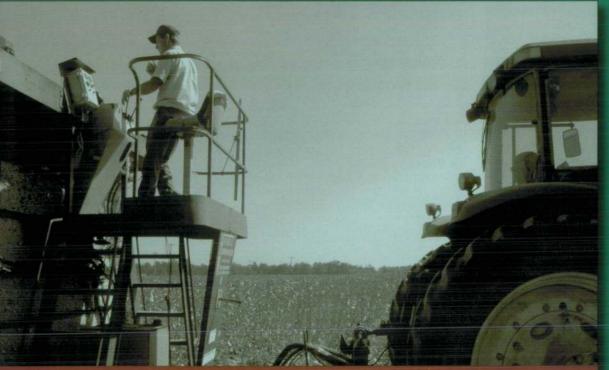
North Carolina S16 FEBRUARY 2006 VOL.22 NO.1







Eastern North Carolina Revisited: What Drives the Region's Economy?



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Tammy Bromley Mike McLaughlin Laurita Ray Nancy Rose Sam Watts

NORTH CAROLINA INSIGHT is a magazine published by the North Carolina Center for Public Policy Research, Inc. (a nonprofit, tax-exempt corporation), Suite 701, 5 W. Hargett St., P.O. Box 430, Raleigh, N.C. 27602. Telephone (919) 832-2839. Annual membership rates: Individual, \$36; Organizational, \$50; Supporting, \$100; Corporate, \$200; Full-Service, \$250; Corporate Donor, \$300; Supporting Corporate, \$500; Patron, \$1,000; Benefactor, \$2,000. Third class postage paid at Raleigh, N.C. Copyright 2006 by the North Carolina Center for Public Policy Research, Inc. Articles may not be reprinted without permission. Graphic design by Carol Majors. Production by Publications Unltd. Printed by Theo Davis Printing, Inc., Zebulon, N.C. The Center is supported in part by grants from the Z. Smith Reynolds Foundation, as well as by eight other foundations, 160 corporate contributors, and almost 600 individual members across the state. The views expressed in this publication are those of the authors and are not necessarily those of the Center's Board of Directors or staff. Published February 2006. Printed on recycled paper. Photography by Karen Tam

Cover: photo by Karen Tam, design by Carol Majors

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North Insight

Vol. 22, No. 1

February 2006



Opportunities and Challenges for Eastern North Carolina, Part II



2	Eastern North Carolina at Work:
	What Are the Region's Economic Engines?

—John Quinterno

Tourism in Eastern North Carolina

—Katherine Dunn

38 Agriculture: Still King of the Eastern North Carolina Economy?

—Mike McLaughlin and Katherine Dunn

Eastern North Carotina Economy

64 More Than Economics:
The Military's Broad Impact on

33

88

—Renée Elder

74 Key Dates in the Base Realignment

Eastern North Carolina

and Closure Process

Federal Impact Aid: How the Program Works

—Katherine Dunn

David and Goliath: The Fight To Site

an Outlying Landing Field in Washington and Beaufort Counties

—Renée Elder

111 Pluses and Minuses of Military Installations in Eastern North Carolina—A Summary

116 From the Center Out:

Record Number of Women and African Americans Serve in the Legislature

-Sam Watts

120 Index to Volume 21

123 Memorable Memo



Ran Coble
ASSOCIATE EDITOR
Mike McLaughlin
GRAPHIC DESIGN
Carol Majors

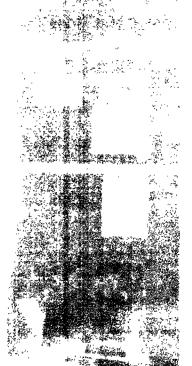
PUBLISHER

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The Center wishes to thank our individual donors for helping to make this research possible. Individual donors are those who have made a three-year commitment to provide general operating support for the Center's research.

Eastern North Carolina at Work:

What Are the Region's Economic Engines?



By John Quinterno

Summary

here is a widespread belief that Eastern North Carolina, while reaching for the future, remains rooted in its agrarian past. The common understanding is that the region for too long relied on agriculture and low-wage manufacturing to earn its daily bread, and that the vestiges of this past—primarily high poverty, a less educated work force, and lagging infrastructure—represent daunting hurdles to a more prosperous future.

Portions of this picture are accurate. The region does have fewer college graduates, more high school dropouts, lower per capita income, and higher poverty than the rest of the state. Indeed, one prominent Eastern North Carolina lawmaker says that if North Carolina's eastern third were a state it would be among the poorest in the nation.

But does Eastern North Carolina really subsist primarily on tobacco, hogs, and field crops, with a few cut-and-sew operations thrown in to stitch the local economy together? The picture is quite a bit more complicated. What are the true engines driving the Eastern North Carolina economy, and what are the challenges the area faces in reaching for a more prosperous future? How is the work force deployed in Eastern North Carolina's 41 counties? Who are some of the largest employers? Where are the commerce centers, and what makes them tick?

Surprisingly, only 2.2 percent of the region's workers are employed full-time on farms—a figure that does not include farm proprietors, family members, or part-time or seasonal workers. Manufacturing, while important, represents only 12.9 percent of the work force, compared to 15.6 percent for the state as a whole. Still, the North Carolina Center for Public Policy Research found that a manufacturer was among the three largest private sector employers in 27 of the region's 41 counties. In 17 of these counties, a manufacturer employing 500 or more people was the single largest private-sector employer. While many remain low-skill, cheap-labor operations, the East is increasingly home to more sophisticated manufacturers that add greater value to raw materials—such as Nucor Steel in Hertford County and Paraclete Armor, manufacturing specialized textiles for the military in Robeson County.

The public sector—including local, state, and federal governments—employs 23.7 percent of the work force in the East compared to 17.7 percent statewide. In several Eastern counties, public institutions are the largest employers. Pitt County Memorial Hospital and East Carolina University together employ more than 10,000 in Pitt County, while the leading private sector employer, Lear Siegler Service, employs fewer than 500. In New Hanover County, the number of employees at New Hanover Medical Center (3,900) and the University of North Carolina at Wilmington (1,600) exceeds that of the largest private sector employer in the county, Wal-Mart, which

employs more than 1,000. Wayne County's Wayne Memorial Hospital, a public hospital, employs more workers than any private sector employer, and Seymour Johnson Air Force Base ranks among the county's top five employers. The U.S. Department of Defense is the leading employer in three counties with large military bases: Craven, home of Marine Corps Air Station Cherry Point; Cumberland, with the Army's Fort Bragg and Pope Air Force Base; and Onslow, home of Marine Corps Camp Lejeune. Thus, the military, with five major bases and numerous smaller posts, represents a huge economic presence in the East.

By sector, services and retail trade—as in much of the rest of North Carolina—provide the bulk of the jobs. Indeed, three out of four workers in the East are employed in the service or retail sectors. A handful of cities also are nurturing a small creative class—considered by one scholar to be the primary growth engine of the future. Tourism is huge along the coast, with beaches in Dare, Hyde, Carteret, Onslow, Pender, New Hanover, and Brunswick County attracting thousands of visitors and generating millions of dollars in tourism revenue annually. Historic sites in the colonial capitals of Edenton and New Bern also are drawing increasing numbers of visitors. Retirees are choosing eastern locations as well, some drawn by the scenic coastal settings and others settling around military bases where military retirees and their dependents enjoy health care benefits and the privilege of shopping on base at discounted prices.

The region as a whole is still seeking to recreate itself as it strives for a vibrant economic mix and a more prosperous future. St. Pauls in Robeson County is one example. A tiny town with two dormant textile mills, St. Pauls symbolizes the region's historic reliance on agriculture and low-wage manufacturing. But the town also is looking to the future, relying on its location along Interstate 95, near massive Fort Bragg and the city of Fayetteville, and within an easy drive to both the state port at Wilmington and the state's longest airstrip at the Global TransPark in Lenoir County to build a 21st century economy.



t. Pauls, a Robeson County town of 2,500, in many ways embodies the economic history of small town Eastern North Carolina. A visitor to St. Pauls' downtown will find many of the sites common to eastern towns: a few churches, some restaurants, a handful of small businesses, stores catering to Latinos, a black mortuary, and overshadowing everything, three vacant textile mills.

A formerly vibrant mill town that has encountered significant setbacks in recent years, St. Pauls stands at a crossroads. It can spring forward to meet the challenges of the global economy, or slide further into economic decline.

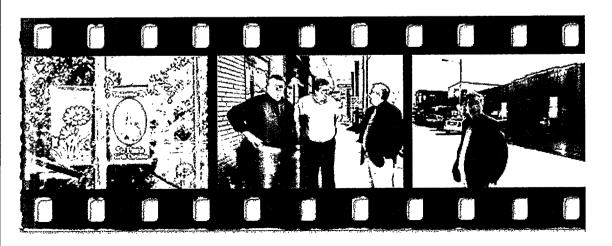
If St. Pauls is in search of a new economic identity, the same can be said for much of Eastern North Carolina, a 41-county region that lags the rest of the state on almost every indicator. The N.C. Center for Public Policy Research first examined the plight of the East as a region in December 2001. The Center's findings included higher unemployment, lower median household income, higher poverty, and lower levels of education generally than for the state as a whole.1 But these findings are magnified in St. Pauls and Robeson County. The county's poverty rate was more than double the state average in 2002 and the highest of the eastern counties. Its median household income was 40 percent lower than the state as a whole (see Table 1, p. 9).2 The Center's 2001 research also uncovered an infrastructure gap for the East as compared to the rest of the state that persists today, though much progress has been made in such areas as intrastate highway construction, availability of water and sewer, natural gas availability, and high-speed Internet access.3 And, compared to the Piedmont, the eastern region lacks capital for jobcreating investment.

Yet another indicator that a region is less vital is declining population, says Al Stuart, professor emeritus of geography and earth sciences at the University of North Carolina at Charlotte and the co-editor of the North Carolina Atlas.4 Stuart notes that the U.S. Bureau of the Census found 16 Eastern North Carolina counties lost population from 2000–2004: Bertie, Columbus, Craven, Cumberland, Edgecombe, Halifax, Hyde, Jones, Lenoir, Martin, Northampton, Onslow, Robeson, Vance, Washington, and Wayne. And, all eight North Carolina counties that lost population from 1990-2000 were located in the East. "This is an ominous trend," says Stuart. "Net out-migration is thought to be 'negatively selective' because it's typically the young and most capable people who leave."5

But despite St. Pauls' location in the poorest eastern county along the south end of Interstate 95, the town has grounds for hope, including numerous avenues to the market. Interstate 95 is the major route for automobile and truck traffic from New York to Miami. The state port at Wilmington lies less than an hour and a half away, and the U.S. Army's Fort Bragg is only a 20-minute commute. Plus, a

John Quinterno is a public policy analyst residing in Chapel Hill, N.C.

Many of the illustrative quotes appearing in articles on the Eastern North Carolina economy and on agriculture in the East are taken from Throwed Away: Failures of Progress in Eastern North Carolina, by Linda Flowers (1944–2000). A native of Faison, N.C., Flowers was a professor of English at North Carolina Wesleyan College in Rocky Mount. Her highly acclaimed book, a combination academic treatment and memoir, was published by the University of Tennessee Press, Knoxville, Tennessee, in 1990. Quotations are reprinted by permission of the University of Tennessee Press.



high-speed Internet connection can be attained with the click of a mouse. St. Pauls even has visions of shipping through the Global TransPark, a planned international cargo airport and industrial park more than an hour's drive away amid the pines of Lenoir County. Thus, the routes to the global marketplace are not cut off to the tiny town of St. Pauls, and the vision of an economic renaissance for this small town and the region as a whole does not seem entirely far-fetched. After all, an earlier revolution in global trade—one built on wooden ships rather than cargo containers and jumbo jets—prompted the East's initial settlement.

But Eastern North Carolina's economy is under construction. The region is changing, but into what, no one knows. Will the East become an integral part of a global economy, or will the region slide into economic irrelevance? Answering that question requires sober reflection on economic and demographic trends affecting the East. An analysis of the region's economic history and make-up suggests that some parts of the East already are competing in a global economy. Yet other communities, particularly those with limited human capital, appear in danger of falling further behind.

Historical Background

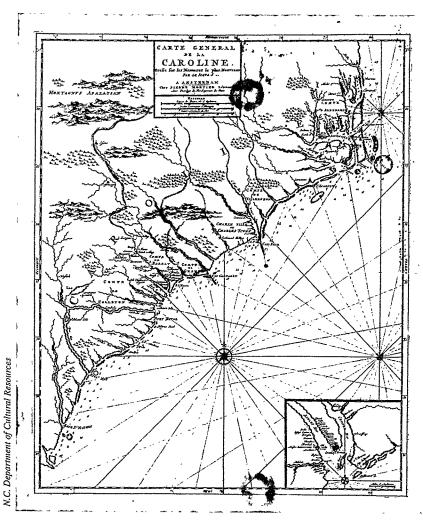
A 17th-century version of globalization sparked Eastern North Carolina's colonization. In the 1660s, Virginians began moving south into the area around the Albemarle Sound. German and Swiss settlers near New Bern and Scotch-Irish immigrants along the Cape Fear River Valley soon joined these Virginia pioneers. By 1740, these groups and a few

others had settled Eastern North Carolina.⁷

Eastern North Carolina's colonial economy rested on maritime trade with a British Empire that bought the region's agricultural and forest goods. Particularly important were the naval stores (turpentine, tar, and pitch) required to maintain wooden ships. By 1768, North Carolina furnished 60 percent of all the naval stores produced in the colonies. This trade bred prosperity in such towns as New Bern, Wilmington, Edenton, Bath, and Beaufort.8

Global trade failed to enrich colonial North Carolina to the same degree as its neighbors. A lack of serviceable ports forced Tar Heels to send products to other colonies for shipping and processing, thereby contributing to the prosperity of neighboring Virginia and South Carolina.9

This economic model the production of raw materials accompanied by relatively little valueadded activity—soon entrenched itself in Eastern



North Carolina. A small group of aristocratic planters benefitted from the extraction and sale of natural resources by slave or low-wage labor and used their political power to block change. Following the Revolutionary War, an elite insistent on maintaining the status quo prevented Eastern North Carolina from competing with a backcountry that "began to surpass the coastal plain in population and industry." 10

The shift in economic momentum away from Eastern North Carolina accelerated after the Civil War. "Since the late nineteenth century," writes University

of North Carolina at Charlotte geographer Alfred Stuart, "manufacturing has been the backbone of the North Carolina economy." North Carolina's low-cost labor, central location, and abundant natural resources led textile firms to relocate from New England to the North Carolina Piedmont. Furniture and tobacco industries soon sprang up alongside textiles, and these "Big Three" industries formed the state's economic pillars. Compared to the Piedmont, the East benefitted less from these industries. While the East grew significant amounts of brightleaf tobacco, for example, the crop was shipped to new Piedmont cities like Durham for processing and sale. The East produced the raw materials, but the Piedmont supplied the more sophisticated economic activities.

In the 20th century, textile firms shifted production eastwards to take advantage of the cheap surplus labor created by agricultural busts. Piedmont cities, meanwhile, developed more advanced manufacturing and sophisticated services like banking. As a result, the metropolitan Piedmont became North Carolina's economic engine, an "urban place that is participating fully in the information technology and global economy." In the 350 years since Virginians began migrating to the Albemarle Sound, Eastern North Carolina has gone from the state's economic leader to its economic laggard.

St. Pauls: The East in Microcosm

While St. Pauls was not incorporated until 1909, people have lived in the area since the 1700s. ¹³ Agriculture dominated the area's economy until well into the 20th century, when farm employment began to decline due to an agricultural bust and technologi-



Karen Ta

cal advances that allowed more crops to be grown with fewer resources.

The Center for the Study of Rural America of Kansas City, Missouri, reports that, "Rising agricultural productivity has allowed other sectors to grow ... by freeing up labor for nonfarm employment." In St. Pauls, the movement away from the farm has occurred in two waves: a shift from the farm into manufacturing and a more recent shift from manufacturing into services and retail.

Manufacturing was the first industry to benefit from rising farm productivity. Productivity created a pool of surplus labor in the period after World War II that led Piedmont textile manufacturers—ever on the lookout for even cheaper workers—to shift production from the Piedmont to the less expensive East. Between 1956 and 1972, the number of manufacturing jobs in Robeson County grew fivefold.¹⁵ And St. Pauls was Robeson County's textile capital.

"The mills and the jobs they provided were the foundation of the community," says Lawrence DiRe, St. Pauls' Town Administrator. "The mills supported the local economy, stimulated the downtown, funded many community activities like Little League, and fostered civic leadership. The problem was that we were an economic one-trick pony. Our economy wasn't diversified, so when the mills left, we had little to fall back on."

The 2001 closing of Carolina Mills' two yarn-spinning plants in St. Pauls knocked the town back on its heels. ¹⁶ The closings left 550 people unemployed and knocked a hole in the tax base. At one time, the mills contributed so much to St. Pauls' coffers that the municipality provided water, sewer, and trash service free of charge to all residents. The mills' disappearance forced civic leaders who



Lawrence DiRe, St. Pauls Town Administrator

thought that the plants always would be there to undertake a painful reassessment of the town's place in the world.

Five years later, St. Pauls' economy consists chiefly of service and retail jobs ranging in quality from cashier positions at the new Food Lion to medical positions at St. Pauls Medical Clinic operated by Southeast Regional Medical Center, a unit of Duke University Health System. Some advanced manufacturing also exists in St. Pauls. Paraclete Armor, a local company that uses high-tech design and production equipment to make body armor and equipment for military and law-enforcement agencies, employs more than 300 people,17 though not everyone agrees that the plant represents a huge upgrade from the old textile mills. Retired geographer Alfred W. Stuart says the characterization of a manufacturer of bulletproof vests and similar protective gear as high-tech industry is "a bit of a stretch-it's still a textile or apparel plant."

Fortunately, St. Pauls has some resources with which to compete, including location. "St. Pauls is on I-95, only 20 minutes from Ft. Bragg and Fayetteville, an hour-and-a-half from the beach and port in Wilmington and within driving distance of Global TransPark, which could provide air shipment

of goods produced in our new certified industrial park," says DiRe.

The Eastern Economy: A Sector Perspective

St. Pauls' current economic makeup resembles that of the East and state (see Tables 2 and 3, pp. 12 and 15). More than three of every four employed Easterners work in the service and retail sectors. Manufacturing accounts for the second largest share of employment at 12.9 percent. Agriculture, meanwhile, contributes only two of every 100 jobs in the East. This sector breakdown tracks the state's economy with two exceptions: agriculture accounts for a larger share of employment in the East (2.2 percent versus 0.9 percent), manufacturing slightly less (12.9 percent versus 15.6 percent).

In spite of a similar economic makeup, the East is poorer than the rest of the state. Eastern North Carolina's 2002 average median household income of \$32,274 was 18 percent less than the statewide figure of \$38,194. Median household incomes ranged from \$24,621 in Tyrrell County to \$43,257 in Camden County. Also, given the fact that Eastern communities tend to have older and

Table 1. Selected Demographic Characteristics of Eastern North Carolina, by County

County		Population (2003)	% White (2000)	Median Age (2000)	Median Household Income (2002)	% Poverty (2002)	% Adults 25–64 w/ BA degree or higher (2000)	% Unemployed (2004)
	ufort	45,816	68.4%	40.2 yrs.	\$30,799	17.0%	16.0%	7.1%
2. Bert	rie	19,748	36.3	38.6	25,462	20.1	8.8	8.1
3. Blac	ien	33,119	57.2	37.9	27,451	18.6	11.3	7.3
4. Bru	nswick	83,787	82.3	42.2	35,786	14.0	16.1	5.2
5. Can	nden	7,852	80.6	39.1	43,257	8.1	16.2	3.7
6. Car	teret	61,122	90.3	42.3	38,155	11.8	19.8	4.7
7. Cho	wan	14,453	60.5	39.8	31,584	15.8	16.4	4.8
8. Col	umbus	54,917	63.4	36.9	26,693	20.9	10.1	6.6
9. Cra	ven	93,454	69.9	34.4	36,635	12.2	19.3	5.1
10. Cur	nberland	311,526	55.2	29.6	36,656	14.9	19.1	5.6
11. Cur	rituck	21,059	90.4	38.3	42,131	9.7	13.3	2.9
12. Dar	e	33,906	94.7	40.4	42,827	8.2	27.7	4.5
13. Dup	olin	51,821	58.7	34.9	29,649	19.4	10.5	5.8
14. Edg	ecombe	53,777	40.1	36.2	30,545	19.8	8.2	8.7
15. Gat	es	10,882	59.1	38.1	34,483	13.3	11.1	4.2
16. Gre	ene	20,262	51.8	35.5	31,611	17.2	12.8	6.2
17. Hal	ifax	56,947	42.6	37.2	25,810	22.1	11.1	8.1
18. Har	nett	100,271	71.1	32.5	34,706	15.8	10.9	5.2
19. Her	tford	23,794	37.4	39.2	26,300	21.3	10.6	5.9
20. Hol	(e	38,193	44.5	30.0	32,160	16.9	15.9	6.0
21. Hy	de	5,792	62.7	39.7	26,633	21.9	9.5	6.9
22. Joh	nston	140,719	78.1	34.2	42,142	12.5	13.3	4.4
23. Jon	es	10,257	61.0	39.1	30,673	16.4	11.6	4.9
24. Ler	oir	59,091	56.5	38.1	30,332	16.9	17.2	6.2
25. Ma	rtin	24,930	52.5	38.7	28,217	18.1	11.6	7.0
26. Nas	sh	90,546	61.9	36.5	36,648	13.5	10.8	6.5
27. Nev	w Hanover	172,780	79.9	36.3	39,698	12.7	14.8	4.4
28. No	rthampton	21,820	39.1	40.0	26,206	21.5	14.7	7.4
29. On:	slow	159,817	72.1	25.0	33,504	14.3	14.8	5.5
30. Par	nlico	13,071	73.2	42.9	32,935	16.1	14.7	4.8
31. Pas	quotank	36,681	56.9	35.9	30,886	16.7	16.4	4.7
32. Per	ıder	44,820	72.7	38.8	34,688	14.8	13.6	4.8
33. Per	quimans	11,806	70.8	42.2	29,647	16.3	12.3	4.8

-continues

Table 1, continued

County	Population (2003)	% White (2000)	Median Age (2000)	Median Household Income (2002)	% Poverty (2002)	% Adults 25–64 w/ BA degree or higher (2000)	% Unemployed (2004)
34. Pitt	141,019	62.1	30.4	32,339	18.3	26.4	5.7
35. Robeson	127,253	32.8	32.0	26,133	26.2	11.4	7.5
36. Sampson	63,597	59.8	35.0	31,962	17.5	11.1	5.0
37. Scotland	35,690	51.5	34.6	29,499	19.0	15.9	10.9
38. Tyrrell	4,246	56.5	38.7	24,621	24.9	10.6	7.1
39. Washington	13,435	48.3	39.2	27,892	19.9	11.6	7.4
40. Wayne	114,778	61.3	34.8	33,081	15.2	15.0	5.4
41. Wilson	76,312	55.8	36.2	32,807	16.4	15.1	8.3
41 Eastern Counti	es 2,505,166	62.4%	36.9 yrs.	\$32,274	16.0%	16.6%	5.8%
N.C. Statewide	8,562,210	72.1%	35.8 yrs.	\$38,194	12.9%	22.5%	5.5%

Sources: North Carolina Department of Commerce, Economic Development Information System http://cmedis.commerce.state.nc.us/countyprofiles/#. Data are taken from the report for the second quarter of 2004; and the U.S. Census Bureau, Housing and Household Economic Statistics Division, Small Area Estimates Branch.

"Jobs of any kind, but especially if they hold much long-range promise, still don't grow on trees; wages still are among the lowest in the nation, and the gap between these eastern counties and the Piedmont cities, as between rich and poor, gets wider and wider. Manufacturing is not what it used to be, and, yet, most people looking for work aren't prepared for anything else.

But these are proud people. Throwed away they may be, but it won't do to count them out."

---LINDA FLOWERS
THROWED AWAY: FAILURES OF PROGRESS
IN EASTERN NORTH CAROLINA

poorer populations, government transfer payments like Social Security and welfare contribute a large part of the East's total income. While transfer payments accounted for 13.7 percent of total income in North Carolina in 2001, the percentage in the East ranged from 10.4 percent in Onslow County to 29.7 percent in Halifax County. ¹⁹

Employment and compensation vary considerably from county to county. The following sections sketch employment and wage patterns in three economic sectors of regional significance: agriculture, manufacturing, and services/retail.²⁰

Agriculture

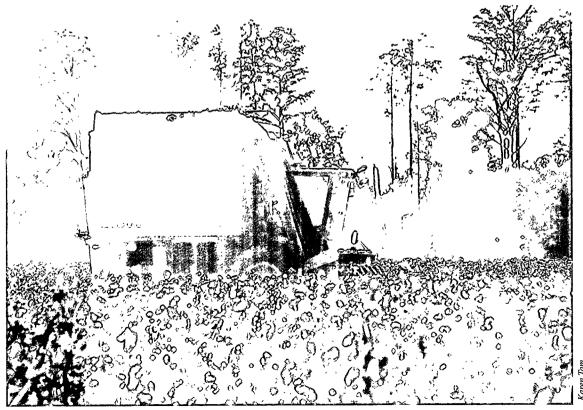
Say "Eastern North Carolina" and most people think instantly of farming. Yet few people actually are employed on working farms. While the East contains 64.3 percent of all agricultural jobs in North Carolina, employment in Eastern agriculture totals only 19,600 people—a mere 2.2 percent of all Eastern jobs. Moreover, agriculture pays poorly with a statewide average weekly wage of \$496 (\$26,000 per year).²¹ In the East, the average weekly agricultural wage falls below the statewide weekly wage level in 29 counties, though some of these counties

are urban ones with comparatively small agricultural sectors. That's not to say agriculture does not make a major contribution to the East's economy. The average net income for farm owners and contract growers in Eastern North Carolina is significantly higher than the state average, in part attributable to much larger average farm size in the East. And, the 2.2 percent figure includes only workers employed full-time on the farm, not farm owners and their family members or even temporary migrant labor. Thus, the number of people dependent on farming for their paychecks is somewhat understated. "There are a number of farms that do not have full-time employees, often due to the nature of the industry; therefore employment numbers are going to be small and not be an accurate representation of the number of people who work in farming," says Catherine Moga Bryant of the N.C. Rural Center, a Raleigh nonprofit that works on building the rural economy. "The farm owners and family members may work on the farm all year, but not be included in the employment numbers.... This is in contrast to the manufacturing industry where businesses employ their workers year-round."

For example, Johnston County reported 181 farms with workers who worked 150 or more days in 2002, but 303 farms with workers employed less than 150 days, according to the 2002 Agriculture

Census produced by the U.S. Department of Agriculture. Of those 303 farms, 198 employed only temporary workers. Even these numbers capture less than half the total number of farms in Johnston County. "There are 1,144 total farms in the county," says Moga Bryant. "The remaining farms may not employ people, but they are at least providing some income to the farmer and his or her family."

A further complication is that labor-market statistics from the Employment Security Commission of North Carolina include only those workers covered by the state's unemployment insurance laws, according to Harry Payne, chairman of the Employment Security Commission of North Carolina. "Agriculture has historically played an important role in the economy of Eastern North Carolina," says Payne. "The importance of this sector continues into the present, yet it can be difficult to discern the current impact of agriculture, particularly when focusing on labor market-based statistics. For various reasons, agriculture is generally excluded either completely or partially from most labor market statistical programs." Moreover, Payne says many of the eastern region's largest employers are involved in agriculture-related business, even if they are not engaged directly in farming.



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Table 2. Eastern North Carolina Workforce by Major Sector and County, 2004

Coun	ıty	Total Work Force	Agriculture % Total	Manufacturing % Total	Service & Retail % Total	Service % Total (1)	Retail % Total
1. 1	Beaufort	17,228	2.6%	18.6%	84.4%	71.5%	12.9%
2. I	Bertie	6,848	5.4	*	72.5	66.9	5.6
3. I	Bladen	14,146	5.2	*	51.2	45.2	6.0
4. I	Brunswick	25,754	0.6	6.3	84.2	67.6	16.6
5. (Camden	1,818	8.0	*	80.4	63.6	16.8
6. (Carteret	22,579	0.5	7.2	84.8	68.0	16.8
7. (Chowan	5,753	3.8	18.9	72.3	62.0	10.3
8. (Columbus	17,701	2.0	16.0	77.4	74.8	12.4
9. (Craven	39,999	1.2	11.0	82.5	70.8	11.7
10. (Cumberland	110,778	0.2	8.3	86.7	72.8	13.9
11. (Currituck	5,315	1.4	2.2	72.5	51.9	20.5
12. I	Dare	19,785	0.0	3.7	87.6	69.2	18.4
13. I	Duplin	20,466	16.2	29.3	50.5	42.5	8.0
14. I	Edgecombe	22,186	1.5	22.0	67.0	58.7	8.3
15. (Gates	1,606	8.8	10.7	78.8	68.4	10.4
16. (Greene	3,837	7.7	8.1	76.0	67.1	8.7
17. F	Halifax	17,691	2.5	12.4	80.4	65.3	15.2
18. I	Harnett	22,722	1.0	12.0	73.7	61.2	12.4
19. I	Hertford	9,489	2.7	12.9	80.2	67.9	12.3
20. I	Hoke	7,600	4.4	32.4	41.9	36.6	5.3
21. F	Hyde	2,132	9.5	4.7	75.8	67.8	8.1
22. J	ohnston	38,016	2.2	17.6	70.4	56.3	14.1
23. ј	lones	1,722	8.7	3.2	77.2	69.0	8.3
24. I	Lenoir	28,074	1.7	14.5	74.9	63.6	11.3
25. N	Martin	9,473	3.3	23.8	74.7	62.5	12.2
26. N	Nash	41,208	3.1	18.2	76.3	63.3	13.0
27. N	New Hanover	91,063	0.1	6.1	85.2	70.5	14.7
28. N	Northampton	5,738	6.0	9.5	67.7	46.7	20.9
29. C	Onslow	40,169	0.5	2.3	89.6	68.9	20.6
30. F	Pamlico	3,018	3.7	3.7	67.7	69.0	15.0
31. P	Pasquotank	16,274	1.1	4.4	84.0	74.0	16.3
32. P	Pender	10,374	7.1	8.5	90.3	69.4	12.5
33. P	Perquimans	2,154	2.5	5.2	81.8	73.9	11.4
34. P	Pitt	65,304	1.4	11.2	85.2	68.7	12.7
35. R	Robeson	37,796	0.6	18.5	81.4	61.9	5.4
36. s	Sampson	18,990	12.3	18.4	67.3	53.0	11.0

Table 2, continued

Cot	ınty	Total Work Force	Agriculture % Total	Manufacturing % Total	Service & Retail % Total	Service % Total (1)	Retail % Total
37.	Scotland	16,103	0.7	32.8	64.0	52.9	10.8
38.	Tyrrell	989	10.3	*	64.6	54.5	10.1
39.	Washington	3,378	9.7	5.2	82.7	69.7	13.0
40.	Wayne	43,518	3.5	15.0	76.0	62.2	13.8
41.	Wilson	38,211	1.3	22.5	67.4	57.2	10.2
41 E	astern Counties	881,251	2.2%	12.9%	77.6%	64.7%	12.9%
N.C	. Statewide	3,778,403	0.9%	15.6%	77.5%	65.5%	12.0%

Notes: "**" denotes missing data. (1) Service sector is the sum of employment in the wholesale trade; transportation/warehousing; information; finance/insurance; real estate; professional/technical services; management; administrative/waste services; educational services; health care/social assistance; arts/entertainment; accommodation/food service; other services; and public administration sectors.

Sources: N.C. Department of Commerce Economic Development Information System, Employment Security Commission of North Carolina

"The changing face of the eastern North Carolina small town is, in part, attributable to the impact of industry. Plants and factories are built in the countryside because of the abundance of land (and to reduce municipal taxation); the agriculture they've usurped now providing them place and bearing: parking lots and pavements, steel fences and access roads, the physical plant itself, and more often than not, in the distance against the woods, a tobacco patch or corn field. But business is off on main street, and many of the interests formerly comprising our idea of town, the doctor's office, grocery stores and dry-good, the feed and grain, the hardware store, schools and banks and eating places, the insurance office and barber shop, have long since pulled out, relocating along the highways, on the outskirts, in the ubiquitous shopping malls: urban sprawl, yet without much sense of anything urban, these villages and towns and crossroads sit small and countrylike. A town is no longer a central place. 'Town' isn't any more thought of as a place of general employment... Increasingly, towns take their meaning from the industry they attract...."

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IN EASTERN NORTH CAROLINA

Increasing productivity is responsible for the recent decline in the agricultural sector's size. Productivity gains, the capital costs associated with purchasing the equipment needed to boost productivity, and price competition with the developing world have led to a drop in small-scale farming and a rise in large-scale agribusinesses. The family farm is less a factor than in the past, but that doesn't mean agriculture isn't important to Eastern North Carolina's economy. Indeed, agriculture is critical. When the East is analyzed from the broader perspective of agribusiness, that is, all value-added economic activity associated with food, natural fiber, and forestry, agriculture still dominates the Eastern economy. In Sampson County, for example, agribusiness accounts for 95.6 of the county's total income.²² (For more on the importance of agriculture to the Eastern economy, see pp. 38-63 in this issue.) Still, some argue that lumping together the raw materials used in production and labeling that agribusiness exaggerates the importance of agriculture. "Of course, agriculture provides raw materials for manufacturers," says Stuart. "So does mining. The value added is attributable to manufacturing, not farming."

Manufacturing

In spite of well-publicized struggles, manufacturing retains a significant presence in the East. Manufacturers employ 12.9 percent of Easterners. The sector's share of total employment ranges from 32.4 percent in Hoke County to 2.2 percent in Currituck County. Manufacturing jobs pay considerably more than agricultural ones. The average North Carolina manufacturing wage of \$41,727 annually exceeds the average annual agricultural wage by 72 percent.

Manufacturing activities vary considerably in size and sophistication. Alfred Stuart of UNC-Charlotte's geography department has noted that manufacturing can be measured in terms of either the number of people employed or the amount of value added to a material. "Historically," writes Stuart, "North Carolina factories have accounted for a higher proportion of national employment than they have value added."²³

Recently, North Carolina's manufacturing sector has shrunk in terms of employment but grown in terms of the amount of value added to products. Eastern manufacturers now are producing higher value products. While the East still has low-value



Karen Tam

Table 3. Average Annual Wage (\$) in Eastern North Carolina by Major Sector and County, 2004

	All Select Service						s	
Cou	ınty	Industries	Agriculture	Manufactur	ing Retail	Professiona	l Health Care	
1.	Beaufort	\$28,964	\$25,584	\$41,392	\$18,096	\$31,148	\$22,672	\$ 9,568
2.	Bertie	25,428	26,052	*	16,744	22,256	17,212	87,88
3.	Bladen	23,764	27,040	*	17,680	35,464	23,400	10,660
4.	Brunswick	30,056	21,944	32,708	18,928	34,060	16,952	12,064
5.	Camden	25,740	27,820	*	19,032	31,148	10,868	8,632
6.	Carteret	23,608	24,284	24,336	19,604	34,424	28,860	11,648
7.	Chowan	25,688	23,192	28,288	18,824	47,216	26,780	8,164
8.	Columbus	27,144	29,172	42,796	19,032	27,040	21,164	9,412
9.	Craven	31,928	26,312	40,664	20,592	42,068	32,656	10,088
10.	Cumberland		17,264	44,564	21,892	37,700	37,544	10,712
11.	Currituck	23,660	26,260	32,344	20,748	32,708	22,048	13,468
12.	Dare	25,012	56,992	30,004	22,620	35,620	35,152	14,924
13.	Duplin	25,636	29,276	26,624	17,420	24,180	23,608	9,100
14.	Edgecombe	29,432	19,344	29,380	17,056	28,444	25,740	10,556
15 .	Gates	24,544	21,476	31,824	14,300	24,752	23,348	8,216
16.	Greene	23,816	19,968	29,848	16,276	19,760	19,136	9,412
17.	Halifax	25,740	20,280	40,248	18,928	42,796	23,608	10,244
18.	Harnett	26,728	19,344	34,320	19,032	29,536	27,664	9,620
19.	Hertford	26,208	24,180	47,060	17,420	32,916	20,488	27,196
20.	Hoke	23,868	19,812	24,076	15,444	21,788	19,916	8,892
21.	Hyde	21,684	15,288	13,988	15,340	22,672	21,112	26,624
22.	Johnston	29,120	17,472	47,996	19,240	37,180	28,028	10,504
23.	Jones	26,728	23,764	30,628	14,924	36,660	29,848	9,724
24.	Lenoir	27,976	21,164	36,452	21,320	38,064	28,756	30,316
25.	Martin	28,912	21,268	48,984	18,044	27,300	19,552	9,152
26.	Nash	31,512	16,796	40,716	20,696	36,348	28,652	10,556
	New Hanove		20,072	53,612	23,192	48,568	38,012	11,232
	Northampton		23,868	39,624	21,528	32,604	17,680	*
29.	Onslow	23,972	24,232	30,420	20,124	28,860	28,756	10,088
	Pamlico	23,192	29,328	23,296	17,940	20,436	20,436	9,620
	Pasquotank	27,404	20,072	30,836	21,476	32,656	32,136	19,552
	Pender	24,076	16,328	28,600	17,680	24,648	21,736	9,776
	Perquimans	22,724	20,540	22,412	16,640	19,448	21,632	9,776
	Pitt	30,992	18,148	40,508	20,436	39,832	38,896	9,828
	Robeson	25,688	24,960	29,380	18,980	24,596	27,456	9,828
	Sampson	26,624	23,712	31,668	18,824	33,124	29,536	9,204
		26,832	25,376	32,188	18,512	34,476	32,760	9,724
38.	Tyrrell	22,048	24,180	*	16,172	*	21,736	7,020
39.	Washington	22,672	22,620	31,824	17,888	22,360	20,280	8,372
40.	Wayne	27,456	23,764	34,528	19,344	33,436	30,732	9,880
41.	Wilson	32,188	17,680	43,680	20,488	39,468	30,056	10,764
	astern Counti		23,064	38,114	20,410	38,652	31,043	10,699
	Statewide	\$34,788	\$24,313	\$41,727	\$22,440	\$51,586	\$35,523	\$12,460

Notes: "*" denotes missing data.

