

Community Health Data Analysis for St. Clair County 2017

Review of Health Status Indicators

Demographic/Education/Socioeconomic Indicators

Age Analysis:

	2000		2010	
Under 5 years	530	5.5%	468	4.8%
5 to 9	594	6.2%	507	5.2%
10 to 14	674	7%	621	6.4%
15 to 19	595	6.2%	586	6%
20 to 24	369	3.8%	412	4.2%
25 to 34	894	9.3%	807	8.3%
35 to 44	1314	13.6%	1096	11.2%
45 to 54	1289	13.4%	1546	15.8%
55 to 59	701	7.3%	809	8.3%
60 to 64	636	6.6%	691	7.1%
65 to 74	1081	11.2%	1241	12.7%
75 to 84	683	7.1%	666	6.8%
85 years and over	292	3%	307	3.1%
Total	9652		9757	
 Median age	 43.9 years old		 47.6 years old	

2010:

St. Clair County has a population of 9757 with a median age of 47.6 years old. All ages are lower, percent wise, of citizens from 2000 to 2010 except for an increase in percentage of 45-74 years old. Lowest population in the county is the 15 - 19 year olds with 586 of 9757. Highest in the county is our 45 to 54 year olds with 1546 of 9757. According to the U.S. Census Bureau, Census 2010.

The age distribution has not changed significantly from 10 years ago, but shows the progression of age of our community. The under 19 year olds decreased and the community is getting older. This information will not change until 2020, when the census will be obtained.

Race/Ethnicity Analysis:

2010:

Race for 2000	for 2010
97.4% white	96.0% white
0.7 % American Indian	3.7% American Indian
	Other races haven't significantly changed.

The majority of the county's race is made up of 96% (9368 of 9757) white non-Hispanic with a 4% (389 of 9757) minority population of people. This hasn't changed since the year 2000. Race,

ethnicity, immigrant and refugee population groups are sparse in our county. This doesn't cause disparity in health status or barriers to accessing health care or preventative services. There hasn't been an increase or decrease of special population groups.

American Indian/Alaska Native population has increased in St. Clair County by 83 people in 2000 to 363 in 2010. This may be because of the acceptance of ancestry of American Indian compared to the year 2000.

This information will not change until 2020, when the census will be obtained.

Other Demographic Features:

As always it is possible that factors such as low educational levels, family size and/or structure, or illiteracy do contribute to increased health risks for some members of the community. Our county has shown a

Education levels have improved in St. Clair County for 25 year olds without a diploma:

2000	2010
26.9% (1,853 of 6,876 people)	17.1% (1,226 of 7,163 people)

Those with High School or GED went from:

2000	2010
45.7% (3,141 of 6,876 people)	47.8% (3,423 of 7,163 people)

More persons have also attended college:

2000	2010
27.4% (1,882 of 6,876 people)	34.9% (2,499 of 7,163 people)

This information will not change until 2020, when the census will be obtained.

The percentage of annual dropouts of total enrollment from the schools in St. Clair County compared to the State are as follows:

	2007	2010	2012	2013	2016
State	4.2% (11,796 students)	3.2%	3.3%	2.4%	2.2%
Appleton City	2.6% (4 students)	4.5%	2.6%	1.8%	1.6%
Lakeland R-3	2.8% (4 students)	3.4%	2.1%	4.5%	1.7%
Osceola	5.2% (11 students)	7%	1.9%	1.8%	1.8%

Graduate Rate:	2007	2010	2012	2013	2016
State	85.8%	64000	61500	85%	90%
Appleton City	90.2%	37	29	93.1%	95%
Lakeland R-3	73.9% (6 students over 4 years)	36	40	83.9%	100%
Osceola	93.5% (4 students over 4 years)	41	45	89.7%	98%

ACT	% of Grads at or above Nat. Average				Composite Score			
	2010	2011	2013	2016	2010	2011	2013	2016
State	35.3%	36%		39.5%	21.6	21.6		20.2%
Appleton City	29.7%	25%	37%	36.7%	20.0	18.3	20.3%	19.3%
Lakeland R-3	22.2%	46.4%	29.6%	16.7%	18.9	24.5	19.7%	17.8%
Osceola	31.7%	34.9%	19.4%	28.6%	21.3	20.7	20.3%	18.1%

MAP tests in Communication Arts showed the following percent below basic.

3rd grade	2007	2010	2012	2013	2016
State	9.4 %	8.1%	7.9%	7.7%	18.6%
Appleton City	10.0 %	8.3%	7.1%	0%	39.1%
Lakeland R-3	10.0 %	0.0%	8.8%	0%	12%
Roscoe	0.0 %	0.0%	37.5%	37.5%	33.3%
Osceola	2.5 %	10.0%	6.1%	11.1%	27.5%

7th grade	2007	2010	2012	2013	2016
State	13.1 %	9.7%	8.6%	9.0%	23.5%
Appleton City	16.1 %	13.0%	11.5%	6.9%	43.5%
Lakeland R-3	8.5 %	8.3%	12.5%	13.2%	12.9%
Osceola	8.3%	5.0%	5.0%	13.6%	33.3%
Roscoe					33.3%

MAP tests in Mathematics showed the following percent below basic.

