



2013 State of the County Health Report

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Overview

The intent of this document is to provide an overview of both the health status of Union County and the health issues impacting county residents, both personal and environmental. The document will provide information on areas that were identified in the 2008 Community Health Assessment as priority areas. This report will indicate any actions that have been taken by the Union County Division of Health and / or the community toward resolving health related issues and improving health outcomes.

In addition to Community Assessment data updates, the report contains statistical health indicators such as the county's leading causes of death, pregnancy and abortion rates hospital discharge data, air quality data, water quality data, and food and lodging inspection data.

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Key Union County Statistics

- **643 square miles, 14 municipalities**
- **208,520 Estimated 2011 Population**
- **\$68,592 Total Household Income**
- **Average Age 36.8**
- **\$64,813 Median Household Income**
- **102,210 Civilian Labor Force**
- **7.7% Unemployment Rate (Avg of Jan – Aug 2013)**
- **19.9 % population 19 to 64 is uninsured**
- **\$20.2 billion dollar total tax base (FY 10-11)**

Union County 2012 – 2013 In February 2013, the Union County Board of County Commissioners voted to unify the County's Departments of Social Services and Public Health into one Human Services Department. Later this year, the Union County Department of Veterans Services and Department of Transportation and Nutrition were merged under the Human Services Administration as well. The impetus of the merger of these programs into the Department of Human Services was to increase efficiency, collaboration and quality of service provision to Union County residents who need the services provided by the County.

The slow improvements in the national economy had a minimal impact on Union County. There has been little growth in tax base or population.

There was a \$300 million dollar increase in the County tax base from 2011 to 2013; this was only a 1.5% increase. There was also a 1.9% decrease in the Median Household Income. There was a minimal increase of .4% in the estimated County population, but a 10% increase in the Civilian labor Force.

It was reported in the Union County 2012 Annual Report that the County Board of Commissioners approved an amended long-term lease with Carolinas Healthcare System (CHS) fulfilling the goal of a long-term lease to improve the provision of hospital, medical and healthcare for residents of Union County by encouraging further investment in the county. The lease allows CMC-Union to continue to deliver high-quality health services such as the Cancer Center and Wound Care Center, and provide access to some of the most advanced diagnostic treatments and technologies into the future. The hospital facility is owned by Union County and leased by the County to CMC-Union. The amended lease with CHS began on Jan. 1, 2012 and will remain in effect until Dec. 31, 2061, unless terminated, extended or renewed before that date. Upon completion of the lease, CHS has an option to extend or renew the lease for an additional 25 years.

A new fitness business opened in Indian Trail in November. Carolina Courts is a facility that includes several courts that can be used for basketball, volleyball, wrestling, indoor soccer, gymnastics and other sports. The facility will be available for multiple events since the courts are separated. The owners also intend for it to be used as an exercise center for Indian Trail citizens.

The City of Waxhaw annexed 34 acres that it is hoped will become the site of an equestrian facility to host competitions and shows. City leaders feel this center would not only benefit local residents, but it also bring visitors to the area that will increase tourism revenue.

In August South Piedmont Community College opened a new Center for Technology and Health Education. Phase 1 use of the center includes training in CNC-Machinery, mechanical training and other programs. In Phases 2 and 3 additional programs will begin using the 50,000 state of the art facility.

2012 Community Health Assessment Results

The Community Health Assessment (CHA) is an opportunity to study the health of the County, both from an individual perspective and from a community perspective. The CHA includes internal data and external data. The internal data is collected to develop an understanding regarding health concerns, disparities, behaviors and environmental factors impacting the health of residents. External data is collected from the State Center for Health Statistics. The data represents key health indicators of a community. The results categorized below were determined to be problematic for residents in achieving positive health outcomes during the 2012 CHA.

The State requires the Division of Health to complete a Community Health Assessment every four years to determine the health status of the community that it serves. Union County completed its first official assessment in 2008.

In 2012 Union County completed its second Community Health Assessment. The CHA was conducted countywide with respondents answering surveys targeted to their specific age group – adult, senior or teen. Spanish surveys were provided for residents that do not speak English. Focus groups were held in Spanish and English. Statistics were included from numerous external sources and reports at both the state and local levels.