Source: N.C. Department of Commerce Economic Development Information System



manufacturing dependent on large quantities of lowcost laborers, there has been growth in high-valueadded manufacturing.

Take St. Pauls. The Carolina Mills facilities that closed in 2001 employed 550 people in the manufacture of a low-value product: yarn. Paraclete Armor, by contrast, employs fewer people but produces

"Companies that can pick and choose will! likely relocate where they can have the best of both worlds: cooperation from state and local governments, but, also, good schools and cultural enrichment."

—LINDA FLOWERS
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IN EASTERN NORTH CAROLINA

much more valuable textile products for a niche market.

The auto industry is another example of more sophisticated manufacturing in the East. While North Carolina possesses no auto assembly plants—having failed in bids to attract familiar nameplates such as BMW, Honda, and Mercedes, the state has the nation's 10th largest automotive cluster in terms of employment. More than 1,000 auto-related and auto-dependent firms operate in North Carolina with a number of companies concentrated in the area between Greenville and Rocky Mount. Collectively, the auto industry generates total wages of \$4.8 billion and has been targeted by the state Department of Commerce as a promising prospect for future expansion.²⁴

Retail and Service Sectors

"Since the late 1970s, manufacturing and services have essentially switched places in terms of their respective shares of the state's economy," writes Elizabeth Jordan, a policy analyst at the North Carolina Budget and Tax Center and author of the report "The State of Working North Carolina 2004." 25

Today, the retail and service sectors employ more than three of every four Easterners. Specifically,



retail accounts for 12.9 of the region's total employment, while service employment encompasses six of every 10 jobs.

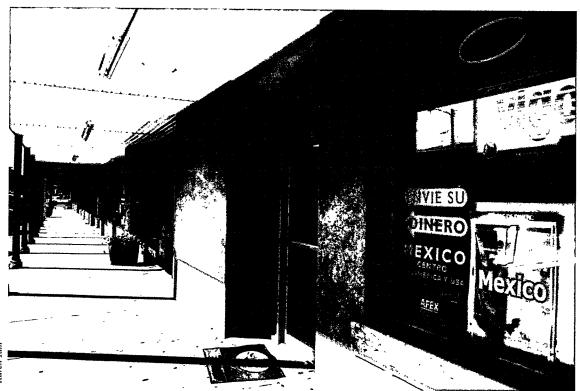
This development is not unique to Eastern North Carolina. MDC Inc., a Chapel Hill think tank, has shown that the retail and service sectors generated two-thirds of all new jobs in the South between 1980 and 2000. According to the organization's "The State of the South 2000" report, "Population growth and aging, rising affluence and the enlargement of the region's consumer base and increasing educational attainment—all of these factors have driven the surge in services and retail jobs." 26

In spite of its size, retail pays poorly. Statewide, retail offers an average weekly wage of \$439 (\$22,440 annually), and many retail jobs offer no benefits. A low-paying sector to begin with, retail pays even less in the East. Only three Eastern counties—Dare, Currituck, and New Hanover—have retail sectors that pay weekly wages at or above the statewide average. The retail sectors in every other county pay below average wages. Gates County's average weekly retail wage of \$251 (\$14,300 annually), for example, is 36 percent less than the statewide average.

The service sector is harder to describe. Though typically portrayed as low-skill, poorly paid jobs at fast food restaurants, service positions actually range in quality from fast food clerks to skilled workers in medical facilities to scientists and engineers who provide professional services.

The East's service sector employs 567,987 people in jobs ranging from private-school teachers to dry cleaners. The health care/social services field constitutes the largest part of the East's service sector, employing 14 percent of workers. Next comes educational services (excluding public schools), which accounts for 10.5 percent of the region's employed workers. The accommodations and food service sector forms the third largest part of the East's service sector with 8.9 percent of employed workers.

Wages in the service sector vary among subsectors. With an average weekly wage of \$1,095 (\$51,586 per year), business and professional service is the sector's best-paid part. Health care, meanwhile, offers an average weekly wage of \$716 (\$35,523 a year), but food service pays considerably less—an average weekly wage of \$241 (\$12,460 annually). These figures show that a person may earn a good wage in the service industry if that person possesses the right skills and education to work in a high paying sub-sector.



Karen Tom

"Economists point to the increased difficulty rural areas are likely to face in attracting and retaining outside companies, largely because the attitudes and many of the policies historically conducive to this end now work somewhat against it: cheap, abundant labor aggressively advertised, low corporate taxes, right-to-work legislation, anti-unionism, governmental cooperation, and the like. Exploitations on which Southern manufacturing has always been dependent may now be coming home to roost. The same low taxes that traditionally have made us attractive to industry also keep us poor: our schools, especially, as well as, in some ways, our quality of life."

----LINDA FLOWERS
THROWED AWAY: FAILURES OF PROGRESS
IN EASTERN NORTH CAROLINA

Leading Private Employers

The East's major employers mirror the region's economy. As of the second quarter of 2004, all Eastern employers, private and public, employed 881,251 individuals—24 percent of all working North Carolinians. The private sector employed 76.3 percent of these individuals, while the public sector employed the remainder. Compared to the state overall, the East's private sector employs fewer people (76.3 percent versus 82.7 percent for North Carolina as a whole); its public sector, more (23.7 percent in the East versus 17.7 percent in North Carolina overall).

Table 4 lists the three largest private employers in each Eastern county as of 2003.²⁷ In general, some combination of a manufacturer, retailer, and health/education provider form the three largest employers.

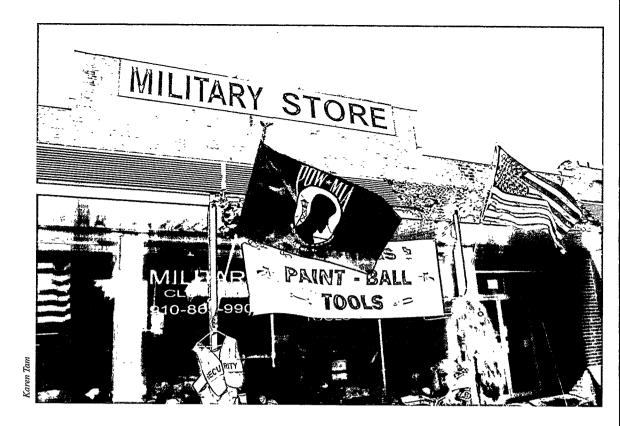
A manufacturer was among the three largest employers in 33 counties. In 17 of these counties, a manufacturer employing 500 or more people was the single largest private-sector employer. These manufacturers ranged in type from Perdue Products' food-processing facility in Bertie County to Abbott Laboratories' pharmaceutical plant in Nash County.

Trade/retail firms were the next most frequent private employer, ranking among the top three in 20 counties and first in eight counties. Wal-Mart Associates was the largest employer in four counties. In Cumberland County alone, Wal-Mart employed more than 1,000 people between its stores and national distribution center.

A health/education provider ranked among the largest employers in 18 counties and was the largest employer in eight counties. In Harnett County, for instance, Campbell University was the largest private employer. This category also includes many public sector employers. Pitt County Memorial Hospital employs 5,570 and East Carolina University employs 4,652 in Pitt County, while the leading private sector employer, Lear Siegler Service, employs fewer than 500. In New Hanover County, New Hanover Medical Center employs some 3,900 and the University of North Carolina about 1,600, while the largest private sector employer in the county, Wal-Mart, employs more than 1,000. Wayne County's Wayne Memorial Hospital is the leading employer in its home county, and Seymour Johnson Air Force Base also ranks among the county's top five employers.

The Military: Eastern North Carolina's Silent Economic Giant

Eastern North Carolina's economy cannot be fully understood apart from the military. The state houses several important installations, all of which are located in the East: Fort Bragg and Pope Air Force Base in Cumberland County; Camp Lejeune Marine Corps Base and New River Air Station (Onslow County); Cherry Point Marine Corps Air Station (Craven County); Seymour Johnson Air Force Base (Wayne County); and the Sunny Point Marine Terminal (Brunswick County). Also, the state's northeast corner benefits economically from



the naval facilities around Norfolk, Va., and a major Coast Guard facility in Elizabeth City. Meanwhile, spending on the National Guard and Air National Guard occurs across the state. (The military's economic impact on Eastern North Carolina, along with potential impact of the U.S. Department of Defense initiative to streamline operations and close some bases is discussed in greater detail in "More Than Economics: The Military's Broad Impact on Eastern North Carolina," pp. 64–115.)

North Carolina has the fourth highest military presence of any state in the nation, meaning the Department of Defense is a major employer. The federal government's payroll carries 115,840 uniformed personnel and 21,192 civilians. With so many jobs linked directly to the military, there is additional economic stimulus affecting retail trade and the service sector.

The military also provides business opportunities for North Carolina firms. Supply contracts with the U.S. Department of Defense (DoD) brought \$1.4 billion into 77 North Carolina counties in 2002. Though that number seems impressive, it represented less than 1 percent of all DoD procurement dollars. In 2002, North Carolina actually received fewer DoD procurement dollars than half of the states in the nation.

Growing the amount of contract dollars flowing into the Old North State is the job of Scott Dorney, a former lieutenant colonel in the Army and the first executive director of the North Carolina Military Business Center (NCMBC). Based in Fayetteville and part of the North Carolina Community College System, the NCMBC was created with state money in 2004 to, in Dorney's words, "leverage the presence of the military in our state for economic development and quality of life for all."

The NCMBC works to bridge the bureaucratic canyon that often separates in-state firms from opportunities. As a result of the Defense Department's elaborate procurement process, local firms capable of providing a good or service may not know an opportunity exists or be eligible to bid on the service. Through initiatives like its *MatchForce.org* website and business assistance services, the NCMBC will help local firms learn about opportunities and become qualified to compete for contracts. Doing this often requires businesses to alter their mindsets.

"We may not make fighter aircraft or aircraft carriers in North Carolina," says Dorney, "but we certainly have plenty of sand and clay." Yet Dorney experienced difficulties in finding qualified North Carolina firms willing to bid as a prime contractor on a \$250,000 contract to provide 30,000 cubic yards

Table 4. Three Largest Private Employers, by County in Eastern N.C., 2003

	County	Employer	Industry	# of Employees
	Beaufort	PCS Phosphate	Manufacturing	1,000+
		Beaufort County Hospital	Education/Health Services	500-999
		National Spinning Company	Manufacturing	250-499
2.	Bertie	Perdue Products	Manufacturing	1,000+
		Quality Home Staffing	Education/Health Services	250-499
		VF Jeanswear	Manufacturing	250-499
3.	Bladen	Smithfield Packing	Manufacturing	1,000+
		Youngblood Staffing	Professional Services	250-499
		Danaher Controls	Manufacturing	100-249
4.	Brunswick	Progress Energy	Utilities	500–999
••		Wal-Mart Associates	Trade/Transportation	500–999
		Bald Head Island LP	Financial Activities	250-499
5.	Camden	Rainbow Shop	Trade/Transportation	50–99
٠.	Juin 0011	Blackwater Lodge & Training	Education/Health Services	50–99
		Coca-Cola Enterprises	Manufacturing	5099
6.	Carteret	Wal-Mart Associates	Trade/Transportation	500-999
v.	Cation	Security Services of America	Professional Services	250-499
		Atlantic Veneer Corp.	Manufacturing	250-499
7.	Chowan	East Carolina Health	Education/Health Services	250–499
/.	Cilowali	The Moore Company	Manufacturing	250–499
		Life Inc.	Education/Health Services	100-249
8.	Columbus	International Paper	Manufacturing	1,000+
0.	Columbus	Columbus County Hospital	Education/Health Services	500–999
		Georgia-Pacific Corp.	Manufacturing	250–499
9.	Craven		Manufacturing	500–999
9.	Craven	Moen Incorporated	Manufacturing Manufacturing	500–999
		Brunswick Corp. BSH Home Appliance Corp.	Manufacturing Manufacturing	500–999
10	<i>a</i> , , , ,			1,000+
10.	Cumberland	Wal-Mart Associates	Trade/Transportation Manufacturing	1,000+
		Goodyear Tire & Rubber Purolator Products	Manufacturing Manufacturing	1,000+
11.	Currituck	Brindley & Brindley Realty	Financial Services	500–999
		Food Lion	Trade/Transportation Trade/Transportation	100–249 100–249
		Griggs Lumber & Products		
12.	Dare	Food Lion	Trade/Transportation	250–499
		Whitecap Linen	Other Services	250–499 250–499
		Sun Realty	Financial Services	
13.	Duplin	Carolina Turkeys	Manufacturing	1,000+
		Murphy-Brown	Natural Resources/Mining	1,000+
		House of Raeford	Manufacturing	500–999
14.	Edgecombe	Barnhill Contracting	Construction	500–999
		Sara Lee Corp.	Manufacturing	500–999
		QVC Rocky Mount	Trade/Transportation	500–999

-continues

Table 4, continued

County	Employer	Industry	# of Employees
15. Gates	Centennial Employee Corp.	Education/Health Service	50-99
	Ashton Lewis Lumber	Manufacturing	5099
	Family Foods of Gatesville	Trade/Transportation	50–99
16. Greene	Associated Materials	Manufacturing	100–249
	Parker Hannifin Corp.	Manufacturing	100-249
	Britthaven Inc.	Education/Health Services	100-249
17. Halifax	International Paper	Manufacturing	500–999
	Wal-Mart Associates	Trade/Transportation	250-499
	Safelite Glass Corp.	Manufacturing	250-499
18. Harnett	Campbell University	Education/Health Services	500-999
	Food Lion, LLC	Trade/Transportation	500-999
	Morganite Inc.	Manufacturing	500-999
19. Hertford	East Carolina Health	Education/Health Services	500–999
	Nucor Corporation	Manufacturing	250-499
	The GEO Group	Professional Services	250-499
20. Hoke	House of Raeford	Manufacturing	1,000+
	Burlington Industries	Manufacturing	500–999
	Conopco Inc.	Manufacturing	500–999
21. Hyde	The East Carolina Bank	Professional Services	50–99
	Cross Creek Healthcare	Education/Health Services	50–99
	Mattamuskeet Seafood	Manufacturing	5099
22. Johnston	Bayer Healthcare	Manufacturing	1,000+
	Caterpillar Inc.	Manufacturing	500–999
	Steve Tarts Race Shop	Manufacturing	500–999
23. Jones	Trent Village Nursing Home	Education/Health Services	50–99
	Eastern Carolina Internal Medicine	Education/Health Services	50–99
	Charles Blythe Equipment	Trade/Transportation	50–99
24. Lenoir	Invista Inc.	Manufacturing	500–999
	Electrolux Home Products	Manufacturing	500–999
	Manpower Temporary Services	Professional Services	500–999
25. Martin	Weyerhaeuser Company	Manufacturing	1,000+
	Williamston Yarn Mill	Manufacturing	250-499
	Martin General Hospital	Education/Health Services	250–499
26. Nash	Abbott Laboratories	Manufacturing	1,000+
	RBC Centura Bank	Financial Activities	1,000+
	Cummins Business Services	Manufacturing	1,000+
7. New Hanover	Wal-Mart Associates	Trade/Transportation	1,000+
iii iiiiiiiiiiiiiiiiiiiiiiiiiiiiiiiiii	Corning Inc.	Manufacturing	1,000 4 500–999
	Pharmaco	Professional Services	500–999
28. Northampton	Lowes Home Center		
manipuli	Severn Peanut Co.	Trade/Transportation	250-499
	Georgia Pacific Resins	Trade/Transportation Manufacturing	100–249 100–249

Table 4, continued

County	Employer	Industry	# of Employees
29. Onslow	Wal-Mart Associates	Trade/Transportation	500–999
	Coastal Enterprises	Education/Health Services	500-999
	Food Lion	Trade/Transportation	250-499
30. Pamlico	YMCA	Other Services	250-499
	Food Lion	Trade/Transportation	100-249
	Britthaven Inc.	Education/Health Services	50–99
31. Pasquotank	Lear Siegler Service	Trade/Transportation	250-499
	Wal-Mart Associates	Trade/Transportation	250-499
	Food Lion	Trade/Transportation	100–249
32. Pender	AG Mart Produce	Natural Resources/Mining	500–999
	Del Laboratories	Trade/Transportation	250-499
	LL Building Products	Manufacturing	100–249
33. Perquimans	Mariner Health Central	Education/Health Service	50–99
_	Apriçot Inc.	Manufacturing	50-99
	Food Lion	Trade/Transportation	50-99
34. Pitt	DMS Pharmaceuticals	Manufacturing	1,000+
	NACCO Materials	Manufacturing	500-999
	Whitaker Trucking	Trade/Transportation	500-999
35. Robeson	SE Regional Medical Center	Education/Health Services	1,000+
	Mountaire Farms of NC	Manufacturing	1,000+
	Campbell Soup	Manufacturing	500-999
36. Sampson	Premium Standard Farms	Manufacturing	500–999
	Prestage Farms	Natural Resources/Mining	500999
	Wal-Mart Associates	Trade/Transportation	250-499
37. Scotland	West Point Stevens Inc.	Manufacturing	1,000+
	Scotland Memorial Hospital	Education/Health Services	500999
	Staffing Connection	Professional Services	500-999
38. Tyrrell	Capt. Neill's Seafood	Manufacturing	100–249
	Double Dee Farms	Natural Resources/Mining	20-49
	Durwood Cooper Farms	Natural Resources/Mining	20-49
39. Washington	HIS Acquisition	Education/Health Services	50–99
-	New Colony Farms	Natural Resources/Mining	50-99
	Home Life Care	Education/Health Services	50–99
40. Wayne	Case Farms	Manufacturing	500-999
-	Mt. Olive Pickle	Manufacturing	500-999
	Cooper Standard Automotive	Manufacturing	500–999
41. Wilson	Bridgestone/Firestone	Manufacturing	1,000+
	Branch Banking & Trust	Financial Activities	1,000+
	VF Jeanswear	Manufacturing	1,000+

Source: North Carolina Employment Security Commission, 3^{rd} Quarter of 2003 http://jobs.esc.state.nc.us/lmi/largest/topten.htm.

of sand and clay for one of Fort Bragg's drop zones. Only five potential vendors were properly registered with the DoD, and none were willing to bid.

After several unsuccessful attempts, Dorney found one firm near Fort Bragg that knew about the pre-solicitation notice and easily could provide enough dirt. The firm, however, would not bid since a Pennsylvania company willing to submit a bid had contacted the North Carolina firm about a subcontracting arrangement. Though the local company would do all the work, the Pennsylvania firm would take a sizable percentage of the contract for completing the same paperwork that the NCMBC would help the local company complete for free.

Similarly, Dorney learned after-the-fact that the Department of Defense was awarding \$233 million in contracts for the provision of battle dress coats and trousers to the Army. Despite the well-documented difficulties of North Carolina's textile industry, none of the contracts or jobs will come to the state. The contracts instead went to firms in Mississippi, Alabama, Pennsylvania, and Puerto Rico.

"We cannot continue to let this business get away from us," says Dorney, who also notes that the stakes will grow larger in coming years. Fort Bragg, for example, is expected to award \$900 million in construction contracts over the next four years. The challenge is to find ways of keeping that money in North Carolina.

"Once fully operational, the NCMBC will help in-state companies find, bid on, win and successfully complete military business," says Dorney. "The military represents a huge, largely untapped resource for economic development, but trends in defense contracting mean that we will have to work even harder to leverage this engine for economic development."

The Role of Small Businesses

Small businesses are another frequently overlooked part of the East's economy. Because of their potential to open big facilities that employ large numbers of people, large companies frequently are the darlings wooed by industrial recruiters with incentive packages. In 1998, for instance, North Carolina offered Nucor Corporation \$161 million in incentives to build a steel plant in Hertford County that would employ approximately 300 people.²⁸

Yet large employers like Nucor are a rarity. "The vast majority of businesses in Eastern North Carolina are small ones, employing fewer than 50 people," observes Catherine Moga Bryant, senior research



associate at the North Carolina Rural Economic Development Center. "These establishments often are overlooked because of their size, but collectively they have a significant economic impact."

Data collected by the Rural Center show that small and medium size establishments, measured in terms of employment, comprise most of the businesses in the state and the East. Of the East's 57,243 establishments with employees in 2002, 95 percent employed 49 or fewer people, and 86 percent had 19 or fewer employees. Just 2.1 percent of Eastern establishments employed 100 or more people (see Table 5, p. 25).29 This translates into more total jobs at smaller firms. In coastal Beaufort County, for example, 16,429 persons held full-time jobs in 2002, according to the Employment Security Commission of North Carolina. Of that total, 3,125 (19.02 percent) worked for employers with more than 100 persons on the payroll, while 4,571 (27.8 percent) held jobs with businesses employing 19 or fewer workers.30

"Small businesses currently are the major contributor to the economy of the East, and this will continue to be the case," says Scott Daugherty, who oversees the University of North Carolina

Table 5. Size of Establishments with Employees in Eastern North Carolina, by County, 2002

G	A	Total # Establishments	Establishments w/ 100 + Employees	% of Total	Establishments w/ 0–49 Employees	% of Total	Establishments w/ 0–19 Employees	% of Total
Cou				2.1%	1,154	95.5	1,063	87.9%
1	Beaufort	1,209	25		372	95.4	346	88.7
2	Bertie	390	5	1.3	600	95.5	549	87.4
3.	Bladen	628	13	2.1	1,935	96.5	1,794	89.4
4.	Brunswick	2,006	33	1.6			178	89.4
<u>5.</u>	Camden	199	1	0.5	193	97.0		89.2
6.	Carteret	2,075	24	1.2	2,001	96.4	1,851	86.8
<u>7. </u>	Chowan	418	8	1.9	395	94.5	363	
8.	Columbus	1,226	23	1.9	1,163	94.9	1,074	87.6
9.	Craven	2,316	48	2.1	2,194	94.7	1,990	85.9
10.	Cumberland	5,805	139	2.4	5,429	93.5	4,863	83.8
11.	Currituck	531	5	0.9	519	97.7	494	93.0
12.	Dare	1,951	18	0.9	1,890	96.9	1,742	89.3
13.	Duplin	1,114	29	2.6	1,047	94.0	967	86.8
14.	Edgecombe	1,130	40	3.5	1,039	91.9	948	83.9
15.	Gates	162	0	0.0	152	93.8	144	88.9
16.	Greene	309	8	2.6	295	95.5	272	88.0
17.	Halifax	1,169	25	2.1	1,103	94.4	994	85.0
18.	Harnett	1,571	31	2.0	1,492	95.0	1,363	86.8
19 .	Hertford	596	19	3.2	556	93.3	511	85.7
20.	Hoke	354	8	2.3	342	96.6	311	87.9
$\overline{21}$.	Hyde	215	3	1.4	209	97.2	196	91.2
22.	Johnston	2,788	44	1.6	2,666	95.6	2,465	88.4
23.	Jones	203	1	0.5	198	97.5	184	90.6
$\frac{23.}{24.}$	Lenoir	1,544	40	2.6	1,432	92.7	1,293	83.7
$\frac{2.11}{25.}$	Martin	595	14	2.4	565	95.0	501	84.2
$\frac{26.}{26.}$	Nash	2,443	63	2.6	2,299	94.1	2,054	84.1
$\frac{20.}{27.}$	New Hanover	6,488	107	1.6	6,192	95.4	5,628	86.7
$\frac{27.}{28.}$	Northampton	412	6	1.5	393	95.4	360	87.4
$\frac{20.}{29.}$	Onslow	2,614	40	1.5	2,520	96.4	2,307	88.3
$\frac{29.}{30.}$	Pamlico	295	4	1.4	282	95.6	261	88.5
$\frac{30.}{31.}$		973	20	2.1	913	93.8	829	85.2
$\frac{31.}{32.}$	Pasquotank Pender	906	15	1.7	874	96.5	821	90.6
		215	1	0.5	205	95.3	194	90.2
$\frac{33.}{24}$	Perquimans	3,477	81	2.3	3,258	93.7	2,917	83.9
34.	Pitt	2,037	61	3.0	1,890	92.8	1,711	84.0
$\frac{35.}{26}$	Robeson		31	2.5	1,151	93.7	1,057	86.1
<u>36.</u>	Sampson	1,288			681	91.3	613	82.2
$\frac{37.}{22}$	Scotland	746	37	5.0	113	95.8	110	93.2
38.	Tyrrell	118	2	1.7		95.5	273	86.9
<u>39.</u>	Washington	314	5	1.6	300			83.9
40.	Wayne	2,474	74	3.0	2,305	93.2	2,075	83.6
41.	Wilson	1,999	57	2.9	1,860	93.0	1,671	
	Eastern Counties	57,243	1,208	2.1	54,177	94.6	49,337	86.2
N.Ç	. Statewide	235,339	5,684	2.4	221,915	94.3	202,806	86.2

Source: Institute for Rural Entrepreneurship North Carolina Business Data Source Book (Raleigh, NC: North Carolina Rural Economic Development Center, October 2003).

system's economic development initiatives and is executive director of the system's Small Business Technology and Development Center (SBTDC).

Through a network of 11 service centers, four of which are in the East, the Small Business Technology and Development Center helps companies gain the market opportunities, technical support, and capital needed to start or grow a business. Such services are especially important in the East

where the geographic dispersion of communities hinders the creation of the "critical mass" required for rapid economic growth. "The SBTDC helps markets work better," says Daugherty.

The Marine Trade Services Unit is one SBTDC initiative that has had an impact on Eastern North Carolina. The program, which was established in 1991 and operates out of sites in Wilmington and Beaufort, has helped grow and market internationally the state's marinas, boatyards, boat dealers, boat builders, marine construction firms, and suppliers. "Today, the marine industry employs more than 25,000 people and is responsible for sales of nearly \$500 million," says Daugherty. Most of this activity is east of Interstate 95.

Besides the SBTDC, UNC's constituent campuses also are trying to use their resources to grow their local economies and promote entrepreneurship. The campuses say that such efforts are an outgrowth of their public service or, in the case of the land-grant schools, their extension missions. The Cameron School of Business at the University of North Carolina at Wilmington, for instance, recently redesigned its Master of Business Administration program to allow students to participate in a "learning alliance" coordinated by the SBTDC. Participating students provide technical expertise to promising businesses identified by the SBTDC, which in turn oversees an experiential learning opportunity for the students.

Daugherty says three major challenges face university-based economic development initiatives. First, much of the push for economic development comes, in his judgment, from external political sources that hope that the universities can create

"It's not only New York's garment district that the North Carolina textile industry must now consider, but Japan and Taiwan and Korea. Few companies native to the state and few coming in can be said to thrive independently of international competition."

—LINDA FLOWERS
THROWED AWAY: FAILURES OF PROGRESS
IN EASTERN NORTH CAROLINA

jobs in a certain region. Second, external pressures can lead to the duplication of services across the system and within individual campuses. Finally, past university-based programs have not been expected to measure their performance. "Return on investment measures," says Daugherty, "must be expected of any public investment."

Several criticisms have been leveled against such public investments in small businesses. First, while there are more of

them, some critics argue that small businesses lack the economic impact of large firms. Because large firms frequently offer higher pay and benefits, they have a greater economic impact on a per employee basis. Also, large firms may have a greater multiplier effect. Large businesses often create a demand for supplies provided by smaller firms. Small firms, however, seldom create a similar effect unless they develop in clusters that provide a similar product or service and thus attract larger suppliers.

However, the recruitment of larger firms through use of incentives has come under criticism of its own, with such problems as promised number of jobs not materializing and firms pulling up stakes and leaving town once the agreed-upon incentives period ends.³¹ Daugherty disputes the notion that small business has less impact than more celebrated economic development conquests of a single large firm. "[S]mall businesses are enormously important to our economy," Daugherty says. "They account for nearly all of the net job growth of the past decade.... [T]hey account more than 42 percent of the private sector jobs, and they contribute nearly one-half of the gross domestic product. If that doesn't represent economic impact, then I don't know what it is."

Second, some observers doubt the efficiency of government-funded attempts to encourage entrepreneurship. "People who make economic decisions need to have a stake in the outcomes," says George Leef, an economist and director of the private, nonprofit John William Pope Center for Higher Education Policy in Chapel Hill. Leef says that economic growth occurs spontaneously and that government programs designed to spark economic

activity have terrible track records because the decision-makers lose nothing if investments fail.

But Daugherty takes issue with the assertion that government-funded attempts to encourage entrepreneurialism are inefficient. "This is based on the erroneous assumption that assistance providers like the SBTDC are making economic decisions and have nothing to lose if investments fail. The SBTDC clearly understands that it is not creating jobs and that it does not make business decisions for its clients. But, our clients are seeking our advice and counsel specifically to help them make better decisions about the future of their businesses. The outcomes of this are clear. Our client base significantly outperforms the North Carolina small business base in terms of employment and sales growth year in and year out."

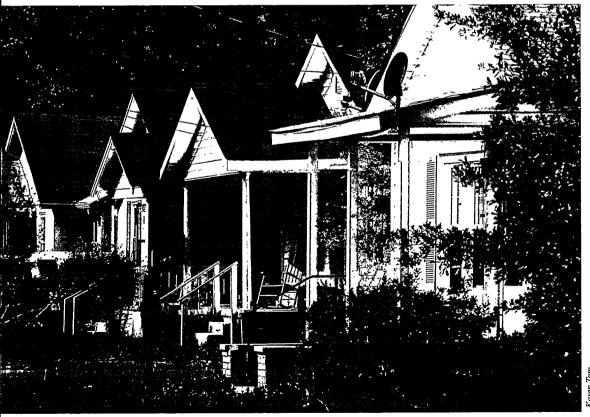
Leef is especially critical of university-based economic development initiatives. "What can the university provide that other private-sector actors can't?" asks Leef. "We don't need the university to guide the invisible hand of the marketplace."

Third, other commentators caution that university-based economic development activities may undermine universities' teaching and research func-

tions. "Universities should be wary about trying to perform 'commercial' functions or be involved in picking 'market winners and losers' which are not their area of expertise," says Jennifer Washburn, author of *University Inc: The Corporate Corruption of Higher Education* and a past presenter at North Carolina State University's Emerging Issues Forum in Raleigh. "These commercial activities undermine the universities' autonomy, their intellectual independence, and their non-profit educational status."

According to Washburn, "universities can help nurture local and regional development, first and foremost, by graduating first rate students." In her writing, Washburn also has asked if universities stress their role in economic development in order to justify public investment in higher education during a time of fiscal austerity.³²

Daugherty says the answer is no. "The fact is that the emerging emphasis on economic development is driven by the transformation of our economy and global competitiveness," Daugherty says. "Our future economic well-being will more than ever be linked to our innovative capacities and the creation of new economic opportunities. Universities represent the largest concentration of economic capital



Karen Tan

in America. Universities are trying to bridge the 'knowing versus doing' gap in order to support more competitive economic activities."

While not pursued for economic development purposes, Pitt Memorial Hospital, the teaching hospital affiliated with East Carolina Medical School, has been a huge creator of jobs and spin-off economic activity in Pitt County and beyond. And, there can be no argument that universities produce something business and industry increasingly crave—college graduates. There is broad recognition among business and university leaders that a more educated work force with a higher percentage of college graduates is a plus in recruiting business and industry.

The Human Resources Challenge

In recent years, scholars and policymakers have struggled to understand the forces driving the economy. While the exact theories and terminology differ, the basic conclusion is this: the modern economy depends not on physical labor, but upon skilled people able to manipulate knowledge and ideas. Even traditional industries like manufacturing will require people who possess higher-order

skills and the flexibility to adapt to rapidly changing circumstances.

Richard Florida, a professor of public policy at George Mason University in Fairfax, Va., argues that a "creative class" of talented and highly educated individuals powers economic growth in the modern world. According to Professor Florida, class and geographic place are intertwined, with economic prosperity welling up in places capable of drawing, cultivating, and retaining creative individuals. By that, Florida means people who work in the arts, technology, engineering, and science, along with management, business, and legal professionals. Florida further observes that locations dominated by agricultural, service, and working class occupations not only are less prosperous but often economically stagnating or declining.

As a region, Eastern North Carolina possesses many communities dominated by employment in stagnating or declining industries like manufacturing, especially when compared to such other North Carolina communities as Raleigh-Durham. In fact, only a handful of Eastern cities—Wilmington, ranked 98th among 268 cities; Greenville, ranked 150th; and Fayetteville, ranked 179th—have sizable



Proposals to site regional landfills to handle interstate waste stirred controversy in the East in 2005.

creative classes as defined by Florida.³⁴ Greenville's strength was a ranking of 15th nationally in technology workers as a percentage of its work force, an anomaly for the region.

Indeed, the East's greatest economic barrier may be the limited educational attainment of its work force. Just 17 percent of the East's adult workforce possesses at least a bachelor's degree, compared to 23 percent of all North Carolinians. Low educational attainment, in turn, leads to employment in less lucrative occupations and greater rates of unemployment and poverty. On every measure of economic well-being—from lower median household income, to higher poverty rates and unemployment, to increased reliance on government transfer payments—the East does not do as well as the rest of the state.³⁵ Furthermore, the East's population is older. Of the region's 41 counties, 28 have median ages above the statewide median of 35.8.

And, in communities that historically were dominated by one industry or firm, like St. Pauls, there may be aversion to change. After decades of relying on the mills to tend to the community's needs, the town suddenly has had to assume much more responsibility for itself—an important but difficult shift in mentality. Says Lawrence DiRe, the town administrator, "We have to learn that no one else knows what's best for us. We have to learn the importance of doing for ourselves as much as possible."

Looking to the Economic Future: Jobs and Place

The Eastern economy grew by attracting companies that wanted to locate "where land was cheap and labor low-cost, low-skilled and abundant." Yet prosperity now favors places containing large numbers of highly skilled workers. The East's greatest previous competitive advantage has become its greatest disadvantage. Forecasts of future economic growth illustrate the consequences of this development. Consider projections of job growth (Table 6, p. 30).

In **percentage** terms, the 10 occupations expected to grow the most in the state between 2000 and 2010, according to the North Carolina Employment Security Commission, are in the technology and education/human services sectors, with computer support specialists expected to expand the most. All of these jobs require some form of advanced education and pay comparatively higher wages. Yet, these 10 occupations will create a relatively small number of actual jobs, a combined total of 45,950.³⁷ Most will not be created in Eastern

"[H]ere a community college or technical school was a godsend. Everybody knew that an education was 'somethin' nobody can't take away from you,' but as the period unfurled, a year or two at James Sprunt or Wayne Community, Nash Tech or Sampson was apt to be looked upon as an alternative even to the willful capriciousness of life."

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IN EASTERN NORTH CAROLINA

North Carolina, with its relatively less educated work force.

Contrast this to the occupations expected to grow the most in **absolute** terms. The Employment Security Commission projects that nine of the 10 occupations projected to add the most jobs in North Carolina between 2000 and 2010 are in the generally lower paying service and retail sectors. These 10 occupations, led by growth in the number of retail salespersons, are expected to generate 189,520 jobs—four times as many as expected to be created by the 10 fastest growing occupations in percentage terms.³⁸

Only two of the jobs that will grow the most in absolute terms require any advanced education—nurses and computer support specialists. The rest simply require some combination of on-the-job training and work experience. The low skill level of these jobs, however, translates into low pay. Elizabeth Jordan of the nonprofit N.C. Budget and Tax Center observes that five of these growing occupations offer wages of less than \$10 per hour, and six pay less than \$15 per hour. "Such jobs," writes Jordan, "will not pay, on average, a wage that would support the minimum needs of a North Carolina worker and his or her family."

If these trends materialize, future economic growth in Eastern North Carolina will vary depending on location. On the one hand, communities that offer work forces with higher levels of education

Table 6. Ten Fastest Growing Occupations in North Carolina, 2000-2010

A) RANKED IN PERCENTAGE TERMS

	%	Total
	Change	Growth
Occupation	2000-2010	2000-2010
Computer Support Specialists	91.5	14,220
Network Administrator	84.6	6,200
Computer Software Engineer	77.7	7,280
Desktop Publishers	64.2	520
Special Education Teachers, Pre-K, K	61.2	2,810
Social/Human Service Assistants	60.3	6,130
Occupational Therapist Aides	57.1	406
Library Science Teachers, Postsecondary	55.6	50
Writers and Authors	55.4	1,070
Speech-Language Pathologists	55.4	1,240

B) RANKED IN ABSOLUTE TERMS

	Total	%
	Growth	Change
Occupation	2000-2010	2000-2010
Retail Salespersons	26,770	24
Cashiers	22,850	21
Food Service Workers	22,390	42
Registered Nurses	21,840	34
Waiters	20,430	34
Nursing Aides	16,240	36
Customer Service Representatives	15,410	30
Teacher Assistants	14,760	44
First-Line Retail Managers	14,610	27
Computer Support Specialists	14,220	91

Sources: N.C. Employment Security Commission; Elizabeth Jordan The State of Working North Carolina 2004, N.C. Budget and Tax Center 2004, Raleigh, N.C., p. 16.

and skills likely will serve as magnets for the kinds of large and small enterprises that require talented workers and pay high wages. These workers, in turn, may serve as a springboard for future growth. Additionally, prosperous urban areas will attract talented people who commute from adjacent communities, thereby benefitting both of those economies.