3rd grade	2010	2012	2013	2016
State	6.1%	5.4%	5.3%	18.4%
Appleton City	8.3%	0.0%	0%	30.4%
Lakeland R-3	2.9%	8.8%	0%	40.9%
Roscoe	33.3%	25.0%	28.6%	16.7%
Osceola	10.0%	6.1%	0%	22.5%

7th grade	2010	2012	2013	2016
State	10.8%	9.8%	10.2%	22.9%
Appleton City	13.0%	15.4%	0%	26.1%
Lakeland R-3	5.6%	9.4%	18.4%	16.1%
Roscoe	12.5%	?		33.3%
Osceola	10.0%	9.8%	9.1%	27.8%

(DESE website information on schools)

Family Size/structure

Single mother households have decreased in St. Clair County:

2000	2010
5.3% (214 of 4,031 households)	3.5% (153 of 4,320 households)

Single parent family households have decreased in St. Clair County:

2000	2010
20.8% (838 of 4031 households)	6.1% (265 of 4,320 households)

Divorced population has increased in St. Clair County:

2000	2012
11.1% (870 of 7,854 people)	12.6% (1,025 of 8,161 persons 15 years and older)

The family structure is changing in our county, which will cause increased health risks.

With single parent households it is harder to provide money, time, and attention. For example, a person getting ill in a single parent household may have more time to wait to get to a doctor due to the parent not being able to get off from work for fear of losing their job.

(No new information at this time)

Economic Indicators:

Household income:

St. Clair County has a median household income of \$32,217 in 2010 compared to \$25,321 in 2000, but the State rate \$45,600. We have 504 households in 2010 bringing in less than \$10,000 a year compared to 680 households bringing in less than \$10,000 a year in 2000. Median family income in 2000 was \$31,498 compared to 2010 of \$42,182.

Household income	2000	2010
	\$25,321	\$32,217
Employment opportunity	53.7% employed	57.3% employed
	40% work outside the county	low employment
Leading Industry	Education/Health & Social Services	Same as 2000

Economic Stability 2012 starting to improve by end of year, but not locally. No new businesses.

(New data will be in 2020)

Employment:

We had 258 unemployed people out of 7,687 over the age of 16 in our county in 2000 compared to 252 in 2010. No new jobs have become available, but our unemployment rate has gone from 6.3% in 2000 to 5.5% in 2010.

Leading Industry & Economic Stability:

Our health care and social assistance ranks at 16.6% with 642 people out of 3,860 in 2000 compared to 23.8% with 1,039 people out of 4,366 in 2010. Our workforce by occupation is Management, Professional and Related Occupations 1,027 persons 26.6% rate in 2000 is now 1,374 persons 31.5% rate in 2010. Although we haven't added new industry to our county, our economy has remained about the same for 2010 as it was for 2000.

In workers by occupation there has only been one area that has increased, that is the Sales and Office occupations. In 2000 there were 838 people of 3,860 (21.7%), but in 2010 this had grown to 1089 people of 4,366 (24.9%). In workers by industry the most significant increase was Transportation and Warehousing, and Utilities. In 2000 it was 164 (4.2%), but in 2010 it was 342 (7.8%). Decreases by occupation are in the Production, transportation and material moving occupations from 759 people (19.7% in 2000 to 615 people (14.1%) in 2010. Decreases in Workers by Industry has hit the Manufacturing hardest with 551 workers (14.3%) in 2000 to 404 workers (9.3%) in 2010. With today's economy still recovering from the recent events, this may not show the true picture of 2011 through 2014. Businesses have been closing and very few if any are opening at this time. Recovery has been sluggish.

Missouri Work Flow Data shows the flow from St. Clair County to other counties as 1,663 workers. Remaining in St. Clair are 2,015 workers. The workers flowing into St. Clair County from other counties is 494 workers. (There have been no updates of this data.)

Poverty:

The rate of children in poverty in our County has gone down from 25.3% in 2000 to 18.3% in 2010, but we are higher in percentage rate than the State (15.3%).

Transfer payments according to the Missouri State Census Data for unemployment insurance benefit payments and State employment insurance compensation is down. Government payments to individuals (retirement & disability insurance benefit, old age & retirement disability, and medical) and income maintenance benefit payments (Supplemental Security Income, family assistance, food stamps, and other income maintenance) are up. No changes found since 2008 data.

Free/reduced lunch program participation has increased at three of our county schools:

	2007	2014	2016
Appleton City	57.7%	57.6%	63.4%
Lakeland	55.3%	58.3%	61.7%
Osceola	51.1%	64.2%	61.8%
Roscoe	39.2%	51.2%	51.3%

Environmental Health Risk Indicator

Analysis of Indicators Related to Housing:

The percentage of housing in St. Clair County that was built before 1950:

- 2000 there was 1915 ~ 36%
- 2010 there was 1898 ~ 25.2%
- showing a loss of 17 houses ~ 10.8%

The demographics of populations living in these areas are rural.

There are no lead abatement/renovation projects that have been undertaken.

