2016 | Maternal and Child Health Data Brief





Highlights

- After a plateau period between 2002 to 2007, teen pregnancy rates have continued to decline in Guilford County among all races, though a racial disparity persists.
- The percentage of women entering late into prenatal care or not receiving care increased across all race and ethnic groups in 2013 and in 2014.
- The rate of preterm births increased to 10.5% in 2014, with a significant and persistent racial disparity.
- Percentages of low and very low birth weight for the years 2010 to 2014 were significantly higher for Black births than for White births.
- After increasing to 8.6 infant deaths per 1,000 live births in 2013, the infant mortality rate declined in 2014 to 7.9. The White rate declined to a historically low rate of 3.8, while the Black/African-American rate increased to 13.6. The Hispanic rate was 5.2 infant deaths per 1,000 live births.
- The Guilford County infant mortality rate is higher than that of the state of North Carolina overall as well as the US rate.

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Birth Outcome Objectives from the 2014 Guilford County Community Health Action Plan

Objective:

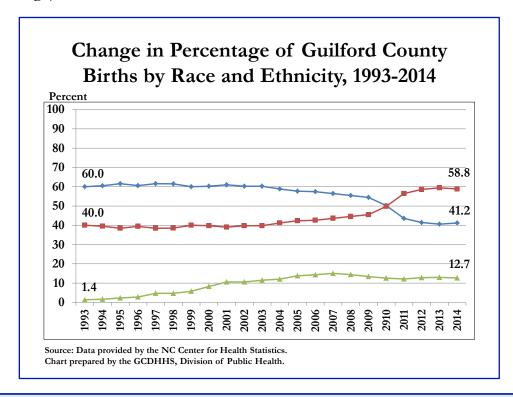
- Reduce rates of preterm births by 5% to below 10% by Dec. 31, 2016
- Reduce preterm birth racial disparity between Whites and African Americans to a ratio of 1.2 by Dec. 31, 2016
- Reduce the infant mortality rate (per 1,000 live births) to 7.1 per 1,000 live births by Dec. 31, 2016
- Reduce the 5-year infant mortality rate racial disparity between whites and African Americans to a ratio of 2.2 by Dec. 31, 2016

• 2012 Baseline:

- Preterm birth percentage: 10.5%
- Preterm birth racial disparity, Ratio between African American and White preterm rate: 1.4
- Infant mortality rate: 7.9 per 1000 live births
- Infant mortality racial disparity, ratio between African-Americans and White infant mortality rates: 2.47 (2008-2012)

2014 Progress toward Objectives

- Preterm birth percentage: 10.5% (*no change*)
- Preterm birth racial disparity; ratio between African American and White preterm rate = 1.5 (*negative change*)
- Infant mortality rate: 7.9 per 1,000 live births (*no change*)
- Infant mortality racial disparity, ratio between African American and White infant mortality rates = 3.6 *(negative change)*

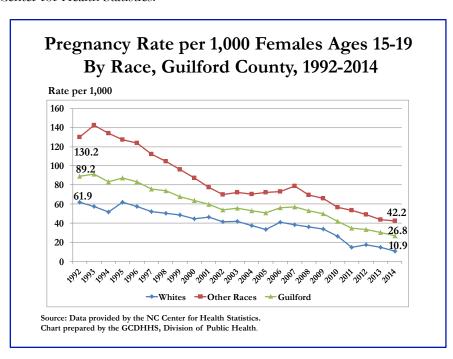


- As a percentage of total live births. White births are declining, while African American births are increasing, making up the majority of births since 2011;
- Hispanic births made up 13% of all births in 2014.