Fayetteville, Greenville, and Wilmington are three Eastern North Carolina cities that may already be on this path. All three are more prosperous than their neighbors and are striving to leverage their human capital and other assets. Fayetteville, for example, not only has made significant investments in infrastructure and economic development, but also is trying consciously to use its cultural, educational,

and medical facilities to tap and retain the international talent that passes through neighboring Fort Bragg.39

In Greenville, Pitt Memorial Hospital and East Carolina University provide thousands of jobs that require advanced technical skills and boost the education levels of the work force. Meanwhile, Wilmington boasts a prime coastal location that attracts tourists and retirees, a University of North Carolina campus that is among the state's most popular, and a film industry built on creative talent.

An additional strength for the northeastern corner of the region is the strong economy of the Tidewater, Virginia area. Many North Carolina residents commute across state lines to work for employers like Ford Motor Company, military installations, and the shipyards, and proximity to this major job base likely will continue to lend an advantage. And, there is obvious growth potential for small towns such as Edenton, in Chowan County, where geography, architectural charm, and a strong sense of place provide an attraction for newcomers.

Pitt County's Farmville is another small town that has continued to thrive, despite a historic reliance on tobacco as the mainstay of the local economy.40 As far back as the 1950s, Farmville civic leaders realized that tobacco would not carry the day indefinitely and sought to diversify its economy away from strict reliance on agriculture. Town leaders formed the Farmville Economic Council to diversify and attract industry, one of the first such organizations in the state. In the 1970s when small town mainstreets across North Carolina were showing signs of decay, Farmville embarked on a major campaign to spruce up its central business district, placing utilities underground, planting trees, and installing brick sidewalks and benches. Today, Farmville is prospering, providing more than 2,000 industrial jobs and providing the second largest employment base in Pitt County—second only to Greenville.

The efforts of small towns and larger cities alike show that those who develop a vision of the future that takes advantage of community assets and who work to implement that vision will be more likely to prosper by developing a broader economic base. On the other hand, communities with lower education and skill levels and fewer community and civic assets to build on likely will develop more low-paying service and retail jobs. Because such jobs pay less, they will form a precarious economic base less capable of generating the resources needed to develop the human and physical capital capable of attracting and developing more lucrative jobs and industries.

Two Lessons for the Future

Peveral policy and governmental organizations have offered comprehensive plans for growing the economy of rural American in general and Eastern North Carolina in particular. One such group is MDC, Inc., a Chapel Hill, N.C., nonprofit with a mission to expand opportunity, reduce poverty, and build inclusive communities throughout the South. Others include the North Carolina Rural Economic Development Center and the N.C. Rural Prosperity Task Force appointed by former Governor Jim Hunt. The North Carolina Center for Public Policy Research has published theme issues of North Carolina Insight on both economic issues confronting Eastern North Carolina and economic development in North Carolina generally. Building on this



"Too often, plants relocating 'Down East' have done so as a last resort, hoping to recoup after prolonged and increasingly severe problems elsewhere. A question worth asking is whether the state's ability to attract such firms as have had relocation forced on them, and whose potential for staying afloat anywhere may be minimal, is not, in the long run, more harmful than good."

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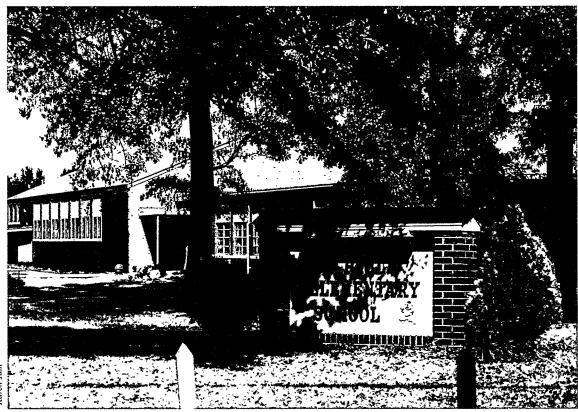
previous work, two lessons emerge from this latest consideration of Eastern North Carolina's economic

engines.

First, investment in human capital is critical. Investing in human resources means encouraging education on all levels—K-12, community colleges and universities. "No strategy for improving the economic and social well-being of Eastern North Carolina can succeed without significant, perhaps massive, investment in improved public schools," writes Tom Lambeth, the long-time executive director and now a senior fellow at the Z. Smith Reynolds Foundation in Winston-Salem, N.C.⁴¹ Also, education must not stop at graduation. People of all ages

need to constantly learn more in order to innovate and prosper. Of course, opportunity also must exist in Eastern North Carolina for educated individuals; otherwise, they will leave in search of opportunity.

Second, regional leaders must stop thinking of economic development as a competition aimed at luring a jobs-producing trophy industry at the expense of one's neighbors. "So much of the South's economic development policies revolves around competition—state vs. state, county vs. county, city vs. city," observe the authors of "The State of the South 2002" report. "Further advancement will require regional collaborations instead of self-defeating competition."⁴²



Karen Tam

Tourism in Eastern North Carolina: A Bastion of History and Good Beaches Too

The rich history and scenic landscape of North Carolina's coast contribute to the statewide growth of the tourism industry. According to the NC Department of Commerce's Division of Tourism, in 2004 more than 49 million visitors traveled to North Carolina, ranking it eighth in person-trip volume by state. Domestic travelers spent \$13.2 billion that year in North Carolina, showing a 4.9 percent increase from 2003, and continuing a trend of increasing revenue from the tourism sector. Tourists ranked visiting North Carolina's beaches their second most popular activity while traveling, along with outdoor activities, both at 15 percent and behind only shopping at 26 percent. Trips to historical places and museums made up 12 percent of travel activities.

While the counties of Eastern North Carolina contribute 25.8 percent of the state's total travel expenditures, the top five of those 41 counties alone contribute 13.5 percent of the statewide total of \$12.6 billion, according to estimates from the Travel Economic Impact Model developed by the U.S. Travel Data Center. With combined total expenditures of \$1.7 billion, Dare, New Hanover, Cumberland, Brunswick, and Carteret counties represent about 52 percent of the East's total travel expenditures of \$3.3 billion. Dare County, home to the 130 miles of coastline and 900 square miles of coastal sounds that are the Outer Banks, is the highest contributor in the East. The scenery as well as the history of this county-from the first flight in 1903 to the tallest lighthouse on the East Coast, Cape Hatteras-help Dare bring in the most state and local tax receipts from tourism; \$31 million and \$29 million, respectively. New Hanover County, with popular vacation spots such as historic Wilmington and Carolina, Kure, and Wrightsville Beaches, contributes the second highest amount. Fayetteville, located in thirdranked Cumberland County, hosts the state's first art museum as well as the Airborne and Special Operations Museum (displaying the history of the U.S. Army's airborne and special operations) located at Fort Bragg.

The collection of small, historic towns in the East also makes its collective impact on the region's economy. Craven County hosts North Carolina's second oldest town, New Bern, and such tourist attractions as the Tryon Palace, the Pepsi-Cola Store (the birth place of Pepsi), and a 157,000-acre national forest. Edenton, the county seat of Chowan County, was named by the National Trust for Historic Preservation as one of the U.S.'s "Dozen Distinctive Destinations" in 2003, and was also selected to participate in the N.C. Main Street Program that year, which helps small towns focus on creating new jobs and investment by revitalizing downtown areas.

Yet another concept that developers hope to move off the drawing boards is a 700-acre entertainment complex off Interstate 95 in Roanoke Rapids that would feature a \$9 million, 1,500-seat music theater and a \$14 million nautical theme park with an aquarium. One of the developers is Randy Parton, the brother of country music queen Dolly Parton. The project is patterned after a successful complex in Branson, Missouri.

With an increasing number of visitors to the state, there is a growing need for workers in the tourism industry. Tourism is the third highest private sector employer in the state, and 25.6 percent of the state's 183,250 jobs directly supported by domestic tourism expenditures in 2004 are in the East. The payroll for this region, however, represents a lower percentage than the percentage of jobs in tourism, at 20.3 percent of the \$3.6 billion state payroll. Hotels, restaurants, travel agencies, and visitor centers all are impacted by tourists. North Carolina's nine welcome centers received about 8.8 million visits in 2004, according to the NC Division of Tourism.

Employment in the tourism industry can also include the marketing of the state, with marketing efforts currently being made by UNC-TV's program "North Carolina Weekend" as well as the NC Division of Tourism's "Visit NC" website. Visit NC gives visitors information on dining, accommodations, and local attractions in the three regions of North Carolina; for those wishing to visit the coast, it gives them a suggested itinerary for a week at the beach, ending with buying a piece of property on the coast. Visitors can

arrange their own itineraries, ranging from petting zoos in Jacksonville to horse-drawn historic carriage tours in Wilmington, to water parks scattered all over the coast.

But with all the enthusiasm, not everyone is enamored with tourism as an economic development engine. "[M]ost of the jobs supported by it are low-wage and seasonal," says Alfred Stuart, professor emeritus of geography and earth science at the University of North Carolina at Charlotte. "Its best role may be that it introduces people to the area, leading some retirees, often affluent, to relocate there, especially in Wilmington and along the Outer Banks." Rapid growth in these coastal hot spots often brings issues of its own. Once isolated Currituck County, for example, now ranks among the 20 fastest growing counties in the nation.

However, efforts are also being made to steer tourists off the beaten path to parts of the region that could use a boost. The statewide "1,000/100 Project" to train community and industry leaders in growing the cultural and heritage tourism industry. The name stems from the project's goal of creating a network of 1,000 trained leaders in

heritage and culture throughout North Carolina's 100 counties. The Foundation of Renewal for Eastern North Carolina (FoR ENC) joined with the project to target 17 Eastern North Carolina counties in 2005, the project's third year. With cultural tourism as the fastest growing segment of the tourism industry, the eastern counties will greatly benefit from the project, says Phillip Horne, president of FoR ENC. "We have a tremendous inventory of sites and opportunities from which to enhance our viability as both a destination and an incubator for entrepreneurs. More than any single region in the state, our potential is unlimited as we begin to realize the full value of our natural assets and our human capital."

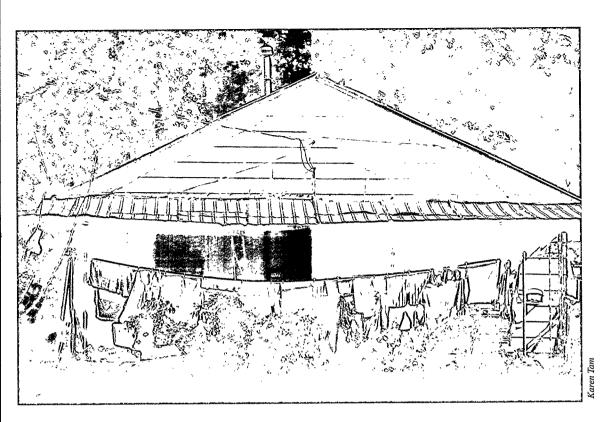
-Katherine Dunn

FOOTNOTES

¹ "FoR ENC-Venture East Partner with Statewide Effort to Expand and Enhance Cultural/Heritage Tourism," Foundation of Renewal for Eastern North Carolina, June 13, 2005, www. forenc.com.

Katherine Dunn, a summer 2005 intern at the N.C. Center for Public Policy Research, is a student at Elon University.





Eastern communities must realize that they are interconnected and that one town or county's success is not necessarily a loss for its neighbor. Again, consider St. Pauls, located just down the road from Fayetteville. On its own, St. Pauls would have difficulty competing in the modern economy, but Fayetteville and Fort Bragg provide opportunities. Paraclete Armor, for instance, might not be in St. Pauls if not for its proximity to Ft. Bragg. So, St. Pauls, a Robeson County town, has a stake in the success of Fayetteville, a Cumberland County city.

Successful eastern communities most likely will be those that see themselves as parts of larger regions and find ways of packaging and leveraging such existing community resources as community colleges and regional UNC campuses that produce educated workers and cultural opportunities.

The notion of regional cooperation is not a new one. North Carolina is divided into seven distinct regions for economic development purposes, with the 41 Eastern North Carolina counties contained primarily within the Northeast, Eastern, and Southeast partnerships. Many counties have their own distinct economic development organization within the broader regional structure, but some, such as Gateway Partnership comprised of Nash and Edgecombe counties, have joined together to further enhance regional cooperation. Another regional ef-

fort is the Foundation for the Renewal of Eastern North Carolina, a nonprofit located in Greenville, N.C., and formed with the intent to promote the economic interests of the entire 41-county region.

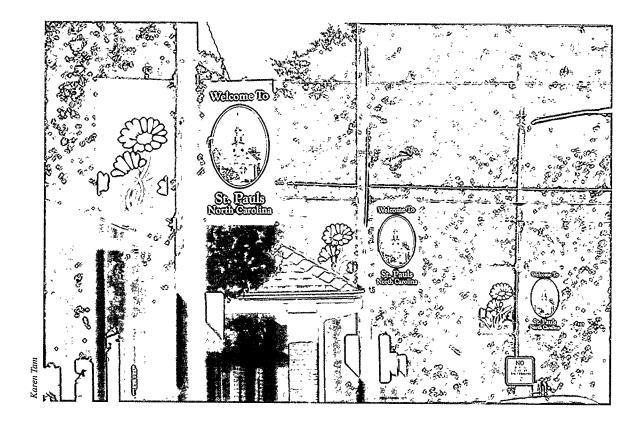
The question of whether Eastern North Carolina will become a robust part of the global economy or a victim of that economy has no single answer. Rather, the answer will be worked out on a case-by-case basis. Some eastern communities already are carving a place for themselves in the global economy. Others are floundering due largely to their deficits

The really throwed away don't much respond to follow-up studies asking howwell they redoing any more than do those whose whole life in school-lhouses has they enabled them to read and write?

— UMDN ROWERS

THROWED AWAY CHURES OF PROGRESS

MEASTERN NORTH CAROLINA



in human capital. Those are the places in danger of being left behind. Success will flow to communities that decide what their competitive advantages are and systematically work to capitalize on those advantages. Those advantages are enhanced by a community's location within a region that has strengths of its own. Thus, the towns and mid-sized cities of Eastern North Carolina can only benefit from efforts to stand together as a region, even as they address longer-term areas of need, such as strengthening infrastructure and improving the overall education level of the populace.

FOOTNOTES

¹ Joanne Scharer, "How Does the East Compare to the Rest of North Carolina?" *North Carolina Insight*, Volume 19, Nos. 3–4, December 2004, pp. 10–11.

² Author's compilation of demographic data available on the Internet from the U.S. Census Bureau at http://www.census.gov, the N.C. Rural Economic Development Center's Rural Databank at http://www.ncruralcenter.org/databank, and the N.C Department of Commerce's Economic Development Information System at http://cmedis.commerce.state.nc.us/countyprofiles/#.

³Leslie Boney III, "Does Eastern North Carolina Have the Infrastructure Needed for Growth?" *North Carolina Insight*, Volume 19, Nos. 3–4, December 2001, pp. 42–88.

⁴ Douglas M. Orr Jr. and Alfred W. Stuart, editors, *The North Carolina Atlas*, University of North Carolina Press, Chapel Hill, N.C., 2000.

N.C., 2000.

⁵ Maps of net migration are displayed in the "Population" chapter of the North Carolina Atlas website, on the Internet at

www.ncatlasrevisited.org. The state demographer projects that population losses will stabilize somewhat, with only five Eastern North Carolina counties losing population from 2005–2009—Bertie, Edgecombe, Halifax, Martin, Northampton, and Washington. See "Projected Annual Population Totals, 2005–2009," on the Internet at http://demog.state.nc.us/demog/cpa2005p.html.

⁶ For a thorough discussion of the Global TransPark concept, see "Air Cargo Complex: Will It Fly? A Pro/Con Discussion," *North Carolina Insight*, Vol. 14, No. 2, September 2, 1992, pp. 26–57. See also the official website of the North Carolina Global TransPark at http://www.ncgtp.com.

⁷ David R. Goldfield, "History," in Douglas M. Orr Jr. and Alfred W. Stuart, editors, *The North Carolina Atlas*, University of North Carolina Press, Chapel Hill, N.C., 2000, pp. 47–76.

⁸ William S. Powell, *North Carolina Through Four Centuries*, The University of North Carolina Press, Chapel Hill, N.C., 1989, p. 135.

⁹ Goldfield, note 7 above, p. 49.

¹⁰ Powell, note 8 above, p. 4.

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¹³ Powell, note 8 above, p. 571.

¹⁴ Center for the Study of Rural America, "Beyond Cows and Corn: Rural America in the 21st Century" *The Main Street Economist*, Federal Reserve Bank of Kansas City, Kansas City, Mo., October 2004, p. 2.

¹⁵ Stuart, "Manufacturing," The North Carolina Atlas, note 4 above, p. 177.

¹⁶ "Carolina Mills Closing a St. Pauls Plant," The Associated Press, October 4, 2000, and "Carolina Mills Will Close Two Plants." The Associated Press, August 16, 2001, news articles filed by the wire service and accessed via Lexis-Nexis search.

¹⁷ See the official website of Paraclete Armor on the Internet

at http://www.paracletearmor.com.

18 Author's compilation of employment and wage data from the N.C. Department of Commerce's Economic Development Information System, available on the internet at http://cmedis. commerce.state.nc.us/countyprofiles/#. Data are for the second quarter of 2004.

¹⁹ Author's compilation of demographic data (see note 2

above).

²⁰ All data on wages and sector for agriculture, manufacturing and service/retail come from author's compilation and analysis of N.C. Department of Commerce Data for the second quarter of 2004.

²¹ Wages are annualized based on a 52-week year. Employment in some sectors like agriculture often is seasonal in nature, meaning that a person may have an annual income considerably less than the estimate stated in the article.

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²⁴ Southern Legislative Conference, The Drive to Move South: The Growing Role of the Automobile Industry in the SLC Economies, Atlanta, Ga., 2003, pp. 97-102.

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²⁷ N.C. Employment Security Commission "Ten Largest Firms by County," on the Internet at http://jobs.esc.state.nc.us/lmi/largest/topten.htm. Data are as of the third quarter of 2003.

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²⁹ Author's compilation and analysis of 2002 establishment data from the N.C. Rural Economic Development Center. See

North Carolina Business Data Source Book, Raleigh, N.C., October 2003.

30 Figures on number of employees at firms of 100-plus and 19- or fewer firms for Beaufort County were calculated by Center intern Katherine Dunn using 2002 North Carolina Employment Security Commission data.

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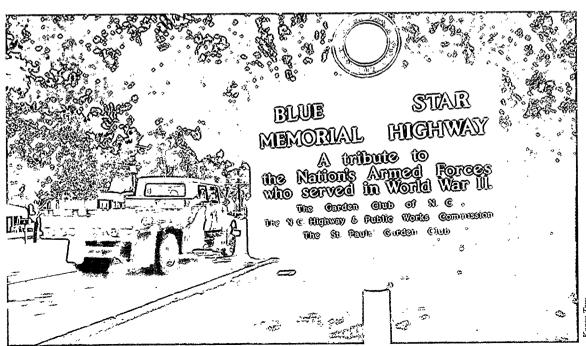
38 Ibid. at http://eslmi12.esc.state.nc.us/projections/Employ mentOutlook.asp?version=aopengd&AreaType=01&Area=000 037&PeriodID=05.

39 Heidi Russell Rafferty, "Boots and Bucks," North Carolina, N.C. Citizens for Business and Industry, Raleigh, N.C., December 2004, pp. 23-38.

⁴⁰ Richard N. Hicks, "All-America City Award Application, Town of Farmville, North Carolina," Farmville, N.C., 2004, p.

⁴¹ Tom Lambeth "Why Eastern North Carolina's Future Matters to the Rest of the State" North Carolina Insight, Volume 19, Nos. 3-4, 2001, pp. 3-9.

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Agriculture: Still King of the Eastern North Carolina Econor by Mike McLaughlin and Katherine Dum

Summary

f, as the marketing slogan goes, goodness grows in North Carolina, Eastern North Carolina must be the state's goodliest part. The region's 41 counties lay claim to the richest and most diverse agricultural economy in North Carolina. Of the 14.2 million acres that make up the 41-county eastern region of North Carolina, 3.1 million acres, or 22 percent, are harvested cropland. The crops that make up the most harvested acres in the state are soybeans, cotton, and corn. Several counties—such as Greene, Pasquotank, and Perquimans—are made up of more than 40 percent harvested cropland. While there has been a decrease in number of farms (35 of the 41 counties saw a decrease in the number of farms from 1997 to 2002, with a total loss of 2,594 farms in the East and a statewide loss of 5,190), the size of farms increased in all but nine of the East's counties over the five-year time period.

Statewide, from 1997 to 2002, farm acreage decreased four percent, from about 9.4 million acres to about 9.1 million acres. Even in the East, farm acreage decreased from 4.7 million acres to 4.5 million acres, or approximately 5 percent. These data are consistent with a long term trend toward fewer but larger farms. Over a 30-year period, from 1974 to 2004, the number of North Carolina farms decreased by 58 percent, while the size of the average farm increased by 57 percent.

The increase in average farm size has contributed to a high average value of farms in Eastern North Carolina, with values climbing to more than \$1 million in 14 of the 41 counties in 2002. The average value of a farm in the East as a region was \$871,827, compared to a statewide average of \$518,719. The region's average net income per farm of \$78,452 also was considerably higher than the statewide average of \$28,869. When combined with agribusiness—food, natural fiber, and forestry—agriculture is a major source of income for Eastern counties. According to calculations by North Carolina State University economist Michael Walden, the value-added manufacturing, wholesale, and retail incomes from agriculture and agribusiness provide more than half of the total income in 13 of the 41 Eastern counties.

However, when most people think of agriculture, they think of crops and livestock, and these commodities are the primary focus of this article. In 2003, North Carolina farms generated some \$7 billion in cash receipts from the marketing of crops and livestock. Of the 10 counties bringing in the most cash receipts, seven were in the East. In rank order, these counties are Sampson, Duplin, Wayne, Bladen, Johnston, Robeson, and Greene. Of the \$7 billion in cash receipts from that year, 60.1 percent was from livestock, dairy, and poultry products. Almost one quarter—\$1.5 billion or 22.2 percent—of the total cash receipts were from hog production alone. Three Eastern counties—Duplin, Sampson, and Bladen—rank first through third,

respectively, in producing hogs and pigs. North Carolina is the nation's second largest pork producer behind only Iowa, with nearly 10 million hogs. The state now has more hogs than people. About 40 percent of North Carolina's hogs are produced in Duplin and Sampson counties alone.

Thus, the argument that Eastern North Carolina rules the state's agricultural economy is a strong one, and there is a strong argument to be made that agriculture still rules the East. But the farm economy faces challenges on a number of fronts. The federal buyout of the tobacco support program changes the business arrangement for raising the region's most valuable crop. Livestock production faces issues around environmental regulation, waste management, and odor control. And, the debate rages about whether consolidation of ownership into larger and more valuable farms is a good thing or a bad thing for the farmer. Ultimately, global competition may render many of these questions moot. But for the present, farmers continue to find creative ways to do what they have done for centuries—scratch out a living from the rich Eastern North Carolina soil.

arming in Eastern North Carolina is not what it used to be. The pillar of the eastern economy, the tobacco price support program, has been bought out by the federal government. Hog farmers grapple with issues around environmental regulation, odor control, and waste disposal. Contract farming controls both the hog house and the henhouse, and may control the future of tobacco as well. The number of farms has declined, while, with the exception of specialty farms, farm size continues to increase.

But make no mistake. Agriculture still rules the East. Ask Ed Emory, agricultural extension director for Duplin County. "Agriculture is the number one economic engine in Duplin County," says Emory. "About 90 percent of our tax base is directly related to agriculture."

Duplin County isn't really the breadbasket of the East, but you might call it the kitchen pantry. Indeed, a literal five-course meal could be prepared from the bounty that is harvested within the county. The menu could include lettuce for a salad, pork tenderloin or turkey and dressing for the meat, nearly any fresh vegetable grown on the eastern seaboard, a fruit course of trendy sprite melon or traditional watermelons or cantaloupe, and blueberry cobbler or strawberry pie for dessert. All this could be washed down with a glass of scuppernong wine produced at the state's oldest winery.

As the marketing slogan goes, goodness grows in North Carolina, and much of what grows in North Carolina grows in Duplin County. Among individual commodities, the county leads the state in hog production. It ranks second in turkeys raised and in the production of corn and hay crops. In broader marketing categories, the county ranks second in the state in livestock, dairy, and poultry production, generating \$455 million in farm income from these commodities in 2003, and seventh in crop production, adding another \$74 million in farm income. In addition, Duplin boasts a top 10 ranking among North Carolina's 100 counties in production of blueberries, cucumbers, peppers, and strawberries. The county also boasts the state's oldest and one of its largest wineries, producing sweet table wine from the scuppernong grape. "Farmers in Duplin County have always done a good job of diversifying," says Emory. "They are early adapters of developments that have allowed them to stay in farming."

But for all the diversity of Duplin County agriculture, neighboring Sampson County produces even

Mike McLaughlin is associate editor of North Carolina Insight. Katherine Dunn is a student at Elon University and was an intern at the North Carolina Center for Public Policy Research.

more farm income. With 27 percent of the county's land in crop production, Sampson produces \$583.3 million on the farm—the highest in the state (see Table 1, p. 43). "For us, agriculture has been good, and I think it will remain good for a long time," says George Upton, Sampson County agricultural extension chairman. Indeed, Farm Futures magazine singles out Sampson County as the most lucrative place to farm in the nation in its September 2005 edition, with Duplin County ranked a close second.1 "We haven't had any layoffs," quips Upton. Farmers don't seek incentives, and they don't opt to move their operations overseas to cut costs. Hard luck and hard times may have hit some individual farmers, but farm values are up, and working farms still produce much of the cash flow in the eastern economy.

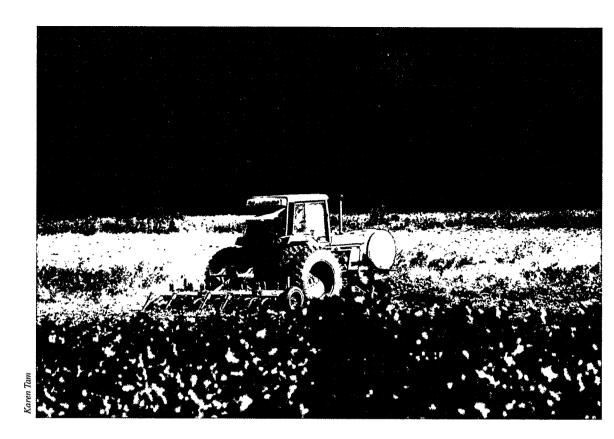
And, if agricultural dependence alone doesn't guarantee a healthy overall economy, it doesn't necessarily hurt to have farming in the mix. Indeed, measures of economic vitality show a mixed picture. One measure of a county's economic viability is whether its population remains stable or grows over time. Eastern North Carolina is a hotbed of agricultural production, with seven of the Top 10 counties in the state in generating cash receipts from farming located in the East. Of these seven, five had stable

or growing populations—Bladen, Duplin, Greene, Johnston, and Sampson. Only Robeson and Wayne lost population from 2000–2004.

However, another way of looking at economic vitality is how income is distributed. Here, the region's agricultural leaders fare less well. Five of the seven counties in the Top 10 ranked below the average median household income of \$32,274 for the 41 counties that comprise the East (see Table 1. Selected Demographic Characteristics of Eastern North Carolina, by County, in "Eastern North Carolina at Work," p. 9). Only Johnston County, increasingly a bedroom community for the Research Triangle area, and Wayne County, home of Seymour Johnson Air Force Base, exceeded the regional average.

And, unless one is the owner, employment on a working farm typically is not lucrative. Indeed, most farmworkers are employed on a seasonal basis at little more than minimum wage, and many are imported from Mexico on temporary work visas. For farms that use migrant workers, living and working conditions are perennial issues. Some 108,000 migrant and seasonal farmworkers worked in the North Carolina fields in 2003. A total of 1,538 migrant labor camps were inspected and certified





by the N.C. Department of Labor in 2004, housing 18,247 workers. Living conditions in the camps are Spartan at best, and the department maintains a gold star program to encourage compliance with minimum standards. A total of 127 growers were recognized for operating exemplary housing programs in 2004, while growers at 79 sites were fined a total of \$88,597.50 for 193 violations of health and safety standards, according to the N.C. Department of Labor's 2004 annual report.

Regina Luginbuhl, the N.C. Department of Labor's agricultural safety and health bureau chief, says the primary safety and health issues are in the fields rather than in the camps. The problems include failure to comply with rules about pesticide applications, failure to provide water for workers or sufficient time to drink it, and heat-related illness. In the 2005 growing season, Luginbuhl says three agricultural workers died of heat stroke. Luginbuhl says growers also see operation of farm vehicles on North Carolina's rural roads as a primary safety issue.

Except for farm owners and their families, farms employ few year-round workers. While the East contains 64.3 percent of all agricultural jobs in North Carolina, employment in Eastern agriculture totals only 19,600 people—a mere 2.2 percent of all Eastern jobs (See "Eastern North Carolina at

Work: What Are the Region's Economic Engines?" pp. 10–14, for more). Moreover, agriculture pays poorly with a statewide average annual wage of \$24,313. In the East, the average annual agricultural wage falls below the statewide annual wage level in 29 counties, though some of these counties are urban ones with comparatively small agricultural sectors.

Regardless of the economics, farming's boosters argue that the industry is essential. Rann Carpenter, former chief executive officer of the N.C. Pork Council, relates a story told by the late Jim Graham, the legendary N.C. agriculture commissioner who served from 1964 through 2000. As Graham told it, a major ice storm got between food distributors and the local grocery stores, creating a near-crisis on the bread aisle and at the dairy case. "People were mad as hell because Food Lion didn't make enough bread and milk," Carpenter says with a chuckle. "People do not understand where bread and milk come from. Agribusiness is a major, major economic engine in this state. It's vitally important. Look at Eastern North Carolina, where people need jobs and are looking for jobs. I think it's something we need to protect."

But the farm community is being buffeted by changes—some of them unsettling. Throughout the past decade, there has been consolidation of smaller

farms into bigger farms, and dominance in the agriculture industry by hog and tobacco farms. In 2004, North Carolina continued to lead the nation in fluctured tobacco production, providing 75.3 percent of total U.S. production, more than any other state, according to the N.C. Department of Agriculture and Consumer Services. And, the industry continues to adapt, having to "speed up to remain, and become even more successful," says N.C. Agriculture Commissioner Steve Troxler, elected statewide in 2004.

The end of the federal tobacco program may shift the focus from tobacco to other agricultural commodities, but North Carolina continues to be a top producer in hogs, pigs, and turkeys, and is seeing growth in specialty crop farming. While the face of agriculture may be changing, two things remain certain: agriculture is still a key industry in the economy of Eastern North Carolina, and the agriculture industry statewide is still heavily reliant on its eastern region.

Of the 14.2 million acres that make up the 41county eastern region of North Carolina, 3.1 million acres, or 22 percent, are harvested cropland (See Table 2, p. 45). Statewide, only about 13 percent of the land is harvested, so it's clear that the East is farmed more intensely than the state generally. The crops that make up the most harvested acres in the state are soybeans, cotton, and corn. Several counties-such as Greene, Pasquotank, and Perquimans—are made up of more than 40 percent harvested cropland.2 While there has been a decrease in number of farms (35 of the 41 eastern counties saw a decrease in the number of farms from 1997 to 2002, with a total loss of 2,594 farms in the East and a statewide loss of 5,190), the size of farms increased in all but nine of the East's counties over the fiveyear time period (see Table 3, p. 46).3

While 63 percent of the state's 53,500 farms produce income of less than \$10,000 a year, the remaining farms hold a majority of the wealth. Still, farmland across the state and in the region is decreasing overall. Statewide, from 1997 to 2002, farm acreage decreased four percent, from about 9.4 million acres to about 9.1 million acres. Even in the East, farm acreage decreased from 4.7 million acres to 4.5 million acres, or approximately 5 percent.⁴

"We see that more and more throughout Eastern North Carolina," says Carpenter, the former Pork Council executive. "Land is going for other purposes, whether it's residential development or highways. That all impacts the agricultural community." A further issue is that newcomers gobbling up what was once prime farmland are not always familiar with

rural ways. This can lead to concerns about farm odors, slow moving farm equipment on increasingly crowded roads, and other farm/city issues. "There's a natural conflict that evolves as a result of a lack of understanding about the agriculture community in general," says Carpenter.

The trend toward fewer and larger farms is long-term, as demonstrated by N.C. Department of Agriculture statistics over a 30-year period. In 1974, North Carolina had 124,000 farms with an average size of 110 acres. By 1984, the number of farms had dropped to 79,000, but the average farm size had increased to 139 acres. The trend toward fewer and larger farms continued into 2004, when the number of farms had fallen to 52,000 but average farm size had grown to 173 acres. Total farm acreage dropped during this period, from 13.6 million acres in 1974 to 9 million acres in 2004.

Lu-Ann Coe, former executive vice president of the North Carolina Agribusiness Council, is among those who see danger in the trend toward fewer farms and less acreage devoted to agriculture. "The state

Table 1. Top Ten North Carolina Counties in Farm Cash Receipts, 2003

	Younty	Cash Receipts (Thousands)**
County		(Thousanus). T
1.	Sampson*	\$ 583,257
2.	Duplin*	570,204
3.	Union	291,508
4.	Wayne*	257,921
5.	Wilkes	232,733
6.	Bladen*	229,804
7.	Johnston*	215,090
8.	Randolph	189,828
9.	Robeson*	177,138
10.	Greene*	143,132
N.C. Total		\$7,008,427

^{*} Denotes Eastern counties

^{**} Includes government payments Source: N.C. Department of Agriculture and Consumer Services

is losing an estimated 2,000 farms per year," writes Coe in a guest editorial in *The Charlotte Observer*. "Since 1985, we have lost over half our farms. In many rural areas, the standard reply to, 'What do you do for a living?' used to be, 'I work the land.' Where will consumers get their food and fiber when there is no one left 'working the land?'"

The increase in average farm size has contributed to a high average value of farms in Eastern North Carolina, with values climbing to more than \$1 million in 14 of the 41 counties in 2002 (see Table 4, p. 49). The average value of a farm in the East as a region was \$871,827, compared to a statewide average of \$518,719. The region's average net income per farm of \$78,452 also was considerably higher than the statewide average per farm of \$28,869.6 Upton, the Sampson County agricultural extension chair, speculates that this is because there are more part-time farmers in the Piedmont and in Western North Carolina—people who make their primary living at another job. In addition, larger farms with more lucrative contracts may drive up the overall net income figure. "We don't have any real way of getting at net" [income] for the individual farmer, says Upton. Still, says Upton, "Farming is a much better occupation than a lot of people think. I don't mean everybody's getting rich, but they're making a living."

When combined with agribusiness—food, natural fiber, and forestry—agriculture is a major source of income for eastern counties. According to calculations by North Carolina State University economist

Michael Walden, the value-added manufacturing, wholesale, and retail incomes from agriculture and agribusiness provide more than half the total income in 13 eastern counties.⁷

In 2003, North Carolina farms generated some \$7 billion in cash receipts. Of the 10 counties bringing in the most cash receipts, seven were in the East. In rank order, these seven are Sampson, Duplin, Wayne, Bladen, Johnston, Robeson, and Greene (see Table 1, p. 43). Of total cash receipts from that year, 60.1 percent was from livestock, dairy, and poultry products. Almost one quarter-\$1.5 billion or 22.2 percent—of the total cash receipts was from hog production alone. Three Eastern counties-Duplin, Sampson, and Bladen-rank first through third, respectively, in producing hogs and pigs (see Table 5, p. 50). North Carolina is the nation's second largest pork producer with nearly 10 million hogs, behind only Iowa. The state now has more hogs than people. Duplin and Sampson counties alone produce about 40 percent of the hogs in North Carolina (See Table 5, p. 50).8 There has been a moratorium since 1997 on the establishment of farms with more than 250 hogs, prompted in part by concerns about water quality and the management of animal waste. North Carolina experienced 46 spills from animal waste management systems in 1998, which is one reason for increased environmental regulations.10 Still, experts agree that hog production has remained stable, and that this has not hurt the industry, as the industry can only grow as much as demand allows.

"In the 1940s and early 1950s, a tenant son would likely have considered farming himself. In the 1960s, however, he could hardly think of doing so. Young men raised on farms, their fathers and grandfathers tenants and their mothers and grandmothers the daughters of tenants, now looked to the Army or the pickle plant for their living, to the plywood company or the feed mill. They drove trucks, either locally or up and down the eastern seaboard. They tried to get on at one of the sewing plants or chicken-processing plants. They worked on the roads for the state or pumped gas or stacked groceries at the local wholesaler's. Some drove everyday back and forth to Kinston or Goldsboro or Clinton where they may have found a slightly better-paying job, at DuPont or General Electric maybe, or Lundy's. Their sons and daughters would have as little feeling for the land as if it had never been a part of their heritage."