The percentage of children in St. Clair County tested for lead poisoning is less than 7% (38 of 530) that are less than 5 years old.

The percentage of those tested that were found to have elevated blood levels was 0% of the 38 tested in 2012. There were 2 children in 2013 with high lead blood levels in St. Clair County from doctors' office blood samples. From 2014 – 2016 there have been no reported high lead levels in children tested at doctors' offices in St. Clair County children.

Analysis of Indicators Related to Water Supply:

The proximity of hazardous waste sites and sewage disposal systems to public/private water supply comes mostly from several locations, no one specific location, mostly traveling vehicles

(accidents). The water supply is mostly ground wells. These would become contaminated mostly due to accidents of vehicles.

In 2010 the well water tests done at St. Clair County Health Department showed 50% of the tests as having E-coli or Coliform in the samples tested. Water testing is now done by DHSS. Out of records found for St. Clair County Health Center for 2015-2016, only 6 private well samples had been sent in with one as having Coliform. According to the DNR water reports for cities: from 2015-2016 Appleton City had 2 analysis come back with Coliform; Collins has had no problems; Lowry City has had 2 coliform; Osceola no problems.

There are two Missouri Department of Natural Resources water pollution control branch of enforcement cases listed for St. Clair County – Plantation Motel ID #1912 and Twin Oaks Harbor ID # 2354.

Hazardous substance events that have occurred recently.

11/20/12 Gasoline spill in Collins 11/20/12 transmission fluid release due to vehicle accident in Collins. 3/26/12 gasoline spill in Collins. 3/19/12 Meth Collection in El Dorado Springs. 1/26/12 fuel & oil leak in Lowry City. 3/1/12 raw sewage. Motor oil leak on 5/8/12 in Osceola. Reports at LEPC meetings for 2015 had a fuel truck on a farm with a slight spill and an oil spill from an auto accident. In 2016 there was a 10 gallon diesel leak from a truck tank puncture and a gas spill at a gas station.

Do industrial or agricultural operations contribute to environmental health risks?

Yes they do but we haven't had a hazardous substance event from industry or agriculture since 1998.

Are public water supplies fluoridated?

No. There has been talk of putting it in the water from a State bill that was introduced.

Public Safety/Domestic Violence

Analysis of indicators of public safety:

Reported for 2004/5: Crime rates for homicide for St. Clair County for 1/1/04 to 12/8/04 were 1; assault were 5 2nd degree hand, 3 - 2nd degree other, 1 - 2nd degree vehicle, 6 – 3rd degree injury, 37 – 3rd degree assaults, 1 – law enforcement assault; juvenile crime were 1 missing, 8 runaway, and 2 child abuse, otherwise the report isn't broken down into juvenile information; and violent crimes in our county were 1 attempted rape, 2 sexual assault, 1 stat. Rape, 9 unlawful use of weapon.

Reported for 2007 by the Sheriff's Office: for 18 years old and older 187 assaults – 1 with firearms, 1 with knife, 17 other dangerous weapons, 12 aggravated assault, 20 other assaults, 0 homicides, 1 rape and 7 other sex offences, 23 burglaries, 17 thefts, 1 vehicle theft, 8 forgery/counterfeit, 34 fraud, 9 stolen property, 14 vandalism, and 3 weapons. Also 17 offences against family and children, 23 driving under the influence, 3 violations in liquor laws, 2 disorderly conduct, 142 other offences. For less than 18 years old - 1 aggravated assault, 3 burglaries, 2 larcenies, and 1 stolen property.

Reported for 2015 by the Sheriff's Office: Aggravated assault 15, Burglary 70, Larceny/Theft 100, Motor Vehicle theft 15, Simple non-aggravated assault 7, Stolen Property 1, Sex Offenses (except forcible rape & prostitution) 2, Possession of Marijuana 6, Possession of Synthetic Narcotics 16, Possession of Other Dangerous non-narcotic Drugs 1, driving under the influence 1, drunkenness 1, all other offenses 31, rape 3, arson 1, domestic violence incidents 66, violent crimes 18, and property crimes 186.

Reported for 2016 by the Sheriff's Office: Aggravated assault 21, burglary 70, larceny/theft 91, Motor Vehicle Theft 2, Simple (non-aggravated) assaults 8, forgery/counterfeiting 1, fraud 1, Stolen property 2, vandalism 1, weapons charges 4, sex offenses (except forcible rape & prostitution) 3, sale/manufacturing of opium or cocaine & their derivatives 1, sale or manufacturing of marijuana 1, sale/manufacturing of synthetic narcotics 2, sale/manufacturing of other dangerous non-narcotic drugs 5, possession of opium or cocaine & their derivatives 2, possession of marijuana 31, possession of synthetic narcotics 19, possession of other dangerous non-narcotic drugs 28, offenses against the family & children 1, driving under the influence 32, liquor law violations 21, drunkenness 1, all other offenses 63, rape 3, arson 5, domestic violence incidents 88, homicide 1, violent crimes 27, property crimes 166.

Problem with illegal drug use or alcohol abuse:

Reported in 2004/5: 33 possession illegal narcotics/drugs; 13 DWI for our county from 1/1/04 to 12/8/04.