The data was collected and compiled and the results were presented to the community for priority setting and strategic planning. The overall goal was to establish a collaborative network with a focused, planned approach for addressing the identified priority issues. The community discussion and priority setting meeting audience included representation from 21 local agencies and organizations. After a presentation and a discussion, each participant completed a survey prioritizing the focus areas. Results are listed below by categories of concern.

Teen Priorities

Bullying / Peer Pressure
Baby Think It Over Curriculum
STD Education

Nutrition

Public School Nutrition
Healthy Eating Education
Farmers Market

Built Environment

Access to Union County Public School
Facilities
Additional parks / greenspace
Sidewalks

Senior Priorities

Additional Senior Center
Mobile medical Services
Long Term Care Planning

Medical

Indigent Care Mobile Unit
Expand Mental Health Services
Affordable Dental Care

Chronic Disease

Cancer
Diabetes
Heart Disease
Alzheimer's

Fitness

Affordable Sports League for Kids
Get Fit Union
Affordable Adult Fitness Facilities

At-Risk Populations

Obese Residents
Mental Health Patients
Adults Not Receiving Prevention Services

Some of the priorities from the 2012 CHA are the same or similar to the priorities of the 2008 CHA. The following is a list of the priorities common in both CHAs:

- Poor Eating
- Obesity
- Concerns over Long Term Care
- Teen Pregnancy / Sex Education
- Peer Pressure
- Chronic Diseases
 - Cancer
 - Heart Disease
 - Alzheimer's
 - Diabetes
- Mental Health Services

After the stakeholders / community meeting attendees finished ranking the priorities within the individual categories, County Health staff assessed available resources to address each issue. CHA identified at-risk populations (obese residents, residents with mental health issues, adults not receiving prevention services) were taken into consideration when selecting priorities to take action.

Obesity across all ages and genders was viewed as a critical issue, as it can be a gateway to more serious, costly health problems: diabetes, cardiovascular diseases, kidney disease and hypertension. Obese and overweight children were selected as a target group due to access and a strong potential to positively influence behavior changes. The Division of Health has access to Registered Dietitians to assist with an action plan addressing this issue. Community partners such as CMC Union, Enterprise Fitness and Smart Start had expressed an interest in working collaboratively on obesity and related chronic conditions.

Diabetes was selected as a priority for public health, as it was impacting high percentages of lower socioeconomic residents obtaining diabetes medications from Healthquest (pharmaceutical assistance agency). Healthquest agreed to work collaboratively with Public Health to improve the overall health of these diabetic residents. Public Health had nursing staff trained in Diabetes Self-Management. Division of Health staff nutritionists could lend support and Medical Nutrition Therapy to these diabetic residents.

Union County Division of Health 2012 -2013 in Review

The Public Health efforts of the Division of Health extends out to all county residents daily through restaurant inspections, childcare inspections, septic and well programs, immunization clinics, grant funded breast health programs, on-going emergency preparedness planning, child health programs, maternity services, dental services and many other efforts.

In 2012, the NC General Assembly expanded county government authority to consolidate local departments in Health and Human Services agencies with the passage of H.B. 438. Therefore, in February of 2013, Union County consolidated four departments including Veterans Services, Transportation, Public Health and Social Services under one administrative unit. This consolidation also abolished the existing Boards of Health and Social Services creating a seventeen member Human Services Advisory Board for oversight.

Division of Health Statistics FY 2012-2013

- **Staff of 95
(79 Health / 16 Environmental Health)**
- **Division Budget: \$8.1 million**
- **12,708 Patients Seen (non-duplicated)**
- **24,546 Patient Visits**
- **Board of Health created a 501(c)(3) to establish a public health foundation for the County**
- **Assisted in the CMC-Union's Community Health Needs Assessment by:**
 - **Arranging and conducting focus**
 - **Providing data from the County 2012 CHA**
 - **Participating in the development of priorities and actions**

- Clients Served in 2012 - 2013**
- **1,785 Family Planning**
 - **703 Maternal Health**
 - **281 High Risk Maternal Health**
 - **3,339 Child Health**
 - **3,128 Child Immunizations**
 - **117 Breast & Cervical Cancer Control**
 - **754 STD**
 - **455 Tuberculosis**
 - **792 Dental Clinic**
 - **834 Children in Smart Start Smiles Dental**
 - **287 About Breast Cancer (Komen Grant)**
 - **739 Breast Health Services Provided**
 - **11,220 Laboratory Clients**
 - **15,076 Lab Tests Processed**
 - **4,250 WIC (average monthly case load)**
 - **1456 Breast Feeding Program**
 - **113 Parenting Education**

Citizen Health / Child Health

Uninsured children (under 18 years of age) living in Union County decreased by 2.3% from 2011 to 2013. However the number children living in poverty increased by 2.5%.

