1 (*worst* in the nation) for self-reported suicide attempts among teens (14.3%; YRRS, 2007). San Juan County rates of reported suicide attempts among teens are similarly high. Nearly 17% of youth in San Juan County reported they had attempted suicide in the past year, 20% of the females and 12% of the males.

Figure 4.8: Reported Suicide Attempts, NM YRRS and National YRBS

New Mexico and San Juan County Rates of Suicide Attempts by Youth, Among Highest Rates in Nation



Data Source: NM Youth Risk & Resiliency Survey (2007), State and San Juan County reports

Youth Risk Behaviors – Violence & Safety: Behaviors associated with violence in San Juan are similar to New Mexico. For example, one out of three youth in San Juan County reported they had carried a weapon in the past 30 days, compared to 27.5% of youth in New Mexico. Only one of these measures showed a significant change over time: “having been in a physical fight in the past 12 months” increased from 30% of San Juan County youth in 2001 to 41% in 2007, representing a significant increase on this item. There is a significant gender difference on all violence questions, with males reporting higher involvement in violence-related behaviors. For example, 46.5% of the males and 21.5% of the females reported they had carried a weapon in the past 30 days.

Abuse, Neglect or Violence

CHILD ABUSE: In SFY2009, according to New Mexico Child Youth and Family Department, there were 452 substantiated allegations of child abuse in San Juan County. The majority of these, 68%, were cases of physical neglect. An additional 28.5% were physical abuse and 3.1% were sexual abuse. Over the last 6 years, rates of reported child abuse have not changed substantially.

Related Self-Report: Among respondents asked to report on what has happened to them and/or someone in their family in the last 12 months, the San Juan County Partnership Needs Assessment survey (2008) reported that 14% of the respondents reported that a child in the family was a victim of bullying; 6% indicated that a family member was a victim of child abuse, and 5.2% reported that a family member was a victim of sexual abuse.

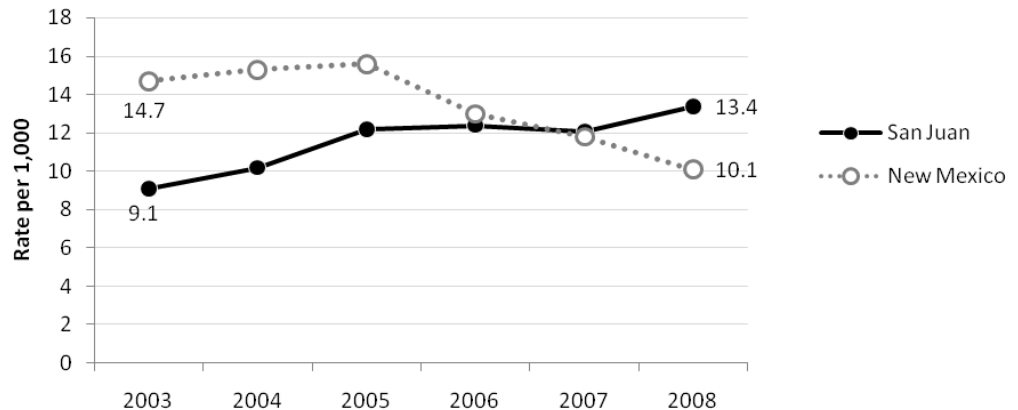
DOMESTIC VIOLENCE: The 2008 Needs Assessment also found that 16% of respondents reported that they or a family member was a victim of domestic violence in the last 12 months. San Juan Regional Medical's Center's Community Health Survey reported similar findings, with 16.5% of respondents acknowledging that they have been threatened by physical violence by an intimate partner in the past five years, similar to reports found on national surveys (14.6%).

Trends, Domestic Violence: The graph below (Figure 4.9) depicts trends in domestic violence rates per 1,000 for years 2003 to 2008, for San Juan and New Mexico. San Juan County's rate has risen steadily from 9.1 in 2003 to 13.4 investigated incidents per 1,000 in 2008, now exceeding the state rate, which has declined from 14.7 to 10.1 in the same time frame.

Figure 4.9: Trends in Rates of Domestic Violence

Trends, Domestic Violence

San Juan County & New Mexico (2003 - 2008)



Data Source: Incidence and Nature of Domestic Violence in New Mexico IX, Betty Caponera, Ph.D. The New Mexico Interpersonal Violence Data Central Repository

Alcohol Involvement: According to Caponera's analysis of data from the New Mexico Interpersonal Violence Data Central Repository, approximately 40% of all of the domestic violence cases reported in San Juan County involved alcohol/drug use.

Substance Abuse

Throughout this section, alcohol-involvement and alcohol as a risk factor have been included in the discussion. Additional items below describe specific substance abuse data not yet discussed.

LONG TERM COUNTY PRIORITY: According to the SJCP Needs Assessment 2008, "The issue of DWI, alcohol and other substance abuse remains the highest priority issue in San Juan County, as identified in this and all three prior county-wide community Needs Assessments conducted by San Juan County Partnership (1996, 2000 and 2004)."

ALCOHOL- AND DRUG-INDUCED DEATHS: San Juan County's rate of alcohol-related deaths, 17.6 deaths per 100,000, is similar to New Mexico's rate overall, but significantly higher than the national rate of 7 alcohol-induced deaths per 100,000 people. This rate includes all deaths (including injury, motor vehicle crashes, homicides/suicides, as well as chronic diseases such as liver disease/cirrhosis) in which alcohol is an underlying cause of death. Among the state's 33 counties, San Juan ranked 14th (with 1 being the worst) for this indicator. San Juan County's rate of drug-induced death, 9.0 deaths per 100,000 for years 2002 to 2006, is lower than New Mexico's rate of 18 and somewhat under the national rate of 11.2. Among the state's 33 counties, San Juan ranked 29th (with 1 being the worst) for this indicator (NM-IBIS, Health Status Highlights for San Juan County).

Adult Risk Behavior: Self-reported binge drinking, by 11.5% of San Juan County residents averaged across years 2006/07, is statistically similar to state and national reports. Among youth, self-reported binge drinking is higher, 28%, though not different than New Mexico and national youth self-report.