In 2007 – 18 years and older 39 drug abuse violations, 27 sale/manufacturing, 24 marijuana, 3 other drugs, 12 in possession, 10 marijuana possession, 2 other dangerous drug possessions. For under 18 years old – 2 sales/manufacturing, 2 marijuana, 3 in possession of marijuana, 1 liquor.

The 2002-2012 Assault Injury Profile for St. Clair County Residents had Hospitalizations from fights as 14 with a 1.7 rate compared to State at 0.6 rate and ER visits for fights as 262 with a rate of 3.2 compared to State at 1.8 rate.

(2015/2016 see Sheriff's Report above.)

Analysis of indicators related to abuse or neglect of vulnerable populations:

Reported in 2004/5: Indicators of maltreatment and neglect of elderly in 2003 there were 29 cases reported, and in 2004 there were 20 cases reported to the hotline on St. Clair County residents.

Indicators of maltreatment and neglect of children in 1998 was 37.4 in County compared to 22.4 in State (per 1000). In 2002 the rates were 50.8 in county compared to 44.3 in State (per 1000). DFS reported 14 reports on 27 children in October 2004, which is double what was reported last year. St. Clair County alternate care last November was 26. In 2004 only 3 foster families were registered in the County.

Domestic violence reports 2 women in 1997-1999 in St. Clair County area.

In the 2006 report from www.dss.mo.gov St. Clair County had 10 substantiated abuses reported, 2 unsubstantiated preventative services indicated, 36 unsubstantiated 55 family assessment services needed, 3 other unable to locate. All were below State percentages except the family assessment services. As of January 2008 there are 8 registered foster families.

(2015/2016 see Sheriff's Report above).

Unintended Injury

Analysis of indicators related to injury:

The major types of injuries in St. Clair County are unintended injuries due to motor vehicle accidents, traffic related, and falls – in/out-patient. The age and population groups mainly involved for traffic in 2004 was the under 15 year olds (31 reported 1997 – 1999) and the 25-44 age groups (21 reported) of males. In 2005 the under 15 years old report was 15 reported and the 25-44 age groups (39 reported). The 45-64 age groups are 34 reported in 2005. For falls the highest incidents are 65 and older females (206 in 1997-1999) and in 2005 again it was 65 and older females (90).

The rate of injury related hospitalization has increased from 712 in 1994-2000 to 931.3 in 1996-2002 to 1,100 in 2005.

For 2011 Injury and Poisoning was high in the Emergency Room Visits for St. Clair County with 906 events at 106.2 rate compared to 92.6 State rate. Fractures were 127 events at 13.6 rate compared to State at 10.9 rate. Open wounds had 197 events at 22.6 rate compared to 18.5 State rate. In 2012 injury and poisoning was high at 125.2 rate compares to State at 99.8 rate.

Unintentional Injury Profile for St. Clair County had Deaths total at 83 events at 69.2% compared to 43.3 at State. Motor Vehicle Traffic Deaths were 35 or 30.1 rate compared to State at 16.6 rate. There were 5 drown, 3 injury at work, 27 visits to the ER for firearms injuries, 2964 ER visits for falls and 197 visits for fire/burn. Unintended injuries makes up the highs compared to State.

(No further updates in MICA.)

Analysis of indicators related to traffic safety:

The circumstances related to traffic safety use of seat belts and child safety seats unable to find statistical matter, but with 15 and under not driving and having a rate of 31 reported injuries in 1997-1999, this may be high due to not wearing seatbelts or not using child safety seats.

Drug and alcohol use has 13 incidents in the county in 2004/5.

The age group most likely to be involved in traffic accidents in St. Clair County is 25-44 years of age.

No updates since 2005 assessment were found, other than Sheriff's report (see above).

Analysis of injuries at work:

The incident of injury at work has increased from 3.6 in 1996-2002 to 4.8% in 1995-2005 to 3.3% in 2002-2012.

No updates since 2012 assessment were found.

Maternal and Child Health Indicators

Analysis of maternal and child health indicators:

Our county in 2002 had about the same prenatal care beginning in the first trimester as State (County 82.9% to State 87.8%). In 2005 the prenatal care beginning in the first trimester for the County was 85% while State was 87.9%. The birth to teen's rate for 2002 is slightly higher in the county than State (County 4.6 to State 4.1). The birth to teen's rate for 2001-2005 was 21.4% county to 29.2% State. Birth spacing (less than 18 months spacing) indicators show our county higher than State in 2002 (County 8.5 to State 6.1). In 2001-2005 birth spacing for County is 11.6% to State 11.1%. Mothers smoking during pregnancy had a higher count in our county compared to State in 2002 (County 33.3 and State 18.1) compared to 2005 29 County and 18.2 State. Births to women with less than a 12th grade education in 2002 in our county were elevated over State (county 23.6 to State 19.2) and in 2005 (County 26.8 to State 18.6). Our county infant mortality was lower than State for 1993-2002 (County 5.4 to State 7.7) and for 2001-2005 (County 4.8 to State 7.6). Trend lines show that problems are beginning decreasing. Poor birth outcomes can be linked to poverty or low education levels, but could also be linked to prenatal care (delivery is out of county and so is prenatal care).