CMC – Union recently executed an agreement with Levine Children’s Hospital to oversee in patient pediatric care. Three hospitalists will be available to provide round the clock care for pediatric patients. Before this arrangement local pediatricians were on a rotating schedule to provide care for pediatric patients.

School Nurses in North Carolina are required to be certified in School Health within 3 years of their hire date. Currently, 29 of the 35 school nurses with Union County Public Schools are certified in School Health. The other 6 nurses are in the process of gaining enough work hours in order to sit for the certification exam.

Child Population / Health Indicators

- **19,875 Elementary School Enrollment**
- **3,420 Children enrolled in NC Health Choice (1/1/13 – 10/21/13)**
- **9,963 Children enrolled in Medicaid (1/1/13 – 10/21/13)**
- **8.9 % Union County children uninsured (0 - 18 years old) (ACS 1 yr. avg.)**
- **15.6 % children (children under 18 years old) living in poverty NC 26 % (ACS 1 yr. avg)**
- **35.4% school age children on free or reduced lunch (as of 5/10/13)**
- **143 children received forensic interviews & medical exams at Tree House for sexual abuse**
- **Low birth weight babies (< 2500 grams) Union County Rate 8.0 / 9.0 NC Rate (per 1,000 live births) (2008-2012)**
- **18% children (2 to 4 years old) seen at Health Dpt had BMI indicating overweight (2011)**
- **15.5% children (2 to 4 years old) seen at Health Dpt had BMI indicating obesity (2011)**
- **2008 – 2012 Infant Mortality Rate 5.7 / 7.5 NC Rate (per 1,000 live births)**
- **2008 – 2012 Post Neonatal Death Rate 1.4 / 2.5 NC Rate (per 1,000 live births)**
- **2008 – 2012 Neonatal Death Rate 4.4 / 5.1 NC Rate (per 1,000 live births)**
- **2008 – 2012 Fetal Death Rate 5.0 / 6.6 NC Rate (per 1,000 live births)**
- **2012 Primary Diagnosis of Asthma Children Ages 0 to 14 Rate 154.1 / NC Rate 163.7**
- **2009 Pediatric Asthma Admission Rate 220.6 / NC Rate 192.9 (per 1,000)**

Citizen Health / Adolescents

Union County Public School Nurses provide several services and programs to help students and staff deal with medical situations. This includes the following:

- Conduct CPR and First Aid Classes for UCPS staff – have conducted 3 so far in the current school year, will conduct 4 more before the end of the school year
- Teach Type I Diabetes awareness and emergency care to staff to help identify and deal with emergency situations related to Type I Diabetes. State law requires that at least 2 staff in each school (in addition to the School Nurse) be trained to take care of Type 1 Diabetic emergency situations. There are between 100 and 110 self-reported Type I Diabetic students currently in the UCPS schools.
- Credential staff to recognize anaphylactic reactions and administer EpiPen.

Nurses draw up care plans for all students who have chronic medication conditions. These plans include how to deal with emergency situations related to the chronic condition – seizures, asthma difficulties, etc. The plan will ensure that a staff member can assist the student even if the School Nurse is not available.

UCPS has a grant from CHS (Carolinas Health Care) Levine Cancer Institute that facilitate a School Nurse teaching health related classes on cancer in the middle schools.

UCPS participates in the state recommended Fruit and Vegetable Program.