Youth Risk Behaviors: Compared to New Mexico, youth in San Juan County report statistically similar levels of substance use for all substances asked about on the NM YRRS, including marijuana and alcohol. Early first use of alcohol is a clearly identified predictor of problems with alcohol and addiction later in life. New Mexico youth are ranked 1st worst in the nation with 30.7% of youth using alcohol prior to age 13. In San Juan, the finding is similar; 29% of youth in San Juan reported having first used alcohol prior to age of 13.

Additional Youth Risk Factors: A higher percentage of San Juan County youth report knowing one or more adults who use drugs (66.3%), compared to 57.4% of New Mexico youth overall. When analyzed by gender, a significantly larger number of females (75%) than males (57%) reported knowing adults who use or deal drugs.

Youth Protective Factors

As highlighted in the New Mexico YRRS (2007) state report, youth who report higher levels of resiliency or protective factors are less likely to engage in risk behaviors related to substance abuse, such as binge drinking, than those with lower levels. Reported protective factors among San Juan County youth are similar to New Mexico overall.

Among San Juan County youth, some of the protective factors include:

- 66% reported high level behavioral boundaries (rules and structure) in the home; an additional 27% reported moderate level boundaries
- 49% reported a high level caring relationship with parents, and a additional 38% reported a moderate level of caring relationship
- 46% reported high level of involvement in school activities; an additional 14% reported moderate level of involvement
- 38% reported a high level of meaningful participation in the community. This represents a significant increase from 28% in 2001.

4.7 RISK AND RESILIENCY INDICATORS

The risk and resiliency factors described here inform overall health and well-being, and they run throughout the categories described above.

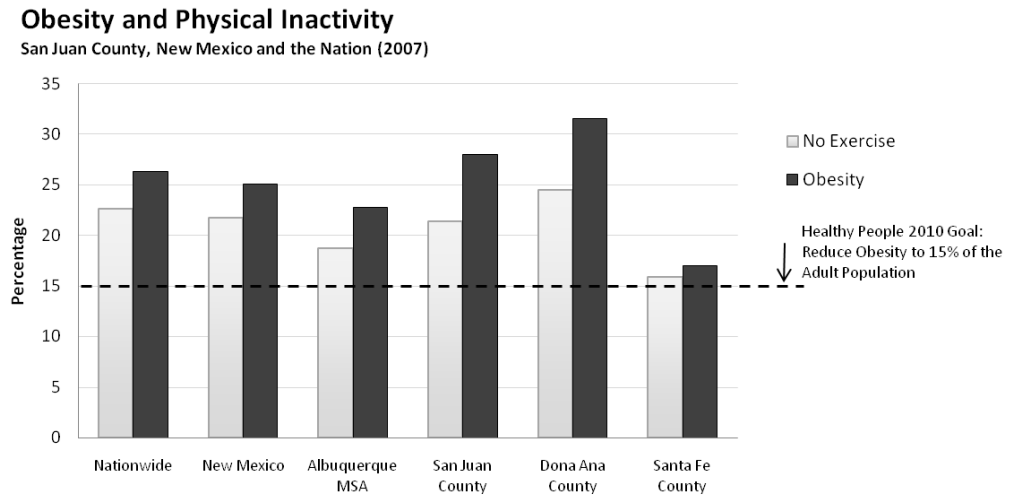
OBESITY & OVERWEIGHT: Having a body mass index (BMI) of 30 or greater, which classifies someone as obese, is strongly associated with higher mortality rates from all causes, particularly cardiovascular disease. Being overweight and obese is in turn characterized by being less physically active, a health risk factor in itself.

Adults: According to BRFSS 2007 data, 28% of San Juan County residents are classified as obese, slightly higher than New Mexico's and national rates. This finding is similar to SJRMC's Community Health Survey, which additionally reported that 38% of San Juan County residents are overweight though not obese. In all, over 65% of San Juan residents are overweight or obese.

Youth: Among youth reports on YRRS (2007), 15% of youth in San Juan County are obese, which is somewhat higher than New Mexico's 11% overall. An additional 14% are overweight. In all, 29% of San Juan County youth are overweight or obese. When analyzed by gender, males (22%) are significantly more likely to be obese than females (9.2%).

PHYSICAL ACTIVITY: Various surveys define "physically inactive" differently. On the BRFSS, 21% San Juan County adult residents are classified as physically inactive, that is, they "report no leisure time exercise or physical activity in the past 30 days." Among youth, 15% were physically inactive; according to the YRRS, they reported "no days of 60 minutes of physical activity in the past 7 days." In addition, 49% of the students on the YRRS reported they had "no days of PE in an average school week."

Figure 4.10: Obesity and Physical Inactivity, BRFSS, 2007



Data Source: Behavioral Risk Factor Surveillance System (BRFSS) 2007, CDC.

Obesity is defined as a Body Mass Index (BMI) of 30 or above. No Exercise refers to doing no leisure time exercise or physical activity in the past 30 days. MSA refers to Metropolitan Statistical Area, a Census designation for groups of counties that contain at least one urbanized area of 50,000 or more inhabitants.

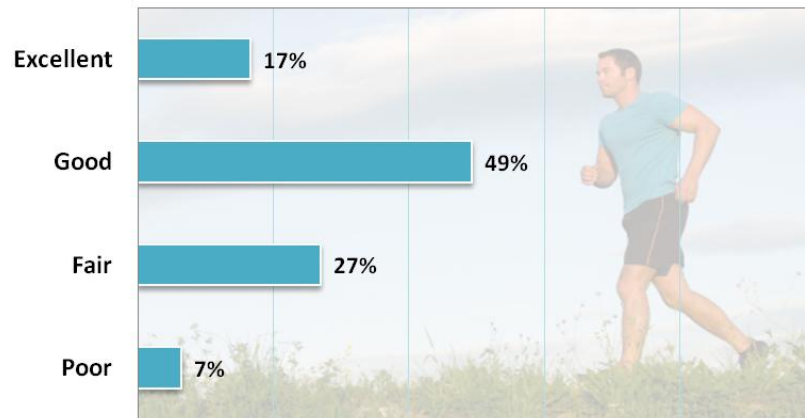
NUTRITION: According to BRFSS data, 25.5% of San Juan County residents met the recommended daily consumption of 5 servings of fruits and vegetables. This is similar to national findings on the BRFSS, and is also similar to finding that 23.4% San Juan County youth met this recommendation. A promising note is that for youth, this represents a significant increase from 16% in 2003 (NM YRRS, 2003/2007).