No race or special populations are experiencing higher rates of infant mortality, low birth weight, or poor birth outcomes. Although the Minority Health Profile for St. Clair County has for 2006-2010 out-of-wedlock births at 36.81% for 173 events and 1 African-American. It also has Inadequate Prenatal Care for 71 women at 15.6% with only 1 African-American. Low Birth Weight is 36 at 7.66%. Infant deaths is 4 at 4.32% and 1 Sudden Infant Death Syndrome at 1.08%.

WIC in 2008 reported a high number clients for ER visits of 219 for ages 1-14 at a rate of 15041.2 compared to State at 10961.8 rate.

Maternal Delivery Profile for St. Clair County showed for 2008-2012 that non-hospital live births per 1000 were 17 at 35.6 rate compared to State at 14.2 rate and healthy live births for 2012 were 79 at 91.9 rate compared to State at 80.7 rate. Women's Reproductive Health Profile for St. Clair County Residents for 2008-2012 has high rates for births to 15-17 year old mothers at 4.6 rate compared to State at 2.7 rate; births to mothers age 20-24 at 34.8 rate compared to 27.1 State rate; Mothers with less than 12 years of education at 25.6 rate compared to State at 16.7 rate; and Mother greater than or equal to 20% overweight for height at 45.9 rate compared to State at 40.5 rate.

The Low Income in St. Clair County data in 2008 shows infant participation in WIC as 101 at 84.2 rate compared to 58.2 rate of State. Of the 69 births in the county in 2012, 39 were on WIC services. In 2013 of the 82 born, there were 44 on WIC.

Diabetes in pregnancy for 2005-2009 has birth to women with other diabetes than insulin dependent are high at 58.3 rate compared to State at 35.6 rate.

Births for 2015 were 71 of which 36 were in the WIC program. Births for 2016 were 112 with 64 in the WIC program.

Between October 1, 2014 and September 30, 2015, WIC had 104 infants, 264 children and 74 women, 57 women not breastfeeding, and 35 women that did breastfeed.

Between October 1, 2015 to September 30, 2016 WIC had 123 infants, 262 children, 95 women, 65 women that did not breastfeed, and 49 women that did breastfeed.

Overweight women and children in WIC has gone up from 2015 to 2016. Inappropriate Nutrition Practices for infants and children has gone down from 2015 to 2016. However, inappropriate Nutrition Practices for women has gone up from 2015 to 2016.

Environmental Tobacco Smoke Exposure has slightly gone up from 2015 to 2016.

Oral Health has improved for children and women in WIC. This can be attributed to the Federally Qualified Health Center Dental Clinic. Children with dental problems has gone from 15.53% in 2015 to 7.63% in 2016. Women with dental problems in WIC has gone from 54.05% in 2015 to 20% in 2016.

Analyze indicators related to prenatal risks.

Smoking during pregnancy has been a high-risk 1st priority in our county for over three years (county rate in 2004 was 33.3% compared to 18.1% for State). The rate in 2005 was 29% County compared to 18.2% State. While State seems to have gone up slightly, St. Clair County has begun to make a significant reduction in smoking during pregnancy. This is probably due to the program through MCH in working with WIC clients to reduce or stop smoking, and Girls on the Run program to teach life skills with that program. Improper weight gain of less than 15 pounds to term is a high-risk in 2004 for our county ranking 2nd (County 11% and State 8.1%). In 2001-2005 the weight gain for less than 15 pounds for county was 12.0% compared to State 8.5%.

Teen pregnancy rated a 3rd quintile in 2004 with the county having a rate of 27.8% to State at 33.7%. For 2001-2005 teen pregnancy was in the 4th quintile with 21.4% County and 29.2% State.

Birth spacing rated 1st in quintile in 2004 with our county having a rate of 14.9% to State at 10.8%. For the 2001-2005 in is in the 3rd quintile with 11.6% County to 11.1 % State.

Late or no prenatal care for 2004 ranked 2nd with county rate at 17.1% and State at 11.3%. For 2005 the county ranked in the 3rd quintile with 13% county and 11.4 % State for late care.

In 2012 the Prenatal Profile for St. Clair County shows highs in rates for no prenatal care at 3.6, prenatal Medicaid at 59.8, Prenatal WIC at 63.5, Prenatal Food Stamps at 45.6, and weight gain less than 15 pounds at 17.2 for 2008-2012. We do not have a doctor in the county for prenatal checkups or for delivery.

Again, these are not related to special populations.

MICA has not been updated to current data at this time.

Analyze indicators of child wellbeing:

As of October 7, 2004 children age 2 that have completed their immunizations were only 42.86% in our county. This is down from 2000 when we had only 65.7% immunized by the age of 2. If the child comes to the health department for immunizations they are also receiving the routine physical through our rural health clinic. The problem is that they aren't coming in for the immunizations and therefore aren't receiving the physical.

Unintended injury and death rates among children in the community are showing unstable rate that cannot be rated with State at 7.2%. No leading causes are available and cannot be measured.