---LINDA FLOWERS

THROWED AWAY: FAILURES OF PROGRESS

IN EASTERN NORTH CAROLINA

Table 2. Harvested Cropland in Eastern North Carolina, 2004

	Commeter	Harvested	Total Area	% of County That
1	County Beaufort	Cropland (Acres) 145,000	of County (Acres) 529,670	Is Harvested Cropland 27%
	Bertie	88,000	447,514	20%
	Bladen	73,000	560,013	13%
	Brunswick	20,000	547,136	4%
5.	Camden	53,000	154,048	34%
6.	Carteret	49,000	340,077	14%
7.		40,000	110,490	36%
8.	Columbus	112,000	599,578	19%
9.		56,000	445,152	13%
	Cumberland	51,000	418,003	12%
11.		28,000	167,494	17%
	Dare	2,000	244,269	1%
	Duplin	155,000		30%
	Edgecombe	110,000	523,411 323,238	34%
	Gates	42,000		
16.			218,003	19%
	Halifax	69,000	169,888 464,282	41%
	Harnett	105,000 60,000		23%
	Hertford		380,826	16%
		47,500	226,349	21%
	Hoke	35,000	250,400	14%
	Hyde	73,000	392,211	19%
22.	Johnston	114,000	506,867	22%
	Jones	50,000	302,912	17%
	Lenoir	93,000	255,917	36%
	Martin	77,000	296,058	26%
	Nash	78,000	345,805	23%
	New Hanover	1,500	127,322	1%
	Northampton	90,500	343,130	26%
	Onslow	38,000	490,797	8%
	Pamlico	39,000	215,648	18%
	Pasquotank	83,000	145,210	57%
	Pender	38,500	557,261	7%
	Perquimans	70,000	158,202	44%
	Pitt	127,000	417,037	30%
	Robeson	205,000	607,296	34%
36.	Sampson	185,000	605,133	31%
37.	Scotland	28,000	204,262	14%
38.	Tyrrell	69,000	249,555	28%
39.	Washington	80,000	222,618	36%
40.	Wayne	132,000	353,664	37%
	Wilson	82,000	237,498	35%
East	ern N.C. Total	3,094,000	14,154,244	Average: 22%
State	ewide Total	4,268,000	33,600,000	Average: 13%

Source: N.C. Department of Agriculture and Consumer Services

Table 3. Trends in Size of Farms in Eastern North Carolina Counties, 1997 and 2002

County	Number (2002	of Farms 1997	Average Farm 2002	Size (Acres) 1997
1. Beaufort	395	429	430	362
2. Bertie	330	423	366	432
3. Bladen	551	637	264	204
4. Brunswick	271	261	152	148
5. Camden	70	87	(Data	unavailable)
6. Carteret	128	121	467	500
7. Chowan	173	175	346	301
8. Columbus	828	1,015	193	170
9. Craven	275	321	287	267
0. Cumberland	478	539	189	197
1. Currituck	82	100	424	400
2. Dare	8	11	(Data	unavailable)
3. Duplin	1,190	1,368	197	176
4. Edgecombe	281	351	582	491
5. Gates	129	174	496	392
6. Greene	271	331	361	313
7. Halifax	380	398	512	469
8. Harnett	730	740	157	159
9. Hertford	136	183	587	418
0. Hoke	201	200	315	347
1. Hyde	144	110	716	872
2. Johnston	1,144	1,420	170	153
3. Jones	154	172	494	424
4. Lenoir	428	495	284	308
5. Martin	305	427	363	272
6. Nash	478	541	335	328
7. New Hanover	77	75	(Data	a unavailable)
8. Northampton	328	404	459	410
9. Onslow	404	438	158	148
0. Pamlico	68	80	770	635
1. Pasquotank	157	203	633	432
2. Pender	296	333	212	210
3. Perquimans	193	223	489	350
4. Pitt	448	525	415	367
5. Robeson	873	1,211	328	240
66. Sampson	1,178	1,299	253	209

Table 3, continued

	Number of Farms		Average Farm Size (Acres)	
County	2002	1997	2002	1997
37. Scotland	159	145	367	369
38. Tyrrell	91	92	809	604
39. Washington	193	236	593	457
40. Wayne	722	941	237	247
41. Wilson	315	433	364	299
Eastern Total	15,062	17,667	389	344
N.C. Total	53,930	59,120	168	160
		# Farms		Farm Size
Net Gain (Loss) in Eastern NC:		(-2,594)		+45 acres
Net Gain (Loss) Statewide:		(-5,190)		+8 acres

Source: 2002 Census of Agriculture County Data, U.S.D.A. National Agriculture Statistics

Service

Hog Production in North Carolina: Contract Farming

As the second largest hog farming state in the nation, the hog industry in North Carolina has experienced exponential growth since the 1990s. The state's hog population grew from 2.6 million

Collards

... Collards and the ham grease they drop

In a pot come back as we enter
The house with porch and a pumpkin.
This steam holds all we remember.

Sweet potatoes clot in a bin, Common flesh beneath this skin Like collards. Grainy-sweet, kin.

> —James Applewhite, Selected Poems

in 1988 to more than 8 million in 1997 and has since increased to nearly 10 million. Hog farming initially was attractive to farmers because of the system that stored hog waste in lagoons, then sprayed the lagoon substance as manure onto crops, creating an ability to sell hogs and grow crops on the same farm. With environmental concerns brought on by odor and flooding, hog waste lagoons since have fallen from favor, and the search is on for new and better ways to deal with livestock waste.

Nevertheless, the industry has continued to grow, if at a more subdued pace. Similar to trends throughout the agriculture industry, hog farms have been decreasing in numbers yet increasing in size. In 1986, there were 15,000 hog farms in the state, but by the year 2000, the number of hog farms had decreased to 3,600.¹¹ If the number of farms has decreased four-fold, the total number of hogs on those farms has *increased* by a similar proportion, from 2.4 million head in 1986 to 9.6 million in 2000. A telling statistic is that some 13,000 hog farms had less than 100 hogs and pigs in 1986, while by 2000, operations with more than 1,000 hogs controlled nearly 99 percent of the industry.

One reason for growth in the hog industry is the rise of contract farming, where corporations enter into contracts with farmers to raise hogs for market at a set price. A well-negotiated contract guarantees that the farmer can cover production costs, removing some

of the uncertainty from a very uncertain field. Typically, says Sampson County agricultural extension director George Upton, a contract would require the farmer to provide a building and agree to raise a given number of hogs. The company would provide the animals, the feed, medication, and a staff person to

check on the animals at least once a week. While companies typically do not hold farmer's responsible if the hog dies while in the farmer's care, they also do not pay for the meat. This is significant because mechanical failure of a hog house ventilation system or poor management can lead to the death of large numbers of hogs in a short period of time. "If you do a better job, you make more money," says Upton. "Death loss hurts your income, so it's best to keep them alive and healthy."

The hog industry in North Carolina is dominated by two corporations, Smithfield Foods, Inc. and Premium Standard Farms. Both hold contracts

"Now that you've won the sweepstakes," the news reporter asked the lucky farmer, "what are you going to do with all that money?" "Well, I reckon," drawled the farmer, "I'll just keep on a-farmin'til it's all gone."

----ANONYMOUS

with hog farmers in North Carolina. Smithfield constructed the world's largest meat processing plant in Bladen County in 1992, at the beginning of the huge growth in hog production.

Large hog farm consolidation is not unique to North Carolina. In 1985, when the top four pork-producing compa-

nies controlled 32 percent of the market, hog farms in North Carolina were only starting to attract the interest of large corporations. Just 13 years later, in 1998, the top four pork-producing companies controlled 62 percent of the market. In 2003, five companies controlled 70 percent of the market. Smithfield controlled 26 percent alone and is estimated to own 1,478 hog farms in North Carolina. A moratorium on the expansion or construction of corporate farms, which was put in place in 1997, has leveled off the industry's expansion. Now, county commissioners have zoning authority over hog farms raising more than 5,000 hogs. Research on suitable



Karen Tom

Table 4. Average Net Income, Average Value, and Average Production Expenses of Farms in Eastern North Carolina, 2002

County 1. Beaufort		Net Income (Avg.)	Value (Avg.)	Production Expenses (Avg.	
		\$ 41,395	\$ 825,417	\$ 157,644	
2. B	Bertie	43,637	877,015	223,333	
3. B	Bladen	103,423	806,777	365,858	
4. B	Brunswick	22,344	448,040	111,186	
5. C	Camden	39,304	1,634,453	261,704	
6. C	Carteret	13,454	985,552	110,267	
7. C	Chowan	40,189	830,343	178,144	
8. C	Columbus	29,612	447,861	108,133	
9. C	Craven	44,175	621,114	141,753	
10. C	Cumberland	16,995	433,526	110,045	
11. C	Currituck	30,378	1,324,800	96,375	
12. D		(Data unavailable)	1,098,170	117,544	
	Duplin	103,805	564,942	503,222	
	Edgecombe	53,401	1,188,753	311,184	
	Gates	57,843	937,669	204,680	
	Greene	103,197	1,047,812	497,543	
	Halifax	39,494	886,263	145,508	
	Harnett	28,444	579,018	121,279	
	Hertford	370,839	1,162,572	363,156	
20. I		33,622	867,176	197,915	
21. F		40,525	1,264,802	208,840	
	Johnston	22,663	599,437	108,902	
23. J		77,281	1,136,331	529,741	
24. I		61,808	942,742	282,162	
	Martin	1,121	781,589	145,145	
26. N		50,667	888,020	187,909	
	New Hanover	1,039	449,401	53,584	
	Northampton	25,678	858,573	177,626	
	Onslow	51,231	427,198	183,880	
	Pamlico	(Data unavailable)	1,503,045	208,176	
	Pasquotank	33,946	1,260,846	197,581	
	Pender	83,930	669,994	262,440	
	Perquimans	33,872	1,106,437	183,236	
34. I		48,264	1,004,236	245,965	
	Robeson	35,882	629,801	186,970	
	Sampson	107,818	784,995	468,225	
	Scotland	69,631	825,124	227,685	
	Tyrrell	38,122	1,380,993	295,184	
	Washington	41,834	1,124,786	211,838	
	Wayne	108,959	722,503	338,241	
		91,188	951,772	178,586	
	Wilson		\$ 871,827	\$224,595	
	ern N.C. Averag Average	\$ 28,869	\$ 518,719	\$104,672	

Source: N.C. Department of Agriculture and Consumer Services

Table 5. Leading N.C. Counties in Livestock Production, 2004

Livestock	Top Three Counties	# of Animals
Hogs and Pigs		
riogs and rigs	Duplin*	2,250,000
	Sampson*	2,110,000
,	Bladen*	860,000
Cattle	Iredell	45,500
	Randolph	39,500
	Chatham	33,500
Beef Cows	Randolph	17,200
	Chatham	16,700
	Wilkes	15,900
Milk Cows	Iredell	11,000
	Randolph	3,700
	Alleghany	3,200
Broilers Produced	Wilkes	91,000,000
	Union	84,400,000
	Randolph	48,000,000
Turkeys Raised	Sampson*	10,200,000
	Duplin*	9,400,000
	Wayne*	4,000,000
Chickens	Nash*	2,300,000
	Alexander	1,690,000
	Iredell	1,640,000

* Denotes Eastern counties

Source: N.C. Department of
Agriculture and Consumer
Services

environment-friendly alternatives to the lagoon system is being conducted at N.C. State University, and this research is being financed by both Smithfield Foods and Premium Standard Farms.

More than 70 percent of hog farms in North Carolina are contract farms, making this sector of the industry very consolidated in ownership.¹³ According to the U.S. Department of Agriculture, an industrial-scale farm is 5,000 hogs or more, and North Carolina has more industrial-scale farms than any other state.¹⁴ Large corporations such as Smithfield own sows themselves, have contracts with other farmers to raise more sows, and have direct contracts with most of the other hog packers.

Like most corporations in the industry, Smithfield is vertically integrated, meaning it has control over almost every aspect of the production chain, from raw materials, to production, distribution, and marketing. While it does not own the farms, it provides the animals and feed to farmers who raise the hogs to market under a contract.

This control is a source of controversy in the industry. One view is that too much control in the corporations makes farmers financially more vulnerable than would otherwise be the case. As farmers under contract with Smithfield finance their own infrastructure, they are often forced to take out loans, and those loans often come from the corporation. Also, farmers in this industry are vulnerable in that they are very dependent on market timing because hogs are market-ready for only a brief period of time, giving the corporations even more leverage.¹⁵

The alternative view is that consolidation within the industry actually lessens risks for individual farmers. Tommy Stevens, interim chief executive officer of the North Carolina Pork Council, says that this consolidation within the industry "takes the burden off of farmers, who are provided with the animals that they raise on their own farms," and this makes the industry more stable. "The industry has also enabled the farmers to stay on the farm," says Stevens. "Many farmers have switched over from crops because hog production is so stable."

"In 1940, 33.6 percent of North Carolina's total number of employees were in agriculture (the majority in the eastern part of the state), but by 1979 this figure had plummeted to 3.6 percent. In 1959, there had been 43,000 farms with sales between 2,500 and 5,000 dollars; by 1969, there were fewer than 19,000. (In the same decade, farms with sales between 40,000 and 100,000 dollars increased fourfold.)"

——LINDA FLOWERS
THROWED AWAY: FAILURES OF PROGRESS
IN EASTERN NORTH CAROLINA



Many of the contract farmers are families who have been producing hogs for generations, says Julie Woodson of the N.C. Pork Council. The \$8 billion industry includes approximately 46,000 farmers across the state, says Woodson. But with the number of actual hog farms falling from 15,000 to some 3,600 in less than 15 years, the trend points clearly toward fewer and larger farms.

Duplin County Agricultural Extension Director Ed Emory says that contract farms in both the hog and turkey industries in the county work well for the farmers and the corporations. Such arrangements are not unique to North Carolina. In fact, the trend toward contract farming is national and even international in scope. However, North Carolina clearly is a leader in this kind of arrangement. "I know many Midwesterners we've had here don't understand contract farming, but it's put stability here," Sampson County Agricultural Extension Director George Upton tells Farm Futures magazine. "We have enough livestock under contract that we can venture out and try new things."16 Ultimately, says Upton, virtually every commodity raised on the farm will be grown under contract.

Contract farming, in Emory's words, is "good both ways." Contracts provide a steady source of income for farmers who may not find such stability in field crops, and corporations do not have to maintain the farms yet have a reliable source of animals for slaughter at a predictable price. What is taken away from the farmer is the ability to sell his animals to the highest bidder. That can work for profit or loss depending on the market at the time the animals are sold for slaughter.

Poultry Production: Far More Than Chicken Feed

North Carolina also is a lead producer in poultry, and all of the top three turkey producers in the state, in rank order by county, are eastern: Sampson, Duplin, and Wayne. Indeed, the move toward contract farming originally started in poultry as early as the 1960s. "It's a way to get more dollars from the land without taking on all of the risk," says Emory. Using a small amount of land for a poultry house with the chicks provided by the poultry processor allowed the farmer to almost guarantee himself a certain level of income to hedge against the uncertainties of crop production caused by weather and price fluctuation. "Our farmers see contract farming as a good thing because it allows them to stay on their own farms," says Emory.

"... As the skilled craftsman, a farmer is proud of what he's made; the sheer looks of it count for much with him, as much almost, though on another level, as the money he will get from it.

Farmers commonly refer to a good crop, as to an animal they admire, as "pretty;" a sorry one they scorn as something that's "plumb throwed away." The sense here is economic, ultimately; yet appreciation is, also, aesthetic and unself-conscious; sensuous. I know of no other people who as matter-of-factly respond to beauty, whose intuition that the physical world is sometimes capable of sustaining them is more natural and honest."

——LINDA FLOWERS
THROWED AWAY: FAILURES OF PROGRESS
IN EASTERN NORTH CAROLINA

Turkey production overall was down in 2003, though cash receipts from livestock, dairy, and poultry were up primarily due to production of hogs and broiler chickens. Turkey producers, however, are optimistic about the Central American Free Trade Agreement, or CAFTA. North Carolina exports to the countries covered by the agreement—Costa Rica, the Dominican Republic, El Salvador, Guatemala, Honduras, and Nicaragua—grew by \$678 million between 2001 and 2004. The 2,400 employees of Carolina Turkeys in Mt. Olive produce more than 550 million pounds of turkey annually, and have not found a strong U.S. market for their product.¹⁷ Instead, most of the meat is exported, some of it going to Costa Rica, but with a previously thin profit due to Costa Rica's 40 percent tariff. While the overall economic impact of CAFTA may not be significant, small farmers throughout the state have hopes of a boost from the agreement.

Tobacco Men

Late fall finishes the season for marketing:
Auctioneers babble to growers and buyers.
Pickups convoy on half-flat tires, tobacco
Piled in burlap sheets, like heaped-up
bedding
Whan sharecropper families move on in

When sharecropper families move on in November.

—James Applewhite, Selected Poems

Crop Production: Life After the Tobacco Buyout?

Tathile livestock, dairy, and poultry are the larger segment of the agriculture industry in the state and the region, crop production is not to be overlooked. Eastern counties are the top producers in the state of tobacco, cotton, soybeans, corn, peanuts, wheat, oats, potatoes, hay, and sorghum (see Table 6, p. 53). And, North Carolina ranks first in the nation for production of tobacco and sweet potatoes, producing 75.3 percent of flue-cured tobacco and 42 percent of sweet potatoes (see Table 8, p. 59). In 2003, the value of the cotton crop in the state was \$322 million, the third largest value ever, and production was up in several key crop commodities, including soybeans, sweet potatoes, and corn.18 Corn producers also see potential in CAFTA, under which export duties on fresh corn would immediately be eliminated, except to Nicaragua and the Dominican Republic, where such duties are expected to be eliminated in the next five to 15 years.19

The state also increased its production of blueberries in 2003 to 22.5 million pounds, representing a 45 percent increase over its 2002 crop. North Carolina exports much of its blueberry production. The Economic Research Service's "Fruit and Tree Nuts Outlook" for 2005 reported that berry crops were in strong demand in 2003 and 2004, which has boosted the value of most berry crops with overall growth from \$449 million in 1980 to \$1.5 billion in 2000 and \$2.2 billion in 2004. While berry crops account for a small share of fruit and tree nut production, their value accounts for 15 percent of cash receipts. The U.S. Highbush Blueberry Council, among others, cites an increase in awareness of the health benefits of

blueberries, rich in antioxidants and an excellent source of Vitamin C, potassium, and dietary fiber, as a reason for the growth in production.

Tobacco Production: Will the Golden Leaf Retain Its Luster?

Thile sweet potatoes and fruit and nut crops have become a steady source of income for farmers in the state, one historically stable source of income for North Carolina farmers has become less stable: tobacco. The Rural Prosperity Task Force, in a February 2000 report, called the range of issues confronting tobacco "a challenge approaching the proportion of the boll weevil that began wiping out cotton crops in North Carolina in the 1920s. Since 1997, when farmers sold more than \$1.2 billion in tobacco, income from the crop has plummeted due to declining quotas, decreased consumption, and international competition. This year, farmers will face the lowest quotas in history; estimates are for tobacco sales of about \$640 million."21 Tobacco receipts increased slightly to \$652 million for North Carolina farmers in 2004, but Congress has since elected to eliminate the 70-year-old quota system that controlled how much tobacco could be grown and who could grow it. The 2005 crop year marks the end of federal restrictions on tobacco production and price supports. The tobacco buyout is funded at \$10.1 billion, \$9.6 billion of which will be paid nationally to growers and allotment holders—those who owned the right to grow a proportional share of the total amount of tobacco approved for production each year—over the course of 10 years. Quotas are tied to the land through allotments based on growing patterns that date back to the 1930s.22 Farmers who did not own an allotment could buy or lease the right to grow tobacco from those who did. Thus, there are growers and there are quota holders, both of whom are to be compensated in the buyout pro-Growers who do not own a quota will be compensated for their share of production in the 2002, 2003, and 2004 marketing years. About 40 percent of the \$9.6 billion will go to some 76,000 North Carolina farmers and quota holders, and recipients may take their payment in lump sum or in 10 annual installments.

The effect of the buyout on the industry statewide is a constant source of speculation. Experts such as Craig Hayes, deputy director of the Division of Agricultural Statistics in the N.C. Department of Agriculture and Consumer Services, are in a "waitand-see" mode, as the first government payments were mailed in the fall of 2005. The buyout is funded

Table 6. Leading N.C. Counties in Crop Production, 2004

	Top Three Counties	Crop Production
Tobacco (lbs.)	Pitt*	18,949,000
` ,	Johnston*	17,755,000
	Robeson*	16,925,000
Cotton (480 lb. bales)	Northampton*	110,300
,	Halifax*	105,600
	Edgecombe*	79,400
Soybeans (bu.)	Robeson*	3,200,000
•	Beaufort*	2,225,000
	Sampson*	2,120,000
Corn (bu.)	Beaufort*	6,005,000
	Duplin*	5,635,000
	Robeson*	5,015,000
Peanuts (lbs.)	Martin*	45,100,000
	Bertie*	43,000,000
	Edgecombe*	39,000,000
Wheat (bu.)	Robeson*	1,808,000
	Union	1,747,000
	Beaufort*	1,544,000
Barley (bu.)	Yadkin	120,000
	Rowan	108,000
	Surry	88,000
Oats (bu.)	Beaufort*	120,000
	Johnston*	102,000
	Robeson*	96,000
Sweet potatoes (cwt.)	Nash*	1,274,000
	Sampson*	980,000
	Johnston*	913,000
Irish potatoes (cwt.)	Camden*	679,000
-	Pasquotank*	616,000
	Tyrrell*	428,000
Hay (tons)	Duplin*	79,000
	Wilkes/Sampso	on* 74,000
	Iredell	61,000
Sorghum (bu.)	Pasquotank*	127,500
	Hyde*	52,000
	Chowan*	50,200

* Denotes Eastern counties

lbs.=pounds

bu.=bushel baskets

cwt.=100 pound unit

Source: N.C. Department of Agriculture and Consumer Services

by quarterly assessments on tobacco product manufacturers and importers based on their product's share of sales in the U.S. market.²³

Some experts believe the huge injection of funds from the buyout

payments will boost the economies of the eastern counties. John Bishop, an economics professor at East Carolina University in the heart of flue-cured tobacco country, isn't so certain. "It will be closer to a wash than people think," Bishop says.²⁴ Pitt County, the state's top tobacco production county, is estimated to receive about \$220 million, but Bishop believes dropping land values and a drop in tobacco revenue from lower crop prices will cancel out the payments. All in all, Bishop says the impact of the payments on the local eastern economies will be determined by the whether the buyout dollars are spent as normal income or are invested. Invested income would have much less of an effect locally.

Experts predict many tobacco farmers will stop growing tobacco as the federally guaranteed price support program ends—especially those farmers close to retirement age or those with smaller farms.

Farming is mighty easy when your plow is a pencil and you're a thousand miles away from the cornfield.

----PRESIDENT DWIGHT D. EISENHOWER

The average age of tobacco farmers is 55, so retirement could be a strong lure for those who reap substantial financial gain from the buyout.²⁵ Brian Long, a spokesperson for N.C. Agriculture Commissioner Steve

Troxler, says the aging farmer is of huge concern to the commissioner. "It's something that the commissioner talks about often when he speaks to groups," says Long. "The average age is going up, which means fewer and fewer young people are going into farming." The problem is most acute in tobacco with the infusion of buyout money, but Long says the problem is larger and the answer is to encourage more young people to enter or stay in the profession. "How do you do it? You've got to show them it's a viable career."

Emory says it's too soon to write off the golden leaf. "It still is the most profitable field crop that we have," says Emory. "Our farmers are still growing a lot of it on contract," he says. "Tobacco is going to be in transition for about three years to see who is going to be able to grow it profitably based on that contract."



Karen Tam

Table 7. Cash Receipts for Livestock and Crops in North Carolina's Eastern Counties, 2004

Type of Production	Top Three Counties	Dollars
Livestock, Dairy, and Poultry	Sampson*	\$462,936,000
	Duplin*	\$454,928,000
	Union	\$226,389,000
Crops	Johnston*	\$125,936,000
-	Henderson	\$121,515,000
	Mecklenburg	\$104,067,000

^{*}Denotes Eastern counties

Eastern County		County Type of Production		Rank Among 100 N.C. Countie
1.	Beaufort	Livestock, Dairy, and Poultry	\$15,916,000	47
		Crops ·	\$47,523,000	17
2.	Bertie	Livestock, Dairy, and Poultry	\$40,895,000	21
		Crops	\$38,699,000	23
3.	Bladen	Livestock, Dairy, and Poultry	\$171,250,000	6
		Crops	\$53,093,000	15
4.	Brunswick	Livestock, Dairy, and Poultry	\$12,172,000	54
		Crops	\$19,516,000	48
5.	Camden	Livestock, Dairy, and Poultry	\$856,000	90
		Crops	\$18,041,000	54
6.	Carteret	Livestock, Dairy, and Poultry	\$207,000	99
		Crops	\$11,565,000	73
7.	Chowan	Livestock, Dairy, and Poultry	\$9,877,000	62
		Crops	\$25,484,000	35
8.	Columbus	Livestock, Dairy, and Poultry	\$50,592,000	25
		Crops	\$59,501,000	12
9.	Craven	Livestock, Dairy, and Poultry	\$17,132,000	43
		Crops	\$24,675,000	37
10.	Cumberland	Livestock, Dairy, and Poultry	\$38,863,000	33
		Crops	\$20,766,000	45
11.	Currituck	Livestock, Dairy, and Poultry	\$1,542,000	86
		Crops	\$11,986,000	70
12.	Dare	Livestock, Dairy, and Poultry	\$40,000	100
		Crops	\$92,000	100
13.	Duplin	Livestock, Dairy, and Poultry	\$449,824,000	1
		Crops	\$68,714,000	8
14.	Edgecombe	Livestock, Dairy, and Poultry	\$37,673,000	32
		Crops	\$58,504,000	13
15.	Gates	Livestock, Dairy, and Poultry	\$14,706,000	49
		Crops	\$17,818,000	55
16.	Greene	Livestock, Dairy, and Poultry	\$102,387,000	10
		Crops	\$35,129,000	27

Table 7, continued

Ea	stern County	Type of Production	Dollars	State Rank
17 .	Halifax	Livestock, Dairy, and Poultry	\$23,271,000	37
		Crops	\$46,671,000	18
18.	Harnett	Livestock, Dairy, and Poultry	\$72,013,000	15
		Crops	\$45,638,000	20
19.	Hertford	Livestock, Dairy, and Poultry	\$27,638,000	35
		Crops	\$20,294,000	47
20.	Hoke	Livestock, Dairy, and Poultry	\$19,607,000	40
		Crops	\$14,250,000	63
21.	Hyde	Livestock, Dairy, and Poultry	\$746,000	92
		Crops	\$25,002,000	36
22.	Johnston	Livestock, Dairy, and Poultry	\$71,403,000	16
		Crops	\$134,722,000	1
23.	Jones	Livestock, Dairy, and Poultry	\$51,230,000	24
		Crops	\$19,303,000	49
24.	Lenoir	Livestock, Dairy, and Poultry	\$73,179,000	14
		Crops	\$54,411,000	14
25.	Martin	Livestock, Dairy, and Poultry	\$12,080,000	56
		Crops	\$44,396,000	22
26.	Nash	Livestock, Dairy, and Poultry	\$54,088,000	22
		Crops	\$64,984,000	10
27.	New Hanover	Livestock, Dairy, and Poultry	\$257,000	98
		Crops	\$7,109,000	83
28.	Northampton	Livestock, Dairy, and Poultry	\$42,243,000	29
		Crops	\$34,463,000	28
29.	Onslow	Livestock, Dairy, and Poultry	\$53,407,000	23
		Crops	\$17,092,000	57

These tobacco farmers entered into contracts before the buyout, and will continue to grow tobacco while receiving buyout payouts, says Emory. Farmers are taking a risk in continuing production in the uncertain environment, but as Emory puts it, "Farmers take a risk every day." Tobacco has been a very profitable crop on a per-acre basis for Duplin County. While tobacco farms make up only one percent of cropland, they make up 50 to 60 percent of income from field crops for the county. Therefore, it will be a hard crop to replace in counties such as Duplin where it is such a large percentage of the field crop income.

Extension director Upton, of Sampson County, says tobacco production barely dipped with the end of the federal tobacco program. In 2005, only 200

fewer acres of tobacco were grown in the county than in 2004, the last year of the tobacco program. That's about a 4 percent drop for a county that has more than 5,000 acres in production. Tobacco contracts typically promise that the grower will provide a given amount of graded tobacco at a preset price. Unlike contracts with hog farmers who raise company-owned pigs, the risk of crop loss lies with the farmer, Upton says.

Eliminating quotas will help reduce the costs of production for farmers who no longer have to buy or lease the right to grow tobacco, thus leading to lower market prices. Changes in global tobacco production could decrease prices in the U.S., but result in an increase in production in Eastern North Carolina.²⁶ North Carolina tobacco currently sells for less than

Table 7, continued

Eastern County	Type of Production	Dollars	State Rank
30. Pamlico	Livestock, Dairy, and Poultry	\$771,000	91
	Crops	\$13,113,000	64
31. Pasquotank	Livestock, Dairy, and Poultry	\$688,000	93
	Crops	\$35,633,000	26
32. Pender	Livestock, Dairy, and Poultry	\$61,048,000	20
	Crops	\$27,393,000	32
33. Perquimans	Livestock, Dairy, and Poultry	\$16,577,000	45
	Crops	\$22,247,000	41
34. Pitt	Livestock, Dairy, and Poultry	\$47,050,000	27
	Crops	\$65,066,000	9
35. Robeson	Livestock, Dairy, and Poultry	\$104,764,000	8
	Crops	\$73,869,000	7
36. Sampson	Livestock, Dairy, and Poultry	\$468,172,000	2
_	Crops	\$98,069,000	4
37. Scotland	Livestock, Dairy, and Poultry	\$39,568,000	30
	Crops	\$9,991,000	77
38. Tyrrell	Livestock, Dairy, and Poultry	\$4,580,000	75
	Crops	\$18,350,000	51
39. Washington	Livestock, Dairy, and Poultry	\$19,994,000	39
_	Crops	\$29,026,000	31
40. Wayne	Livestock, Dairy, and Poultry	\$187,414,000	5
•	Crops	\$60,776,000	11
41. Wilson	Livestock, Dairy, and Poultry	\$9,810,000	63
	Crops	\$96,325,000	5

Source: N.C. Department of Agriculture and Consumer Services, North Carolina Agriculture Statistics, Cash Receipts (2004).

the average U.S. market price of tobacco but for more than the average price of tobacco from Brazil, the dominant producer. As the majority of tobacco crops in the U.S. and Brazil are under contract with international companies, changes in production after the buyout will likely be determined by these companies. Although world tobacco production is not expected to increase significantly, over time it is predicted that there will be an increase in U.S. production; growing the majority of the world's tobacco in one nation, Brazil, is said to be risky.²⁷ Tobacco production also is projected to become more consolidated as tobacco farm sizes continue to increase, causing many farmers to transfer to niche and alternative farming. Thus, tobacco farmers will be taking a risk in the next few years. Whether they

continue growing tobacco or venture into new areas of agriculture, the future of agriculture in the East will in part be determined by their success.

Alternative Crop Farming

While the large farms are growing larger, there has simultaneously been an increase in smaller, specialty farms. Such farms focus on so-called "specialty crops" that fit a market niche overlooked by framers growing standard commercial varieties. The move toward specialty farming is occurring in both Eastern North Carolina and the state as a whole. N.C. Agriculture Commissioner Steve Troxler cites the growing importance of specialty crops as the transition is made from tobacco. He says North

"But if, as often happened, produce didn't bring enough even to pay for itself, let alone anything else; if beans and cucumbers, pepper and squash, were brought back home—the farmer damned if he meant to give them away for fifty or seventy-five cents or maybe a dollar a bushel (the basket alone costing him twenty-five or fifty cents—and allowed to rot or be fed to the hogs, then the only thing to do was borrow more and more heavily—knowing, as you always knew, that tobacco, its price artificially maintained through government support, might bring but the bare minimum"

—LINDA FLOWERS
THROWED AWAY: FAILURES OF PROGRESS
IN EASTERN NORTH CAROLINA

Carolina has become the third most diverse state in agriculture, behind only California and Texas. Ed Estes, associate head of the Agriculture and Resource Economics department at North Carolina State University, adds that farmers are looking for high value crops, such as melons, which have the potential to yield thousands of dollars an acre compared with \$20 to \$25 an acre for corn and soybean crops.

These crops, however, come with much more of a risk, as there is a high variance in their yields. "The ability to take a risk is the difference between someone who is successful and someone who is not," says Estes. The search for specialty, or alternative, crops is ongoing as agricultural researchers and farmers seek to reap a windfall harvest in changing consumer tastes and trends. "Niche markets are never big but constantly evolving," says Estes. "It's a different taste with a limited number of consumers who are willing to pay for that experience." He says farmers in the state also are tending to shift from labor intensive crops, citing an increase in pick-your-own strawberry farms as an example. Estes says that overall, North Carolina could already be considered a niche player, outside of turkey and hog produc-

"Specialty crops have really taken off the last few years and are an important part of the agriculture economy," says Steven Leath, director of the N.C. Agricultural Research Service. "It is important to keep in mind that soybeans started out as a specialty crop 40 years ago.... You just never know what is going to take off." Lorraine Ruffin, whose brothers all farm on their land in Wilson County, says farmers are looking to new crops with the tobacco buyout because many have large debts from borrowing for equipment purchases. However, many of the new specialty farms appear much more labor

intensive. One example is the sprite melon, a yellow, softball-sized fruit with a taste similar to both watermelon and honeydew melon. The sprite melon is durable, has a long shelf life, and can ship easily. Ruffin's brother, Bill Harrold, began to think toward alternative crops about four years ago because of the tobacco buyout, although his sprite melon crops "are a lot more work than tobacco, with much more [labor] per acre required."

Nonetheless, alternative crops are growing in popularity among North Carolina farmers. The number of organic farms also continues to increase across the state, as demand increases. More organic food was purchased in conventional supermarkets than at food cooperatives and natural food stores for the first time in 2000, and consumer interest in organically grown foods continues to increase market opportunities for organic farmers.²⁸ Other alternative crops such as sea oats and even aquaculture are attracting various farmers, including those who are seeking to make the switch from tobacco. As restrictions are increased on the wild harvest of various seafood species due to over-fishing and habitat concerns, and those supplies become more limited, aquaculture is expected to grow further throughout the nation, and Eastern North Carolina seems well-situated to take advantage of this trend. Already, North Carolina aquaculture practitioners raise such species as clams, oysters, hybrid striped bass, and trout.

Global climate changes also are expected to have an impact on agriculture, as gradual warming is predicted to decrease soil moisture and reduce water availability for irrigation, and warmer temperatures and milder winters will increase the presence of agricultural pests. Kenneth Sorenson, extension entomologist at N.C. State University, says that specialty crops can be more vulnerable to insects and to pesticides, as problems and reactions are unique with

each crop and are still being researched. Sorenson says each unique crop brings its own challenges. While "concern seems to always be with developing the product that will make the most money, we must remember to work within the agricultural system," Sorenson says.

Specialty crops may not have a tremendous overall impact on the state or even the eastern region, but statistician Dee Webb of the N.C. Department of Agriculture says that on a "county-by-county level, these alternative crops will have an impact," especially in smaller Eastern counties that are traditionally supported by agriculture. Nick Augostini, marketing specialist for specialty crops at the department's Cunningham Research Station in Kinston. N.C., agrees. "They are certainly not going to hurt the industry," says Augostini. Indeed, a new and different product often will lead to success. "Twenty years ago, supermarkets had 20 to 60 produce items throughout the year," Augostini says. "Now, it can be over 600 items. A successful crop will have to stand out to the consumer." For example, Augostini says the sprite melon is a specialty crop with a great deal of potential because it is new money to the state. it has a long shelf life, and there is a high demand from consumers for melons. North Carolina sprite melon sales in 2004 generated more than \$3 million. Augostini says that research must be market-driven, so that farmers are always producing crops for which there is a market.

If the reaction of Charlotte residents at a watermelon tasting is any indication, the producers of alternative crops *are* having success in reaching new markets. Kids at a research station-sponsored watermelon tasting were shocked to find that some watermelons still contain, of all things, seeds! "What are we supposed to do with those black things?" Augostini recalls the children asking. Some had never tasted a watermelon with traditional black seeds, having only experienced seedless varieties.

But if marketing is a crucial part of these crops, farmers are traditionally production specialists, and many are not familiar with the marketing and entrepreneurial aspects that come with new, alternative crops, says Blake Brown, a professor and extension economist of agriculture and resource economics at N.C. State University. He says it is yet to be seen whether farmers will develop the new skills required to have success in new areas of the industry. Ronnie Handey, a second generation produce farmer from Wallace, N.C., is one who has learned that it is not wise to get ahead of the market. Handey reluctantly

Table 8.	North Carolina Agricultural Products Ranking
	in Top Five Among the 50 States, 2004

Percent of				
Rank	Item	U.S. Production	Top 3 States with N.C.	
1	Total tobacco	39.8	NC, KY, TN	
	Flue-cured tobacco	75.3	NC, SC, VA	
	Sweet potatoes	42.0	NC, CA, MS	
2	Hogs and pigs	16.2	IA, NC, MN	
	Christmas tree—cash receipts	21.3	OR, NC, MI	
	Turkeys raised	14.8	MN, NC, AR	
3	Cucumbers for pickles	11.8	MI, FL, NC	
	Trout sold	8.3	ID, WA, NC	
	Poultry & egg products—cash receipts	9.2	GA, AR, NC	
4	Blueberries	10.1	MI, NJ, OR, NC	
	Broilers (chickens)	8.6	GA, AR, AL, NC	
	Greenhouse and nursery—cash receipts	6.2	GA, TX, AL, NC	
	Strawberries	.8	CA, FL, OR, NC	
5	Catfish sold—food size	1.5	MS, AL, AR (NC-5)	
	Peanuts	8.4	GA, TX, AL (NC-5)	
	Snap beans	4.6	FL, GA, CA (NC-5)	

Source: N.C. Department of Agriculture and Consumer Services

decided to give the sprite melon a try based on the advice of extension specialists, but no one would buy them. Handey found that his customers at the farmers markets in Kinston and his family's produce stand in Wallace preferred plain, old-fashioned cantaloupes.

John Sparrow, who owns farmland in Kinston, says marketing is something he would like to learn more about, though he too is approaching the experiment cautiously. "If we start these specialty crops, who is going to buy them? Is there a market for them? We can develop all sorts of crops, but we need someone who will buy them. Whoever marketed Vidalia onions is brilliant. They taste the same as white onions to me, but were marketed as having a new taste. Marketing is what the research stations need to focus on." Sparrow rents his farmland to farmers who primarily grow corn, soybeans, and tobacco.