HEALTH CARE PROVIDER SUPPORT: On San Juan Regional Medical Center’s Community Health Survey, of those who were classified as obese, 45% indicated they had been given advice about their weight by a health professional in the past year. Similarly, 40.8% of all respondents, and 56.8% of obese respondents, reported they had received diet/nutrition advice from a physician in the past year. On SJCP’s Needs Assessment survey, 73% of those who reported having a health issue or condition in the past year were receiving medical attention for it.

SELF-REPORTED HEALTH STATUS: According to BRFSS data (2007), 17% of San Juan County residents reported their health as “fair” or “poor.” The SJCP Needs Assessment survey (2008) found a higher percentage of respondents who rated their health as fair or poor.

Figure 4.11: Self-Reported Health Status

How would you rate your physical health?
San Juan County Partnership Needs Assessment Survey, 2008



Data Source: SJCP Needs Assessment Household Survey, 2008 (n=402)

4.8 SUMMARY & INTERPRETATION OF COMMUNITY HEALTH STATUS INFORMATION

Highlights

- Strategies designed to educate and support young parents need to take into account the race/ethnicity and single-parent proportions among younger people, and also recognize the high poverty rate among these subpopulations is an overlay that affects access and ability to utilize services. Birth rates are higher among Native American and Hispanic San Juan County residents, and while births to adolescent teens is decreasing, births to single-mothers has been steadily rising, both of which are state and national trends. Fifty percent of all live births in San Juan are to unmarried women.
- Prenatal care in San Juan County is strikingly less favorable than New Mexico and the nation. Over the past 5 years, San Juan has consistently ranked among the worst counties for both timely (first trimester) and level of prenatal care.
- San Juan County rates of cardiovascular (heart) disease, stroke and cancer are lower than national rates, but are higher on diabetes, chronic lower respiratory disease, liver disease, unintentional injury and suicide. The *order* of leading causes of death is generally the same as the nation, except that for San Juan, deaths due to unintentional, accidental injuries is the 3rd leading cause of death; stroke is 5th. Across the nation, accidental injury death is the 5th leading cause; stroke is 3rd. San Juan's rate of death due to accidental injury is more than twice the national rate.
- One of the highlights of the mortality section is San Juan Regional Medical Center's survey finding that 88.5% of their San Juan County respondents reported one or more health risk factors. Risk factors in their analysis included tobacco use, obesity, poor nutrition and physical inactivity. While these risk factors are commonly tied specifically to cardiovascular disease, they cut across virtually all chronic diseases, including diabetes, cancer and respiratory disease. Moreover, they contribute to overall health, quality of life and well-being.
- Environmental pollutants in San Juan and the Four Corners region has received state-wide and national attention, particularly as San Juan began to edge dangerously into the Federal ambient ozone standards. The connection of ozone levels and hospital emergency visits for asthma has been documented. The NM Department of Health has written a strategy to address exposure to environmental hazards in San Juan County into the FY11 Strategic Plan for Improving Community Health.
- It has been said that, "alcohol added to an already bad situation just makes it worse." Alcohol is a risk factor that runs throughout the community health status section, and it is a top-rated priority concern in the county. The alcohol-induced death rate in the county compares similarly to New Mexico, but is well over twice the national rate. Moreover, alcohol involvement is a substantial contributor – and preventable component – that plays a role in 40%, on average, of accidental injury deaths, motor vehicle fatalities, suicides, homicides and domestic violence incidents. A variety of prevention programs are in place to address alcohol, and substance abuse generally, and to reduce this risk factor among young people in particular.
- The risk factors described above outline key components – and improvable factors – that contribute to a healthy lifestyle and reduce chronic disease. They include maintaining a healthy weight, physical exercise, good nutrition, and early, ongoing health care attention. And as can be seen, there is room for improvement on all of these risk factors. Strategies designed to assist families to participate in wellness programs can have far-reaching positive effects.

HEALTH RELATED SERVICES: CAPACITY, ACCESS AND USE

5.1 CAPACITY

Physicians & Health Care Professionals

HEALTH CARE PROFESSIONALS – SHORTAGE DESIGNATION: Like 17 other counties in New Mexico, San Juan is a “whole county designated service area,” that is, an area designated as having a shortage of primary medical care, dental or mental health providers.

Physicians: According to the New Mexico Health Policy Commission’s annual report of health professionals in New Mexico, (2009), there were 161 Licensed Physicians residing in San Juan County in 2008, with a rate of 1.25 Physicians per 1,000 people. This is below New Mexico’s rate of 2.22. Previous years’ Health Policy Commission reports suggest this is a *decrease* in the number of physicians, down from 218 in 2007.

Specialty Care Physicians: Of the 161 physicians, 69 are “Licensed Specialty Care Physicians,” meaning they have a special practice area such as cardiovascular disease, urology, rheumatology, or other. With 69 Licensed Specialty Care Physicians, San Juan has a rate of .54 per 1,000 people, about half New Mexico’s rate of 1.09.

Nurses: In 2008, there were 840 Licensed RNs, a slight increase from 810 in 2007. San Juan’s rate of 6.52 RNs per 1,000 is under the New Mexico rate of 7.98 RNs per 1,000 people.

GOING ELSEWHERE FOR CARE?: According to San Juan Regional Medical Center’s Community Health Assessment, and corroborated by similar findings by SJCP Needs Assessment, approximately 25% of county survey respondents seek medical care elsewhere, for example, by traveling to Albuquerque or Durango. Most respondents expressed they went elsewhere to receive some type of *specialty* care, such as, Cardiology.

DENTISTS: Dentists are in particularly short supply in New Mexico, and San Juan County is no exception. In 2007, there were 56 dentists in San Juan County, resulting in a rate of 45 per 100,000 people. This is similar to New Mexico’s rate of 46 dentists per 100,000 people. New Mexico is ranked 50th, that is, *worst* in the nation for dentists per capita.