However, in talking with three of the school nurses in the county Lakeland School had 105 referrals of 415 students screened, Appleton City School had 56 referrals of the 128 screened, and Osceola School had 98 of their 556 screened that needed dental referral. Not all students at the schools have been screened. Miles for Smiles van comes to Lakeland and Osceola Schools twice a year, but haven't been able to care for all those needing to be seen. Miles for Smiles does not see Roscoe School or Appleton City School.

2016 Compass Health Wellness (Federally Qualified Health Center) has a dental clinic. This dental clinic has been taking referrals from WIC. These referrals have improved the dental health of children and mothers in our community, thus reducing the poor oral health conditions. In 2015 15.53% of children in WIC and 54.05% of mothers in WIC had dental problems. In 2016 only 7.63% of children and 20% of mothers have oral health conditions.

Prevalence of Infectious Disease

Analysis of communicable disease rates:

Race and special populations are not a factor.

We haven't seen any special outbreaks or extraordinary incidence of enteric disease since the last assessment in 2004/2005. Again, no significant outbreaks have occurred from 2005-2014. An outbreak occurred in 2016 of Pertussis in a non-vaccinated group of people in the county. And the beginning of 2017 has shown influenza has increases in the county.

St. Clair County has had the following diseases investigated:

	2012	2013	2014	2015	2016
Animal Bites	24	15	26	13	16
Sexually Transmitted	14	8	6	3	4
Food Related	18	7	4	3	6
Tick related	22	20	28	26	32
Hepatitis	19	17	27	18	19

Analysis of vaccine preventable disease:

No vaccine preventable disease cases were reported in 2004.

We haven't had any mortality reported in St. Clair County from influenza since 2004. No reports of influenza deaths from January 2005 to December 2007. We had 7 reported influenza positive laboratory confirmed cases from January to March 2006. Only one reported Influenza A case in 2007. Of the 104 reported deaths in 2007 in St. Clair County 14 had pneumonia as a cause related to the death, but 7 were due to aspiration pneumonia. No deaths were from Influenza.

From Women's Health Profile for St. Clair county Residents hospitalizations for pneumonia and influenza were high at 54.4 rate compared to State at 41.7 rate. Inpatient Hospitalization Profile for St. Clair County Residents shows Pneumonia and Influenza for 2012 as high at 53.6 rate compared to State at 38.7 rate.

In 2012 -2013 Vaccine preventable disease investigations showed 2 Hib in 2013; chickenpox 2 in 2012 and 9 in 2013; Influenza A 2 in 2012 and 13 in 2013; Influenza B 2 in 2012 and 12 in 2013.

County childhood immunization rates for vaccine preventable disease are 49.07% of 2 year olds are complete with their immunizations as of December 14, 2004 and is 51.30% as of May 31, 2006. In December 2007 the immunization rate for St. Clair County is up at 77% for 2 year olds. This increase is due to reminder cards being sent out as clients are due. We are continuing to increase these rates and at the same time work on reminding clients of needed healthy child checkups. We are going to begin entry of other physician's immunizations from another clinic this year.

Schools have begun checking Show-Me-Vax for immunizations as of 2010. Day care and head start are continuing to update records.

For 2016 the county had an outbreak of Pertussis in unvaccinated individuals. According to Missouri Department of Health and Senior Services 93% of the children born in 2013 seen at the St. Clair County Health Center by July 12, 2016 were properly immunized. On February 14, 2017 the rate was 90% for children born in 2014. These rates were pulled from information from the Show Me Vax website.

For 2017 the county has had an increase in influenza (from January to mid-February we have had 72 reports.

St. Clair County Health Center has had the following diseases that are vaccine preventable reported over the following years:

	2012	2013	2014	2015	2016
Pertussis	1			10	5
Chickenpox	2	7		2	3
Hib		2			
Influenza	149	121	37	78	61
Measles					1

Prevalence of Chronic Disease Risk Factors

St. Clair County's rate for adult tobacco use is 32.9 % in 2003 compared to 26.4% at State. St. Clair County MCH Performance measures show that in 1999 our county baseline was 29.7% of women reported smoking during pregnancy, compared to 19.0% of State. Physical inactivity is lower at county with 20.7% compared to State at 24%. Obesity, BMI > +30, in adults 18 and older for the county in 2003 was rated 25% compared to State at 23.4%. The county rate for percent of adults with high cholesterol is 37.5% compared to 37.1% for State. Prevalence for asthma is at 11.2% for county compared to 10.8% for State. These all contribute to increasing the county's heart disease, lung cancer and other smoking related diseases.

There are no indicators available on obesity and inadequate diet by particular age groups, race, or special population for our county.

The most prevalent causes of hospitalization in our county seem to be due to heart disease 264.6% compared to State at 164.6%, which is consistent with risk behaviors.

A youth survey of 6th-8th graders was done at one of our schools in our county of 114 students. This survey had the following results: 42% of the students reported divorced and never married parents. 15.7% reported not being involved in extracurricular activities. 7% reported using tobacco beginning at the ages of 12-14. 23% reported using alcohol beginning at ages 10-13. 57% reported they could obtain drugs with 18% using drugs. 22% reported being sexually active and the highest level being at 6th grade. 23% reported the need to exercise regularly. 27% felt they weren't in the normal range with most feeling overweight. 32% reported needing more dairy and 53% needing more fruits and vegetables. 44.7% reported the need to see a dentist, and 37.7% needed a physical. 31.5% reported not using safety restraints (seat belts).