Union County Adolescent Population 2012-2013

- **9,921 Middle School Students**
- **11,162 High School Students**
- **2,756 High School Graduates / 90.8 % Graduation Rate**
- **86% of graduates plan to attend college**
- **\$95.2 million in scholarship monies awarded in 2013 (4-year value)**
- **87% of victims served for sexual abuse at United Family Services are under 18**
- **864 Teen Motor Vehicle Crashes (2009)**
- **4 Teen Driver Crash Resulting in Fatality (2009)**
- **30 Teen Driver Crash Involving Alcohol (2009)**
- **2012 Teen Pregnancy Rate 25.4 / 39.6 NC Rate**
 - **2012 African American Teen Pregnancy Rate 53.7 / 55.0 NC Rate**
 - **2012 Hispanic Teen Pregnancy Rate 51.8 / NC Rate 46.7**
 - **2012 White Teen Pregnancy Rate 16.4 / NC Rate 28.3**
- **2012 Teen Abortion Rate 4.7 / 7.6 NC Rate**
 - **African American Teen Abortion Rate *Not Available* / NC Rate 13.1**
 - **Hispanic Teen Abortion Rate *Not Available* / NC Rate 13.1**
 - **White Teen Abortion Rate 4.0 / NC Rate 5.1**

(All pregnancy & abortion rates are for girls 15 to 17, per 1,000)

Citizen Health / Adults

Union County experienced a 1.7% decrease in the number of uninsured adults from 2011 to 2013 while the State had a .2% increase.

Union County is participating in TRANSFORM4HEALTH. This is a regional Community Transformation Grant Project – a state funded initiative to promote tobacco-free living, active living and healthy eating. Following are some of the specific things Union County Division of Health has done as part of this initiative:

- Identified 15 farmer’s markets, mobile markets, farm stands, farm and Community Supported Agriculture Programs and shared information about healthy food sources within the community.
- Provided support and marketing materials for the newly established Rocky River Local Foods that sells locally grown produce to the residents and businesses in Union County
- Provided support for South Piedmont Community College to become a Smoke Free Campus
- Provided support for the Union County Farmers Market to be Tobacco Free
- Established a Joint Use Agreement with Union County Schools and the local Girls & Boys Club for identified fitness space for club participants

Adult Health Indicators
Agency for Healthcare Research (2009)

Prevention Quality Indicators	County Rate	NC Rate
(represent hospital admission rates)	(per 100,000)	(per 100,000)
Diabetes short-term complication	184.7	223.7
Diabetes long-term complication	298.3	297.5
Congestive heart failure	468.8	577.2
Chronic Obstructive pulmonary disease	397.8	429.7
Adult Asthma	92.0	102.3
<u>Inpatient Facilities</u>		
<ul style="list-style-type: none"> • 9,410 General Hospital Discharges (2011) [According to the Cecil G. Sheps Center for Health Services Research] • 157 CMC Union General Hospital Beds (2011) • 607 Nursing Facility Beds in 6 facilities (2011) 		
Pregnancy, Fertility, Abortion Rates	Union County	NC
(Rates per 1,000)	2012	2012
2012 Pregnancy Rates (ages 35- 44)	27.8	27.9
2012 Fertility Rates (ages 35 – 44)	24.7	24.0
2012 Abortion Rates (ages 35 – 44)	2.8	3.7
Uninsured Adults (2012)	Union County	NC
Adults 19 to 64	19.9 %	23.5 %

The latest statistics from the UNC Sheps Center illustrate the following medical professional availability.

Health Professionals in Union County vs. NC, per 10,000 population

	Union County 2010	Union County 2011	NC 2011
Dentists	2.6	2.6	4.3
Physicians	8.3	8.1	22.1
Primary Care Physicians	4.6	4.0	7.8
Pharmacists	7.9	7.9	9.5
Registered Nurses	42.4	44.8	98.6
Nurse Practitioners	1.2	1.4	4.1
Certified Nurse Midwives	0.2	2.2	1.6
Physician Assistants	1.3	1.7	4.0
Psychologists	0.4	0.4	2.1
Chiropractors	1.5	1.3	1.6
Occupational Therapist	2.0	2.0	2.8
Optometrist	0.5	0.6	1.1
Podiatrist	0.0	0.1	0.3
Physical Therapist	2.4	3.0	5.4
Respiratory Therapist	1.5	1.6	4.3

Mortality / Morbidity

Mortality Rates Union County vs. NC (Age Adjusted per 100,000)