Agriculture research at the state's 18 research stations is becoming more necessary now than ever, and with an increasingly urban legislature, funding for this research is getting harder to come by. ²⁹ Since 1998, the N.C. Agriculture Department's budget has

Table 9. Rank in Cash Receipts of Major North Carolina Agricultural Products

		2004 Cash
		Receipts (in
Rank	Product	Millions)
1	Hogs	\$2,709
2	Broiler Chickens	2,042
3	Greenhouse/Nursery	832
4	Tobacco	620
5	Turkeys	449
6	Cotton	304
7	Soybeans	288
8	Cattle and Calves	258
9	Chicken Eggs	240
10	Com	182
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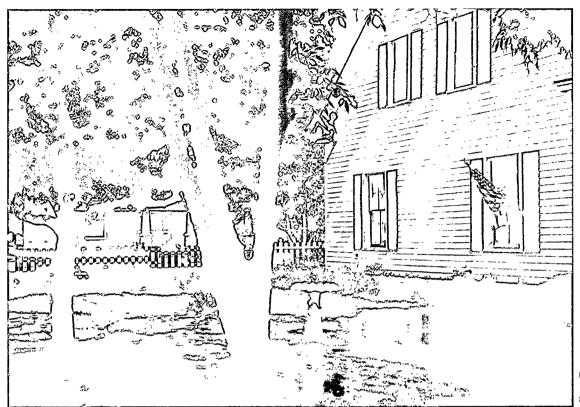
Source: N.C. Department of Agriculture and Consumer Services, Agricultural Statistics Division Men who can graft the trees and make the seed fertile and big can find no way to let the hungry people eat their produce. Men who have created new fruits in the world cannot create a system whereby their fruits may be eaten. And the failure hangs over the State like a great sorrow.

—John Steinbeck
The Grapes of Wrath

been cut by 9.6 percent, from \$58.5 million to \$52.2 million, and its work force has been trimmed by 127 positions. However, learning what markets are available as well as methods to produce each unique crop requires extensive research that will remain vital to an increasingly complex industry.

Developments in the industry also are allowing for more than just producing commodities; they are adding value to them. For example, a new manufacturing facility to be constructed in 2006 in Mt. Olive will use renewable resources, such as oil from soybeans, to produce bio-diesel.30 Demand for bio-fuels manufactured from renewable sources is anticipated to grow rapidly due to federal tax incentives. Many government entities also now mandate that a percentage of their vehicles use bio-diesel, according to the N.C. Department of Agriculture, thus increasing the need for soybean production in the state. Blake Brown says that value-added research and niche marketing are key to the success of specialty crops. This added value can range from the creation of the bio-diesel plant, to marketable melons such as new small, seedless watermelons created with smaller families in mind. At the Tidewater Research Station in Washington County, rice is being genetically engineered to produce proteins found in human milk in hopes that it will eventually be used in products ranging from sports drinks to rehydration formulas.

Upton, the Sampson County agricultural extension chairman, sees limited potential in specialty crops for the typical Eastern North Carolina farmer. "I don't think it will be the salvation, but a lot of people do," says Upton. He holds more hope for the development of new markets for existing commodities, such as the use of soybeans for bio-diesel. His



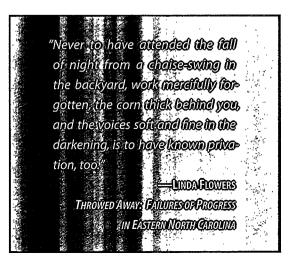
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reasoning? Farmers already are growing the crop and production costs are low. Thus, new sources of demand will drive up profitability.

Estes agrees that specialty farming is not going to provide an alternative for a farmer growing 3,000 acres of soybeans. More likely, it will be a farmer looking to lessen dependence on his tobacco crop or an individual who wants to commit one or two acres to trying something different. "In addition to specialty crops, there's going to have to be some large acreage solution," says Estes.

It is uncertain what the next few years will bring to the industry. Corporations in the hog industry will be working towards more environmentally friendly farming methods, as North Carolina becomes increasingly strict on environmental regulation. During the first years of the federal buyout, tobacco farmers may stick it out, waiting to see if changing global production will boost sales. Others may retire from farming. Still others may try their hands at alternative crops, feeding the steadily growing and diverse needs of consumers. Trends in consolidation toward larger farms in such traditionally powerful industry segments as hogs, poultry, and tobacco likely will continue, as will the trend toward fewer and larger farms generally. These trends will have an out-sized impact on Eastern North Carolina, since the East is more reliant on agriculture than the rest of the state.

The North Carolina Rural Prosperity Task Force sees three major challenges: fluctuating prices on world markets, the decline in importance of tobacco in the East and statewide, and potential devastation from hurricanes and flooding. The task force offered eight recommendations to help farmers weather the coming storms. These included: (1) creation of the Agricultural Advancement Consortium to research



trends in agriculture and identify and promote new economic opportunities for farmers; (2) increased funding for promoting North Carolina agricultural and biotechnology products; (3) expanded marketing of horticultural products to help replace some of the income lost from the tobacco quota buyout; and (4) expanding the number of facilities available to farmers to process their crops and add value in the marketplace.³¹

These efforts are important as the rural economy seeks to right itself, though not everyone is certain that efforts such as increased marketing and production of alternative crops will be enough to fill the potential void left by the end of the tobacco quota program and the uncertainties of international competition. With increasing farm size, fewer farms, greater environmental concerns, and development pressure brought by population growth, the role of agriculture may be reduced in the future—throughout North Carolina but most profoundly in the East.

Estes, the North Carolina State University agricultural economist, says some analysts see the end of American agriculture within the next 50 years, as global trade barriers fall and land and labor costs increase in the U.S. "You're going to see more and more reasons for not trading eliminated," says Estes. "Certainly we'll grow less as global pressures continue to exist, and we can get cheaper foods elsewhere. We going to have less agriculture 10 to 20 years from now than we do now, and the agriculture we do have is going to have to be much higher value if even one in 10 farmers are going to survive."

Adds North Carolina State University economist Michael Walden, "I don't think it's going to fade away, but I think it will be more competitive." Walden says the U.S. enjoys a competitive advantage over many international producers due to its growing season, rich soil, and government-funded technical support provided through the agricultural extension service. But agricultural trade barriers increasingly are at the center of international trade disputes. Like Estes, Walden believes many of these barriers ultimately will fall and the market ultimately will flood with lower cost food from places such as Asia, Mexico, and South America. In response, the U.S. will continue its shift toward fewer and larger farms, with more and more contract arrangements to smooth out the risk.

Even in the face of these changes, agriculture retains a great deal of vitality and is likely to remain vibrant for the foreseeable future. "Agriculture is a necessity," says Nick Augostini. "People have to eat, they have to buy clothes, and they have to build houses. All of this comes from agriculture."

FOOTNOTES

¹ Bryce Knorr, "Hotbeds of Profitability: The Best Places To Farm," *Farm Futures* magazine, Decatur, Ill., September 2005, pp. 13-18

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⁴ *Ibid.* Data compiled from Table 8 using the 41 Eastern counties; data unavailable for Camden, Dare, and New Hanover counties.

counties.

⁵ Lu-Ann Coe, "Understand agriculture's value," guest editorial, *The Charlotte Observer*, April 7, 2000, p. 14A.

⁶U.S. Department of Agriculture, note 3 above, Table 1: County Summary Highlights, 2002.

⁷ Michael Walden, "North Carolina County Agribusiness Values," Department of Agricultural and Resource Economics, North Carolina State University, Raleigh, N.C. On the Internet at www.ag-econ.ncsu.edu/faculty/walden/counties.htm.

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⁹ North Carolina General Statute 143-215.10A.

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¹⁴ Markets and Management Studies Program, Duke University. "North Carolina in the Global Economy: Hog Farming," Spring 2005, p. 1. Available on the Internet at www.soc.duke.edu/NC_GlobalEconomy/hog/overview.php

¹⁵ Ibid.

16 Knorr, note 1 above.

¹⁷ Karen Rives. "CAFTA doesn't spook all of N.C.," *The News & Observer*, Raleigh, N.C., May 12, 2005, p. 1A.

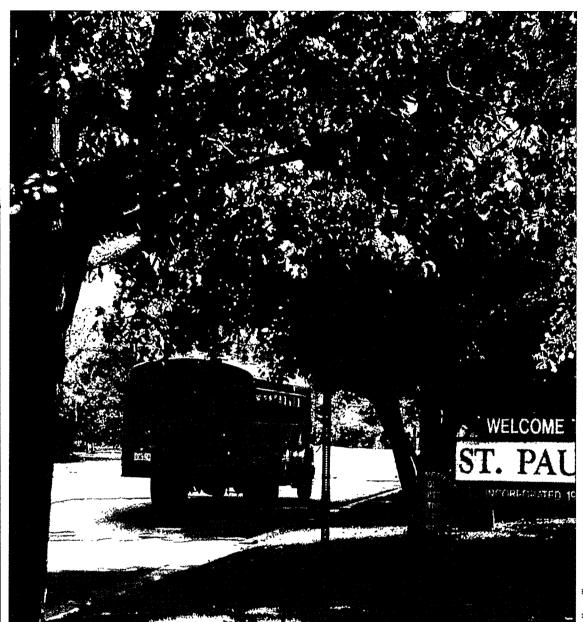
¹⁸ NC Department of Agriculture and Consumer Services and the National Agriculture Statistics Service, U.S. Department of Agriculture, *North Carolina Agriculture Statistics* 2004, Raleigh, N.C., 2005, p. 42.

¹⁹ Rives, note 17 above.

²⁰ Susan Pollack and Agnes Perez, "Fruit and Tree Nuts Outlook," March 31, 2005, Electronic Outlook Report from the Economic Research Service, U.S. Department of Agriculture. Available on the Internet at www.ers.usda.gov/publications/fts/mar05/FTS315.pdf

²¹ Leslie Boney and Lucy Gorham, *North Carolina Rural Prosperity Task Force Report*, N.C. Department of Commerce, Raleigh, N.C., Feb. 21, 2000, p. 57.

²² For more on this topic, see William R. Finger, editor, *The Tobacco Industry in Transition*, North Carolina Center for Public



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Policy Research, Raleigh, N.C., 1981. See especially pp. 13-25.

²³ A. Blake Brown, Professor, Agricultural and Resource Economics, "A Summary of the Tobacco Buyout," North Carolina State University, November 12, 2004, Available at N.C. State University's Tobacco Buyout Information Website at www.cals. ncsu.edu:8050/advancement/tobaccobuyout/buyoutbkgd.htm.

²⁴ Brian McDearmon. "Tobacco buyout should mean double in Pitt." *The Daily Reflector*, Greenville, N.C. June 21, 2005, p. 1A. ²⁵ Betty Joyce Nash, "Tobacco Buyout—The Invisible Hand Plants First Crop," *Region Focus*, Federal Reserve Bank,

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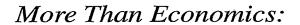
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²⁸ Carolyn Dimitri and Catherine Greene, "Recent growth patterns in the U.S. Organic Foods Market," Economic Research Service, U.S. Department of Agriculture, September 2002. Available on the Internet at www.ers.usda.gov/publications/aib777/.

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The Military's Broad Impact on Eastern North Carolina

by Renée Elder

Executive Summary

In its approach to the U.S. Department of Defense Base Realignment and Closure process, with thousands of military and civilian jobs on the line, North Carolina attempted to brand itself as "the most military friendly state in the nation." And, of the state's three regions, the East is by far the friendliest. Home to six major military bases and several smaller installations, the East plays host to some 116,000 uniformed troops and more than 21,000 civilian workers, pumping billions of dollars into the economy of the state's poorest region. Indeed, approximately one-eighth of the nation's troop strength is stationed in Eastern North Carolina (116,000 soldiers in Eastern North Carolina out of 780,000 total troops).

The military presence provides a great deal of pride in the region's role in defending freedom, and the nation's defense is vital to every citizen. But the heavy military presence also produces broad impacts. What are some of these impacts, and how do they affect Eastern North Carolina's military towns and counties? The Center examined 12 areas of impact: economic impact; defense contracts; impact on ports; impact on sales taxes and property taxes; impact on taxpayer-financed services and on growth and housing; impact on the public schools; impact of military spouses and retirees on the local work force; rates of crime, domestic violence, and child abuse; race relations and the military; presence of drinking establishments, pawn shops, and tattoo parlors; environmental impact; and air space restrictions.

1. Economic Impact: A study by economists at East Carolina University completed in 2004 estimates that the military generates \$18.1 billion in economic impact each year, some \$13 billion of which stays in Eastern North Carolina. These numbers include a multiplier effect that increases the actual dollars, but with \$3.9 billion in actual base payrolls bankrolling 137,000 jobs, it's evident that the military has a major impact. However, spin-off development produces a disproportionate share of lower-paying retail trade jobs in counties with large military installations such as Onslow, home of Marine Base Camp Lejeune. In addition, major overseas deployments historically have produced a drop in sales tax revenue as military dependents slow their spending and even relocate to join relatives living out of state until the deployment ends. In the 1991 Persian Gulf War, this was thought to contribute to a major recession in North Carolina and a state government revenue shortfall of \$1.2 billion. Thus, while military jobs are less affected by the ups and downs of the traditional economy, they have cycles of their own caused by deployment patterns and changes in troop strength. The phenomenon was present but less pronounced in the last few months of 2002 before the war in Iraq, but sales tax revenues have since bounced back to pre-deployment levels.

2. State's Share of Defense Contracts: North Carolina has not been favored with its fair share of Department of Defense contracts for home state businesses. North Carolina ranks fourth among states in military presence but 23rd in the amount of defense contracts the state receives. Of more than \$200 billion in Department of Defense procurement in 2004, less than 1 percent came to North Carolina.

A report by Angelou Economics for the Military Business Center at Cumberland Technical Community College shows a 50 percent increase in military contracts awarded to businesses in the state between 2001 and 2004, but during the same period the amount of contracts awarded nationally rose by 68 percent to \$230 billion. States that did significantly better than North Carolina included California, Virginia, Texas, Connecticut, and Maryland. California, Virginia, and Texas have more military personnel stationed in their states than does North Carolina. Additionally, North Carolina did not win the majority of the contracts for local base work. Of the \$2.4 billion in contracts awarded by the state's military bases, only \$460 million went to North Carolina firms.

- 3. Impact on Ports: Business at North Carolina's two ports at Wilmington and Morehead City was up 24.5 percent in fiscal year 2004, partially due to increased use by the military. Since the beginning of Operation Iraqi Freedom, the port at Morehead City has shipped 22,000 short tons (44 million pounds) of cargo for the military on 53 vessels, producing \$562,000 in revenue. Some 175,000 short tons have been shipped from the state port at Wilmington on 22 vessels, producing some \$3 million in revenue. State officials say the deepening of the Wilmington port in 2005 is expected to generate still more shipping by the military. These state ports, along with the Military Ocean Terminal at Sunny Point, are three of only 15 strategic military ports in the country.
- 4. Impact on Sales Taxes and Property Taxes: While the oft-heard complaint is that heavy military presence drives up property taxes for property owners due to the vast amounts of tax-exempt land and facilities, the numbers do not bear out that allegation. Military counties in the region carry moderate to low per capita property tax burdens compared to others in the region and state. Onslow County's per capita property taxes are lowest in the 41-county region. Sales tax revenue in Onslow, while it dropped off at the beginning of Operation Iraqi Freedom, recovered nicely and now rivals per capita sales tax revenue generated in nearby non-military counties. Cumberland County's per capita property tax rate also is lower than the 41-county eastern region average, despite the fact that 42,240 acres of federal property are off the tax rolls at an estimated value of \$126.7 million, according to a 2001 estimate. During that same year, on-base commissary sales of \$4.1 million were not subjected to the state and local sales tax.
- 5. Impact on Taxpayer-Financed Services and on Growth and Housing: Population growth and housing availability are a problem for some local governments, in that

the lower-cost housing built for military families often doesn't pay the cost of providing services. Harnett County, near Fort Bragg, is one place where the problem has surfaced. The county's population grew 10 percent between 2000 and 2003, more than twice the state average, as military families flooded into the area in search of cheaper housing. The heavy growth is expected to continue, putting huge demands on school systems, recreational facilities, and water and sewer systems. The county has yet to see substantial commercial development to go with the residential growth and help pay the cost of serving these new residents. To the northeast, Coast Guard Air Station Elizabeth City and related command units may help drive up housing prices as employees relocate from places like Alaska and California where real estate is much more expensive.

- 6. Impact on Public Schools: The public schools are one area where local officials say the military does not pay the full cost of educating its dependents. With 52,000 students and 16,000 federally connected students, the Cumberland County Public Schools were to receive \$5.8 million in federal Impact Aid dollars in 2005. That's less than 2 percent of the school system's \$362 million operating budget. However, federal officials say the raw numbers overstate the case. Many military personnel live off base, own property, and pay taxes that help cover the cost of their children's education. In addition, not all federally connected children are military dependents. Only 12,394 students have parents in the military in uniformed service.
- 7. Impact of Military Spouses and Retirees on the Local Work Force: Local economic development officials say thousands of retirees leave the military every year, and they tend to settle around their most recent assignment. Officers typically retire at 46 and enlisted personnel on average retire at age 42. These military retirees are considered a boon because they have an income stream and are less likely to have children who place demands on schools and recreational facilities. If they return to work, they often have desirable job skills that economic developers can tout when they attempt to sell a new industry on a particular area. Additionally, more than half of Marines stationed at places like Cherry Point in Craven County are married, and spouses of military personnel often are educated and bring job skills of their own. A negative for those who want to work is that there is a shortage of high-quality jobs around many military bases, with a preponderance of retail and lower-paying service sector jobs. Economic developers in places like Jacksonville, N.C., where retail trade produces a fifth of all jobs, are working hard to change that picture. In addition, the 2005 N.C. General Assembly passed legislation requiring state occupational boards to streamline licensing requirements for military spouses who wish to practice a trade or profession that requires a license (teachers or health care workers are excluded from this provision). The law also provides in-state tuition at North Carolina's public universities and community colleges for military personnel and their dependents.

- 8. Rates of Crime, Domestic Violence, and Child Abuse: Officials in military towns say they are victims of a long-standing stereotype that no longer holds—that of high crime rates, red light districts, and public drunkenness. State crime statistics support the contention that crime rates are no higher, and in some cases lower, than in counties with similar demographics statewide. Examining the data, high crime rates seem to be more of a factor of urbanization than of presence of a military installation. Two areas where crime rates were found to be elevated in military counties were in domestic violence and in child abuse fatalities. The U.S. Army Surgeon General found a clustering of five domestic violence homicides in a 43-day period in 2002 to be statistically significant. A study by Marcia Herman-Giddens of the University of North Carolina School of Public Health found child abuse homicides to be elevated around Camp Lejeune Marine Base and Fort Bragg Army Base. While questioning some of the research methods in the Herman-Giddens study, Fort Bragg officials say they have implemented a number of programs to ease the stress of military deployments on soldiers and their families.
- 9. Race Relations and the Military: The city of Jacksonville, home of Camp Lejeune, is hailed as the least segregated city with a population above 25,000 in the nation. Fort Bragg integrated its base schools well before the federal government required it in Brown versus Board of Education. There have been racially motivated hate crimes in military communities, including the December 1995 slayings on the streets of Fayetteville of two African-Americans by three white Army privates based at Fort Bragg who subscribed to neo-Nazi beliefs. However, North Carolina's military counties have suffered little by way of hate crimes in recent years. Of 77 hate crimes registered in North Carolina in 2003, none were in military counties. Two of 62 such crimes occurred in military counties in 2002.
- 10. Presence of Drinking Establishments, Pawn Shops, and Tattoo Parlors: Does a heavy military presence encourage such retail trade as bars, pawn shops, and tattoo parlors? According to the Center's research, the picture is mixed. One measure is the average number of residents per drinking establishments. The lower the number of residents per drinking establishment, the higher the number of drinking establishments on a per capita basis. This is a means of adjusting for differences in population size among the counties. With 741 residents per drinking establishment, the data showed slightly fewer residents per bar for military counties versus non-military counties. That compares to 764 residents per drinking establishment for the 41 eastern counties and 1,019 for the state as a whole. In addition, some less populated military counties had relatively high numbers of pawn shops compared to counties without a military base, and Onslow County, home of Camp Lejeune and New River Air Station, had a greater concentration of tattoo artists per capita than any county in the state. However, most military counties did not have a disproportionate number of tattoo parlors or pawn shops when population size was taken into account.

11. Environmental Impact: Military installations face a range of environmental issues, chief among them being potential soil and water contamination and noise from low-flying aircraft. Water quality has been a concern at some military bases, including Camp Lejeune, where volatile organic compounds were found in several drinking water wells, according to the Agency for Toxic Substances and Disease Registry (ATSDR), a federal public health agency of the U.S. Department of Health and Human Services. The contamination was linked to leaking underground storage tanks, chemical spills, and drum disposal, as well as solvents from a dry cleaning operation on base.

Several studies done by the ATSDR have suggested a potential link between volatile organic compound contamination and birth defects among families living on the base. In 2001, the Pentagon was fined \$312,000 and required to spend almost \$1 million to clean up two drinking water contaminants, lead and trihalomethanes, found in the drinking water supplied to Fort Bragg. Unexploded ammunition or weapons at bombing ranges is also a cause for concern. However, the military has begun to address environmental issues more aggressively in recent years, strengthening its record on such issues as protecting water quality, wastewater treatment, and protecting wildlife.

A further environmental concern is noise pollution. The Eastern Carolina Joint Use Land Study produced in November 2002 by government officials in the area surrounding Craven and Carteret counties urged that cooperative planning eliminate development in strategic areas near the bases to reduce land use conflicts. Such conflicts are at the heart of a Navy proposal to purchase or condemn for purchase more than 30,000 acres of land in Washington and Beaufort counties for an Outlying Landing Field for Super Hornet jets. The proposal has set up a row between the Navy and concerned citizens who want to preserve their rural solitude. Meanwhile, the Navy is attempting to escape the complaints of urban residents in urban Virginia Beach where the Super Hornets are based at Oceana Naval Air Station.

12. Air Space Restrictions: Further concerns revolve around expanding military airspace that has prevented the popular Outer Banks from being served by commercial airlines. The military's special-use airspace with varying levels of flight restrictions all but surrounds the Dare County airport. Airport officials say only a limited amount of unrestricted air space to the west of the airport is available for approach, and they worry that even that could be compromised if the Marine Corps receives permission for two new special-use zones it has requested from the Federal Aviation Administration. Tourism is the driving force of the Dare County economy, and local officials worry that ever-tightening military air space restrictions will discourage not only commercial flights but also amateur pilots who are intimidated by the prospects of flying through restricted, permission-only areas. Military officials counter that the airport authority exaggerates the impact of military training routes. Much of this airspace is available when not scheduled for use by the military. And, military officials say air traffic

controllers on military bases have added a safety element by making their services available to civilian use.

Thus, the military presence brings a bounty of economic impact in jobs and spin-off development. It brings a willing work force and produces a number of retirees who apparently like calling North Carolina home. The tax-exempt status of military property does not seem overly onerous, though it does take some high-quality real estate along the coast out of potential development. But the military brings a variety of impacts beyond economics. There is broad impact on the East, its way of life, and its future. The costs include noise, air space restrictions, and the opportunity cost of giving up for military use such resources as the pristine land along the Onslow County coast and potential residential or commercial property in Cumberland County. For example, in 2001, the Cumberland County tax office assigned a value of \$126.7 million to the military's 42,240 acres within the county. In addition, there is the commercial mix that comes with serving a large military population—heavy on lower-paying retail trade. Thus, the heavy military presence, though laden with benefits, comes at a price.

erryl Garner grew up on a small tobacco farm in Eastern North Carolina. For decades, his family struggled to make a living off the land, growing crops in the summer and timbering in the winter. As a young man in 1941, Garner's future appeared to hold only more of the same. But his prospects changed that year, when the U.S. Marine Corps began clearing 8,000 acres of swamps, farms, and timberland near Garner's home to begin building Cherry Point Air Station.

That, he says, has made all the difference for him and for his region of North Carolina. After a four-year apprentice-training program, Garner pursued a career as an aeronautical design engineer. He retired from Cherry Point in 1992 after more than 40 years of service and now presides as mayor of Newport, his Carteret County hometown. Today, approximately 9,000 Marines and sailors are stationed at Cherry Point (See Table 1, p. 71). Another 5,771 civilians also are on its payroll, earning average salaries of \$50,000 a year.

Meanwhile, in Washington County, Jerry and Myra Beasley are fighting the prospect of a forced sale of their farm to the military. The couple's 850-acre farm is included in the 30,000 acres the Navy wants to acquire for its outlying landing field (OLF) to train pilots in takeoffs and landing. The project would require the Beasleys and dozens of others to give up their land, yet it would bring only a handful

of jobs to the county because the jets it will serve are based 90 miles to the south as the crow flies at Cherry Point or at Oceana, Virginia.

The project will bring lots of noise, which the Beasleys believe will disrupt the environment and discourage private development in what already is one of the poorest counties in the state. "Washington County is struggling now to meet its expenses," Jerry Beasley says. Some in Washington County say they are hopeful that the OLF, if it comes, signals that the Navy will one day open a bigger facility and bring more jobs to the community. But Beasley's not interested: "I don't want my child growing up in a military town full of tattoo parlors and strip joints."

North Carolina has a long history of hospitality to the military. Its presence and economic impact has been seen by many as a blessing to the eastern region, which lags behind the rest of the state in income, education, and other important indicators. But for all the good it does, the military's large shadow also falls over communities in some not-so-positive ways.

As the U.S. Department of Defense embarked on another round of base realignment and closures, many citizens and government officials in North Carolina focused on ways to preserve the state's

Renée Elder is a free-lance writer and editor residing in Raleigh, N.C. role as a home base to some of the largest and most powerful military installations in the world. "We shouldn't look at the military economy as just something that belongs to Eastern North Carolina," says Lt. Gov. Beverly Perdue, who is spearheading state government efforts to strengthen its military position and recruit even more Department of Defense investments. "This is a statewide economy that just happens to be located in the east. It's just as important as the furniture industry and the textile industry.... We're trying to define North Carolina as America's military base, with huge land masses and ocean access. The whole country can benefit."

The base realignment and closure process, known as BRAC, began in December 2003 with the publication of draft selection criteria for closing or consolidating military bases according to updated needs of military branches. Initial recommendations for closure or consolidation were made in the spring of 2005. U.S. Defense Department officials have indicated that due to efficiency and technology improvements, there is as much as 25 percent excess capacity at the country's 425 military facilities.¹

The process caused fear and trembling across the state at the prospect of a major base closure, but the fears proved largely unfounded. The state will experience a net loss of 568 military positions out of nearly 116,000 and gain 420 civilian jobs (see Table 2, p. 72).2 Pope Air Force Base would be converted to Army use, and two reserve facilities will be shuttered, but otherwise the state comes out largely unscathed under the process. The base closing commission, headed by Anthony J. Principi, a former U.S. Veterans Affairs Secretary, softened the initial proposals, opting to leave at least some Air Force jobs at Pope while still shifting the base to Army control, and leaving intact the Army research office at Research Triangle Park, which had been proposed for closure.3 The commission also endorsed a recommendation to shift the U.S. Army Forces Command (FORSCOM) and U.S. Army Reserve Command units to Fort Bragg and move a Special Forces unit elsewhere. The BRAC commission report was delivered to the President on Sept. 8, 2005, and became law in mid-November.

Table 1. Major Military Installations in Eastern North Carolina and Affiliated Jobs

Ins	tallation	Date Established	Location I (County)	Military Positions	Civilian Jobs
1.	Fort Bragg	1918	Cumberland, Hoke, Harnett, Moore	52,000	8,500
2.	Pope Air Force Base	1919	Cumberland, Hoke, Harnett	6,543	774
3.	Camp Lejeune and Air Station New River	1941	Onslow	43,100	4,800
4.	Marine Corps Air Station Cherry Point	1954	Craven	8,987	5,771
5.	Seymour Johnson Air Force Base	1942	Wayne	4,298	542
6.	Coast Guard Support Center	1940	Pasquotank	900	575
7.	Sunny Point Military Ocean Termin	al 1955	Brunswick	12	230
	Total Affiliated Jobs:			115,840	21,192

Source: N.C. Lieutenant Governor's Office, www.ltgov.nc.us/BRACLinks.asp.

Realignment decisions ultimately were to be based on facilities' usefulness for future military operations and "factors such as potential costs and savings, community support, and environmental considerations," according to the U.S. Department of Defense.⁴

Smaller bases were considered somewhat more vulnerable than the larger installations, says Jim Davis, economic development director for Craven County. "Obviously, the Pentagon is not going anywhere or probably Fort Bragg, but there's not anybody exempt on the list," Davis says.

But with a net loss estimated at only 568 military positions, and 420 civilian jobs gained in the BRAC process, supporters of a strong military presence in North Carolina wound up savoring a victory. Retired Gen. Paul Dordal, who headed up BRAC efforts for Fort Bragg and Pope Air Force Base in Fayetteville, says moving FORSCOM from Fort MacPherson, Georgia, to Fort Bragg was particularly important. That move offsets much of the loss of

personnel from realignment of Pope Air Force Base, but the greater gain is the military contractors who may relocate to the area to deal with the military command. "The community leaders representing communities around Fort McPherson testified at the BRAC hearings that the economic impact of losing FORSCOM there would be over \$700 million annually," says Dordal. "We may not receive all of the same economic benefits with FORSCOM that they are losing. However, there should be a number of defense contractors that deal with FORSCOM on a regular basis who will want to move to stay close to FORSCOM. FORSCOM is a four-star headquarters that is in charge of training, equipping, and preparing the Army for combat, and the contractors will follow the headquarters to Fort Bragg."

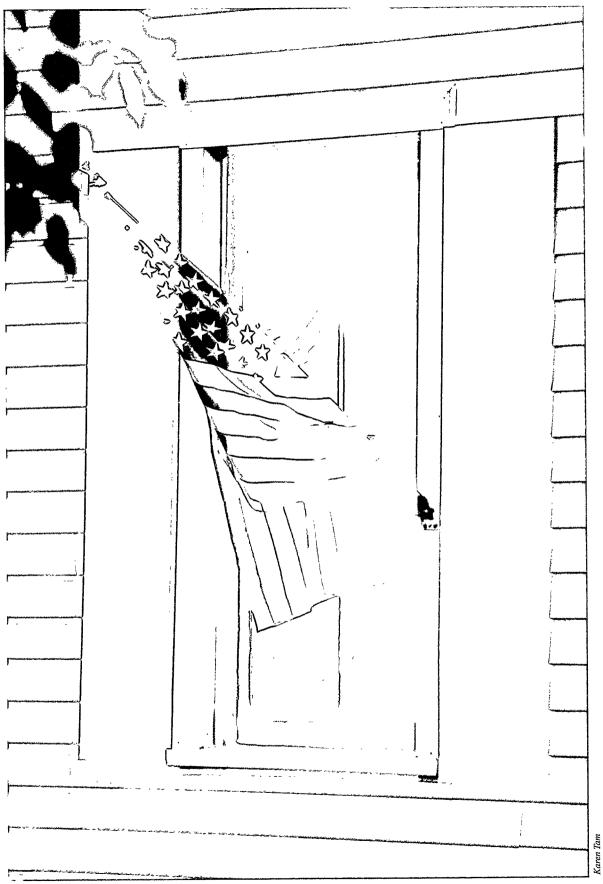
But the apparent victory in surviving BRAC was not universally applauded. "Lieutenant Governor Perdue did an excellent job of protecting our bases," says Cyrus B. King, Sr., a World War II veteran residing in Raleigh, N.C., and a long-time critic of

Table 2. Base Reduction and Closure Impact on Eastern North Carolina and North Carolina Statewide

	Proposed Changes:				
Installation and County Location	Military Positions	Civilian Jobs			
Fort Bragg	4,078	247			
Cumberland, Hoke, Harnett, Moore					
Pope Air Force Base	(4,821)	808			
Cumberland, Hoke, Harnett					
Camp Lejeune & Air Station New River	(182)	(1)			
Onslow					
Marine Corps Air Station Cherry Point	(48)	(656)			
Craven					
Seymour Johnson Air Force Base	345	17			
Wayne					
Net Gain (Loss) at Military Bases:	(532)	415			
Navy Reserve Center (Buncombe)	(7)	0			
Niven U.S. Army Reserve Center (Stanly)	(34)	5			
Army Research Office (Durham)	(1)	0			
Charlotte/Douglas International Airport (Mecklenburg)	6	0			
Total Gain (Loss) in N.C.:	(568)	420			

Source: U.S. Department of Defense: Appendix C, BRAC 2005 Closure and Realignment Impacts by State at www.defenselink.mil/brac.

() Parentheses indicate job cuts



Key Dates in the Base Realignment and Closure Process

Dec. 31, 2003: Draft selection criteria published for most recent round of base realignment and closure process (BRAC), with 30-day period for public comment

Feb. 16, 2004: Final selection criteria published

May 16, 2005: No later than this date, the U.S. Secretary of Defense must publish in the *Congressional Record* and send to Congressional defense committees his recommendations for base realignment or closure.

July 1, 2005: Deadline for U.S. Comptroller General to submit a report to Congressional defense committees containing a detailed analysis of the Secretary's recommendations and selection process for base realignment and closure.

Sept. 8, 2005: Deadline for BRAC Commission to transmit to the President its findings and recommendations based on review and analysis of the Secretary's recommendations.

Sept. 23, 2005: Deadline for the President of the United States to approve or disapprove of BRAC Commission recommendations and transmit to the BRAC Commission and to Congress a report containing his decision. If the President approves, the recommendations become binding 45 days after he submits them to Congress.

Oct. 20, 2005: The deadline for the Commission to submit revised recommendations to the President if the President disapproves the BRAC Commission's initial recommendations.

Nov. 7, 2005: Deadline by which the President must approve or disapprove revised recommendations. The process ends unless the President transmits to Congress approval of the revised recommendations by this date. If the President approves, the recommendations become binding within 45 days unless Congress enacts a joint resolution of disapproval.

April 15, 2006: BRAC Commission terminates

Final Outcome: President Bush approved the BRAC Commission recommendations on Sept. 15, ahead of the Sept. 23 deadline. Congress did not pass a joint resolution of disapproval, and the recommendations took effect Nov. 9, 2005.

Source: U.S. Department of Defense

North Carolina's dependence on the military. "My concern, and I have shared this with her, is that the struggle by our state as well as others has little to do with the needs of the military or the defense of the nation. Base protection has to do with jobs. Eastern North Carolina is overly dependent on military spending. We are 'base dependent.' And of course, every congressperson, every senator, every mayor, etc. strives to keep bases in their district, state, or region, regardless of need."

In examining the role of the military in North Carolina, it's clear that the military pumps billions into North Carolina's economy each year. But there also is evidence that there are some negative consequences, as well. For example, while a military base brings jobs, paychecks, and new residents, it may also require communities to spend money on new schools and recreational facilities, new roads, and other infrastructure while the community can't realize property tax income on land taken over by the federal government because of its tax-exempt status.

Jobs for civilians and military employees can help stabilize the economy and pour money into local businesses, small and large. Yet while retail stores, services and restaurants flourish, investment in industry or other important business sectors may lag behind. Since World War II, North Carolinians have largely acted on the presumption that cash infusions from civilian jobs and military payroll into local communities more than make up for any added costs—especially considering the relative scarcity of other economic activities in the eastern region.

State Sen. Tony Rand (D-Cumberland) acknowledges there are some challenges presented by military bases to the communities in which they are located. For example, he points out that federal impact aid, intended to offset local school costs for serving military families, doesn't always cover the true expense. During fiscal year 2005, for example,

Patriotism is easy to understand in America; it means looking out for yourself by looking out for your country.

 the U.S. Education Department's impact aid program contributed \$5.8 million to the Cumberland County school system's budget of \$362 million, yet more than 16,000—or 32 percent—of the 52,000 students were federally connected, most of them through their parents' uniformed military service.⁵ That amounts to a federal contribution of only \$362.50 per student.

But the positive side of the balance sheet is much stronger, Rand believes. "As in bringing any big industry into your community, there's always a trade off," he says. "And not everything you hear about the negative side is true."

1. The Economic Impact of Military Bases in North Carolina

A study by economists at East Carolina University, completed in 2004, estimates that the military brings in \$18.1 billion to the state economy each year, some \$13 billion of which stays in Eastern North Carolina.⁶ That study estimates that Fort Bragg Army Base and Pope Air Force Base, both in Cumberland County, generate \$4.7 billion in economic activity for North Carolina each year. The study indicates that Cherry Point Marine Corps Air Station and the Naval Air Depot in Craven County create \$1.6 billion in income for the state; Camp Lejeune Marine Corps base and New River Air Station in Onslow County generate some \$5.2 billion; and Seymour Johnson Air Force Base in Wayne County brings in another \$900 million annually.

In addition, the Sunny Point Marine Terminal in Brunswick County and the National Guard and Reserve account for an estimated \$2.8 billion in payroll and other income, the ECU study says. Richard Brockett, associate director of ECU's Regional Development Institute and a primary author of the military impact study, says these figures are drawn from a computer model using actual military expenditures along with "multiplier" estimates of how those dollars travel throughout the community to create additional wealth. The multiplier is not one number but varies based on the type of expenditure as well as on the industries and economic sectors present in the community, Brockett says. The numbers include \$3.9 billion in actual base payrolls, plus operational and capital construction dollars and business contracts. These latter numbers are difficult to extract in order to determine actual dollars and remove the multipliers from the model used to create the total estimate of economic impact, says Brockett. He says multipliers used in the model ranged from less than two for payroll dollars in smaller markets to more than three for contract dollars. On average, Brockett estimates the multiplier at two statewide for payroll and retirement dollars. "Since these dollars make up a significant portion of the total dollars we looked at, it could be the prevailing multiplier that is referred to for discussion purposes."