Primary Care Reimbursement & Oral Care: In 2008, the state of New Mexico began offering a new state reimbursement program whereby primary care physicians are able to be reimbursed for preventative oral health services for children. This program is designed to address access challenges, especially among publicly-insured children (Briefing, National Academy for State Health Policy, Sept. 2009).

Hospitals & Clinics

SAN JUAN REGIONAL MEDICAL CENTER: San Juan Regional Medical Center (SJRMC) is an acute-care and community provider 260-bed capacity hospital located on the west end of Farmington. Of the 260 beds, 72 were added in 2006 in a major addition to the hospital; 20 were added in 2008 when the fifth floor of the new addition was completed. The hospital delivers a range of healthcare services to the citizens of San Juan County and the Four Corners region.

SJRMC Physician Clinics and Specialized Care: The SJRMC system includes nine Physician Clinics, including clinics specializing in neurodiagnostics and neurosurgery, cardiology, pediatrics, urgent care, internal medicine, behavioral health, and women’s health. A satellite health Physician Clinic is located in Bloomfield. In addition, the system encompasses a specialized 20-bed Rehabilitation Hospital, the only licensed rehab hospital in the Four Corners, as well as a cancer center, a wound treatment center, and laboratory / radiology services. The recently expanded Nephrology Unit is a 38-bed unit offering specialized care for kidney disease, much of which is caused by diabetes. Finally, a van is available, by appointment, to transport residents to medical visits (<http://www.sanjuanregional.com>).

AirCare: AirCare is San Juan Regional Medical Center's medical flight program which serves the residents of San Juan County, the Four Corners region, and much of the Navajo Nation. The

program includes both a helicopter and an airplane which are fully staffed with highly trained personnel and state-of-the-art equipment. This service is dedicated to the transfer of critically ill or injured patients 24 hours a day.

NORTHERN NAVAJO MEDICAL CENTER (IHS): The Northern Navajo Medical Center is an Indian Health Service (IHS) facility servicing the Shiprock Service Unit. Shiprock is the largest Service Unit serving the Navajo Nation and extends west into Arizona and north into Utah. Approximately 50,000 Native Americans mostly Navajo Tribally enrolled live in the Service Unit. The NNMC is a short-term hospital with 69 beds. The daily inpatient load is 40, and the daily outpatient volume averages 400 per day. Annual OB cases range from 700 to 750, and annual average number of ER cases range from 15,000 to 16,000 (<http://ihs.gov/Navajo> > Health Care Centers > Shiprock). Multiple field clinics are open from 1-5 days per week, each are staffed by Shiprock MD's. The NNMC also operates the Navajo Area Radiation Exposure Screening and Education Program (RESEP) that serves uranium industry workers and downwinders residing on the Navajo Indian Reservation.

NNMC Emergency Services: The Department of Emergency Medical Services- Shiprock Field Office is located in the community of Shiprock. The Shiprock Office serves a population of 32,000 and an area of about 1,300 square miles.

GENERAL HEALTH CLINICS: In addition to those mentioned above, there is a Public Health Department office in Bloomfield, the DZ Health Center south of Huerfano, and five health clinics/centers in Farmington, including the Farmington Community Health Center, the VA Community Clinic, Health Center Family Clinic, Reliance Urgent Care and the Public Health Department office in Farmington.

Services & Agencies

The following summary of services is based on the *Family Youth & Family Resource Directory*, produced by San Juan County Partnership.

CHILD, YOUTH AND FAMILY SUPPORT: The Resource Directory lists an extensive number and variety of support services available for children, youth and families in the San Juan County, both on the Navajo Reservation and off. Services range from court-based (e.g., Drug Court, Juvenile Services Center, CASA) and school-based services (e.g., Student Assistance Services, Developmental Pre-School, After-School Programs) to state-funded or intensive support services (e.g., CYFD; Childhaven Shelter). A total of 26 entries in the directory could be classified as support services for children, youth and families.

Cost and Location: Amazingly, the majority of services listed are free, with the exception of some of the counseling services, many of which offer slide scale fees. Many of the services' point of contact are through school districts or schools. For example, the Early Childhood Program is an integrated service for children and families in the Bloomfield School District. In general, while most services designate the entire county as their service area, 10 of the 26 are located in just Farmington. And, five of the 26 are specifically for Navajo Nation residents, such as the Navajo Nation Head Start, the Teen Life Center in Shiprock, and Navajo Nation CCDF (child care and care for persons with disabilities).

MATERNAL INFANT/CHILD HEALTH SERVICES: There are 14 programs/agencies listed in the Resource Directory that are specifically for pregnant or new parents and their young children, up to 3 to 5 years. Programs include services for teen parents (e.g., the Teen Parent Program and Day Care Services for parents who are students), as well as parent training programs (e.g., the Parents as Teacher program with locations in Farmington and throughout the Central Consolidated School District). Five of the 14 agencies/programs listed specifically help women and girls with pregnancy. Some are more geared toward nutritional support, such as the Navajo Nation WIC program.

Cost and Location: All services listed are free of charge, or minimal slide-scale fee. The majority of the services are located in Farmington or Shiprock. Exceptions include the Parents as Teachers program mentioned, with locations throughout the Central Consolidated School District,

and the Early Head Start with multiple locations throughout the county on and off the Navajo Nation. One program specifically mentions offering transportation services to their Farmington location.

MENTAL HEALTH/COUNSELING SERVICES: The Resource Directory lists 20 counseling and mental health service agencies, five of which are residential treatment programs. Many specifically cater to substance abuse counseling/treatment (e.g., Four Winds Recovery, AA).

Cost and Location: Seven of the 20 are free; others are insurance-based or slide-scale. Once again, locations are primarily in Farmington or Shiprock.

EMERGENCY/LOW INCOME AND REFERRAL SERVICES: The Resource Directory lists 7 agencies that provide referral services or emergency assistance. They include the Helpline, Navajo Nation Program for Self-Reliance, the American Red Cross, ECHO, and the Farmington Indian Center. They are typically Farmington- or Shiprock-based, and are free of charge.

OTHERS: A wide range of other services are listed in the Resource Directory, including services specifically for victims of domestic violence, for seniors (i.e., senior centers or other senior programs), and for physically and/or developmentally disabled residents, as well as higher education and employment assistance programs.