Cause	2007 - 2011	2007-2012
Heart Disease	172.4	179.3
Cerebrovascular Disease	44.5	46.0
Diabetes	18.9	22.0
All Cancers	159.5	179.7
Septicemia	16.0	13.6
Nephritis, Nephrotic Syndrome, Nephrosis	18.5	18.6
Pneumonia & Influenza	14.9	17.9
Chronic Lower Respiratory Disease	41.9	46.6
Chronic Liver Disease	7.2	9.3
Alzheimer's Disease	61.9	29.0
Motor Vehicle Injuries	14.5	15.5
157 Motor Vehicle Crashes w/drivers over 75		
Suicide Rate	10.9	12.1
Homicide Rate	3.4	6.3
All Other Unintentional Injuries	20.9	29.2

Cancer Data (Cancer incidence rates per 100,000 Population, age adjusted)

Cancer	Union County 2005 – 2009	Union County 2007 – 2011	NC 2007 – 2011
Colon / Rectum	16.3	15.7	15.5
Lung / Bronchus	52.2	44.9	54.5
Breast Cancer	17.3	17.4	23.0
Prostate	22.6	22.7	24.3

Adult Health Indicators / Communicable Disease *Sexually Transmitted Diseases*

Number of Cases	Union County 2011	Union County 2012	Union County 2013 (1/1 – 11/20)	NC Avg Cases 2008-12
HIV Disease	14	5	no data to date	1,409
AIDS	7	7		938
Chlamydia	518	517	517	50,650
Syphilis	2	1	no data to date	1,046
Gonorrhea	164	172	102	14,335

Adult Health Indicators / Communicable Disease

Number of Cases	Union County 2011	Union County 2012	Union County Jan 1 – Nov 20, 2013
Campylobacter	12	23	22
E. Coli	1	5	2
Hepatitis A	0	0	1
Hepatitis B	1	0	1
Hepatitis B Carrier	11	6	8
Hepatitis C	0	0	0
Lyme Disease	1	1	4
Meningococcal	0	0	0
Meningitis Pneumococcal	0	0	0
Rocky Mountain Spotted Fever	0	0	1
Salmonellosis	57	45	28
Shigellosis	2	1	6
Pertussis (Whooping Cough)	2	5	11
Malaria	3	3	0
Hemophilic Influenza	2	4	2
Legionellosis	2	0	1
Cryptosporidiosis	0	0	0

Dental Health

When a family's funds for health care are scarce dental care is often neglected and this results in both short-term and long-term health issues. The Union County Health Department is working to minimize this problem through its seven year partnership with Smart Start (Alliance for Children). The Smiles Program through this partnership provides dental education and a tooth brushing program in Union County child care centers. Through these outreach efforts and the affordable Public Health Dental Clinic the Health Department continues to make families aware of the importance for preventative dental care and the need for a dental home.

The Dental Clinic has continued to provide cleaning and related services through 2013. However, it has been limited during parts of the year in its ability to provide complete dental care because of the lack of a staff dentist during two intervals. In November a new dentist came on board and the clinic is again operating at full service.

The Dental Clinic offers the following services:

- Consultation
- X-rays
- Cleaning
- Extractions
- Fluoride treatments
- Fillings
- Sealants
- Night guards
- Pulpotomies
- Partials and dentures
- Bilingual staff for Spanish-speaking clients
- Accepts: Cash, Credit Card, Debit Card, Ameritas Insurance, Medicaid and Health Choice

Dental Smiles Program

July 2012 – October 2013

- **Parents who participated in on time parent education session: 177**
- **Directors and or teachers who attended to dental sessions: 32**
- **Children who attended dental sessions: 450**
- **Locations for dental sessions: 23**
- **Classrooms for dental sessions: 12**
- **Dental sessions for children: 80**
- **Dental sessions for parents: 30**
- **Approx. number of family members impacted by dental health education: 925**
- **Clinic accepts Medicaid, NC Health Choice and Private Pay**

Mental Health

The two of the largest providers of counseling services in Union County are Daymark Recovery Services and Safe Alliance (formerly United Family Services).

United Family Services recently changed its name to Safe Alliance. In Union Safe Alliance provides critical crisis services to victims of sexual assault, rape, child abuse or suicide. Their services include: 24 hour rape crisis line, a children's advocacy center, safety planning services, hospital accompaniment, case management, systems advocacy, support groups and court advocacy/accompaniment. The Tree House Children's Advocacy Center provides a neutral, child-friendly location for forensic interviews, medical evaluations, advocacy and support for victims and non-offending family members. Safe Alliance assists more than 3,000 people annually in Union County and reach many more through educational and prevention programs.