Our rates for women 50-64 with no mammogram or clinical breast exam in the last year are 57.3% for 2003 compared to State at 35.9%. Women 30-69 with no pap test in the last 3 years for 2003 in our county are 23.4% compared to State at 13.8%. Men and women >50 years who have never had a blood stool test is 63.9% in county compared to 57% in State, and who have never had a sigmoidoscopy or

colonoscopy is 58.9% to States 49.2%. These services for mammogram, clinical breast exam, pap testing, blood stool testing and sigmoidoscopy or colonoscopy are available in our county at either the local clinics in Appleton City or Osceola or at one of the hospitals.

The Women’s Health Profile for St. Clair County Residents shows chronic lower respiratory disease as high with a 37.8 rate compared to State at 24.6 rate.

The Diabetes Profile for St. Clair County Residents shows current health coverage as being high at 88.3 rate for 2008-2012. It also shows ischemic heart disease as the principal diagnosis for 2007-2011 at a 21 rate compared to State at 17.5 rate.

The Chronic Disease Comparisons Profile for St. Clair County Residents shows for 2005-2009 a high in hospitalizations for heart disease at 164.1 rate compared to State at 152.4 rate; ER Visits for heart disease at 16 rate compared to State at 12.9 rate; hospitalizations for ischemic heart disease at 62.1 compared to State at 55.2 rate; ER Visits for ischemic heart disease at 2.3 rate compared to State at 0.8 rate; ER visits for stroke/other cerebrovascular disease at 1.5 rate compared to 0.8 rate for State; hospitalization for breast cancer at 3.8 rate compared to State at 2.2 rate; hospitalizations for chronic obstructive pulmonary disease excluding asthma at 47.3 rate compared to State at 23.2 rate. Deaths from lung cancer is shown at 76.7 rate higher than State at 61.4 rate. And Deaths attributed to smoking at 181.5 rate compared to State at 152.2 rate.

Mortality for 2007-2011 from acute Myocardial Infarction is high at 126 rate compared to 70.7 rate for State; from congestive heart failure is 1.1 compared to State at 0.6; acute MI at 0.8 compared to State at 0.3; Non-ST elevation MI at 10 events.

(No updates on MICA since 2011.)

Death certificates show the following for St. Clair County (not all death notices are sent to the health department since some are entered by the funeral homes electronically):

	2012	2013	2014	2015	2016
Deaths	91	53	52	54	39
Heart Disease related	34	19	19	28	18
Cancer	19	15	10	12	8
Diabetes	2	1	1	0	0

Leading Causes of Mortality

Analysis of leading causes of mortality:

Mortality rates are higher in unintentional injuries and motor vehicle accidents. Total unintentional injuries for the county rate at 68.6% compared to State at 40.2%. Motor vehicle accidents rate at 45.7% compared to State at 20.1%. Both of these are ranking first in our county. Data does not show if this is related to lack of seatbelt use, or alcohol use as a contributing factor. All injuries and poisonings rate

94.5% in county with 64.1 % in State and it is also ranking first in our county. These are from 1999-2002 data.

Rates of mortality that are higher than the state rate are not consistent with behavioral risk factors for diseases. The rate of mortality is also not consistent with rates of screening tests for early detection, or other risk factors like high blood pressure or high cholesterol.

In 2005 of 131 deaths 34 were from Cancer, 32 from heart disease, 4 from pneumonia, and 12 from chronic lower respiratory disease. In 2007 of 104 deaths 44 were from heart disease, 25 from cancer, 7 pneumonia, and 28 miscellaneous/other. 2001-2011 Leading Cause of Death Profile shows St. Clair County Residents with lung cancer at 77.4 rate compared to State at 60 rate; unintentional injuries at 69.5 rate compared to 46.8 State rate; Motor Vehicle Accidents at 36.5 rate compared to 17.6 State rate; smoking attributed estimates at 180.1 compared to 148.5 rate for State.

Death certificates show the following for St. Clair County (not all death notices are sent to the health department since some are entered by the funeral homes electronically):

	2012	2013	2014	2015	2016
Deaths	91	53	52	54	39
Heart Disease related	34	19	19	28	18
Cancer	19	15	10	12	8
Age/Dementia	16	12	10	8	9
Pneumonia	3	1	7	1	4
Other	17	5	5	5	0
Diabetes	2	1	1	0	0
Known Smokers	10	13	10	4	3
Unknown if smoked	32	22	15	20	16

Heart disease and cancer continue to be our leading causes of death. Heart disease and cancer have been shown to be connected to obesity and smoking.