5.2 ACCESS

Supply & Relevance

HEALTH PROFESSIONAL SHORTAGE: From the description above of the Capacity of San Juan County's health care system, it is clear that San Juan County suffers, as do most counties in New Mexico, from a shortage of health professionals. Moreover, the highest ranked *barrier* to health care, according to San Juan Regional's 2008 Community Health Assessment, was "trouble obtaining an appointment, reported by 27% of their health survey respondents. An issue related to relevance was noted above in regard to survey findings that San Juan residents are seeking *specialty* care elsewhere.

Expanding Health Care and Support Services: At the same time, as evidenced by San Juan Regional Medical Center's growth and expansion over the past 10 years, there are growing health care facilities in the county that are responsive to residents' health care needs. In addition, there is a wide range of support services available in the county, many of which are free of charge. The extent to which residents who need services are aware of what services are available, or the degree to which the services are being utilized or accessed to their *full capacity* is not yet very well understood. Further investigation could be done in regard to gaining a better understanding of access to care issues in San Juan County.

Barriers

AWARENESS OF SERVICES: It has been suggested by agency representatives and health care professionals in the county that lack of awareness of health care services, and of resources in general, is a primary barrier to access.

Community Health Improvement Council, Health Summit: In all areas (health care, behavioral health, education, environmental, food and housing, injury prevention and public safety), the following strategic actions were identified as key:

- Increase awareness of resources
- Clarify what services are already in place
- Increase access to services through taking materials to neighborhoods and educating in the community, thereby increasing "peer" support
- Utilizing online technology to help share information (e.g., blogs, websites, databases, online resource book)
- Utilize media to build awareness
- Gain a better understanding of the avoidance of and possible shame related to help seeking, as a potential barrier to seeking information and accessing care.

Key Informants: Key informants on the San Juan County Partnership Needs Assessment (2008) were asked, "What barriers might prevent people from using existing services." In open-ended responses, informants listed the following needs: (1) greater cohesion between agencies; (2) combining efforts that promote services; and (3) more central access points for services and service information, such as community centers. Moreover, the following system-wide issues were rated as being of moderate to high need in the county: community organizing; information and referral; and planning and coordination of services. These responses are consistent with past Needs Assessment reports.

Awareness of Referral Resources: In regard to information and referral services, 65% of the survey respondents on SJCP's Needs Assessment household survey had not heard of the United Way Helpline, suggesting a need for awareness-building of the *referral* services as a way to find out about resources in general.

ABILITY TO PAY: According to the New Mexico Dept of Health (NM-IBIS) 2006 estimates, 28% of San Juan County residents under age 65 are uninsured. This is similar to New Mexico overall, at 25.8%, but significantly higher than the 17.8% national percentage. In 2008, approximately 24% were enrolled in Medicaid, including 15.7% of children under-21 are enrolled in Medicaid. These percentages are similar to New Mexico overall.

Following is a summary table of related questions from the San Juan County Partnership county-wide Needs Assessment (2008) respondent survey.

Table 5.1: Related County Household Survey Data

| Survey Item | Major Problem | Moderate Problem | Minor Problem | Not a Problem |
|---|----------------------|-------------------------|----------------------|----------------------|
| Paying for or getting medical insurance | 26% | 16% | 11% | 46% |
| Enough money to pay the doctor or buy prescription medicines | 24% | 16% | 12% | 47% |
| Availability, accessibility or affordability of dental care | 22% | 15% | 11% | 49% |
| Home health care for someone with a disability, serious illness, or elderly | 14% | 8% | 9% | 56% |
| Special transportation or availability of access for a disabled person | 12% | 8% | 9% | 57% |
| Adult day care for someone with a disability, serious illness, or elderly | 10% | 10% | 8% | 57% |

Data Source: San Juan County Partnership Needs Assessment, 2008

When asked whether the respondent sought help for the problem, it was found that respondents were more likely to seek help for medical, insurance and dental care than they were for other challenges such as transportation, parent training or prenatal care.

According to San Juan Regional Medical Center's 2008 Community Health Assessment, the greatest barriers to people's access to medical care in San Juan County in the past year were: (1) Trouble Obtaining an Appointment (27%); (2) Trouble Affording a Prescription (24.7%); (3) Trouble Affording a Physician Visit (22%) and (4) Transportation Prevented a Visit (13.8%). These four items were statistically less favorable when compared to national findings.

Subpopulations In addition, persons who are less likely to be insured are: adults under 40, those with lower incomes, and Native American respondents. In turn, persons who are uninsured are less likely to engage health services for preventative care such as check-ups, were less likely to have an specific source of ongoing health care and were also less likely to receive certain preventative screening tests, such as mammograms.

TRANSPORTATION: On San Juan County Partnership's Key Informant Survey (2008), when asked to describe any barriers that might prevent people from using existing services, 50% of the survey respondents listed transportation and its central role in access to services.

Transportation Patterns: According to 2006-2008 American Community Survey 3-Year estimates, 85% of workers in San Juan County drove to work alone, 10% carpoled, 3% worked at home, and a small number (0.5%) took public transportation to work. The remaining 2% accounted for all other alternative means of transportation (such as biking, walking, motorcycles). The average commute time it takes San Juan County residents to get to work is 22.4 minutes. These transportation patterns are similar to other rural counties in New Mexico.

According to the 2008 SJCP Needs Assessment, 42.8% of the respondents reside in Farmington, yet the majority (90%) of respondents reported they do "most of their shopping" in Farmington. When asked if they have a car they can use, 89.6% of the respondents reported they did.

Public Transportation: Limited alternative transportation options exist outside of Shiprock and the tri-city area of Farmington-Aztec-Bloomfield, The Red Apple Transit is a small but growing public transportation system primarily within Farmington, plus a daily route each to Kirtland, Aztec and to Bloomfield. In addition, the Navajo Transit is a public transportation provider with a single daily route from Shiprock to Farmington, operating Monday through Friday.

5.3 UTILIZATION

PRIMARY CARE: According to San Juan Regional's Community Health Assessment (2008), 59% of San Juan residents had visited a physician for a routine check-up in the past year, compared to 63% in New Mexico and 65% nationally.