Teen Pregnancy in Guilford County

Teen Pregnancies, Abortions and Live Births, by Race, 2014									
	All Races	Whites	African-Americans						
Pregnancies Ages 10-14	12	0	11						
Pregnancies Ages 15-19	504	106	305						
Total Pregnancies Ages 10-19	516	106	316						
Pregnancy Rate per 1,000 Females Ages 10-14	0.7	0.0	1.7						
Pregnancy Rate per 1,000 Females Ages 15-19	26.8	10.9	38.5						
Total Pregnancy Rate per 1,000 Females Ages 10-19	14.6	5.8	21.8						
Abortions Ages 10-14	4	0	3						
Abortions Ages 15-19	149	29	99						
Total Abortions Ages 10-19	153	29	102						
Abortion Rate per 1,000 Females Ages 10-14	0.2	0.0	0.5						
Abortion Rate per 1,000 Females Ages 15-19	7.9	3.0	12.5						
Abortion Rate per 1,000 Females Ages 10-19	4.3	1.6	7.0						
Live Births Ages 10-14	8	0	8						
Live Births Ages 15-19	349	76	202						
Total Live Births Ages 10-19	357	76	210						
Birth Rate per 1,000 Females Ages 10-14	0.5	0.0	1.2						
Birth Rate per 1,000 Females Ages 10-14 Birth Rate per 1,000 Females Ages 15-19	18.6	7.8	25.5						
Birth Rate per 1,000 Females Ages 10-19	10.1	4.1	14.5						
Dittil Tate per 15000 i ciliares riges 10-17	10.1	7.1	17.5						
FEMALE POPULATION 10-14	16,435	8,683	6,596						
FEMALE POPULATION 15-19	18,880	9,722	7,930						
TOTAL FEMALE POP. 10-19	35,235	18,405	14,526						

Source: NC State Center for Health Statistics.



Prenatal Care

Prenatal visits are important for the health of both infant and mother. Health care providers can educate mothers on important health issues, such as their diet and nutrition, exercise, immunizations, weight gain, and abstaining from tobacco, alcohol and other drugs. Late entry into prenatal care is defined as beginning prenatal care after the first three months of pregnancy. Mothers who receive no prenatal care are more likely to give birth to low birthweight and preterm babies.

Month 1	Entering in	to Prenatal	Care, by Ra	ce and His	panic Status	s, 2014
Month Entering Prenatal Care	White	Black or African- American	American Indian	Asian	Other Non- White	Hispanic
1	73	47	0	8	5	8
	2.9%	1.9%	0.0%	1.7%	.8%	1.0%
2	756	414	8	68	56	96
	30.2%	16.7%	27.6%	14.5%	9.3%	12.4%
3	1045	742	6	162	157	212
	41.7%	29.9%	20.7%	34.6%	26.0%	27.4%
4	249	436	6	74	135	164
	9.9%	17.6%	20.7%	15.8%	22.3%	21.2%
5	145	301	5	50	102	118
	5.8%	12.1%	17.2%	10.7%	16.9%	15.2%
6	93	186	1	46	62	73
	3.7%	7.5%	3.4%	9.8%	10.2%	9.4%
7	53	122	2	25	35	43
	2.1%	4.9%	6.9%	5.3%	5.8%	5.5%
8	31	86	0	19	18	24
	1.2%	3.5%	0.0%	4.1%	3.0%	3.1%
9	20	54	1	2	15	18
	.8%	2.2%	3.4%	0.4%	2.5%	2.3%
No prenatal	14	52	0	4	6	6
Care	.6%	2.1%	0.0%	0.9%	1.0%	.8%
Unknown	25	39	0	10	14	13
	1.0%	1.6%	0.0%	2.1%	2.3%	1.7%
Total	2,504	2,479	29	468	605	775
Total Percent	100%	100%	100%	100%	100%	100%

Source: NC State Center for Health Statistics.

Percentage of Births to Mothers Receiving Late or No Prenatal Care									
	2011	2012	2013	2014					
Overall	24.2	23.7	34.8	40.3					
White	12.6	12.7	19.3	24.2					
African-American	30.0	30.2	42.6	49.9					
Hispanic	43.6	38.7	55.4	57.5					

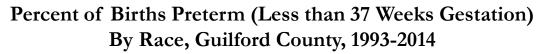
Source: NC State Center for Health Statistics.