The use of multipliers in estimating economic impact is a common practice. Bruce Gombar, director of economic development for Onslow County, home to Camp Lejeune, says estimates of how much a dollar invested in a local economy can circulate in the local economy can range as high as three to seven times. Because multipliers can be used to exaggerate economic impact and because applying multipliers to real spending is an inexact science at best, the N.C. Center for Public Policy Research recommended in a previous study of the North Carolina motion picture industry that use of a multiplier be disclosed and explained, that industry-specific multipliers be used, and that efforts to publicize economic impact also include estimates of real spending.⁷

The Center also raised questions about multipliers in its study of the economic impact of professional sports as an economic development tool.⁸ John Connaughton, an economist at the University of North Carolina at Charlotte, had estimated the impact of the National Basketball Association's Charlotte Hornets, now in New Orleans, on the Charlotte-area economy, as well as the potential impact of a National Football League franchise. Connaughton said a rough rule is to figure \$2 in economic impact for every \$1 in actual spending. "You've got to be real careful about whether you're recycling dollars that already exist or bringing new dollars in," said Connaughton.9

Estimates of the economic impact of the military have varied wildly in recent years. In 1995, East Carolina University's Regional Development Institute estimated the impact at \$2 billion. The N.C. Advisory Committee on Military Affairs put the figure at \$5 billion. Now, ECU's Regional Development Institute estimates an \$18 billion economic impact, with 77 of North Carolina's 100 counties benefitting from at least one military contract.

The most recent \$18 billion impact estimate did not include money generated through the U.S. Coast Guard Support Center in Elizabeth City, or any income accrued by North Carolinians working



I hear people talking bad
about the way they have to
live here in this country

Harping on the wars we fight
and griping about the way
things ought to be.

I don't mind them switching
sides and standing up for
things they believe in

But when they're running down
our country man they're walking
on the fighting side of me....

on military bases or on military contracts in other states.

Neither does the study include figures from the cost side of the ledger in doing big business with the military. "Those impacts are not included," Brockett says.

"This particular request from the governor's office didn't ask us to look at the expenditures that had to be made to accommodate the population of the military."

So, how do the costs and benefits really stack up?

The economic benefits outlined in the ECU study accrue primarily to the region that needs them most, Eastern North Carolina, which has long struggled to catch up with the rest of the state economically. Even today, with military income flowing into the 41-county eastern region, this region lags behind on a number of important economic indicators. For example, per capita household income stands nearly 20 percent below that of the rest of the state, poverty rates by county average nearly 4 percent higher, and county unemployment rates consistently run, on average, slightly higher than the state as a whole.10 (See Tables 3 and 4. See also "Eastern North Carolina at Work: What Are the Region's Economic Engines?" pp. 8-10, for county-by-county jobless rates and other economic and social indicators for the region.)

ECU's Brockett traces some of the region's problems to its historic ties with agriculture, which places a higher value on hard work than on lengthy years of education.

"Because of the rural agricultural base, education was not a cause that was advanced early on," Brockett says. "Of course, time and history have changed that, but Eastern North Carolina was not in the right lane to begin with ... and economies tend to stay in the lane that they are in."

Along with tobacco and cotton, textile production and other manufacturing have been an important means of income for residents in the East. Many of those traditional industries are now in decline. The opening of Camp Bragg—now known as Fort Bragg—near Fayetteville in 1918 set the pattern for another kind of industry in the region. Today, the state's military presence is concentrated largely in the East and includes 115,840 military personnel, along with nearly 37,000 Reserve and National Guard forces. 11 Sen. John Kerr (D-Wayne), who represents the legislative district containing Seymour Johnson Air Force Base, says the military has taken on increased importance with the decline of tobacco, long the economic life-blood of the East. "Without the military, we'd have nothing," says Kerr. "Everybody would have to commute to Raleigh or Charlotte."

Major installations include:

 Fort Bragg. Fort Bragg is the world's largest airborne facility and one of the U.S. Army's largest military installations. Originally established in 1918 as Camp Bragg to provide a facility for field artillery practice in preparation for World War I, the base employs 52,000 military

...They're walking on the
fighting side of me—
Running down a way of life our
fighting men have fought
and died to keep—
If you don't love it leave it, let
this song that I'm singing
be a warning—
When you're running down our
country hoss you're walking
on the fighting side of me.
—MERLE HAGGARD
"THE FIGHTIN' SIDE OF ME"

Table 3. Comparing Selected Demographics of North Carolina, Eastern North Carolina, and Counties with Military Bases

	Median Household Income	Average % of Population at or Below Poverty	Average % of Population Unemployed	Average % Unaffordable Housing
All 100 N.C. Counties	\$39,184	12.3%	5.4%	18.6%
41 Eastern Counties	\$32,163	16.0	5.6	20.6
33 Eastern Counties, without Base Counties	\$31,903	17.2	5.7	20.5
8 Military Base Counties	\$34,718	14.5	5.0	21.3

Source: North Carolina Department of Commerce, Economic Development Information System at http://cmedis.commerce.state.nc.us/countyprofiles/#. Data are taken from the report for the second quarter of 2004. Unaffordable housing percentages from the U.S. Census Bureau, 2000. Military base counties are Brunswick, Craven, Cumberland, Harnett, Hoke, Onslow, Pasquotank, and Wayne.

and 8,500 civilian personnel. Fort Bragg's military housing area reaches into nine counties: Bladen, Cumberland, Harnett, Hoke, Lee, Moore, Robeson, Sampson, and Wake.

- *Pope Air Force Base.* Established in 1919 adjacent to Fort Bragg in Cumberland and Hoke counties, Pope is home to the 43rd Airlift Wing and 23rd Fighter Group and has 6,543 military personnel and 774 civilian workers on base. While Pope is the North Carolina military installation most affected by the federal government's 2005 Base Closure and Realignment recommendations, the number of personnel at the base would change little. Still, they would be wearing Army green rather than Air Force blue as the base would be converted to Army use. That's a significant change.
- The U.S. Marine Corps Camp Lejeune. Camp Lejeune was established in 1941 in Onslow County to provide an East Coast amphibious training facility in preparation for World War II. Adjacent to the base lies the Marine Corps' New River Air Station. Camp Lejeune and the air station are home to 43,100 Marines and sailors, including the II Marine Expeditionary Force, the 2d Marine Division, and the 2d Force Service Support Group. About 4,800 civilian employees work at these facilities. Three addi-

tional battalions made up of 3,800 Marines will be relocated to the base by December 2006.

- Marine Corps Air Station Cherry Point.

 Construction began on the facility that would become Cherry Point Air Station just before the Japanese attacked Pearl Harbor in 1941.

 Commissioned as Cunningham Field in 1942, Cherry Point's mission was to train units and individuals for service in the Pacific Theater. The air station also carried out anti-submarine missions along the East Coast. Renamed Cherry Point in 1954, this Craven County installation serves as home base to 8,987 military personnel and employs 5,771 civilians.
- Seymour Johnson Air Force Base. Established as a training facility for World War II, Seymour Johnson Air Force Base has 4,298 active duty military and 542 civilian employees. Decommissioned in 1946, the base was reactivated under pressure from community leaders in 1956. The base now is home to the 4th Fighter Wing, including two combat squadrons and two squadrons responsible for training all Air Force F-15E air crews.
- Coast Guard Command Units at Elizabeth City.
 Established in Pasquotank County in 1940 as a sea plane base, there are five command units

with 900 active duty members and 575 civilian employees associated with this Coast Guard installation today. The units are Support Center Elizabeth City, Air Station Elizabeth City, Aircraft Repair and Supply Center, Aviation Technical Training Center, and the National Strike Force Coordination Center. Unique among the state's major military installations, the Coast Guard facilities are affiliated with the U.S. Department of Homeland Security rather than the Department of Defense. Thus, they were not subject to the BRAC process.

• Sunny Point Military Ocean Terminal. Opened in 1955 in Brunswick County, Sunny Point Military Ocean Terminal is a key East Coast shipping point for the Department of Defense. Sunny Point personnel include about a dozen soldiers, some 230 civilians, and several U.S. Army Reserve Units.

The numbers outlined above total 115,840 military jobs and 21,192 civilian jobs at these seven facilities alone, and economic impact models put the number of jobs supported by the military much higher. 12 "It's a huge economic engine," Senator Rand says. "And, that huge disposable income makes for a robust consumer economy."

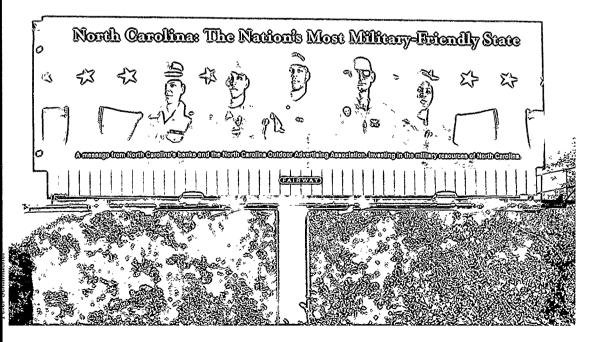
Indeed, when eight counties with major military installations are extracted from the eastern region as a whole and considered as a separate unit, the

Table 4. Population Growth, 2000 to 2004.

	% Population Growth
N.C. Statewide	6.1%
41 Eastern Counties	4.5
33 Eastern Counties, without Base Counties	3.9
8 Military Base Counties	6.8

Source: Population Division, U.S. Census Bureau, Table 1: Estimates of the Population for Counties of North Carolina: April 1, 2000 to July 1, 2004.

economic indicators show substantial improvement (see Table 3, p. 78). Median household income for the counties of Brunswick, Craven, Cumberland, Harnett, Hoke, Onslow, Pasquotank, and Wayne rises from \$32,163 for the East as a whole to \$34,718 annually for the military base counties, poverty rates fall from a county average of 16 percent for the East to a county average of 14.54 percent for the military



counties, and unemployment drops to 5.0 percent, below the East's unemployment rate of 5.6 percent. These numbers support the argument that the military has a beneficial impact on the region's economy, regardless of any multiplier effect.

2. State's Share of Defense Contracts

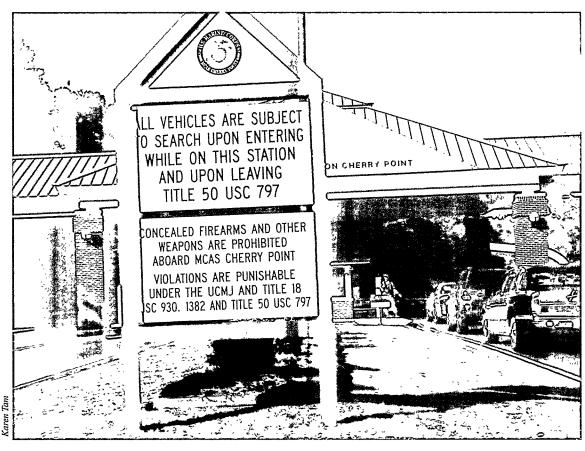
ttracting related industries is one way North All Carolina communities try to maximize their military connections. Another way the state is seeking to make the most of its friendly military relationships is by obtaining U.S. Department of Defense contracts for home-state businesses. This can benefit military host communities, but its effects can be more broad-reaching. So far, North Carolina has not been favored with its fair share of Department of Defense contracts, says Scott Dorney, director of the new North Carolina Military Business Center. North Carolina ranks fourth among states in military presence, but drops to 23rd in amount of defense contracts the state receives, Dorney says. "Of over \$200 billion in DoD procurement last year, less than 1 percent came to North Carolina," Dorney says.

Dorney would like to see that figure greatly increased, and North Carolina is seeing improvement. A report from the Military Business Center shows a 50 percent increase in military contracts awarded to businesses in the state between 2001 and 2004, but during the same period the amount of contracts awarded nationally rose by 68 percent to \$230 billion. States that did significantly better than North Carolina included California, Virginia, Texas, Connecticut, and Maryland. California, Virginia, and Texas each have more military personnel stationed in their states than does North Carolina. 13

North Carolina didn't even win the majority of the contracts for local base work. Of the \$2.4 billion in contracts awarded by the state's military bases, only \$460 million went to North Carolina firms. ¹⁴ "They had \$230 million in cut-and-sew contracts that went out for new Army uniforms, and North Carolina didn't get any of it," Dorney says.

Dorney believes North Carolina businesses should put a sharp focus on military procurement and make it a priority to bring home a larger share of the pie.

"It's definitely realistic," Dorney says. "There are sectors in defense technologies and textiles



NORTH CAROLINA INSIGHT

where we have high densities of businesses in North Carolina that can do that work... but we don't compete for the business."

Existing businesses may be good candidates for such contracts, but the Military Business Center also is interested in bringing new companies into North Carolina to satisfy the military's demands. "We're looking at the needs of the military to try to find out what we can fill," says Jim Davis, Craven County economic development director. About a third of the business prospects looking at Craven County have some military connection, he adds.

Pasquotank County, home of the Elizabeth City U.S. Coast Guard base, will benefit from a \$20 million investment this year from St. Louis-based defense contractor TAMSCO. The city and county offered more than \$1 million in public grant money to run new sewer lines to the Elizabeth City Regional Airport, where the maker of high-tech electronic equipment is building a new aircraft maintenance hangar. TAMSCO has promised to bring 100 new jobs into northeastern North Carolina, with annual salaries ranging from \$37,000 to \$100,000.15

Angelou Economics, the consulting firm that worked with the North Carolina Military Business Center to identify future business opportunities with the military, in June 2005 released a "gap analysis" highlighting the difference in the number of military personnel in the state and its military sales. ¹⁶ The analysis recommends a stronger marketing effort by the N.C. Department of Commerce to drum up more military business. This effort would include enhancing information resources for those who would do business with the military, identifying defense as a target industry for recruitment, creating an enterprise team that recruits defense-related industries, and tailoring incentives specifically to attract new defense companies.

Dorney says the goal of these efforts would be to increase the state's share of military procurement from just under 1 percent to 1.5 percent within five years, a goal he says is do-able based on efforts by other states such as Kentucky. "That would create 30,000 new jobs and \$150 million in state and local tax revenue," he says.

In addition to opportunities in military procurement, North Carolina has been the beneficiary of the military's university research budget, though little of this accrues to Eastern North Carolina. In fiscal year 2003, \$1.6 billion was budgeted for university research nationally, according to the U.S. Office of Management and Budget. The Army Research Office located at Research Triangle Park has been the hub for much of this research carried out at Triangle area

"Every gun that is made, every warship launched, every rocket fired, signifies, in the final sense, a theft from those who hunger and are not fed, those who are cold and are not clothed.... This world in arms is not spending money alone. It is spending the sweat of its laborers, the genius of its scientists, the hopes of its children."

——DWIGHT D. EISENHOWER
EISENHOWER, BY STEPHEN E. AMBROSE

universities. The office was recommended for closing under the base realignment and closure process (BRAC), but the base closing commission decided against this recommendation, sparing one military job and 113 civilian jobs, and preserving the local link between area universities and the Department of Defense.

3. Impact on Ports

North Carolina's two ports, at Wilmington and Morehead City, are hoping to play an increasingly important role in the movement of military goods and troops, according to Susan Clizbe, communications manager for the North Carolina State Ports Authority.

Partially due to increased use by the military, business at the two ports was up 24.5 percent in fiscal year 2004 and promised to increase again by at least as much in 2005.

Since the beginning of Operation Iraqi Freedom, the port at Morehead City has shipped 22,000 short tons (44 million pounds) of cargo for the military on 53 vessels, producing \$562,000 in revenue. Some 175,000 short tons have been shipped from the state port at Wilmington on 22 vessels, producing some \$3 million in revenue. State officials say an improvement project at Wilmington, which deepened its shipping channel to 42 feet allowing for 15 percent greater cargo capacity, will enable the state to provide an even greater level of service to the military. The state port at Morehead City already had one of the deepest shipping channels on the East Coast, at 45 feet.

Besides the increased revenue, State Ports Authority CEO Tom Eagar believes the ports serve a vital strategic role in keeping the military supplied. "When we handle cargo for our armed forces, the ports make an important contribution to North Carolina's status as the nation's most military friendly state," says Eagar. "Even more importantly, our state has three of only 15 strategic military ports in the country—Morehead City, Wilmington, and the Military Ocean Terminal at Sunny Point."

4. The Military's Impact of Bases on Sales Taxes and Property Taxes

The military's economic impact becomes evident during a drive through any of the military towns in Eastern North Carolina. Furniture stores, car lots, tanning salons, self-storage facilities, and fast-food restaurants line the highways and cluster around base entrances. Store owners say sales fall off during periods of big military deployments such as Kuwait, Afghanistan, and Iraq, but bounce back quickly when the service men and women return home ready to spend their hard-earned pay.

During the first Gulf War fought by the U.S. against Iraq in Kuwait in 1991, for example, more than a third of military families left Jacksonville and Onslow County. That number has been cut in half for the recent conflict, with local officials crediting community efforts such as Project CARE, a support system developed for military spouses to encourage them to stay in town while their husband or wife is deployed and help keep the local economy

I looked at him in uniform,
so young, so tall, so proud.
With hair cut short and eyes alert,
he'd stand out in the crowd.
I thought how many men like him
had fallen through the years?
How many died on foreign soil?
How many mothers' tears?
How many pilots' planes shot down?
How many died at sea?
How many foxholes were soldiers
graves?
No, freedom is not free.

-Maj. Kelly Strong

"FREEDOM IS NOT FREE"

alive. Onslow's Project CARE (Community Action Readiness Effort) offers families help with a wide range of services, from auto repair to interpreter services to discounts at local stores. "We started Project CARE through the Chamber of Commerce to show support for the military in community," says Onslow County Manager Alvin Barrett. "During the most recent events in Iraq and Afghanistan, we haven't seen that big a dip. More folks have been staying once they see the support from the community."

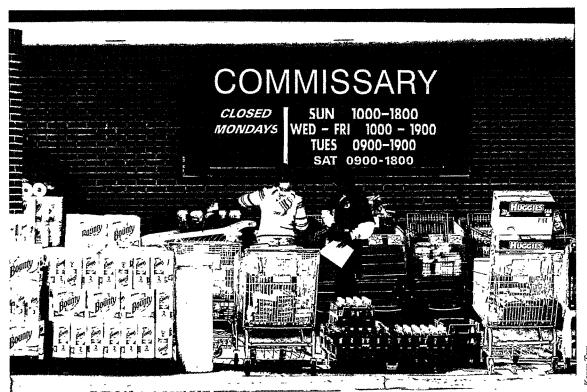
Sales tax revenues for the city of Jacksonville dipped from \$8.74 million in 2001 to \$7.85 million in 2002 as troops deployed in anticipation of the start of the Iraq war in March 2003. The deployment of U.S. troops began in December 2002, and Marines from Camp Lejeune were dispatched to the Gulf region in January 2003. However, it is not clear when military families became aware of the pending mobilization. Sales tax revenues in Jacksonville rose to \$8.71 million in 2003 and in 2004 reached \$11 million.

Havelock, population 22,000, saw declines in sales of real estate, automobiles, and furniture in the six months before the war with Iraq started in March 2003.¹⁷ Sales tax revenues slipped from \$844,764 in 2001 to \$801,570 in 2002. Sales tax revenue in 2004 was \$1.09 million. Similarly, the city of Fayetteville experienced a drop in sales tax revenues in 2002—down from \$16.1 million in 2001 to \$15.3 million in 2002. Sales rebounded in 2003, with revenues climbing to \$16.9 million, and revenues reached \$20.7 million in 2004.

While deployments can be a challenge for owners and operators of small businesses, wage and hour workers also find that military driven economies tend to offer a disproportionate number of retail, restaurant, and other lower-paying jobs. "In those particular areas—in the Cumberlands, Cravens, and Onslows of Eastern North Carolina—the economic barometer is affected by the growth or contraction of the military," Brockett says. "There isn't, in some of those cases, a great deal of economic diversity to withstand what might happen if the military bases packed up and moved out."

But that's not too different from any community where a single industry dominates, he adds.

In 2004 in Onslow County, home of Camp Lejeune, retail trades made up a full fifth of all jobs, or 20.6 percent.¹⁸ Those jobs paid an average of \$18,876 annually, just above the federal poverty level of \$18,750 for a family of four. "Like any large business entity in an area, the more dependent they are on it, the more it's going to reverberate throughout the entire economy, whether it's retail,



Karen 1a

real estate, or job opportunities," Brockett says. Statewide figures show retail employment averaging 11.6 percent of jobs, with weekly retail wages averaging \$21,736, according to N.C. Department of Commerce figures. The highest paying jobs in the state—with an average annual salary of \$63,596—fall into the category of "management of companies and enterprises" and make up 1.7 percent of all employment in North Carolina. Onslow County only reported 247 management positions in 2004, totaling 0.6 percent of all employment, with average paychecks of \$659 per week, or \$34,268 annually.

Gombar, Onslow County's economic development director, says having a military base in his community is a "tremendous asset." Rising pay for soldiers, along with the tendency by many to live off base and purchase homes, fuels the local civilian economy, Gombar says. "Today, the vast majority of our Marines have automobiles, so they have more mobility and are not as tied to the base as they used to be," he says.

Per capita property tax data from the North Carolina Department of State Treasurer show that residents of counties with a major military presence do not carry an outsized burden relative to non-military counties in the East. Indeed, Onslow County's annual per capita property tax burden of \$254 is the lowest in the region. Wayne County, home of

Seymour Johnson Air Force Base, has seen a substantial per capita property tax increase, moving from \$217 per capita in 2000 to \$325 in 2004, but the county's tax burden remains lower than that of the East as a whole. Cumberland's per capita property tax burden reached \$409 in 2004, higher than the previous examples but still well below that of many counties in the East with no military presence. Thus, the vast acreage taken off the tax rolls by the military does not seem to have had an outsized impact on the property taxes of county residents.

That's not to say the heavy military presence has no impact on revenues. Federal land is, of course, not taxed. In Hoke County, the approximate 80,000 acres owned by the federal government represents about a third of the county's total acreage. Additionally, cars owned by soldiers who claim another state as their residence are not subject to local property taxes. Out-of-state residents also do not pay state income taxes.

5. Military Base Impact on Taxpayer-Financed Services

Because many military families live off base and contribute to the property tax base through home ownership or through their rental payments, it is difficult to gauge the total financial impact

on local governments that play host to a military community. "Today, 44 percent of all Marines are married, and 77 percent of those married folks live out in town [rather than on base]," says Gombar. Lejeune, home to about 43,000 Marines, has only about 4,400 quarters on site to serve married couples and families, Gombar says. "When the military comes into a community like this one, and new married couples come in, chances are they're going to be living out in town," Gombar says. "They're paying taxes like anybody would, and the local tax base goes up."

Along with educational services, military-related activities put additional demands on infrastructure and services such as highways, water and sewer, recreational facilities, and fire and police protection.

Rick Heicksen of the Fayetteville Metropolitan Planning Organization says the military contributes to projects that benefit both the community and base operations. For instance, the U.S. Department of the Army recently allocated \$12 million to help Cumberland County complete a \$16 million road project that will decrease the amount of throughtraffic on the base, Heicksen says.

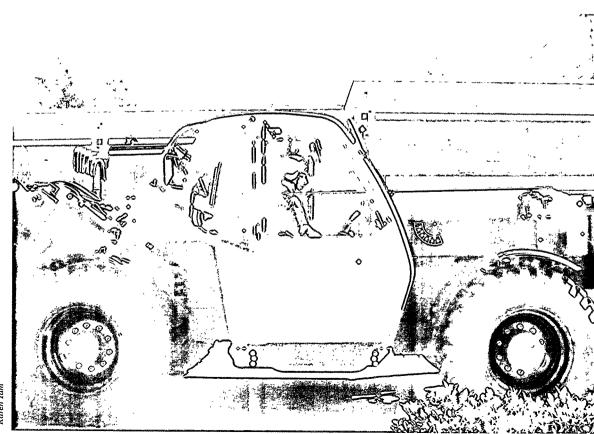
Federal land used for military bases, and thus not subject to property taxation by local govern-

ments, is a major issue for many local communities. Harnett County Commissioner Tim McNeil says some 25,000 acres of county land is locked away from taxation or other types of potential development by Fort Bragg. "We get no tax of any kind on that land," McNeil says. "We are a large county geographically, but poor because of our tax base."

In Onslow County, Camp Lejeune's 127,000 acres runs on either side of the New River, and includes 14 miles of beachfront property that is used for military training in amphibious operations. Nestled between Topsail Island and Emerald Isle, this part of the county would be bringing in large tax receipts for the county if it were available for development, county officials surmise. "I'm sure that some of the beach land would have developed and some of the riverfront," says Alvin Barrett, county manager for Onslow.

Rep. George Cleveland (R-Onslow) doesn't buy the argument that without the military, land could be put to higher use to the county's greater benefit. "That's an old argument that, if really looked at, would balance out with the military impact to the community," Cleveland says.

Lately, land outside the actual footprints of the bases has become an issue. The 2004 General



Karen Tam

Assembly authorized \$20 million in certificate of participation (COPS) bonds to help protect land surrounding bases from encroachment.¹⁹ That means state agencies such as the Clean Water Management Trust Fund can borrow to purchase land and use income generated by the fund's resources to pay back the bondholders. Rep. Rick Glazier (D-Cumberland) says cities and counties need to make sure that incompatible developments don't grow up next to the sensitive military installations. "It's an increasing concern-if we want to maintain our bases and their ability to grow, the land use immediately around it cannot withstand unlimited growth," he says. "Having compatible growth around the military will enable the bases to preserve their mission. It's a big issue that is working its way through county government as well as state government."

Examples of inappropriate development might include a residential subdivision adjacent to a paratrooper practice drop zone, he says. "A commercial piece or farm land would be preferable." Communities that have developed in ways that are incompatible with a base training mission may be in danger of losing favor with the military, Glazier adds. "If they lose the ability to perform their mission at that base, they might move on to another base."

One major vehicle for preserving land around military bases has been the Clean Water Management Trust Fund (CWMTF), established by the 1996 N.C. General Assembly to help local governments, state agencies, and conservation nonprofit groups finance projects to protect and restore water quality. According to a CWMTF fact sheet, the fund provides "a viable tool for protecting the state's military installations against encroachment from development where water quality protection can also be achieved. Recent projects include \$2.1 million in grants in 2003 to protect water quality on 3,000 acres adjacent to Camp Lejeune Marine Corps Base, and \$7.7 million expended in \$2004 to help preserve 6,740 acres near Seymour Johnson Air Force base and Camp Lejeune. The fund approved \$12.3 million in 2005 to protect Seymour Johnson, Camp Lejeune, Cherry Point, and Fort Bragg.

In many instances, the U.S. Department of Defense provides matching funds to aid in these acquisitions. "Our goal is to protect water quality," says Bill Holman, executive director of the Clean Water Management Trust Fund. "We are always looking for partners and opportunities to leverage our funds with other public and private funds." Where water quality is not an issue, other trust funds may partner with the military to acquire land.

As of August 2005, Governor Mike Easley says more than 15,700 acres of land within five miles of military bases had been protected through these efforts. In addition to the Clean Water Management Trust Fund, funding for these initiatives has come from the state's Natural Heritage Trust Fund and Ecosystem Enhancement Trust Fund.

Impact on Growth and Housing

Harnett County contains about 25,000 acres of the 161,000 acres that comprise Fort Bragg, but so far the county has profited little from any commercial spin-off activities. Tim McNeil, county commissioner for an area in the western part of the county adjacent to Fort Bragg, says military families have been buying up homes and property in the county. Harnett County's population grew by 11.6 percent between 2000 and 2004, nearly twice the state average of 6.1 percent and well above average population growth for military counties of 6.8 percent. ²⁰ Non-military Eastern counties experienced a more subdued 3.9 percent gain in population for the same period.

Fort Bragg families are finding lower-cost housing in Harnett County, where only 20 percent of housing is rated "unaffordable" by the state based on a 2000 median household income of \$35,105. That's similar to the 20.6 percent of housing rated unaffordable for the East as a whole and below the average rating of 21.3 percent unaffordable for the eight military counties, but slightly higher than the 18.6 percent North Carolina average. In Cumberland County, 25.6 percent of housing was rated unaffordable for residents with a 2000 median household income of \$37,466. "They're predicting that the two townships on our end of the county will grow by another 40 percent over the next four years," McNeil says.

The influx of families is putting huge demands on the water, sewer, recreation, and education systems, McNeil says. Yet he thinks a decision by Fort Bragg to build even more housing in Harnett County could help offset that burden by attracting stores, gas stations, and other commercial businesses nearby. "I think it is going to have a positive impact because those numbers will help us get commercial growth in western Harnett County that we otherwise wouldn't have gotten," he says.

To the northeast in Pasquotank County, the presence of the U.S. Coast Guard may be pricing some local residents out of the market, says Ebere Oriaku, chairman of the economics department at Elizabeth City State University. "Many Coast Guard employees relocate here from places like Alaska or

California and want to buy a home and are willing to pay a higher rate," Oriaku says. "This makes the cost of housing high. Even rental property and apartments are higher than they should be. To meet the rising costs, some people in this area are being forced to go to Virginia and start looking for higher paying employment. Some have been forced to move." The per capita income for Pasquotank County in 2000 was \$30,444 and the percent of unaffordable housing stood at 26.4 percent.²¹

Constance Brothers, chair of the Dare County Airport Authority in Manteo, N.C., and a native of Elizabeth City has a differing perspective on the Coast Guard's impact ton the local housing market. "I cannot believe that the Coast Guard presence is driving up the cost of housing," says Brothers. "[T]here are only a few officers who make the big bucks compared to a lot of enlisted who don't."

Brothers adds that blue collar workers have been commuting to the shipyards of Virginia for decades because of superior pay and benefits and a scarcity of local jobs. This phenomenon is not related to housing costs or the Coast Guard presence, Brothers says. "By contrast, Elizabeth City has become an exurb for professionals from Virginia who come down for lower taxes and lower cost housing." This influx of Virginia "gentry" is the driver of recent increases in housing prices in Elizabeth City, Brothers says.

6. Military Base Impact on Public Schools

ocal public schools in military counties often struggle to meet the demands of a largely transient population of students. The U.S. Department of Education offers funds to assist school systems serving students living on untaxed federal land, such as military bases. Today, school systems across the state spend an average of \$6,615 per student per year from all sources (excluding the federal child nutrition program), while impact fees may amount to only a few hundred dollars per student at best. "The government's commitment to fund impact aid has been severely limited over time," says state Rep. Rick Glazier (D-Cumberland), whose district includes Cumberland County and Fort Bragg. "Now it doesn't come close to making up the gap that's caused by so much of the property being untaxable, due to it being a federal enclave."

In Cumberland County, about 4,400 students in kindergarten through grade nine attend one of the federally run schools on base at Fort Bragg. Another 16,000 federally connected students attend

the Cumberland County school system, which enrolls a total of almost 52,000 students. During fiscal year 2005, the federal government's impact aid program contributed \$5.8 million to the Cumberland County school system's current expeditures budget of \$299 million. The federal government uses a formula that takes into account the student's family connection to the government, whether the family lives on base, and the proportion of federally connected students within a school system to determine the amount of impact aid the school district receives (see "Federal Impact Aid: How the Program Works," p. 88, for more). Rep. Glazier says the high percentage of young families stationed at the military base places a huge burden on the school system, yet the nontaxable federal land takes away from revenues needed to provide those services.

As a Cumberland County school board member in 2001, Glazier testified before the North Carolina General Assembly's Impact of Military Bases on Public Services and Taxes Study Committee. "The county tax office, assuming a value of \$3,000 per acre, assigns an additional value of \$126.7 million for the post's 42,240 acres within Cumberland County," Glazier told the panel. Glazier also told legislators his county was missing out on sales tax revenue for approximately \$4.1 million in untaxed commissary sales that year at the military base.

Meanwhile, the military population brings some extraordinary challenges for educators, including a large percentage of non-English speaking students, students from families on the lower end of the military pay scales, and transient families who "cause the system to have to work harder to keep up," Glazier says.

He says nearly half the student population qualifies for free and reduced-price lunches, and in at least one elementary school in Cumberland County, 60 percent of the students who started the school year did not remain for the full academic year.

"Because of the low-wealth nature of a substantial portion of our population, in combination with the high percentage of children whose parents are in active military service, issues of transiency likewise abound in our system," Glazier told the committee.

Cumberland County also is known for its excellent special education programs. That has drawn a large number of military families with learning issues, Rep. Glazier says. School officials say 1,175 of the 7,409 students in the system with special education needs are from military families. Of the \$5.8 million the school district receives in federal impact aid, more than \$500,000 is awarded to help cover





On-base housing such as these homes at Marine Air Station Cherry Point is becoming less prevalent as more military personnel move off base.

the additional expenses of educating these children with special needs.

Other counties with nontaxable federal land also receive help from the federal government's impact fees. Statewide, that amount was \$12.8 million in fiscal year 2005, and six of the top 10 recipients have a major military presence (see Table 5, p. 90).²² Onslow County will receive \$2.27 million. Craven County, home of Cherry Point, gets \$2 million; Wayne County, home of Seymour Johnson Air Force Base, will receive about \$748,000; Hoke County, with about one-third of the county's total acreage part of Fort Bragg, will receive some \$220,000; and Harnett County, where 1,814 children from Fort Bragg attended public schools during the 2004-2005 school year, is slated to receive about \$122,000 from the federal government's impact aid program for 2005.23 Pasquotank County, with its relatively smaller Coast Guard operation, receives \$29,000, and Brunswick County, home of the Sunny Point shipping terminal, receives no impact aid, reflecting its small staff of only 12 military positions.

In the 2003–2004 school year, per pupil expenditures from all sources for all counties with a major military presence, with the exception of Brunswick, were below the statewide average of \$6,615, according to the N.C. Department of Public

Instruction. Brunswick spent \$7,198, 36th among the 100 counties; Pasquotank spent \$6,595, ranking 70th; Craven County spent some \$6,467, ranking 77th; Cumberland approximately \$6,250, ranking 90th; Hoke County spent \$6,218 per student, ranking 94th; Wayne County spent some \$6,070 per student, ranking 101st; Onslow approximately \$6,056, ranking 102nd; and Harnett \$5,942, for a ranking of 111th. However, it is important to note that these per student expenditures are from all sources, including state, local, and federal governments. The federal government pays more impact aid when families live on military property and thus are not paying property taxes, and increasing percentages of military personnel are living in the community rather than on base.

7. Impact of Military Spouses and Retirees on the Local Work Force

Bruce Gombar, director of economic development for Onslow County, says Camp Lejeune's military families offer a significant contribution to the civilian work force, an asset he likes to use when recruiting new industry. Many of the military men and women who retire or leave the service when their

-continues

Federal Impact Aid: How the Program Works

The federal Impact Aid law (Title VIII of the Elementary and Secondary Education Act of 1965) was designed to provide assistance to local school districts that have a high concentration of federally connected students, according to the Impact Aid Program Office in the U.S. Department of Education. These children by definition reside on Indian lands, military bases, low-rent housing properties, and other federal properties, or have parents in the uniformed services or parents employed on eligible federal properties. There are several types of impact aid, and the program uses a formula to determine how much aid a school system will receive. The types of aid spelled out in the law are as follows:

I. Payments for Federal Property (Section 8002)

To be eligible for Payment for Federal Property, a school district must show the following: that the federal Government has acquired land in its tax base, that this land is not historically federal land (it has been acquired since 1938), and that this land was valued at a minimum of 10 percent of the district's total property at the time it was acquired.

II. Basic Support Payments (Section 8003 (b))

Basic Support Payments require that a school district educate a minimum of 400 federally connected children, or that federally connected children make up a minimum of 3 percent of the district's average daily attendance. These payments are the majority of the total impact aid appropriations; in 2003, they represented 92 percent of the \$1.19 billion appropriated nationally.

For each school district that qualifies, a formula is applied to determine how much will be appropriated. The maximum amount that the school district could receive is determined, as well as what is referred to as the Learning Optimum Threshold, or the minimum amount on which the district could support the federally

connected children. With limited funding, this minimum amount becomes the starting point in determining how much funding school districts will receive. The formula takes into account such factors as the way these children are connected to the federal government and the proportion of these federally connected children to the total number of students in the district.

The formulas to determine the maximum funding and minimum needs vary for each category of children eligible for impact aid. The logic behind the law is that each category of children has a different impact on a school district. Thus, each category is given a different weight, as follows:

- A student residing on tax-exempt federal property within the district with a parent employed on federal property, on active duty, or an official of a foreign government, receives a weight of 1.00.
- A student residing on American Indian lands receives a weight of 1.25.
- A student residing on *taxable* property with a parent who is on active duty or is an official of a foreign government, receives a weight of .20.
- A student residing on taxable property with a parent who is employed on federal property receives a weight of .05. The district must show that there are at least 1,000 of these students in average daily attendance or that these students make up 10 percent of the total average daily attendance in order to qualify for this category of impact aid.

School revenues are derived largely from personal, residential, and commercial property taxes. Thus, students who reside on tax-exempt federal property are given more weight than students who live on taxable property yet have parents who are federally employed. As an example, Cumberland County Board of Education has nearly 16,255

students in its school district who are considered federally connected, yet under the weighted system, this number is the equivalent of some 3,075 students.

When the total number of weighted students is determined for each category of students in a qualifying school district, this number is then multiplied by the local contribution rate (or half of per pupil expenditures from all sources), which establishes the maximum the district could receive. This amount is then compared to the total amount allocated for the state in which the district is located. In North Carolina, \$12.8 million has been allocated for impact aid for 2005. The local contribution rate is \$3,919.50, which, when applied to Cumberland County's 3,075 weighted students, totals \$12.05 million. This amount is almost the entire amount available statewide, yet Cumberland County's school district is just one of 31 school districts in North Carolina that qualify for impact aid.

Thus, the minimum funding level comes into play, taking into account two percentages: (1) federally connected students as a percentage of the district's total student population, and (2) maximum impact aid funding as a percentage of total current expenditures for the district. The 16,255 federally connected students in Cumberland County make up 32.36 percent of the district's 50,229 total student population, and maximum funding of \$12.05 million would total 4.03 percent of the district's \$299 million current expenditures budget. These two percentages (32.36 + 4.03) are added together, and the total (36.39 percent) is applied to the maximum aid amount to arrive at a minimum, or floor-level amount of impact aid. Thus, Cumberland County would receive a minimum of \$4.39 million, or 36.39 percent of the maximum for the county of \$12.05 million.