Subpopulations & Primary Care: Women are more likely to have had a routine check-up than men, and the likelihood of having had a check-up increases with age. In addition, adults living *below* poverty were *more* likely to report a routine check-up in the past year, suggesting the possibility that public-insurance coverage is a positive contribution to utilization of primary care in the poverty population.

Children by Age and Gender: Among San Juan County parents, 77.9% report that their child had a routine check-up in the past year. This is significantly lower than national findings of 91.3%. Routine check-ups were higher among girls (90%) than boys (65%), and among children under 6 (93.7%).

SOURCE OF MEDICAL CARE: In terms of the reported *source* of medical care, 38.5% reported that they rely on a regular doctor's office for medical care, and 27% go to a clinic or health center. By contrast, 16.6% do not consider themselves to have a regular source of medical care; 4.7% reported that they rely on a hospital emergency room for their medical care.

ORAL HEALTH: As noted above, 62% of San Juan County residents had been to the dentist at some point in the past year. This is somewhat lower than the national average of 70% for the same year (BRFSS, 2006).

HEALTH DISPARITIES

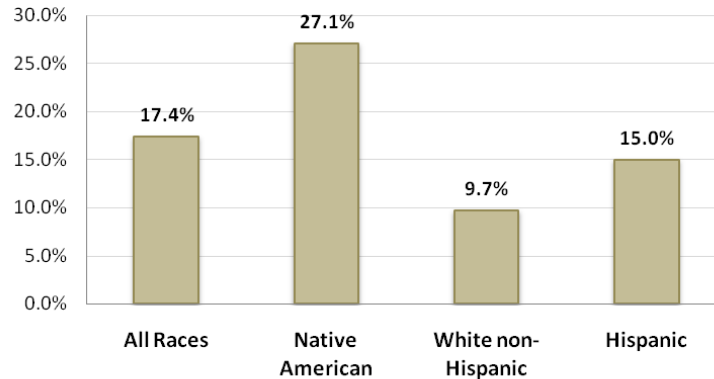
6.1 ECONOMIC DISPARITIES

POVERTY & RACE/ETHNICITY: Figure 6.1 illustrates the difference in poverty by Race/Ethnicity. Native Americans in San Juan are over two and a half times more likely to be living below the Federal poverty level than White residents; Hispanics over one and a half times more likely.

Figure 6.1: Poverty Rate Comparisons

Percent Below Poverty by Race/Ethnicity

San Juan County, NM (2006/2008)



Data Source: American Community Survey, 3-Year Estimates (2006-2008)

INCOME & RACE/ETHNICITY: For years 2006-2008, the median household income Native American/Alaska Natives was \$34,915, for White non-Hispanics it was \$52,741 and for Hispanics, \$40,392 (American Community Survey, 3-Year Estimates, 2006-2008).

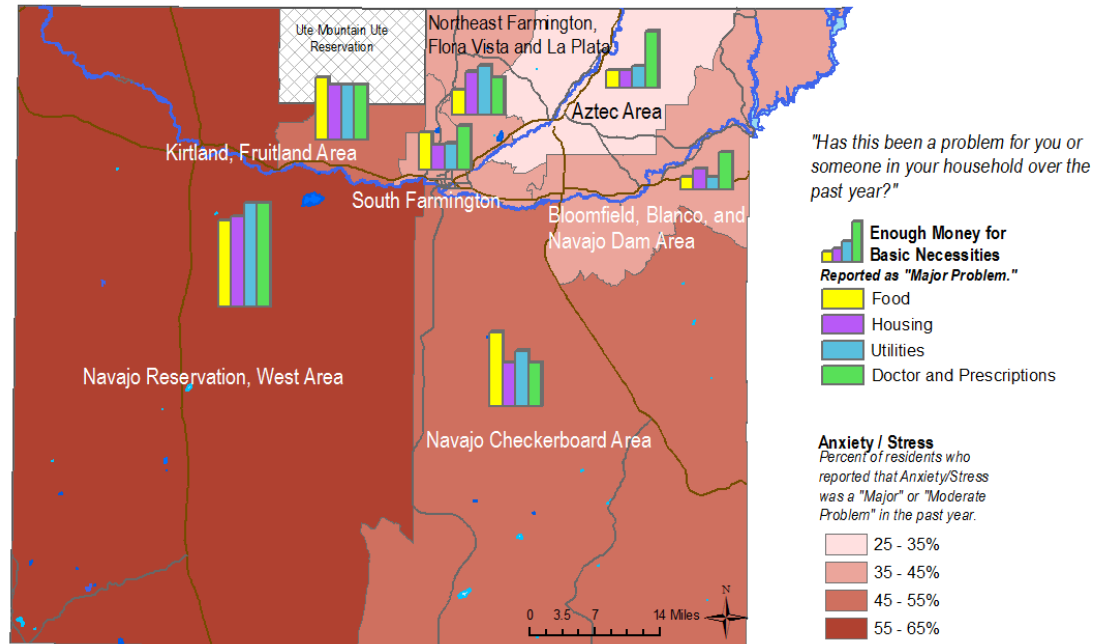
Stress & Financial Burden: Stress is an underlying cause of chronic disease, physical and behavioral health problems. San Juan County Partnership Needs Assessments have consistently found that anxiety and stress are top-ranked personal household challenges. Moreover, financial challenge is one of the greatest contributors to stress among Americans.

This map below (Figure 6.2) is a GIS analysis using San Juan County Partnership Needs Assessment Survey (2008) resident survey data. Unique, meaningful county areas were first created using a combination of ZCTA (zip code tabulation areas) and Census Tracts. Survey results were then geo-coded to these county areas. As shown, there is a geographic correspondence between poverty, as measured by the ability to afford basic necessities such as food and housing, and self-reported stress and anxiety. Note also the correspondence with Navajo Reservation (west and southeast sections of the county), where there are higher rates of poverty.

To provide an idea of the range of reported financial challenge, according the San Juan County Partnership Needs Assessment (2008) data, approximately 2 out of 5 households on the Navajo Reservation of the western area of the county experienced “major problems” affording food (38%) and/or housing (41%), compared to 5 to 10% of Aztec and Bloomfield area residents. The height of the bar graphs superposed on the map below depicts the reported financial burden of four basic necessities.