B. Community Health Improvement Capacity Indicators

Health Care System Indicators

Analysis of the Community’s Health Care System:

Reported in 2004/5: Our healthcare provider rate in 2002 was 1:877 compared to States 1:407. We need more healthcare providers in our county. We have 9 doctors. We do have 4 Nurse Practitioners and a Nurse midwife. By 2007 we have seen a loss of the nurse midwife, but now have 12 doctors and 5

nurse practitioners. By 2014 we have 6 physicians and 6 Nurse Practitioners in the county with 8 specialists that come in monthly.

We have a barrier of being a rural county and therefore transportation is a problem to get to a doctor. Ellett Hospital has begun transportation services to their doctors in Appleton City and the OATS bus can be scheduled.

Adequate access to emergency services through Sac-Osage Hospital and Ellett Memorial Hospital is available. Acute care is available through Sac-Osage Hospital, but the hospital has had major financial difficulties and is scheduled to be closed in October 2014. Access to long-term care is available through Truman Lake (a skilled nursing facility), Appleton City Manor (an intermediate care facility), and Country Side Estates (a residential care facility).

In 2003 16.6% of the county lacked health insurance coverage, compared to 12.31% of State. There doesn't seem to be any particular segment of the population without health insurance. Now with Obamacare most everyone is covered with insurance.

Only 2 dentists in the county give dental health care. One dentist had left by 2011, but in 2012 the FQHC was formed and is now open in Osceola to provide care. Mental health also been started thanks to the FQHC.

There are no populations that are not served due to language-specific or culturally knowledgeable service providers.

Resources are available through On My Owns, Inc. which has moved to Collins and DFS to accommodate those needing sight and hearing impaired services or other assisting technology.

The health care resource gaps in our community are more doctors, more dentists, transportation, respite care, and pharmacy.

2016: Sac-Osage Hospital was closed and torn down. Ellett Memorial Hospital in Appleton City is the only hospital in St. Clair County. The hospital has been bringing in specialists from Bolivar. Clinics in the area are: Appleton City Clinic, Citizens Memorial Clinic, FQHC – Compass Health Wellness, Golden Valley Clinic, and Morton - VanZanten Clinic. We still have 3 long-term care facilities as listed above. The dental has remained the same. We have gained another pharmacy which has just opened in Osceola. The other pharmacy being in Appleton City. St. Clair County has 4 Doctors, 8 Nurse Practitioners, 1 Physician's Assistant, and 7 Specialists brought in from other counties. We have 2 dentists in the county. We have Citizens Memorial Hospital EMS and Ellett Memorial Hospital EMS for ambulances. Delivery services are still outside of the county, although an Obstetrics doctor from CMH is seeing patients at Ellett Memorial Hospital. Cancer care is also outside of the county.

Community Health Resource Indicators

Analysis of health resources that are available to address leading causes of mortality, especially premature deaths, and risk factors that contribute to leading health problems in the community:

Presently we have available in our community: a physician for chemotherapy, recreation due to the lake, a swimming pool in Osceola, senior nutrition sites, WIC, On My Own, Inc., First Steps, Pathways, Parents as Teachers, School nurses that are present daily, FQHC, Community Betterment Coalition, GED Classes, Medicaid Transportation, Oats bus, Doctors, Dentists, Nurse Practitioners, Health Coalition/CHART, and Ellett Memorial Hospital.

The St. Clair County Health Center assesses the community on a three-year basis. For the third year through the Maternal Child Health program, they have worked on injury prevention. They have with the help of the Coalition completed a booklet for nutrition and physical activity resources and a car seat/seat belt/injury prevention resource booklet. These have been posted to the website www.scchcmo.net The St. Clair County Health Center has provided a facilitator for the local C.H.A.R.T. Coalition. Without this facilitator the local Coalition would have ceased functioning in 2004. They provide immunizations through the Vaccine for Children Program through State to keep vaccine preventable diseases from occurring.

We have a hospice in the community, but home health services come from outside the county.

The Specialists come in from Citizens Memorial Hospital to Ellett Memorial Hospital for Cardiology, Orthopedics, Urology, Gastro-Intestinal, Rheumatology, Ophthalmology and Obstetrics. Delivery for Obstetrics is outside of the county.

Community Health Assessment Summary of Findings

For St. Clair County

- A) Review of community health status indicators, including primary and secondary data, reveals the following problems:
Heart disease, cancer, poor nutrition and physical fitness, and injuries from falls and accidents.
- B) Review of Behavioral Risk Factor Surveillance System County Level Data reveals the following problems: in 2004/5 Physical inactivity is lower than the State, Current smokers are higher than State, Overweight with BMI 25-29.9 is lower than State, and Obese (BMI > 30) is higher than

State. In 2007 no changes in physical activity, but the smoking in pregnancy has been decreased and in some cases stopped due to our WIC department working through MCH and WIC with clients during their visits. From 2012-2014 MCH chose to address obesity. From 2015 to 2017 for MCH St. Clair County Health Center is addressing injury prevention, but has continued to work on projects with the coalition to better the county's nutrition and physical fitness.

C) The 4 most significant problems affecting the health status of the population within the jurisdiction of the local public health agency are (public health priorities):

- 1) Maternal Child Health injury prevention.
- 2) Education and guidance on healthy eating and physical activity.
- 3) Tobacco use reduction/cessation.
- 4) Disease prevention through up-to-date immunizations.