The federal government then provides the minimum amount and any additional funding up to the maximum amount as appropriations will allow. For Cumberland County in 2005, the minimum amount would be \$4.39 million, the maximum amount would be \$12.05 million, but the

actual amount funded in Basic Support Payments is \$5.3 million.

III. Children With Disabilities Payments (Section 8003 (d)).

In addition to the total amount appropriated for federally connected children, impact aid is allotted to school districts where such children are eligible for services under the Individuals with Disabilities Act (IDEA). For the Cumberland County school district, about \$540,825 is appropriated for 1,175 students with disabilities, bringing the district's total impact aid funding to just over \$5.8 million.

IV. Construction Grants (Section 8007)

These grants are allocated to school districts with high percentages of federally connected children that live on American Indian lands or that are children of members of the uniformed services, and they help to pay for construction and repair of school buildings.

The federal government estimates that for impact aid in 2005, it will appropriate \$1.1 billion in Basic Support Payments, \$62 million for federal property, close to \$50 million for children with disabilities, and \$48 million for construction grants. Of the \$12.8 million allocated to North Carolina under these payments, 31 school districts in North Carolina will receive appropriations. Military counties in Eastern North Carolina account for six of the top 10 school district recipients, and these six school districts account for 87.3 percent of all impact aid dollars allocated for North Carolina (See Table 5).

-Katherine Dunn

Katherine Dunn, a 2005 intern at the North Carolina Center for Public Policy Research, is a student at Elon University.

Table 5. The Top 10 School Districts Receiving Federal Impact Aid in North Carolina and Amounts Allocated to Them

N.C. School District	Federal Impact Aid Funding in FY 2005
1. Cumberland County Board of Education	\$5,803,740
2. Onslow County Board of Education	\$2,273,177
3. Craven County Board of Education	\$2,005,482
4. Swain County Board of Education	\$985,836
5. Wayne County Public Schools	\$748,265
6. Graham County Schools	\$274,873
7. Hoke County Board of Education	\$220,459
8. Jackson County Schools	\$136,666
9. Harnett County Board of Education	\$122,483
10. Asheville City Schools	\$52,270

^{*} Military counties are indicated by italic type.
Source: United States Department of Education, Impact Aid Program. Recipient project payments by impact aid number for North Carolina in FY 2005.

tour of duty is up stay in Jacksonville or return to the area, says Gombar, who returned to Jacksonville as a retired Marine. He previously spent three years as chief of staff at Lejeune. "Every year, we have roughly 8,000 Marines and sailors who leave the service," he says. "These people are a proven commodity, highly trained people with a great work ethic. They understand the meaning of teamwork. Their skills and training are often cutting-edge. Retraining them into a civilian job requires much less work. Because of that, any employer would be proud to have them in their work force."

Attracting or keeping these residents is considered a coup by many economic developers because they tend to be older, with fewer children at home and create fewer demands on the city's schools, roads, recreational facilities, and other infrastructure.

"Military tend to retire in the last place they are assigned," says Hugh Overholt, a retired Army general, an attorney with the New Bern law firm of Ward and Smith, and a lobbyist for Allies for Cherry Point's Tomorrow, a group working to head off military reductions or closure. "We have a large veteran and retired community in and around our base."

At 13.4 percent, Craven County has a slightly larger proportion of retirement age residents than the statewide average of 12 percent. Some 17.2 percent of residents in neighboring Carteret County on the coast are 65 or older, according to the U.S. Bureau of the Census. Carteret also houses a substantial number of military personnel, both active duty and retired.

Mark Fagan, who heads the department of sociology and social work at Jacksonville State University in Alabama, has studied trends in military retirement. In 2003, Fagan says North Carolina ranked sixth among the states in military retirees receiving pay, with 74,459 retirees drawing \$106 million per month. "In 2003, there were 1.9 million military retirees in the United States," according to Fagan. "These military retirees have a guaranteed income and are younger than many other retirees. Officers typically retire at 46 and a typical enlisted serviceman or woman retires at 42. They will typically seek a new career."²⁴

With higher marriage rates in today's active duty population, military spouses also play an important role in the work force, says Craven County Economic Development Director Jim Davis. Base officials say married Marines make up 56 percent of the active duty force stationed at Cherry Point, and that represents a strong worker base for civilian employers, says Davis. "The spouses can work and help increase the family income, and the industries coming in near the base can benefit from that," says Davis during a drive through Havelock Industrial Park.

Davis says he uses this in his pitch to companies he hopes to recruit into the area. "We'd like to see more businesses related to base activity," Davis says. "We are trying to attract industries into Havelock such as suppliers, manufacturers, and designers that are aviation-related. That's a strong effort for the city."

To help with the problem of underemployment or unemployment around military bases, the 2005 N.C. General Assembly passed legislation requiring state occupational boards to streamline licensing requirements for military spouses who wish to practice a trade or profession that requires a license (teachers or health care workers are excluded from this pro-

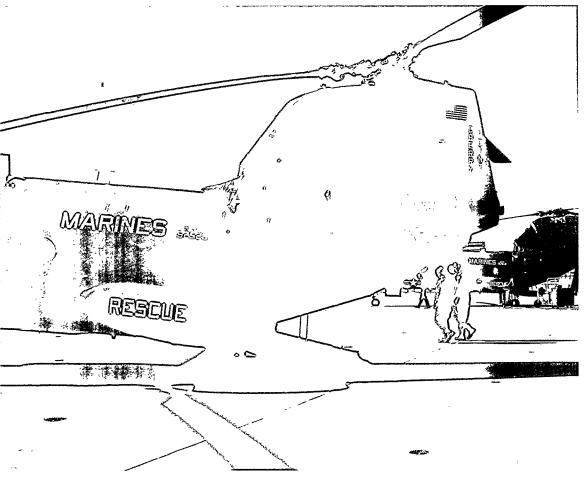
vision).²⁵ The law also provides in-state tuition at North Carolina's public universities and community colleges for military personnel and their dependents, and provides funding for military support groups in base communities.

8. Rates of Crime, Domestic Violence, and Child Abuse Around Military Bases

here's often a stereotype associated with military towns," Gombar says. "Fayetteville experiences it. Jacksonville experiences it. To a certain extent, all military towns experience it. What people remember is the late '60s and early '70s when some of these towns became like the Wild West, with red light districts, lots of bars, and service men and women getting drunk and getting into fights. That reputation was often well deserved."

Roy Parker, retired editor of *The Fayetteville*Observer and the author of a history column in

—continues



Karen Tam

Table 6. N.C. Crime Rates Per 100,000 by County, 2004

County	Crime Rate per 100,000 Residents (rank)	County	Crime Rate per 100,000 Residents (rank)		
Alamance	4,077.2 (33)	Graham	(Data unavailable)		
Alexander	2,386.2 (80)	Granville	3,655.5 (43)		
Alleghany*	184.2 (97)	Greene	3,219.0 (56)		
Anson	5,188.2 (17)	Guilford	5,507.3 (15)		
Ashe	2,052.2 (86)	Halifax	4,977.7 (19)		
Avery	1,290.1 (91)	Harnett*	4,178.2 (31)		
Beaufort	3,533.7 (48)	Haywood	3,034.6 (63)		
Bertie	3,149.2 (57)	Henderson	3,117.7 (58)		
Bladen	4,928.9 (20)	Hertford	5,058.8 (18)		
Brunswick*	4,373.4 (30)	Hoke*	4,777.0 (24)		
Buncombe	4,108.0 (32)	Hyde	891.6 (94)		
Burke	2,659.3 (76)	Iredell	3,707.2 (41)		
Cabarrus	3,386.5 (54)	Jackson	3,946.5 (35)		
Caldwell	2,980.0 (66)	Johnston	3,548.5 (45)		
Camden	1,211.1 (92)	Jones	2,130.8 (84)		
Carteret	3,397.5 (53)	Lee	5,289.9 (15)		
Caswell	1,930.9 (87)	Lenoir	6,517.0 (7)		
Catawba	4,737.7 (25)	Lincoln*	2,920.5 (68)		
Chatham	2,773.8 (72)	McDowell	2,648.6 (77)		
Cherokee	3,096.6 (61)	Macon	2,170.4 (83)		
Chowan	3,014.1 (65)	Madison	1,050.9 (93)		
Clay	1,334.3 (90)	Martin	3,823.0 (38)		
Cleveland	4,853.9 (23)	Mecklenburg	7,800.2 (2)		
Columbus	6,323.7 (8)	Mitchell	(Data unavailable)		
Craven*	4,408.7 (29)	Montgomery	3,398.9 (52)		
Cumberland*	6,709.8 (6)	Moore	2,779.4 (71)		
Currituck	3,272.2 (55)	Nash	5,570.7 (13)		
Dare	4,944.8 (20)	New Hanover	6,942.8 (4)		
Davidson	3,081.0 (62)	Northampton	3,780.7 (38)		
Davie	2,804.8 (70)	Onslow*	859.0 (96)		
Duplin	3,720.9 (40)	Orange	4,532.3 (27)		
Durham	6,731.5 (5)	Pamlico	1,770.3 (89)		
Edgecombe	5,489.5 (14)	Pasquotank*	4,594.9 (26)		
Forsyth	5,975.2 (9)	Pender	2,307.2 (82)		
Franklin	2,501.1 (79)	Perquimans	2,612.7 (78)		
Gaston	5,609.9 (11)	Person	3,520.8 (49)		
Gates	1,569.1 (95)	Pitt	5,770.1 (10)		
		· · · · · · · · · · · · · · · · · · ·	—continues		

Table 6, continued

	Crime Ra	ite per		Crime Rate per		
County	100,000 Residents (rank)		County	100,000 Residents (rank)		
Polk	2,105.8	(85)	Union	2,665.2	(75)	
Randolph	3,812.6	(37)	Vance	8,398.3	(1)	
Richmond	5,190.4	(16)	Wake	3,424.4	(51)	
Robeson	6,994.7	(3)	Warren	2,752.6	(73)	
Rockingham	4,464.7	(28)	Washington	(Data unavai	lable)	
Rowan	3,707.0	(44)	Watauga	2,966.0	(67)	
Rutherford	4,020.1	(34)	Wayne*	4,907.7	(22)	
Sampson	3,516.4	(50)	Wilkes	2,862.4	(69)	
Scotland	5,594.3	(12)	Wilson	3,559.8	(44)	
Stanly	3,114.8	(60)	Yadkin	2,672.6	(74)	
Stokes	3,028.3	(64)	Yancey	847.9	(96)	
Surry	3,740.0	(39)				
Swain	3,521.1	(47)		Crime Rates	·	
Transylvania	2,324.6	(81)	8 Military Counties	** 4,	351.1	
Tyrrell	1,822.1	(88)	All 100 North Caro	lina Counties 4,	573.9	
				···· · · · · · · · · · · · · · · · · ·		

Counties with military installations are indicated by italic type.

Source: N.C. Department of Justice, Annual Summary Report of 2004 Uniform Crime Reporting Data

Table 7. Rankings on Crime Rate Per 100,000 for Eight N.C. Military Counties

Rank	County
6	Cumberland
22	Wayne
24	Hoke
26	Pasquotank
29	Craven
30	Brunswick
31	Harnett
96	Onslow

Source: Rankings based on N.C. Department of Justice, Annual Summary Report of 2004 Uniform Crime Reporting Data

^{*} Asterisk indicates data unavailable but county ranking based on previously released 2003 data.

^{**} Mean crime rate for eight military counties.

Eastern North Carolina's largest daily newspaper, says the effort to clean the city's image is ongoing. In an interview with American RadioWorks broadcast on National Public Radio, Parker describes Fayetteville's main commercial thoroughfare, Bragg Boulevard, as "that seven-mile stretch of go-go joints and pawn shops and all that stuff." But Parker adds that Fayetteville has cleaned up its act substantially since he first moved to the city in the 1970s. "When I first got here, there were four outdoor movie theaters lined up and they showed sleaze night and day. But you know, it's changing—not overnight, but it's changing."

Gombar says part of that change is driven by the move to volunteer military service. Volunteers often have higher levels of education, are more likely to be married, and typically serve longer than did draftees. Despite having one of the largest populations of 18 to 26-year-olds of any city its size in the country, Gombar says the crime rate is relatively low. "But that's not the image people have of a military town," he says.

Rep. George Cleveland (R-Onslow), whose district includes Camp Lejeune and Air Station New

River, credits the improvement to "the quality of today's young men that enter the service." Sen. Kerr of Wayne County also speaks highly of the Air Force personnel stationed at Seymour Johnson Air Force Base in Goldsboro. "They're part of our community. They go to church. They participate in things. They're high-caliber people. They're good citizens," says Kerr. Kerr adds that the all-volunteer military means personnel are more engaged and motivated. "I think it's a different Army," says Kerr. "You've got your career soldiers. This Army is not a bunch of young thugs. It's a sophisticated Army."

Sen. Tony Rand of Fayetteville agrees. "The idea there's a lot of crime is a myth," he says. "When you consider the fact that we have a large number of people living here who have been trained in varying degrees of violence, they are overall well-behaved and amazingly good citizens."

Still, Chuck Fager, executive director of Quaker House, a nonprofit service agency that gives advice and counseling to soldiers who are having problems with military life, says the effort to clean up Fayetteville's image can only have so much success due to the profusion of night clubs, strip joints,



Karen Tam

pawn shops, and used car lots that goes with a large military presence. "They might try to spray paint it some, but it's still there," says Fager.

Crime statistics collected by the N.C. Department of Justice in 2004 show mixed results (see Tables 6 and 7, pp. 92–93). As Fager puts it, "We don't live in fear. I've lived here four years, and I haven't been burglarized yet," he says. "Sometimes we're at the top of the state's crime statistics, and sometimes we're not."

The numbers bear out Fager's observation. Statewide, there are 4,574 crimes per 100,000 population, down by 2.9 percent in 2004 from 2003. However, crime actually increased by 0.3 percent in Fayetteville during the same time period. Cumberland County reported 6,710 crimes per 100,000 population, well above the crime rate for the state as a whole. By contrast, Brunswick, Craven, Harnett, and Onslow counties registered crime rates below the rate for the state as a whole. Onslow County, home of Camp Lejeune, registered only 859 crimes per 100,000. Indeed, Onslow's rate was among the state's lowest, according to the Department of Justice report. However, crimes reported for Cumberland and Onslow counties did not include those handled on base by military police, which would have raised the numbers for those counties substantially. At Camp Lejeune, for example, 1,343 crimes against persons were reported in 2003, including two murders, 30 rapes, 33 aggravated assaults, 186 simple assaults, and 203 burglaries or housebreakings. None of these reported crimes were included in the uniform crime reporting data maintained by the state, according to Captain Joseph Riley, operations officer at Camp Lejeune. In 2004, four of eight military counties (Cumberland, Hoke, Pasquotank, and Wayne) had crime rates higher than the statewide crime rate of 4,574 per 100,000.

Moreover, domestic violence and child abuse have been linked to the military in the past few years. Fager, the director of Quaker House, agrees that this is an area where military life does seem to contribute to a higher crime rate. "It's really military-wide," Fager says, not just in Cumberland County. In one 43-day period in the summer of 2002, four women married to active duty soldiers stationed at Fort Bragg were killed by their spouses. In two of the cases, the spouse subsequently committed suicide. During the same period, an active duty soldier was killed, and the victim's wife and step-daughter were charged in that crime.

While a follow-up report commissioned by the U.S. Army Surgeon General did not find domestic violence rates higher at Fort Bragg than in the gen-

eral population over the 12-month period surrounding these incidents, it determined the "clustering" of those five homicides to be statistically significant. Because three of the four soldiers accused of committing the acts of violence had recently returned from Afghanistan, the report included a series of recommendations to help families cope with deployment, as well as a method for screening soldiers for behavioral health issues, including any signs of domestic violence.²⁷

North Carolina still does not have a statewide system for tracking domestic violence cases, much less reporting military connections. However, Linda Priest, clerk of court for Cumberland County, estimates that about 20 percent of the county's approximately 1,500 domestic violence cases each year involve someone who is part of the military. "Our statistics were driven off the chart during the 2002–2003 fiscal year," she says, of the year when the military cluster occurred. "While statewide domestic violence went up 7 to 8 percent, it went up 34 percent in Cumberland County."

The Center for Public Policy Research studied family violence in North Carolina and reported 224 domestic-violence related deaths from 2002–2004, as tracked by the North Carolina Coalition Against Domestic Violence, a Durham, N.C., nonprofit.²⁸ Of those, 19 occurred in the eight military counties, with nine in Cumberland alone.

Child abuse and its potential links to the military were examined in a study released in 2004 by the North Carolina Child Advocacy Institute. The study looked at child abuse homicide incidents occurring between 1985 and 2000 in North Carolina and found that child abuse homicides among military families living in Onslow and Cumberland counties were significantly higher than the statewide average rate of 2.2 deaths per 100,000 children. Among military families residing in Cumberland County, the rate was 5 deaths per 100,000, and among military families from Onslow County, the rate was 4.9 per 100,000 residents.²⁹ "These long-term patterns are not a statistical fluke, nor a coincidence," the report concludes. "They suggest problems in and around North Carolina military families and military communities that predictably result in a consistently high number and rate of child abuse homicides."

Although the homicide rate for children in military households was elevated in Cumberland County, so was the homicide rate for children in non-military families. That rate, at 4.4 per 100,000 population, was twice the statewide rate of 2.2 per 100,000. In Onslow County, the rate for non-military families, at

3.2 per 100,000, also was higher than the state average, "again indicating problems broader than those stemming from the military installation itself." The child homicide rate for military families was found to be elevated in several other military counties, with Craven at 5.6, and Wayne at 3.2. However, the study authors note that rates based on less than 20 child homicide deaths are less reliable than those for 20 or more such deaths.³⁰

The study results could not be compared to military installations in other states because no comparable data exists, says Marcia Herman-Giddens, author of the study and an adjunct professor at the University of North Carolina at Chapel Hill's School of Public Health. She recommends a nationwide tracking system for child abuse incidents that could help identify clusters such as the one she found surrounding the two N.C. military bases. "It's difficult to get the data," Herman-Giddens says. "It just happened that someone like me got interested and did the intensive work."

Fager recalls the military's reaction to these data as defensive. "They were sputtering and spinning as fast as they could, but the numbers are what they are," he says. While Herman-Giddens says she was disappointed in the response to the report from military leadership, social service directors in Onslow and Cumberland counties responded by forming civilian task forces to look into the issue further. Col. Al Aycock, Garrison Commander at Fort Bragg, serves on Cumberland County's Child Homicide Identification and Prevention Task Force.

Tom McCollum, deputy public affairs officer for the 18th Airborne Corps at Fort Bragg, says the Army isn't ready to accept Herman-Giddens results as valid. "We have found fault in the institute's research numbers," he says. He said the Army has raised questions about the study's case tracking procedures and its definition of the crime—including whether parents should be held responsible for caregiver assaults and whether deaths that occurred after the parent left the military could be counted. "The headlines look extremely shocking," McCollum says. "But a lot of the programs they suggested be implemented, Fort Bragg's already doing it."

Herman-Giddens defends the study's methods in attributing child homicides to military families. "Our definition of a military child abuse homicide was one where the child had one or both parents in the military and the child was killed by a care giver—for example, a live-in boyfriend. In one or two cases, the perpetrator was a babysitter rather than a parent or parent figure. Some military personnel that I spoke

with would have liked us to count cases only if the active-duty parent was the perpetrator. We felt using that as a definition of a case was way too narrow. As for counting homicides committed after the active-duty parent had been discharged, there was only one case in the entire study in such a category, and that was because the homicide was committed only two or three days after a discharge."

Tom Hill is family services director at Fort Bragg. Hill cites a long list of programs that the Army has developed to deal with domestic issues such as family violence. "If there's anything we can do to save a life, we want to do it," Hill says.

Mental health issues, including suicide, are other areas of concern for many military families. "I think we can all agree that war fighting produces many hardships and dangers in combat. I also think we can agree a wide range of stressors accompany all our deployments," Bernard Rostker, undersecretary of Defense for personnel and readiness, told his audience at the 2000 Department of Defense Conference on Leaders and Operational Stress in Washington D.C. Rostker, pointed out that stress plays a role in a wide variety of human behavior, including substance abuse, alcoholism, and suicide.31 And, military officials say the age of instant global communications has in some ways made matters worse, flooding deployed personnel with information about home front problems they can do little or nothing about.32

Despite the added stress of military deployment and wartime activities, suicide rates in counties adjacent to military installations in North Carolina appear similar to statewide patterns. In 2003, the State Center for Health Statistics recorded 949 deaths by suicide, a statewide rate of 11.3 per 100,000 population.³³ Of the eight military counties, Cumberland recorded 13.3 suicides per 100,000 population; Brunswick 12.2; Onslow 8.9; Craven 8.6; Harnett 8.2; Wayne 7.9; Hoke 2.7; and Pasquotank 2.7.

9. Race Relations and the Military

The military has tended to lead both the eastern region and the state as a whole in integration generally. Roy Parker, the former editor of the Fayetteville Observer and a columnist on military history, notes that base schools on Fort Bragg were integrated in 1951—fully three-years before the 1954 Supreme Court ruling in Brown v. Board of Education outlawed racial segregation in the public schools and more than a decade before that decision was fully implemented. Parker notes that a white principal at one base school, noting the poor facilities for black students at a separate school, simply

declared, "This won't work," and merged the two schools.

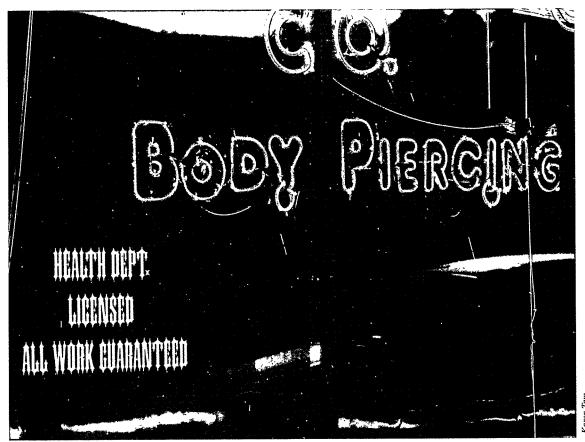
At the national level, African Americans have risen to the top levels of the military chain of command. Colin Powell, who served as Chairman of the Joint Chiefs of Staff, is the prime example. But the true test is within the neighborhoods back home. Here again, the military passes muster. Using a measure called a dissimilarity index that indicates how homogenous various neighborhoods are, with a score of 100 being completely segregated and 0 being completely integrated, Jacksonville, home of Marine Corps Camp Lejeune, ranks as the least segregated city in North Carolina with a population of more than 25,000, according to the U.S. Bureau of the Census.34 Fayetteville ranks as fifth least segregated, and Goldsboro, home of Seymour Johnson Air Force Base, ninth. Indeed, Jacksonville stands out as a national leader in street level integration, ranking least segregated overall among 319 metropolitan areas.

In December 1995, the slayings on the streets of Fayetteville of two African-Americans sent shockwaves through the city that reached all the way to the Pentagon. That's because the perpetrators,

three Army privates based at Fort Bragg, revealed at trial that they had dabbled in neo-Nazi philosophy and that the murders were motivated by racial hatred. The murders provoked soul-searching within the city, the convening of friendship circles to talk about race, and an investigation by the military that ultimately determined the problem to be isolated in scope. Of 77 hate crimes recorded by the State Bureau of Investigation in North Carolina in 2003, none occurred in military communities.³⁵ Only two of 62 hate crimes occurred in military communities in 2002.³⁶

10. Presence of Drinking Establishments, Pawn Shops, and Tattoo Parlors

A nother lifestyle issue concerns whether a heavy military presence creates a rough and tumble street environment dominated by adult entertainment, bars, pawn shops, and tattoo parlors. But are these kinds of businesses more prevalent in military communities than the rest of North Carolina? To answer this question, the Center examined the number of drinking establishments, pawn shops, and tattoo artists plying their wares across North Carolina.



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Very few North Carolina businesses indicate they provide "adult entertainment" as part of any licensing process. Thus, this information is hard to gather and was not included.

Easier to quantify is the number of drinking establishments in military communities and elsewhere. To account for differing population sizes, the Center calculated both the number of licensed drinking establishments and the number of residents in the county per drinking establishment. Fewer residents per bar or restaurant serving alcohol represents a higher concentration of drinking establishments. With 741 residents for every bar or restaurant serving alcohol, the data showed slightly fewer residents per bar for military counties versus non-military counties in the East (see Table 8). That figure compares to 764 residents per drinking establishment for the 41 eastern counties and 1,019 for the state as a whole.

With a few exceptions, military counties do not host high numbers of pawn shops on a per capita basis (see Table 9). Cumberland, the home of Fort Bragg, had 21 pawn shops, second only to much more populated Mecklenburg's 24. However, taking

population into account, Cumberland's total number of pawn shops ranked 16th in the state. The highest ranking military county on a per capita basis was Craven, ranking sixth with nine pawn shops serving a population of 93,454. Pasquotank, with its Coast Guard facilities under the U.S. Department of Homeland Security, ranked 10th per capita in pawn loan shops, with three shops and a population of 36,681. Wayne County was the next highest ranking military county in proliferation of pawn shops, ranking 15th in the state with eight shops and a population of 114,778. Onslow County, with five shops serving 159,817 residents, ranked 41st in the state on a per capita basis. Indeed, Onslow had fewer pawn shops than did similarly populated Pitt County, home of East Carolina University, which had seven pawn shops and ranked 27th.

The statewide distribution of tattoo artists tells us that this practice remains more Marine than mainstream, despite a proliferation of tattooed people and tattoo parlors across North Carolina. Onslow County had 59 registered tattoo artists, according to the N.C.

—continues on page 102

Table 8. Number of Drinking Establishments in Eastern North Carolina Counties with Military Bases

	# of Drinking		Average # of Residents Per
County	Establishments	Population	Drinking Establishment
Brunswick	462	83,787	181
Craven	269	93,454	347
Cumberland	669	311,526	466
Harnett	51	100,271	1,966
Hoke	25	38,193	1,528
Onslow	369	159,817	433
Pasquotank	100	36,681	367
Wayne	179	114,778	641

Average # of Residents Per
Drinking Establishment
741
764
1,019

Source: N.C. ABC Commission. Drinking establishments are those establishments with permits for: malt beverages on premise, unfortified wine on premise, unfortified wine on premise, brown bagging at small restaurants, brown bagging at large restaurants, mixed beverages restaurant, mixed beverages private club, mixed beverages tourism ABC establishment, mixed beverages hotel, and brown bagging private club.

Table 9. County Population, Number, and Per Capita Ranking Among 100 N.C. Counties of Tattoo Artists, Pawn Shops, and Drinking Establishments

		Tattoo Artists		Pawn Shops		Drinking Establishment	
County	County Population	# of	(Ranking)*	# of	(Ranking)*	# of	(Ranking)*
Alamance	138,754	12	(24)	3	(51)	304	(39)
Alexander	35,165	0		0		5	(100)
Alleghany	10,912	0		0		29	(27)
Anson	25,384	0		0		9	(94)
Ashe	25,320	1	(43)	0		19	(79)
Avery	18,221	0		21	(1)	108	(4)
Beaufort	45,816	3	(32)	0		115	(29)
Bertie	19,748	0		4	(4)	27	(57)
Bladen	33,119	1	(48)	3	(8)	11	(95)
Brunswick	83,787	25	(2)	4	(28)	462	(6)
Buncombe	215,468	37	(8)	9	(34)	811	(11)
Burke	89,943	15	(10)	3	(38)	81	(73)
Cabarrus	146,852	2	(55)	7	(29)	257	(46)
Caldwell	78,606	3	(44)	5	(21)	73	(71)
Camden	7,852	0		0		10	(61)
Carteret	61,122	0		13	(3)	435	(3)
Caswell	23,965	0		0		26	(65)
Catawba	148,797	16	(18)	10	(17)	465	(15)
Chatham	54,645	1	(52)	0		54	(68)
Cherokee	25,694	2	(27)	0		11	(92)
Chowan	14,453	0		0		41	(23)
Clay	9,499	0		0		7	(80)
Cleveland	98,497	10	(21)	7	(14)	121	(62)
Columbus	54,917	3	(35)	5	(7)	33	(86)
Craven	93,454	8	(25)	9	(6)	269	(19)
Cumberland	311,526	51	(11)	21	(16)	669	(40)
Currituck	21,059	0		0		123	(5)
Dare	33,906	4	(16)	0		512	(1)
Davidson	153,897	5	(46)	0		112	(82)
Davie	37,871	0		0		31	(76)
	are per capita						continu

Table 9, continued

County	County Population	Tat # of	too Artists (Ranking)*	Pa # of	wn Shops (Ranking)*	Drinking # of	g Establishmen (Ranking)*
Duplin	51,821	0		4	(13)	47	(7Ž)
Durham	239,662	13	(36)	7	(44)	727	(16)
Edgecombe	53,777	0		0		63	(64)
Forsyth	321,852	17	(37)	8	(48)	920	(20)
Franklin	52,855	0		0		42	(77)
Gaston	192,650	0		5	(47)	246	(60)
Gates	10,882	0		0		6	(89)
Graham	8,137	0		0		3	(93)
Granville	53,346	0		0		39	(81)
Greene	20,262	0		0		28	(56)
Guilford	438,520	0		10	(50)	1,512	(14)
Halifax	56,947	3	(38)	3	(24)	81	(55)
Harnett	100,271	5	(39)	3	(43)	51	(90)
Haywood	56,418	2	(45)	0		161	(21)
Henderson	96,370	7	(29)	6	(23)	225	(33)
Hertford	23,794	0		0		58	(30)
Hoke	38,193	0		0		25	(84)
Hyde	5,792	0	· · · · · · · · · · · · · · · · · · ·	0		44	(2)
Iredell	136,387	6	(42)	5	(36)	300	(38)
Jackson	35,627	7	(4)	0	William	100	(24)
Johnston	140,719	22	(12)	4	(46)	183	(59)
Jones	10,257	2	(5)	0		8	(78)
Lee	50,561	9	(7)	4	(12)	116	(35)
Lenoir	59,091	4	(31)	3	(25)	130	(37)
Lincoln	68,630	0		0		69	(67)
Macon	43,647	0		0		91	(41)
Madison	31,968	1	(47)	0		8	(96)
Martin	20,196	0		0		46	(36)
McDowell	24,930	0		0		24	(69)
Mecklenburg	769,843	120	(13)	24	(42)	2,965	(10)

^{*} rankings are per capita

Table 9, continued

County	County Population	Tattoo Artists # of (Ranking)*		Pawn Shops # of (Ranking)*		Drinking Establishment: # of (Ranking)*	
Mitchell	16,052	0		0		4	(97)
Montgomery	27,680	0		5	(5)	14	(91)
Moore	79,900	0		4	(26)	378	(9)
Nash	90,546	4	(41)	3	(39)	212	(32)
New Hanover	172,780	31	(6)	8	(32)	928	(7)
Northampton	21,820	0		0		23	(66)
Onslow	159,817	59	(1)	5	(41)	369	(34)
Orange	123,196	1	(56)	0		446	(13)
Pamlico	13,071	0		7	(2)	38	(18)
Pasquotank	36,681	10	(3)	3	(10)	100	(26)
Pender	44,820	0		3	(19)	90	(43)
Perquimans	11,806	2	(9)	0		18	(53)
Person	37,594	0		3	(11)	72	(44)
Pitt	141,019	15	(20)	7	(27)	367	(28)
Polk	19,194	0		0		53	(25)
Randolph	137,385	3	(50)	4	(45)	31	(98)
Richmond	46,594	7	(14)	3	(20)	68	(54)
Robeson	127,253	10	(26)	6	(31)	79	(85)
Rockingham	92,893	6	(33)	3	(40)	123	(58)
Rowan	135,147	12	(23)	0		237	(45)
Rutherford	63,861	0		4	(22)	98	(51)
Sampson	63,597	1	(53)	3	(30)	36	(88)
Scotland	35,690	0		3	(9)	34	(70)
Stanly	59,533	7	(17)	4	(18)	42	(83)
Stokes	46,356	1	(51)	0		27	(87)
Surry	72,810	4	(34)	3	(35)	124	(47)
Swain	13,573	0		0		40	(17)
Transylvania	29,799	4	(15)	0		112	(12)
Tyrrell	4,246	0		0		10	(31)
Union	149,045	11	(28)	5	(37)	124	(74)

Table 9, continued

County	County Population	Tat # of	ttoo Artists (Ranking)*		wn Shops (Ranking)*	Drinking # of	g Establishments (Ranking)*
Vance	44,216	2	(40)	0		74	(48)
Wake	721,437	51	(30)	17	(49)	2,047	(22)
Warren	20,286	0		0		31	(52)
Washington	13,435	0		0		22	(49)
Watauga	43,170	4	(22)	0		226	(8)
Wayne	114,778	13	(19)	8	(15)	179	(50)
Wilkes	67,509	1	(54)	3	(33)	82	(63)
Wilson	76,312	2	(49)	0		154	(42)
Yadkin	37,524	0		0		6	(99)
Yancey	18,131	0		0	***************************************	15	(75)

Sources: Data on the number of drinking establishments are from the N.C. ABC Commission website at www.ncabc.com. Pawn shops are from the Employment and Security Commission of North Carolina's Labor Market Information Division at www.ncesc.com. Tattoo artists are registered with the N.C. Department of Health and Human Services. Counties without tattoo artists are not included in the rankings of tattoo artists per capita. Pawn shops also are not included in number of pawn shops per capita.

—continued from page 98

Department of Health and Human Services. That's the highest concentration of tattoo artists in the state after adjusting for population, and second only to Mecklenburg County in total tattoo artists. With five times the population, Mecklenburg had 120 tattoo artists, enough for a 13th place ranking on a per capita basis. The next highest ranking among the military counties goes to Pasquotank, home of the Coast Guard and third in the state with 10 tattoo artists serving a population of 36,681. Cumberland, meanwhile, has 51 registered tattoo artists, the third highest in total number in the state, but 11th after adjusting for population. Wayne County, home of Seymour Johnson Air Force Base, ranks 19th of 100 counties in tattoo artists per capita, and Craven County, home to Marine Air Station Cherry Point, ranks 25th.

11. Environmental Impact

Military installations face a range of environmental issues, chief among them potential soil and water contamination and noise from low-flying aircraft. Water quality has been a concern at some military bases, including Camp Lejeune, where volatile organic compounds were found in several drinking water wells, according to the Agency for Toxic Substances and Disease Registry (ATSDR), a federal public health agency of the U.S. Department of Health and Human Services. The contamination was linked to leaking underground storage tanks, chemical spills, and drum disposal, as well as solvents from a dry cleaning operation on base.

Several studies done by the ATSDR have suggested a potential link between volatile organic compound contamination and birth defects among families living on the base. A new study started in the spring of 2005 will try to determine whether children exposed *in utero* from 1968 to 1985 had specific health effects, ATSDR officials say.

In 2001, the Pentagon was fined \$312,000 and required to spend almost \$1 million to clean up two drinking water contaminants, lead and trihalomethanes, found in the drinking water supplied to Fort Bragg.³⁷

Adam Shestak, of the environmental watchdog group Clean Water for North Carolina of Durham,

^{*} rankings are per capita

N.C., writes that the military "emits large amounts of pollution," as can be seen in the media coverage of "water supply contamination which impacted thousands at Camp Lejeune. Two of North Carolina's active military installations are on the 'Superfund' National Priorities List, and 35 of the over 150 Formerly Used Defense Sites (FUDS) throughout North Carolina have been identified as in need of environmental clean-up. Another 40 of these FUDS have not been located, prohibiting their evaluation for potential environmental hazards." 38

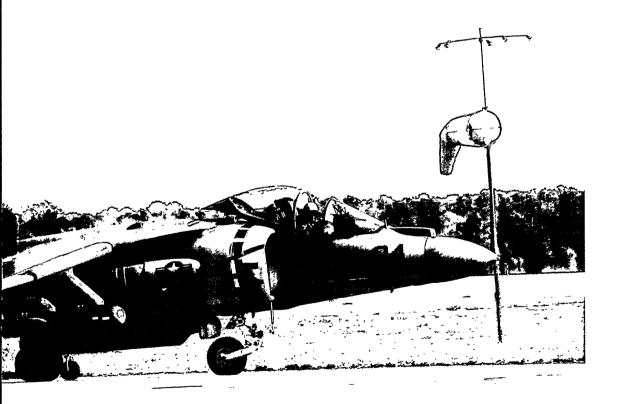
But Bill Holman, executive director of the N.C. Clean Water Management Trust Fund, which has partnered with the military to acquire land to protect water supplies, says the military has done much to improve its performance in environmental stewardship in recent years. He mentions steps by both the Army and the Marine Corps to improve erosion and sedimentation control problems, improve wastewater treatment, and preserve habitat for wildlife and endangered species such as the red cockaded woodpecker. "I'd actually describe them as good environmental stewards," says Holman. "That does reflect a change in the last 10 or 15 years. Both the Army and

the Marines have staff dedicated to managing their properties for both training and conservation."

Sen. John Kerr (D-Wayne) says the Air Force also has been a good environmental steward. "They bring infrastructure for water and sewer. They're saving wetlands. They clean up their mess."

Unexploded ordnance (ammunition or weapons) at bombing ranges has been cause for concern in North Carolina. In a 1994 memo, Bill Flournoy of the state Department of Environment and Natural Resources (DENR) concluded that contamination at numerous active and inactive target areas "has the potential to be a very big problem."

Ranges exist at Fort Bragg, Camp Lejeune, Cherry Point, Seymour Johnson, and Pope Air Force Base for small arms, artillery, and missiles. Four active air-to-ground weapons training sites are established in the Pamlico and Albemarle sounds at Stumpy Point, Palmetto, Brant Island Shoals, and Piney Island. Three inactive target sites also exist in the sounds along the Outer Banks, according to maps on record at the DENR office. Bases that closed years ago, including Camp Butner in Granville County and Camp Davis at the Onslow County town



of Holly Ridge, are also considered potential sites for contamination by unexploded ordnance, DENR officials say.