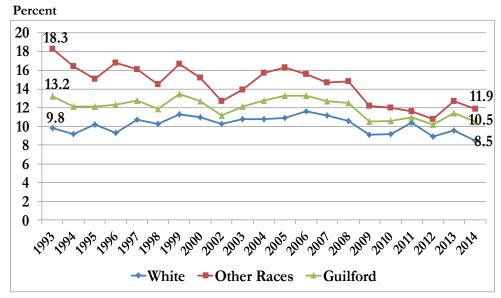
Completed Weeks of Gestation, All Births Guilford County, 2011-2014

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Number of Births by Completed Weeks of Gestation											
	2011 2012 2013										
<28 weeks (Extremely preterm)	68	55	70	61							
28 to 31 weeks (Very preterm)	80	54	60	83							
32 to 36 weeks (Moderate to late preterm)	521	538	576	494							
37 weeks plus (Normal term)	5,373	5,506	5,451	5,442							
Unknown	7	11	12	5							
Total Number	6,049	6,164	6,169	6,085							
Percent of Births by Cor	mpleted Weeks	of Gestation									
<28 weeks (Extremely preterm)	1.1	0.9	1.1	1.0							
28 to 31 weeks (Very preterm)	1.3	0.9	1.0	1.4							
32 to 36 weeks (Moderate to late preterm)	8.6	8.7	9.3	8.1							
37 weeks plus (Normal term)	88.8	89.3	88.4	89.5							
Unknown	0.1	0.2	0.2	.08							
Premature Births—Less than 37 Weeks Gestation											
Number	669	647	706	638							
Percent	11.1	10.5	10.0	10.5							

Source: NC Center for Health Statistics; North Carolina Birth Certificate File

Note: Percentages represent the obstetric estimate of gestational age.





Source: Data provided by the NC Center for Health Statistics. Chart prepared by the GCDHHS, Division of Public Health.

Low and Very Low Birthweight

Birth Weights in Guilford County, 2004-2014

		Nu	mber of	Births b	y Birth	Weight	Categor	y			
Birth Weights	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Very Low Birth Weight Less than 1,500 grams	135	121	123	144	122	146	111	143	107	118	131
1,500-2,499 grams	392	441	450	476	473	446	453	451	466	461	462
Normal Weight 2,500+ grams	5,334	5,435	5,546	5,676	5,786	5,558	5,439	5,455	5,588	5,590	5,489
Total Births	5,861	6,000	6,119	6,296	6,381	6,150	6,003	6,049	6,164	6,169	6,085
		Pe	rcent of	Births b	y Birth	Weight (Category	У			
Very Low Birth Weight Less than 1,500 grams	2.3	2.0	2.0	2.3	1.9	2.4	1.8	2.4	1.7	1.9	2.2
1500-2,499 grams	6.7	7.4	7.4	7.6	7.4	7.3	7.5	7.5	7.6	7.5	7.6
Normal Weight 2500+ grams	91.0	90.6	90.6	90.2	90.7	90.4	90.6	90.2	90.7	90.6	90.2
Low Birth Weight Births—Under 2,500 Grams											
Number Low Birth Weight Less than 2,500 grams	527	562	573	620	595	592	564	594	573	579	59.3
Percent Low Birth Weight	9.0	9.4	9.4	9.8	9.3	9.6	9.4	9.8	9.3	9.4	9.7

Source: NC Center for Health Statistics; North Carolina Birth Certificate File.