The average number of clients served per month in 2013 (January – September) by Daymark is 3,178 which is 236 higher than the average monthly number for fiscal year 2012/13; that is a 7.4% increase. The average monthly in 2010 – 2011 fiscal year was 2.648 so there was an increase 294 (9.9%) average monthly number in the 2 year period up to the past fiscal year (2012/13).

Residents will have to await placement when they present in the Emergency Room. Although the number of people having to wait three or more days has decreased the challenge of the wait time in the Emergency Room is still an issue.

Key Mental Health Statistics

Psychologists: Union County .4 vs. NC 2.1 (per 10,000 population) 2012

Daymark Recovery Mental Health Clients (2012 - 2013)

- 2942 average number of clients served per month
- 199 average number of clients served Emergency & Mobile Crisis Services (per month)
- 105 Average number of clients seen as walk in patients for Emergency Services / Advanced Access (2012 - 2013)

United Family Services (UFS) Clients (June 2012 – July 2013)

- 1759 direct services to clinical and victim clients
- 42% of those receiving services were victims of child abuse, sexual assault, or other violent crimes
- UFS runs 24 hour rape crisis hotline
- 29 Accompanied rape victims to the hospital
- Safe Alliance's "Tree House" program provided services to 158 new child clients including 136 medical exams and 143 forensic interviews to children as part of the sexual assault response team
- 94 outreach/awareness programs presented to 1558 community members on child abuse and sexual assault

Emergency Services & Safety

A new address numbering process was put into place that allows an individual or business to go to the tax office and through special software access all departments and agencies involved in addressing. This has increased the accuracy of the 911 addressing database.

In 2013 the 911 Department received reaccreditation in emergency, medical and fire dispatching.

The 911 now has its own radio technician to ensure the interoperability of the communication equipment between all emergency departments. This has improved the efficiency in emergency situations involving multiple departments/agencies.

During the 2012/13 fiscal year Union EMS has seen a reduction in response times as a result of the transition of its busiest ambulances to 12-hour shifts and a specific focus on monitoring and improving response times. The transition of additional ambulances from 24-hour shifts to 12-hour shifts is planned for 2014.

Union EMS has adopted a transport protocol for heart attack patients taking them directly to interventional hospitals for cardiac catheterization and stents. This has a positive impact on more than 50 patients a year. Also, as a result of recent updates to EMS' medical protocols and the agency's commitment to "Team Focused CPR" the rate of return of spontaneous circulation (RSCC) in cardiac arrest patients continues to improve. This choreographed approach to resuscitation prioritizes responder actions based on national research and improves the number of successful resuscitations as well as the long-term neurological outcomes.

In addition to providing the ambulance services and emergency medical services for the County, Union EMS also provided medical standby coverage for 86 high school and collegiate football games and participated in 35 community relations events. EMS also provided medical standby for 134 other event/departments – fire, SWAT and PR Events.

2012 - 2013 Emergency Statistics / Injury Indicators

- **189,483 calls received into 911**
- **262,123 dispatched 911 calls (including those initiated by safety personnel)**
- **8.85 minutes, average response time for Union EMS for Emergency calls**
- **18,808 Union EMS Responses resulting in 12,938 Transports**
- **61% Union EMS Transports went to CMC Union**
- **3% Union EMS Transports to CMC - Waxhaw**
- **35% Union EMS Transports went out of County**
- **3,819 motor vehicle crashes (2012)**
- **25 crashes resulting in fatalities (2012)**
- **212 crashes involving alcohol (2012)**
- **9 crashes involving alcohol with fatalities (2012)**

Environmental Health

The Union County Health Department Environmental Division implemented a new digital system “Digital Health Department” to make current permit and inspection data of all county permitted and inspected facilities easily available to County citizens. The system is a website (www.union.digitalhealthdepartment.com) that gives people access to all food, lodging, institution, day care and swimming pool permits and inspections. Citizens are made aware of the new Digital Health Department through the Division of Health’s outreach efforts. Additionally, the Environmental Health Department now accepts debit and credit card payments (Visa and MasterCard).