Figure 6.2: Poverty as Measured by Ability to Afford Basic Necessities, and Reported Stress

Ability to Afford Basic Necessities is Correlated with Self-Reported Stress



Data Source: San Juan County Partnership, Needs Assessment (2008) | GIS Mapping, Natalie F Salvatore, Ph.D.

Renters & Housing Cost Burden

RENTERS, POVERTY & HOUSING COST BURDEN: Renters who are living below the poverty level or at lower incomes in San Juan are particularly burdened by housing costs. Among renters whose household income is less than \$10,000, two out of three (65%) are paying more than 35% of the income on housing costs. Over half (55%) of renters whose household income is \$10,000 to \$20,000, are spending 35% or more of their household income on rental costs (American Community Survey, 3-Year Estimates, 2006-2008).

Rural versus Urban

RURAL ACCESS TO SERVICES: As described above, 40% of San Juan County residents are classified as living in "rural, non-farm" environments; 47% in "general urban" and 12.5% in "urban cluster" environments. The remaining 1% live in "rural farm" environments. Access to services is more challenging for those in outlying rural areas of the county, particularly for low-income and less mobile populations, including disabled and seniors.

Disability Status and Rural Transportation: A 2007 Needs Assessment report by the Native American Disability Law Center, Inc. in San Juan County concluded that "public transportation is scarce and often inaccessible," and in addition, "60% of the population surveyed could not afford gas for their cars." Among the 179 clients surveyed, "47% could not get transportation."

6.2 DISPARITIES IN SELECTED HEALTH STATUS INDICATORS

Chronic Disease

CHRONIC DISEASE: Below is a summary table of mortality rates for chronic diseases by Race/Ethnicity, illustrating the burden of different diseases by population group. (*Note: Non-white deaths are primarily Native American.*)

Table 6.1: Mortality Rates for Selected Causes of Death by Race

| | Higher rates Among Non-Whites | Higher Rates Among Whites |
|----------------------------------|---|--|
| Chronic Disease / Cause of Death | Pneumonia/Influenza Stroke Unintentional Injury (<i>Including Motor Vehicle Accidents</i>) Homicide Diabetes Mellitus | Heart Disease Cancer Chronic Lower Respiratory Disease Alzheimer's Disease Suicide |

Data Source: Rates from CDC Wonder, in San Juan Regional Medical Center, Community Health Assessment, 2008

Maternal-Child Health

PRENATAL CARE BY RACE/ETHNICITY: As described in the Maternal Child Health Indicators section earlier, indicators of prenatal care in San Juan are significantly worse compared to New Mexico and the nation. Approximately 21% of the births in San Juan, for years 2006-2007, received no or low prenatal care. As can be seen in the table below summarizing prenatal care by Race/Ethnicity (Table 6.2), the greatest disparity in San Juan County exists for Hispanics, both within San Juan and compared to Hispanics in other parts of New Mexico.

Table 6.2: No or Low Prenatal Care by Race/Ethnicity (2006-2007)

| Race/Ethnicity | San Juan County | New Mexico |
|-------------------------------|------------------------|-------------------|
| All Races | 21% | 11% |
| American Indian/Alaska Native | 19% | 17% |
| Hispanic | 25% | 12% |
| White non-Hispanic | 20% | 8% |

Data Source: NM Dept of Health, Bureau of Vital Records and Health Statistics, Annual Report 2006 and Selected Health Statistics 2007 (Vol. 1): Natality Report

Risk Factor

OBESITY: As described above in the general Risk Factors section, 28% of San Juan County residents are classified as obese, a risk factor that influences many health issues.

Race/Ethnicity & Obesity: Obesity rates are generally similar across Race/Ethnicity categories, with 24% of White non-Hispanic, 29% of Native Americans and 29% of Hispanics being classified as obese.

Gender & Obesity: Among adults, more men (31%) than women (23.5%) are classified as obese. Similarly, among youth, as noted previously, males (22%) are significantly more likely to be obese than females (9.2%).

SUMMARY OF PROFILE HIGHLIGHTS AND INTERPRETATION

7.1 ISSUES AFFECTING THE POPULATION

Highlights: Community, Health Status & Disparity Factors

- Financial burden and related stress – San Juan County is comprised of a growing moderate size “urban” corridor along the northern section of the county, contrasted with large spans of extremely rural areas. There are striking disparities in poverty and income by race/ethnicity. The ability to afford basic necessities such as food and housing, along with corresponding levels of reported stress, are serious personal concerns. As unemployment rates increase, so are the numbers of persons seeking supplemental support for basic necessities. Renters, and particularly renters living below poverty or in low income brackets, are found to be most housing cost burdened in the county.
- Community assets – Despite related challenges, residents of San Juan County report that they appreciate the quality of life afforded by a rural lifestyle, the scenery, the climate, and many feel that the area offers good recreational activities and is a good place to raise a family. Respondents on San Juan County’s growth management survey expressed appreciation for San Juan College, the medical facilities, the volunteer fire departments, the Sheriff’s Department, and the transfer station system.
- Prenatal care – San Juan County has a need to increase early engagement in prenatal care. It is ranked among the worst in the state for first trimester and for overall levels of care prenatally. A disparity exists in San Juan in which Hispanic mothers are even less likely to be seen early and regularly for prenatal care.
- Health behaviors and conditions – In San Juan County, nearly 9 out of 10 people report one or more health risk factors, such as tobacco use, obesity, poor nutrition and physical inactivity. These factors contribute to overall health, quality of life and well-being; and there is room for improvement in addressing all of these modifiable risk factors. Males in San Juan, including boys compared to girls, are at a much greater risk of being obese.
- Preventative health behaviors – San Juan County residents are somewhat below national rates of preventative health care behaviors, including routine physical health check-ups, having an identified source of care, and receiving an influenza vaccination. Uninsured persons and those in lower income brackets who are not covered by public insurance are less likely to engage in most preventative health care activities.
- Substance abuse – Alcohol abuse, along with DWI, is a top-rated priority concern in the county. The alcohol-induced death rate in the county compares similarly to New Mexico, but is well over twice the national rate. Moreover, alcohol-involvement represents a substantial, preventable component of accidental injury deaths, motor vehicle fatalities, suicides, homicides and domestic violence incidents.
- Environmental concerns – Ozone levels, particulate matter pollution and mercury are all recognized concerns in San Juan and the Four Corners in general. Especially vulnerable populations to pollutants include pregnant women and infants, seniors, and persons with already compromised lung capacity. Addressing exposure to environmental hazards in San Juan and neighboring counties is written into New Mexico’s Dept of Health FY11 Strategic Plan, in part because of the documented connection of ozone with emergency visits for asthma

- Mental/emotional and relationship health – High rates of suicide attempts by youth in San Juan County, along with significantly higher reported feelings of sadness and hopelessness, are of great concern. The steady increase in domestic violence rates in San Juan over the past 5+ years suggests the ongoing need for family-relationship support services.