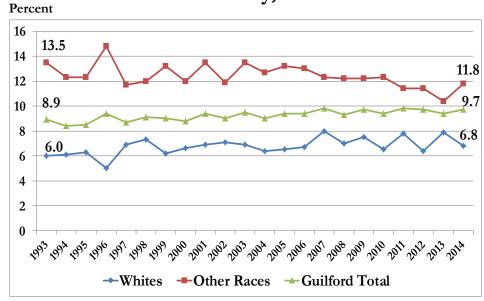
Note: Birth weights under 2,500 grams (five pounds eight ounces) are classified as low birth weight; Birth weights under 1,500 grams (three pounds five ounces) are classified as very low birth weight.

Low and Very Low Birthweight, by Race and Ethnicity, Guilford County and North Carolina, 2010-2014

	Birth	To	Total		nite	Bla	ick	Hispanic		
	Weight	Births	Percent	Births	Percent	Births	Percent	Births	Percent	
North	Low	53,990	9.0	25,222	7.5	19,815	13.8	6,002	6.7	
Carolina	Very Low	10,438	1.7	4,293	1.3	4,600	3.2	1,090	1.2	
Guilford	Low	2,910	9.6	877	7.1	1,554	12.9	267	6.9	
County	Very Low	612	2.0	164	1.3	371	3.1	56	1.5	

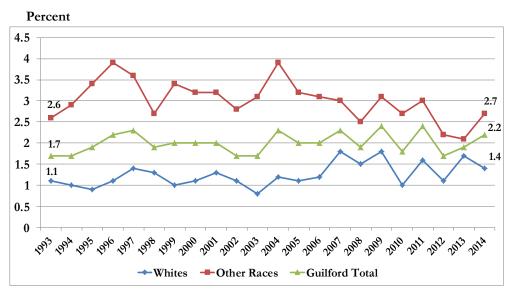
Source: NC Center for Health Statistics, County Health Databook.

Percent of Births Low Birthweight* by Race Guilford County, 1993-2014



Note: *2,500 grams (about 5 ½ pounds) and under. Source: Data provided by the NC Center for Health Statistics. Chart prepared by the GCDHHS, Division of Public Health.

Percent of Births Very Low Birth Weight* by Race, Guilford County, 1992-2014



Note: *1500 grams (about 3 ½ pounds) and under Source: Data provided by the NC Center for Health Statistics. Chart prepared by the GCDHHS, Division of Public Health.

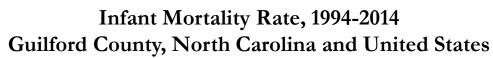
Infant Mortality in Guilford County

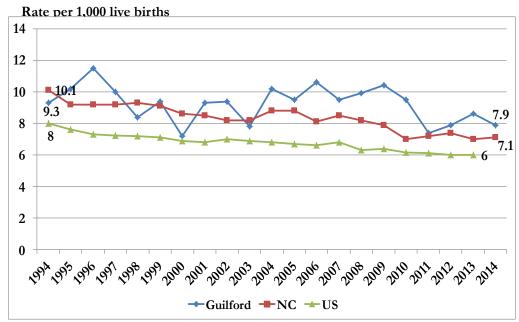
Infant Deaths per 1,000 Live Births, by Race/Ethnicity Guilford County, 2004-2014

Number of Infant Deaths											
	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Guilford County All Races	60	57	65	60	63	64	57	45	49	53	48
White	16	20	31	21	26	17	25	10	16	20	9
African Americans						45	31	30	26	32	33
Hispanic							9	5	5	3	4
		Infant	Mortali	ty Rate 1	per 1,000	Live Bi	rths				
Guilford County All Races	10.2	9.5	10.6	9.5	9.9	10.4	9.5	7.4	7.9	8.6	7.9
White	4.6	5.8	8.8	5.9	7.4	5.1	6.4	3.9	6.5	8.0	3.8
African American						18.6	13.2	12.7	10.7	12.7	13.6
Hispanic							11.8	6.7	6.3	3.7	5.2
	Number of Live Births										
Guilford County All Races	5,861	6,000	6,119	6,296	6,381	6,150	6,003	6,049	6,164	6,169	6,085
White	3,445	3,462	3,513	3.548	3,563	3,349	3,013	2,549	2,460	2,503	2,370
African American						2,418	2,341	2,367	2,429	2,519	2,434
Hispanic							759	741	790	804	774

Source: NC Live Birth File: NC Center for Health Statistics.