Environmental Health Factors and Statistics

- **1910 Inspections, 649 Compliance Visits of Food and Lodging Establishments**
- **93 Food Service Permits Issued**
- **192 Food, Lodging and Institutions Program Complaints Taken**
- **41 Inspections and Compliance Visits of Nursing Homes, Adult Day Cares**
- **205 Well Permits Issued**
- **137 Well Certificates of Completion**
(171 new wells, 12 repairs, 19 abandonments)
- **239 on-site wastewater system improvement permits issued**
- **236 Bacteria Water samples taken (from both new and existing wells)**
- **76 water samples taken with coli form present**
- **8 water samples taken with E. Coli bacteria present**
- **6 Methamphetamine Labs (1 Review of Abatement Plans)**
- **383 Swimming Pool, Wading Pool, Spa Inspections and Compliance Visits**
- **2 child lead investigations, 0 child lead poisoning cases**
- **15 Tattoo Artist permits issued**
- **30 Tattoo Inspections**
- **197 Childcare Facility Inspections, 100 Compliance Visits, 4 Permits issued**
- **65 School Building Inspections, 22 Compliance Visits, 2 Permits issued**

On September 1, 2012, there were significant changes to North Carolina’s Food Establishment Rules with the adoption of the FDA Food Code. It helps restaurants and food trucks ensure safer food for diners. The changes reinforce the strong partnership between retail food service and public health to assure that the public can have even greater confidence that the food they eat when dining out is safe.

Some of the major changes under the updated North Carolina Food Code include:

- Food establishments will be required to refrain from handling exposed, ready-to-eat foods with bare hands.
- Each food establishment will be required to develop and adhere to an Employee Health Policy to prevent and control the transmission of illnesses.
- During hours of operation, all restaurants must have a certified food protection manager who has passed an American National Standards Institute-accredited exam. This requirement will become effective January 1, 2014.
- Food establishments will be required to decrease the temperature of refrigerated foods and must date-mark opened, ready-to-eat foods.

In anticipation of the rule change, all Environmental Health Specialists that inspect food service establishments have completed FDA Standardization. The standardization procedures involve food safety interventions, identification of risk factors known to contribute to foodborne illness, and a Hazard Analysis Critical Control Point (HACCP) based inspection. The purpose is to improve food safety and achieve a high degree of uniformity throughout the county in both the requirements and the manner of enforcement of state laws governing food safety in the retail food industry.

Air Quality

Union County continues to have a problem and concern with Ozone levels. According to the State of North Carolina's Amended Recommendation on Boundaries For the 2008 8-Hour Ozone Standard" published on February 29, 2012 much of Union County is considered nonattainment – not meeting standards.

The EPA designates counties adjacent to urban counties that are in non-attainment with the same designation due to the wind carrying the pollutants into adjacent counties. Weather plays a critical role in ozone formation. For example, one or two years of favorable or unfavorable hot weather can impact the three year average. Reducing the pre-cursor pollutants (NOx and VOC's) for ozone would impact the three year average. North Carolina's plan to reduce Ozone formation is to concentrate on the reduction of Nitrogen Oxides (NOx) only.

Much of the air pollution in Union County comes from nearby Mecklenburg County. However, another portion of the pollution is caused by the commuters that drive from Union County to Mecklenburg County. Following is an excerpt from the "State of North Carolina's Amended Recommendation on Boundaries For the 2008 8-Hour Ozone Standard".

Union County contributes 6.84 percent of the commuters who drive in to Mecklenburg County to work each day, most of which live in the western portion of the county. Union County ranks number 1 in commuting counties into Mecklenburg. The VMT are expected to increase to 6.5 million in 2015 and 8.7 million in 2025. There is a significant amount of commuter traffic from the northern and western townships into Mecklenburg County. These townships (Monroe, Sandy Ridge, Vance and Goose Creek) may be impacting the ambient air quality data in the CSA. The 4 townships recommended for attainment have lower traffic counts compared to the 5 townships that are recommended for Non-attainment. Of the 4 townships to be excluded, Jackson Township had an estimated 1563 trips to/from Mecklenburg County, which was 4.1% of the county total and 0.3% of the trips from the entire CSA. Traffic to/from Mecklenburg for the 3 other townships (Buford, Lanes Creek, and New Salem) was even less.