Highlights: Health-Related Services

- Capacity – While San Juan County is a designated health professionals shortage area, it is also recognized that the community provider hospital facilities have been expanding in capacity, and encompassing an even broader range of services. Community surveys identified that 25% of San Juan County residents go elsewhere for medical care, predominantly for specialty care, and there is a corresponding shortage of *specialty* health care physicians in the county. Dentists are in particularly short supply in San Juan County and across the state.
- Access – Lack of awareness of services, transportation and ability to pay pose barriers to accessing care in San Juan.
 - *Awareness of services* – Lack of awareness of services is reported by services and health agency representatives to be one of the greatest barriers to access to care in San Juan County. Potential challenges related to literacy and primary language spoken need to be recognized and addressed when designing strategies to increase awareness of services.
 - *Transportation* – Transportation from rural areas of the county to the Farmington and Shiprock areas where office locations are concentrated is another identified challenge which is compounded by poverty and low income. Long-term plans exist for building better infrastructure, including gradually increasing public transportation (see San Juan County's Growth Management Plan, Section VIII: Transportation Element). Finding additional strategies for alternatives to the single-driver commute model is warranted.
 - *Ability to pay* – In terms of ability to pay, approximately 20 to 30% of San Juan residents find it challenging to pay for medical services; increasing to 40 to 50% in poorer areas of the county. The rate of persons without insurance in San Juan (28%) is significantly higher than the national rate (18%).
- Utilization – Children in San Juan County are particularly less likely to be seen for routine medical check-ups (78%), significantly lower than national findings (91%). Routine check-ups were found to be higher among girls (90%) than boys (65%).
- Oral health care – In regard to oral health care, regular dental care among San Juan County residents, both adults and children, is generally lower than national rates. Of note is that in 2008, New Mexico began offering a Medicaid reimbursement program in which primary care physicians can be reimbursed for preventative oral health care. This program is designed to address access, especially among publicly-insured children (Briefing, National Academy for State Health Policy, Sept. 2009).
- Access to care: An area for further exploration – Capacity, access and utilization are complex and intertwining issues. The extent to which residents in need of services are *aware* of what services are available, and the degree to which services are being accessed or utilized to their *full capacity*, and the way in which barriers to care overlap, are not well understood. Further investigation is needed to better understand access to care in San Juan County.

7.2 EXPLANATION & PERSPECTIVE

Health Council Priorities

The Community Health Improvement Council has identified the following priorities for FY11:

1. Health Priority One: Access to Care
2. Health Priority Two: Healthy Infant Practices

Access to Care

Goals related to this first health priority include: (1) increase community knowledge and use of resources; and, (2) increase sharing of information among practitioners, the community and local organizations.

Activities currently outlined in the Community Health Improvement Plan are to engage existing neighborhood groups as a venue for sharing information and further building on community cohesion and engagement. These strategies hinge on utilizing neighborhood assets, existing neighborhood groups, to share information and resources.

These activities are directly connected to needs indicated throughout this profile, and by key agency representatives in surveys, health summit and focus groups. They address needs related to (a) lack of awareness of services; (b) ability to pay, to the extent that awareness of free or low fee services will be increased; and (c) transportation, to the extent that awareness of transportation options, as well as carpooling opportunities can grow from increased neighborhood group participation.

The activities outlined also hold the potential to increase neighborhood attachment, and feelings of safety, which is a community-level protective factor demonstrated to contribute to community and individual well-being.

As an additional example of activities, homebuyer education and financial literacy classes will be offered to help people move from cost-burdened renting to home ownership, and toward greater financial skill levels. Homeownership can in turn help to facilitate a greater sense of belonging and neighborhood attachment. Financial literacy and homebuyer education classes also help reduce disparities.

The presupposition of this approach is that working at the neighborhood /community level to build cohesion and increase citizen-peer support and information sharing about the help/support services available, all lead to increases in access to the existing network of care. This in turn holds the long range potential to reduce poor community health outcomes, including but not limited to substance abuse, domestic violence and suicide.

Sharing information between practitioners about data indicators and related resources can help to facilitate greater cohesion between agencies, provide ready access to resource materials such as the Youth and Family Resource Directory, promote better understanding of broader related issues of access to care, and add an information resource for RFP development, bringing additional resources to the community. Utilizing Internet technology is a viable media for sharing information, and it provides an avenue to further link practitioners to online resources and data.

This Community Health Profile will also be made available online, readily available for practitioners and the community.

Healthy Infant Practices

Goals related to this second Health Priority include: (1) increase community education on healthy infant practices; (2) improve dental health among children ages 0 to 3 years; and, (3) improve health of children in San Juan County by addressing obesity and diabetes issues.

Activities currently outlined in the Community Health Improvement Plan include utilizing media to educate about healthy infant practices, as well as partnering with health care services and schools to offer classes, and to increase participation in healthy infant practices, including good perinatal practices, breastfeeding, early oral healthcare practices and regular check-ups. In addition, physical activity/exercise and healthy nutrition programs for youth and families, as well as parenting classes, are all designed to help young families begin and sustain healthy practices for the entire family.

These activities are directly connected to risk behaviors described throughout this profile, and hold the potential for broad-ranging positive impact on the myriad health outcomes that are related.

The presupposition underlying this approach is that by starting healthy practices early, developing parenting skills and knowledge about physical exercise and nutrition, all contribute to reducing health risk behaviors and improving community health outcomes.