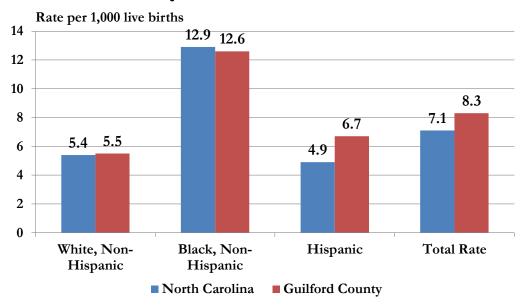
- After increasing to 8.6 infant deaths per 1,000 live births in 2013, the infant mortality rate declined in 2014 to 7.9. The White rate declined to a historically low rate of 3.8, while the Black/African-American rate increased to 13.6. The Hispanic rate was 5.2 infant deaths per 1,000 live births.
- The leading causes of infant death in 2014 were maternal complications of pregnancy, disorders related to short gestation and low birth weight, congenital malformations, deformations and chromosomal abnormalities and respiratory and cardiovascular disorders originating in the perinatal period.





Source: Data provided by the NC Center for Health Statistics. Chart prepared by the GCDHHS, Division of Public Health.

Infant Mortality Rates, by Race/Ethnicity, Guilford County and North Carolina, 2010-2014



Source: Data provided by the NC Center for Health Statistics. Chart prepared by the GCDHHS, Division of Public Health.

Detailed Infant Causes of Death, 2014

ICD-10 Codes	Cause of Death	Number of Deaths
I35.0	Nonrheumatic aortic (valve) stenosis	1
J984	Other disorders of lung	1
K566	Unspecified intestinal obstruction	1
P01.0 P01.1 P05.9	Maternal complications of pregnancy Newborn (suspected to be) affected by incompetent cervix Newborn (suspected to be) affected by premature rupture of membranes Newborn affected by slow intrauterine growth, unspecified	1 2 1
P07.2 P07.3	Disorders related to short gestation and low birth weight Extreme immaturity of newborn Preterm (premature) newborn (other)	8 3
Q04.2 Q79.0 Q89.9 Q91.3	Congenital malformations, deformations and chromosomal abnormalities Holoprosencephaly Congenital diaphragmatic hernia Congenital malformation, unspecified Trisomy 18, unspecified	1 1 1
P22.0 P22.9 P25.1 P26.9 P28.0 P29.3	Respiratory and cardiovascular disorders originating in the perinatal period Respiratory distress syndrome of newborn Respiratory distress of newborn, unspecified Pneumothorax originating in the perinatal period Unspecified pulmonary hemorrhage originating in the perinatal period Primary atelectasis of newborn Persistent fetal circulation	1 1 1 1 2
P52.3 P54.8 P60.0 P77.0 P91.6	Hemorrhagic and hematological disorders of newborn Unspecified intraventricular (nontraumatic) hemorrhage of newborn Other specified neonatal hemorrhages Disseminated intravascular coagulation of newborn Necrotizing enterocolitis of newborn Hypoxic ischemic encephalopathy	2 1 1 1
R95 R99	Sudden Infant Death Syndrome Ill-defined and unknown cause of mortality	1 10
P02.1	Complications of placenta, cords and membranes	1
P02.7	Newborn (suspected to be) affected by other forms of placental separation and hemorrhage Newborn (suspected to be) affected by chorioamnionitis	1 1
	Total Infant Deaths	48

Source: NC Mortality File, Center for Health Statistics

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For more information about Guilford County health statistics, visit www.myguilford.com/humanservices/health/health-statistics