Health Indicators

- **1 Code Red days in the Charlotte Metropolitan Statistical Area (2012)**
- **10 Code Orange Days in the Charlotte Metropolitan Statistical Area (2012)**
- **125 Code Yellow Days in the Charlotte Metropolitan Statistical Area (2012)**
- **Charlotte region designated moderate non-attainment**
- **Average value for the 8 hour ozone violations for 2010 – 2013 for Union County is 0.073 ppm (parts per million); for Mecklenburg County is 0,083 ppm**
- **Pediatric Asthma Rate (children birth – 14) Union County Rate 154.1 vs. NC Rate 163.7 (per 100,000 population) 2012**
- **Asthma Rate for All Ages Union County 91.6 vs. NC Rate 100.3 (per 100,000 population) 2012**

Environmentally Friendly Practices in Union County

Union County continues to take steps toward reducing its carbon footprint. In April 2013, the County, along with the City of Monroe, held the sixth annual Earth Day event. At that single event 34% of the total household hazardous waste collected by the county was turned in.

Recycled Items for Fiscal Year 2012-2013

- **47.7 tons of household hazardous waste**
- **4601.49 tons of yard waste**
- **126.92 tons of white goods (appliances) and other metals**
- **2699.3 tons of tires**
- **296.2 tons of wood pallets**
- **17,235 gallons of oil**
- **34 drums of oil filters**

2013 Union County Division of Health Goals

- **Achieve Re-Accreditation status in 2014**
- **Pursue grants to diversify programs and revenue streams**
- **Increase public awareness of the Union County Health Department programs and services through community outreach**
- **Plan for new Health Department facility in 2017**
- **Promote healthy eating and raise awareness around the importance of eating locally grown foods**
- **Grow Union County Employee WELLNESS MATTERS initiative**
- **Establish new innovative public health partners to improve the health and wellbeing of residents that are not currently benefiting from health department services**
- **Work collaboratively with nursing homes and assisted living communities to deliver on-site dental services and immunizations**
- **Continue to utilize the Community Transformation Grant to increase the usage of locally grown foods in the county.**
- **Reduce by 20% the prevalence of Type II Diabetes within Union County Healthquest clients through education, prevention and self-management**
- **Decrease the adolescent obesity rate in Union County through interactive interventions at the Boys and Girls Clubs in Monroe.**

Data Sources

Union County Division of Health

Union County 911 Department

Union County Public Schools, www.ucps.k12.nc.us

Safe Alliance (formerly United Family Services)

Daymark, Union County

North Carolina State Center Health Statistics

US Census Bureau, American Community Survey

Employment Security Commission www.esc.state.nc.us/countycard/index.aspx

Union EMS

Union County Department of Social Services

www.statehealthfacts.org

Adolescent Pregnancy Prevention Campaign of North Carolina

<http://www.appcnc.org/>

TRANSFORM4HEALTH -- Region 4 NC Community Transformation Grant Project

<http://transform4health.org/>

Union County Public Schools

<http://www.ucps.k12.nc.us/>

Tree House/Safe Alliance

www.safealliance.org

North Carolina Department of Health and Human Services

State Center for Health Statistics and the

Office of Healthy Carolinians/Health Education

<http://www.schs.state.nc.us/SCHS/data/databook/>

<http://www.schs.state.nc.us/schs/data/databook/2013/>

NC Health Professions Data System

<http://www.shepscenter.unc.edu/hp/prof2011.htm>

<http://www.nchealthystart.org>

<http://www.schs.state.nc.us/schs/data/pregnancies/2012/>

Hospital Discharge Data

<http://www.shepscenter.unc.edu/wp-content/uploads/2013/04/NC-Inpatient-Patient-Characteristics-2011-Hospitals-M-Z.pdf>

Adult Health Indicators

<http://www.ncdhhs.gov/dma/countyreports/2011/UnionCounty.pdf>

Communicable Diseases

http://epi.publichealth.nc.gov/cd/figures/cd_oct2013.pdf

Vehicle Crashes

<http://www.hsrc.unc.edu/crash/datatool.cfm>

<http://www.schs.state.nc.us/schs/data/databook/CD18%20Asthma%20hospitalizations%20by%20county.html>

http://www.ucps.k12.nc.us/news/jump.php?news_id=371909