Examination of similar ranges in Cape Cod, Massachusetts, showed soil and groundwater contamination by a variety of substances, including dioxin, lead, aluminum, diethylphthalate, hexachlorobenzene and many more, according to a March 2001 memo from N.C. Department of Justice attorney Bill Miller. "This provides an example of some of the chemicals that can be left behind by the explosion or burning of military munitions, flares, propellants etc.," Miller said of the Massachusetts findings. "In an aquatic environment such as North Carolina with water-based target areas on the coast, the residuals may be more dispersed by water transport. There may also be some reason for concern at North Carolina's land-based target ranges with regard to groundwater contamination from range activity at locations in the porous sandhills and along the coast."

Aircraft noise levels and potential accidents pose additional concerns. The Eastern Carolina Joint Land Use Study produced in November 2002 by local officials in Region P Council of Governments surrounding Craven and Carteret counties urged that cooperative planning eliminate development in strategic areas near the bases to reduce land use conflicts. "When people and communities are exposed to noise and accident potential, they often seek relief," the report states. "This often places pressure on the military base to modify operations and procedures, which could have a significant negative impact on the overall mission of the installation.... In this scenario, both parties lose." ³⁹

These concerns are key issues in the Navy's efforts to locate a landing field in Washington County (See "David and Goliath: The Fight To Site an

A glut of geese can play the devil
With national life on every level,...
This solemn thought I introduce:
The higher the level, the bigger the goose
——Ogden Nash
"Goose Population Gains High Level"
HEADLINE (NEW YORK TIMES)

Outlying Landing Field in Washington and Beaufort Counties," pp. 106-108, for more on the Outlying Landing Field, or OLF, issue). The site is near the Pocosin Lakes National Wildlife Refuge, which is the winter home to hundreds of thousands of swans. snow geese, and other migratory birds. If the OLF is created, farming and other rural activities will be supplanted. The Navy seeks to acquire 30,000 acres for the operation and if the effort is successful, landowners unwilling to part with their land at market value will face condemnation proceedings. A driving concern for the Navy is reducing noise pollution along the heavily populated southeastern Virginia coast. That ultimately could become a concern in Eastern North Carolina, as the region's air space is crisscrossed by military training routes.

12. Air Space Restrictions Pinch Private and Commercial Flights

A large portion of Eastern North Carolina has air space restrictions that limit civilian aircraft access to routes and schedules designated by military air traffic control. Some military training routes allow military aircraft to fly at high speeds at altitudes of 100 feet or lower. Military-related air space restrictions prohibit or limit civilian access whenever training maneuvers are underway, which can be any day of the week, says George D. Speake Jr., former director of Dare County Regional Airport. "North Carolina is the prime pilot training area on the East Coast for the Navy, Air Force, and Marines," Speake says.

The military's special-use airspace with varying levels of flight restrictions all but surrounds the Dare County airport. Only an eight-mile-wide path of unrestricted air space to the west of the airport is available for approach. But even that could be compromised if the Marine Corps receives permission for two new special-use zones it has requested from the Federal Aviation Administration, Speake says. "We're located in a tourist area. In fact, tourism is really the only thing driving the economy here," he says. "But if the military keeps going, and they fill in all of our air space, the next thing you know civilians won't be able to get to this airport."

Civilian pilots who wish to fly through restricted areas must not only get clearance from FAA controllers but also from the Navy, whose air controllers go by the call sign "Giant Killer." Such requests may be and often are turned down. Even when the flight plan is approved, some pilots are wary of traveling through a potential military operation. "Special-use air space scares most pilots," Speake says.

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Dare County has not been permitted to install an INS, the most sophisticated type of navigation available to pilots, because of the military's involvement in the region, Speake says. This means that pilots have to use alternative navigational aids that make it harder to land in bad weather, thus dimming the airport's chances of ever bringing commercial air service to Roanoke Island and the Outer Banks. "What commercial airline is going to fly somewhere that they can't be guaranteed to land?" he asks.

Lt. Col. Gerald R. Reid, director of the Community Plans and Liaison Office at Marine Corps Air Station Cherry Point, says Speake exaggerates the restrictions placed on Dare County Airport due to military flight patterns. Military training routes are not the same as restricted airspace, and can be crossed or followed when not in use by the military. While there are five military training routes within 30 miles of Dare County Airport, the closest is 11 miles away. The closest that allows flights under 100 feet is 50 miles away. Civilian pilots may approach the airport from the west, south, and northeast—not just the west as Speake indicates. "When Dare County range is inactive, 360 degrees of sky is available," says Reid.

Reid adds that the special use zones it has requested from the FAA would not restrict any established approach procedures, airways, or routes. The closest special use area, if activated, would be more than 20 miles from the Dare County airport. Giant Killer controllers only restrict flight through special use airspace when airspace is used for hazardous military training activities. "This is required by FAA regulation (FAA Order 7110.65 series) to ensure safety of both civilian and military aircraft."

Reid says Air Station Cherry Point actually improved flight safety in the Dare County area when Cherry Point Approach Control extended its northern boundary in April 2004, "bringing much needed air traffic control service to an otherwise under-served area." Still, Reid acknowledges that the airport is pinched by a restricted area to the north controlled by the Air Force, and by lack of radar coverage. "Today, controllers have no choice but to use non-radar procedures, which result in greater time and distance spacing. This can translate to delays and higher fuel costs.... Radar coverage would permit smaller spacing between aircraft and between aircraft and airspace boundaries."

—continues

Military and civilian officials at Marine Air Station Cherry Point explain military training routes and their impact on civilian flight patterns.



Karen Ta

David and Goliath: The Fight To Site an Outlying Landing Field in Washington and Beaufort Counties

avid and Goliath. That's the image residents of Washington and Beaufort counties frequently use to describe their fight against the U.S. Navy's plans to establish an outlying landing field, or OLF, for pilot training in those counties.¹

The metaphor not only reflects the indignation many residents feel over the military's proposed endeavor, but it also evokes what some see as the struggle's primary issue: whether the rights of one heavily populated, wealthy, politically powerful region in Virginia trump those of a sparsely settled, poor one in North Carolina. "We're at the bottom of every list when it comes to poverty, dropout rates, SAT scores, you name it," says Jeanne Saunders, who owns a 1,000-acre farm in Washington County near the OLF site. "You can't find a thing to recommend us to anybody. That's why we were considered a weak place to go to try to dump this thing."

U.S. Census numbers back up her economic picture, showing Washington County's 13,400 residents with an average annual household income of about \$29,000—about \$10,000 below the statewide figure. Only 69 percent of residents have a high school education compared to 76 percent statewide. The county's population decreased by 3 percent between 2000 and 2004.²

By contrast, the Navy's current takeoff and landing practice field near its Oceana base in Virginia Beach, Virginia, is nestled into a growing and already densely populated area of pricey homes and commercial developments. Virginia Beach's population increased 3.4 percent between 2000 and 2004, to 440,000. Ninety percent of the city's residents are high school graduates, and the city's median household income, at \$48,705, is nearly \$20,000 per year higher than that of Washington County residents. More than 100,000 residents live in a zone designated for jetnoise that is deemed unsuitable for future housing developments.

The Census Bureau also reported 143,359 non-farm jobs in Virginia Beach in 2001, compared to 3,796 non-farm jobs in Washington County, and 15,307 in Beaufort County, which

contains a portion of the OLF acquisition area. For the Navy, it might seem a sensible choice to move the airstrip to a largely rural area of Eastern North Carolina that will for many years remain free from encroachment of residential and commercial development. The first mention of the OLF was by Robert J. Natter, commander of the U.S. Atlantic Fleet. Natter wrote in a letter to Virginia Beach area residents in October 2000: "It is precisely because of community concerns over jet noise that we are carefully exploring the establishment of an additional outlying field to accommodate Super Hornet training...."

Rear Admiral Christopher Weaver, during a speech before the U.S. Senate Armed Services Committee on April 1, 2004, also cited light pollution from surrounding development as one problem the Navy has experienced at Oceana, along with limited capacity to expand. "The current site near Virginia Beach, VA is not as effective for night-time training due to ambient light sources, and lacks the capacity to handle a training surge such as experienced for the war on terrorism and Operation Iraqi Freedom," Weaver told the committee. "The Washington County site is about halfway between NAS Oceana and MCAS Cherry Point. We believe it is the best alternative from an operational perspective."

The U.S. Senate Armed Services Committee is chaired by Virginia Republican Sen. John Warner, a former secretary of the Navy. The Navy's funding request for acquiring property for the North Carolina OLF was \$61.8 million in fiscal year 2005, with an ultimate pricetag of \$185 million. The Hornet squadron base and operations would remain at Oceana and, according to Navy documents, the airstrip would bring 50 or fewer jobs to North Carolina. Meanwhile, local residents say more than 200 farm jobs would be lost.

An organization known as NO-OLF—North Carolinians Opposed to the OLF—is working to defeat the Navy's project. While the prospect of losing some 30,000 acres in taxable acreage has been a major catalyst for the opposition, other factors have also played significant roles.

Residents decry the potential loss of family farms, worry about negative impacts on local wildlife preserves, and warn of the danger migrating birds pose to pilots taking off and landing at the site, adjacent to the Pocosin Lakes National Wildlife Refuge, winter home to more than 10,000 swans and geese. Further, they argue that Virginia Beach homeowners knew about the jet noise when they purchased their homes, while Washington County residents would have the noise problem foisted upon them against their will.

Some say future prospects for the struggling area's economy are also at stake. Recent record-breaking real estate prices in coastal areas have led many second-home buyers and retirees to look toward the North Carolina "inner banks" for property, a trend that could one day be an economic boon for the Washington County area and other sites along the sounds and riverfronts.

Mark Fagan, an economist at Jacksonville State University in Jacksonville, Alabama, who studies the economic impact of retirees, says the strategy is a smart one for rural counties. "These relocating retirees bring sizeable net worth—\$300,000 to \$400,000—and an annual income of \$35,000 to \$40,000 to their community of relocation," Fagan says. "Retirement development is a good, clean way to increase the tax base."

Not only would the jet noise detract from the area's retirement and tourism options, the limits on air space that are imposed surrounding any military range can diminish the ability of private and commercial flights into the area, according to aviation experts and officials at the N.C. Department of Environment and Natural Resources.

In a letter to President George W. Bush, dated May 18, 2005, state Senate President Pro Tempore Marc Basnight outlined his opposition to the OLF. Basnight writes that he and his constituents "remain strongly opposed to this OLF because of the dramatic negative impact it will have on tax bases of these economically distressed counties, the danger in which it would put military pilots, the degradation that would occur in the environmental and wildlife com-

munity, and the effect on individual property owners."

The greatest danger to pilots presented by the Washington County site would be from migrating waterfowl. If sucked into a jet engine, birds can cause the engine to stall or even crash. The risk is considered greater for smaller jets such as military aircraft because they have fewer engines. For their part, Navy officials say migrating birds can easily be avoided by radar using the Bird Avoidance Model, or BAM, and by observing existing flight restrictions for National Wildlife Refuge properties. Environmental concerns can be mitigated by moving residents out of areas where noise levels would be greatest and by placing land-use restrictions on buffer lands surrounding the landing field that would protect the Albemarle-Pamlico National Estuary. And, Navy officials argue, the low population density and central location between Oceana and Cherry Point make the site ideal for training exercises. The site also would fit the nation's emerging national defense strategy by increasing surge readiness-or ability to deploy on short notice, Navy officials say.

Neither U.S. Sen. Elizabeth Dole (R-N.C.), a member of the Senate Armed Services Committee, nor Sen. Richard Burr (R-N.C.) has taken a position on the OLF issue.⁵ Lt. Gov. Beverly Perdue, who has been working to maintain good relations with the military through the Base Realignment and Closure proceedings, commends the citizen activists, although she personally doesn't oppose the OLF.

"I admire the folks who have spoken out against and for the OLF," Perdue says. "The people from my home county, Craven County, wanted the OLF to come. We passed resolutions urging the Navy to site the OLF in our home county. But I'm proud of what has gone on in Eastern North Carolina because I think communities must step up and be heard about their concerns.... The military and the Defense Department are used to folks across America having the right to say what they think should be done."

—continues

Three environmental groups and the Washington and Beaufort county governments have filed suit to contest the proposed OLF location, and on May 27, 2005, U.S. District Court Judge Terrence Boyle (Eastern District, N.C.) granted a motion for a summary judgment following arguments by their attorneys. Boyle, who has been nominated by President Bush for a higher U.S. Court of Appeals seat, ruled that the Navy had not completed its legal requirements under the National Environmental Policy Act to evaluate the impact of the OLF on the surrounding area. "The court has spoken," Roper Mayor Bunny Sanders, of Washington County, told the Washington Daily News. "David has won this battle." Opponents cheered the decision. The Navy appealed but announced it would reconsider sites in four other North Carolina counties-Bertie, Craven, Hyde, and Perquimans. Meanwhile, the Navy has resumed land acquisition from willing sellers in Washington and Beaufort counties. It remains to be seen who will win the war.

-Renée Elder

FOOTNOTES

¹ Bill Sandifer, "Judge to Navy: No OLF," Washington Daily News, Washington, N.C., May 31, 2005, p. 1A.

²U.S. Bureau of the Census, American FactFinder, PopulationFinder, on the Internet at http://factfinder.census.gov/home/saff/main.html?_lang=en.

³ Ibid.

⁴ Jon W. Glass, "Navy has been tuned out, crowded out at Oceana," *Virginian Pilot*, Norfolk, N.C., Sept. 12, 2004, p. 1A.

⁵ Valerie Bauerlein, Rob Christensen, and Lynn Bonner, "Senators take no position on Navy field," *The News & Observer*, Raleigh, N.C., April 4, 2005, p. 1A.

⁶ Sandifer, note 1 above.

Key Dates in OLF Site Selection

October 2000: Navy announces that new Outlying Landing Field (OLF) will be considered to mitigate noise complaints from Virginia residents concerned about jet noise from Oceana Naval Air Station and an OLF at Fentress Field.

August 2002: Navy releases draft Environmental Impact Statement listing a site in Washington and Beaufort counties near Plymouth, N.C., as one of two preferred sites.

September 2003: Navy announces decision to locate its proposed \$186 million OLF on 30,000 acres in Washington and Beaufort counties over the objections of local officials, affected landowners, and environmentalists.

January 2004: Environmental groups and local government officials in Washington and Beaufort counties file suit in federal district court to block the OLF.

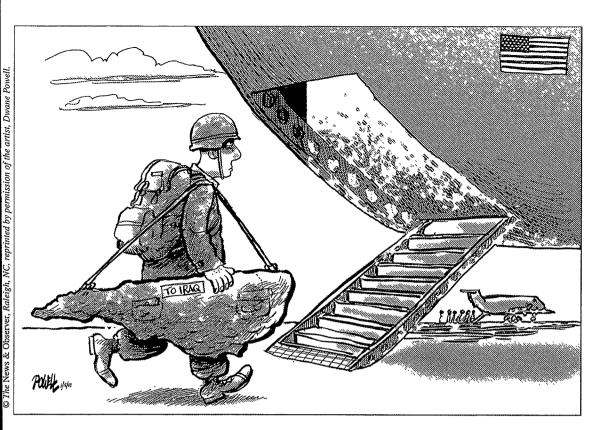
April 2004: U.S. District Court Judge Terrence Boyle grants a temporary injunction blocking further land acquisition or site preparation by the Navy after Washington and Beaufort counties, the National Audubon Society, the N.C. Wildlife Federation, and Defenders of Wildlife raise questions about the Navy's environmental study. November 2004: In internal Navy emails made public in court proceedings, Navy officials indicate they were pressured to justify the OLF site in Washington and Beaufort counties after superiors had already decided to place it there, using the term "reverse engineering" to describe the process.

February 2005: Judge Boyle bans further work by the Navy in Washington and Beaufort counties, ruling that the Navy violated environmental laws in selecting its preferred OLF site.

June 2005: Navy announces it will study environmental impact at four additional North Carolina sites in Bertie, Craven, Hyde, and Perquimans counties.

September 2005: Federal Appeals Court upholds Boyle's ruling that the Navy did not properly assess the environmental impact of the field in Washington and Beaufort counties, but also directs Judge Boyle to allow the Navy to proceed with some tasks at the site while reassessing environmental impact.

November 2005: The Navy receives Boyle's modified injunction allowing the Navy to continue land purchases with willing buyers and conduct more tests at the site.



Reid says the N.C. Department of Transportation's Division of Aviation, the U.S. Marine Corps, and the U.S. Navy "are studying the potential of installing surveillance radar near the Dare County Airport that would enable greater air traffic services [and] improve air navigation and safety. This radar service will substantially reduce mid-air collision control over non-radar operations."

Closing

North Carolinians are justly proud of their role in defending freedom. Yet debates about patriotism tend to cloud any discussion of Eastern North Carolina's heavy dependence on the military. To get a clear vision of the impact of the military on the East, one must look beyond pure patriotism.

The heavy military presence in Eastern North Carolina brings with it pluses and minuses. On the plus side of the ledger is economic impact, with the military providing in excess of 100,000 jobs, plus defense contracting opportunities—though given the number of troops on its soil North Carolina does not get its fair share of these opportunities, government-funded university research, and increased business for the state's ports. A further plus is an educated

and well-trained work force comprised of military spouses and retirees, who leave the service earlier than in civilian life and are more likely to settle near bases to enjoy tax free shopping and health care on base.

Wearenowsatabing around to germoney for such things as school construction.... road building. There are all sorts of things to be done in this country.... Is zero reason why the sums which now are going into these sterile, negative mechanisms that we call warmunitions should not go into something positive."

—DWIGHT D. EISENHOWER
EISENHOWER, ESYSTEPHEN B. AMEROSE

Minuses include impact on local government tax revenues due to untaxed properties and facilities, fiscal strain for the public schools because the federal government pays less than the full cost of educating military dependents, pressures on the local housing market brought on by large numbers of military personnel seeking off-base housing, elevated levels of domestic violence and child abuse, conflicts over land use, increasing air space restrictions, and environmental concerns such as noise pollution and heavy metals contamination of soil and water.

The military is a major employer in Eastern North Carolina with a huge impact on the region's economy. Yet there may be a point when the heavy military presence begins to pinch. Before North Carolina reaches that point, the state may need to give more careful consideration to the pluses and minuses of being America's most military-friendly state. Tal

FOOTNOTES

Dave Montgomery, "Panel Weighs Bases' Futures," Knight-Ridder Newspapers, as published in The News & Observer, Raleigh, N.C., May 4, 2005, p. 3A.

²BRAC 2005 Closure and Realignment Impacts by State, U.S. Department of Defense, May 2005, Appendix C, on the Internet at www.defenselinks.mil/brac.

³ Liz Sidoti, "Politics trumps a few of Rumsfeld's picks," Associated Press, The News & Observer, Raleigh, N.C., August 28, 2005, p. 4A.

⁴ Federal Register, Washington, D.C., Volume 69, Number 29, Feb. 12, 2004, pp. 648-652.

⁵ U.S. Department of Education, federal impact aid division

⁶ S. Richard Brockett, et al., North Carolina Statewide Military Impact Study, East Carolina University Regional Development

Services and Regional Economic Models Inc., spring 2004, p. 2. ⁷ For a discussion of the use of multipliers in determining economic impact, see Mike McLaughlin, "More on Multipliers in Evaluating the Economic Impact of Movies," North Carolina

Insight, Volume 14, No. 3, February 1993, pp. 7-12. ⁸ J. Barlow Herget and Mike McLaughlin, "Not Just Fun and Games Anymore: Pro Sports as an Economic Development Tool," North Carolina Insight, Vol. 14, No. 2, September 1992,

pp. 2–25. See especially pp. 5–8. 9 *Ibid.* at p. 5.

10 Data on income and poverty are taken from the U.S. Bureau of the Census. Employment data are from the Employment Security Commission of North Carolina. Calculations comparing the 41-county eastern region to North Carolina as a whole on these indicators are by the Center staff.

11 Angelou Economics, "Defense Industry Demand Analysis," North Carolina Military Business and Resource Center, Fayetteville, N.C., April 18, 2004, p. 3.

¹² North Carolina Statewide Military Impact Study, note 6 above, p. 4.

¹³ "Defense Industry Demand Analysis," note 11 above.

15 Bob Montgomery, "TAMSCO to invest \$20 M at airport," The Daily Advance, Elizabeth City, N.C., July 9, 2004, p. 1A.

16 "Public Event Rollout," North Carolina Military Business & Resource Gap Analysis, Angelou Economics for North Carolina Military Business and Resource Center, June 1, 2005, p. 1.

¹⁷ Zanetta Doyle, "Middle East War Affects Local Economies," Economic Development Digest, National Association of Development Organizations Research Foundation, Washington, D.C., Vol. 13, No. 6, May 2003, p. 3, on the Internet at http://www. nado.org/pubs/may03.html.

¹⁸ N.C. Department of Commerce, Economic Development Information System, "Onslow County Profile," on the Internet at

http://cmedis.commerce.state.nc.us/countyprofiles/profile.cfm. ¹⁹ Session Law 2004-179 of the 2005 Session (House Bill

²⁰ U.S. Bureau of the Census, on the Internet at http://quickfacts.census.gov/qfd/states/37/37085.html

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Impact Area

Pluses for Military

Minuses for Military

1. Economic impact

The military provides more than 137,000 jobs and \$3.9 billion in actual annual payroll. Estimates of total economic impact have varied widely, but East Carolina University's Regional Development Institute places the impact at some \$18.1 billion. Most of this impact accrues to Eastern North Carolina, the home of all six of the state's major military installations. Eastern counties with military bases have higher per capita income and lower unemployment than non-military counties.

Spin-off development in military communities produces high proportions of low-paying retail jobs. Large deployments may cause swings in economic conditions, hurt local merchants, and reduce state and local sales tax revenue.

2. Defense contracts

North Carolina military bases awarded \$2.4 billion in contracts to outside firms in 2004, ranking the state 23rd in the nation for such contracts. North Carolina is seeking to increase its share of military contracts through the Military Business Center at Cumberland Technical Community College.

With the nation's 4th highest number of troops, the state doesn't get its fair share of contracts. Of the \$2.4 billion in *contracts* awarded by military bases in N.C., only \$460 million went to N.C. firms. Of more than \$200 billion in Department of Defense *procurement* in 2004, less than 1 percent came to North Carolina.

3. Ports

Business at North Carolina's two ports at Wilmington and Morehead City increased 24.5 percent in 2004, in part due to increased use by the military.

With \$562,000 in revenue produced by military shipping at Morehead City, and \$3 million at Wilmington, the military still generates only modest amounts of revenue for state ports. Military shipping will wax and wane with overseas deployments.

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Impact Area

Pluses for Military

Minuses for Military

4. Sales taxes and property taxes

Average property tax rates in the eight military counties are below the mean for the 41 counties of the Eastern region. The decline in sales tax revenue was not severe for the initial phase of the Operation Iraqi Freedom deployment in 2002. A major military presence also produces large volumes of revenue producing retail sales.

Federal property is exempt from taxation by local government. Property tax rates in counties with major military installations might be even lower were it not for the thousands of acres of federal property excluded from the tax rolls-42,240 acres in Cumberland County alone. Military counties likely would have higher sales tax revenue without major deployments. Operation Desert Storm was thought to contribute to a statewide recession that helped empty the state's coffers through a drop-off in sales tax revenue in 1991. Military personnel with cars registered out of state do not pay property taxes on these vehicles. Unless they are N.C. residents, military personnel do not pay state income tax either.

Taxpayer-financed services, as well as growth and housing The flood of military personnel living off base means more taxpaying citizens to help compensate for vast acreage taken off the tax rolls by the federal government.

Low-cost housing built for military personnel often will not return through property tax revenues the full cost of providing local government services.

6. Public schools

Military dependents bring diversity to the region's public school classrooms, bringing students from across the nation into local communities. Federal impact aid provides some support for local school systems educating military dependents, and military dependents typically live off base in private housing subject to local property taxes.

School officials argue that federal impact aid is not sufficient to cover the full cost of educating military dependents. In Cumberland County, for example, 16,000 federally connected students make up more than 30 percent of public school students. However, impact aid contributes less than 2 percent of the Cumberland County school system's operating budget.

Impact Area

Pluses for Military

Minuses for Military

7. Military spouses, retirees, and the local work force

Thousands of retirees leave the military each year. The typical retirement age is 42 for enlisted personnel and 46 for officers, so they provide a ready work force and volunteer labor pool. Military pensions provide a revenue stream that helps support the local economy. Military spouses may also bring marketable job skills. Streamlined licensing requirements and educational opportunities provided in the 2005 N.C. Military Support Act may help with the problem of underemployment for both military spouses and retirees who wish to enter the civilian work force.

Military communities typically do not have enough job opportunities to support the large numbers of persons leaving the military or provide job opportunities to military spouses. Underemployment is an oftcited problem. Military retirees can shop on base, and many do, so some of the income they bring to a community is not harvested there.

8. Crime, domestic violence, and child abuse

Statewide crime statistics indicate that crime rates in military counties generally are no higher, and in some instances are lower, than in counties with similar demographics and no military installations. In 2004, four of eight military counties had crime rates lower than the statewide crime rate of 4,574 per 100,000 population.

State crime statistics generally do not include a broad range of crimes committed on base. However, both Cumberland and Onslow counties-North Carolina's largest host counties for the military - had the highest child homicide rates in the state, according to a study by the N.C. Child Advocacy Institute. Domestic violence homicides also were found to be elevated in 2002, with five homicides recorded in Cumberland County in 43 days. Thus, a major military presence may mean increased risk for child and domestic abuse.

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Impact Area

Pluses for Military

Minuses for Military

9. Race relations

The military generally has been a leader in race relations. The City of Jacksonville, home of Camp Lejeune, is hailed as the least segregated city in the nation with a population of more than 22,000. Fort Bragg integrated its schools long before the federal government required integration in the U.S. Supreme Court decision in *Brown versus Board of Education*.

Despite its generally good record, the military's reputation on race has been stained on occasion by hate crimes. The December 1995 slayings on the streets of Fayetteville of two African Americans by three white soldiers affiliated with a hate group prompted a high-level investigation by the military.

 Presence of drinking establishments, pawn shops, and tattoo parlors With some exceptions, military counties do not have more tattoo artists or pawn loan shops than do similarly populated counties across North Carolina. Military boosters credit the rise of the all-volunteer military, higher marriage rates for troops, and general efforts to improve the military's image with having some success in cleaning up the street scene around major military bases.

Military counties do have more drinking establishments per capita than average for the 41-county eastern region or the state as a whole. Only nine "adult entertainment" establishments are registered in the entire state so data are incomplete in this area. Onslow County, home of Marine Corps Camp Lejeune, leads the state in tattoo artists per capita.

Impact Area

Pluses for Military

Minuses for Military

11. Environment

Military installations have taken a stronger role in environmental stewardship—attempting to clean up fouled drinking water, protect endangered wildlife, and enter into partnerships with the state to acquire land to help protect water quality.

Environmentalists challenge the military on several fronts. Contaminants have fouled drinking water at both Fort Bragg and Camp Lejeune. Unexploded ammunition is a problem on active and abandoned bombing ranges and training grounds. A Navy proposal to acquire 30,000 acres for an off-site landing field in Washington and Beaufort counties was found to have given too little consideration to environmental issues such as the presence of large numbers of migratory waterfowl. Noise from low-flying jets also draws complaints.

12. Air space restrictions

Eastern North Carolina has seen expanded military airspace for practice maneuvers and likely will see more, but much of this airspace is available when not scheduled for use by the military. Air traffic controllers on military bases have added a safety element by making their services available to civilian use. Military pilots must practice their skills, and some air space restrictions must be expected as a result.

Military air space used for practice maneuvers begins to pinch places such as Dare County Regional Airport in Manteo. Flying through military operating areas can be intimidating for a private pilot. Local officials worry that future proposed military training routes could restrict traffic even more and negatively affect tourism. The Outer Banks and the Carteret County beaches, both popular with private pilots, also are under consideration for military training routes.



FROM THE CENTER OUT

Record Number of Women and African Americans Serve in the Legislature

by Sam Watts

he numbers of women and African Americans serving in the N.C. General Assembly reached record highs in 2005. Meanwhile, rates of turnover among legislators remain high—averaging close to a fourth of the House and a fifth of the Senate every two years since 1984. And, the Center's survey of legislators, lobbyists, and capital news reporters finds that legislative committees dealing with state budgets, taxes, rules, and education continue to be viewed as the most powerful. These and other trends are detailed in Article II, the citizens' guide to the 2005–2006 legislature published by the N.C. Center for Public Policy Research.

The Rise of Women in N.C. Politics

The first woman to serve in the N.C. General Assembly, Lillian Exum Clement of Buncombe County, was elected in 1920, months before the 19th amendment to the U.S. Constitution gave women the right to vote. Women were a rarity in the legislature from then until 1973, when nine were elected. Since then, their numbers have increased at a relatively

Editor's Note: "From the Center Out" highlights research by the North Carolina Center for Public Policy Research. This article summarizes trends in the N.C. General Assembly contained in Article II: A Guide to the 2005–2006 Legislature.

Sam Watts is a policy analyst at the North Carolina Center for Public Policy Research.

steady pace, reaching a record-high 39, or 23 percent, of all 170 legislators this year. This is nearly double the 12 percent of seats women held 20 years ago and now equals the average percentage of state legislative seats held by women across all 50 states. North Carolina also leads the South in the number of female legislators.

The Center's executive director Ran Coble says, "With more women in the General Assembly, issues such as curbing domestic violence, providing affordable child care, and achieving pay equity among state employees have a better chance to be heard and acted upon." At a forum in Chapel Hill on "The State of Women in the State," Sen. Ellie Kinnaird (D-Orange) said, "I think women's public policy is very different from men's public policy."

Women now hold the majority of chairs heading the most powerful committee, Appropriations, which puts together the state budget. In the Senate, two of three Appropriations Committee co-chairs are women—Senators Linda Garrou (D-Forsyth) and Kay Hagan (D-Guilford). In the House, three of six Appropriations Committee co-chairs are women—Representatives Debbie Clary (R-Cleveland), Beverly Earle (D-Mecklenburg), and Wilma Sherrill (R-Buncombe). Rep. Clary says, "Having more women in the legislature assures that cuts won't be made to the Health and Human Services budget without due process."

Women also now chair or co-chair two of the six most powerful committees in the Senate and four of the six most powerful committees in the House. In the Senate, women co-chair the Appropriations

and Education/Higher Education committees. In the House, women chair or co-chair the Appropriations, Finance, Education, and Transportation committees. Jennifer Weiss (D-Wake) says, "In the General Assembly, everyone has a voice and everyone has a seat, but it makes a difference when more women get into positions of power within the legislature."

Most African Americans Ever in General Assembly

The 2005–2006 General Assembly also has a record number of African American members, with 26, or 15 percent of 170 legislators. In 1968, Henry Frye (D-Guilford) was the first African American elected to the General Assembly since the 19th Century. The longest-serving African American in the 2005 General Assembly is Representative H.M. "Mickey" Michaux (D-Durham), who has served 14 terms, beginning in 1973. African Americans chair or co-chair one of the six most powerful committees in the Senate and three of the six most powerful committees in the House.

High Turnover Among Rank and File Legislators, Low Turnover Among Leaders

Forth Carolina also has high turnover among legislators. Since the 1984 elections, turnover has averaged 22.9 percent in the state House every election and 20.4 percent in the Senate. The 2005 General Assembly had 12 Senators and 21 Representatives who are new since the 2003 session, with three more who were appointed to seats in 2004 and are serving their first full terms in their chambers.

The Center's Coble says, "We have significant turnover in North Carolina, even without term limits." He says the high turnover stems not only from legislators who lose their primary or general elections, but also from legislators who run for higher office, die in office, are appointed to other positions, or who retire because of age, poor health, or polls that tell them they would have trouble being re-elected. For example, former legislators Virginia Foxx and Patrick McHenry were elected to the U.S. Congress, long-time legislators Eric Reeves and Gordon Allen retired, and Connie Wilson chose not to run for

Rep. Wilma Sherrill (R-Buncombe), pictured with Rep. Joe Kiser (R-Lincoln)



The News & Observer, Raleigh, N.C.

reelection to the state House because she was placed in the same Mecklenburg County House district as another incumbent Republican in 2003 redistricting. Two legislators have died in office the last two years.

Despite high turnover among rank and file members, the General Assembly has low turnover among the leadership in each chamber. Senator Marc Basnight (D-Dare) is serving his seventh term as President Pro Tempore of the Senate, while Representative Jim Black (D-Mecklenburg) is serving his fourth term as Speaker of the House—including one as Co-Speaker with Rep. Richard Morgan (R-Moore) in 2003–04. The length of Basnight's tenure is unprecedented, while Black's length of service now matches that of the previously longest-serving Speaker of the House, Liston Ramsey (D-Madison), who was Speaker from 1981 through 1988.

Survey Results on the Most Powerful Committees in the 2003–2004 Legislature

The Center's guide also contains rankings of the "most powerful' committees in each chamber to help citizens understand the inner workings of the legislature. Based on surveys of all legislators, reg-

istered lobbyists based in North Carolina, and capital news correspondents, the six most powerful Senate committees, in order, are: (1) Appropriations/Base Budget; (2) Finance; (3) Rules and Operations of the Senate; (4) Judiciary I; (5) Education/Higher Education; and (6) Commerce. The six most powerful House committees are: (1) Appropriations; (2) Finance; (3) Rules, Calendar, and Operations of the House; (4) Judiciary I; (5) Education; and (6) Transportation. Coble says the committees viewed as most powerful are very consistent from session to session.

Other Trends in the Legislature

Other trends in the legislature highlighted by the Center in its latest legislative guide include:

- The most frequent occupations for legislators are business-related with 56 of 170 legislators in business or sales.
- Forty-eight legislators are retirees.
- Thirty-nine legislators are attorneys, but this is significantly fewer than the number of attorneys (68) that served in the legislature in 1971.

These and other legislative trends are outlined in Article II: A Guide to the 2005-2006 North



Rep. Mickey Michaux (D-Durham)



Sen. Ellie Kinnaird (D-Orange)

Carolina Legislature. This edition marked the fifteenth legislative session the Center has published the guide. The citizens' guide contains profiles and photos of each of the 170 members of the General Assembly, including business and home addresses; telephone and fax numbers; counties in their districts; the number of terms they have served in the legislature; and their educational and occupational backgrounds. For members who served in the previous session, the guide lists five bills they introduced in the 2003–2004 session, their votes on 12 bills of statewide interest, and their past rankings of attendance, roll call voting participation, and effectiveness. The effectiveness rankings are based on surveys of all legislators, registered lobbyists based in North Carolina, and the capital news media. The latest set of legislative effectiveness rankings was released in May 2004. The guide also includes demographic and occupational trends for the General Assembly since 1985 and rankings of the 50 most influential lobbyists in the legislature.

A pocket-sized *Supplement to Article II* contains important information for citizens, lobbyists, and reporters, including all committee assignments

and each legislator's political party affiliation, home county, legislative office address and telephone number, e-mail address at the General Assembly, and legislative seat number. The supplement also contains seating charts, committee meeting schedules, and deadlines for introducing various kinds of bills and resolutions.

Copies of Article II: A Guide to the 2005–2006 N.C. Legislature and the Supplement with committee assignments are available for \$25 a set, which includes tax, postage, and handling. To order, write the Center at P.O. Box 430, Raleigh, NC 27602, call (919) 832-2839, fax (919) 832-2847, or email tbromley@nccppr.org.

Significant Milestones in the Rise of Women in N.C. Politics

- 1920: Lillian Exum Clement elected to be the first woman to serve in the General Assembly.
- 1996: Elaine Marshall elected as N.C. Secretary of State, the first woman to be elected statewide to the Council of State.
- 2000: Four of the 10 members elected to the Council of State were women, including Lieutenant Governor Beverly Perdue, Secretary of State Elaine Marshall, Labor Commissioner Cherie Berry, and Agriculture Commissioner Meg Scott Phipps.
- 2002: Elizabeth Dole became the first woman to be elected as U.S. Senator from North Carolina.

Significant Milestones in the Rise of African Americans in N.C. Politics

- 1968: Henry Frye became the first African American elected to the General Assembly since the 19th Century.
- 1991: Dan Blue (D-Wake) became the first African American to serve as Speaker of the state House of Representatives.
- 1992: Ralph Campbell elected as State Auditor, the first African American elected statewide to the Council of State.
- 1992: Eva Clayton, representing the 1st Congressional District, becomes the first African-American female elected to the U.S. House of Representatives.
- 1999: Henry Frye became the first African American to be named Chief Justice of the state Supreme Court.

INDEX TO VOLUME 21

Below is a subject index to *North Carolina Insight*, Volume 21 (2004–2005). Following the subject heading is the article title, the author(s), the number of the issue in Volume 21 where it appeared, and the page number in the issue. The index includes Volume 21, Nos. 1–2, published in June 2004, Volume 21, No. 3, published in August 2004, and Volume 21, No. 4, published in March 2005.

- **Children:** Conclusions and Recommendations for Fighting Family Violence, by Mike McLaughlin, Vol. 21, No. 4, p. 83.
- Educational Achievement: Bridging the Gap? by Kerra L. Bolton, Vol. 21, Nos. 1–2, p. 76.
- Family Court—A New Vehicle for Addressing Domestic Discord, by Renee Elder and Mike McLaughlin, Vol. 21, No. 4, p. 73.
- Infant Abandonment: A Unique Form of Child Maltreatment, by Lori Feezor, Vol. 21, No. 4, p. 88.
- Is the Federal "No Child Left Behind" Law an Unfunded Mandate on the States? by Mike McLaughlin, Vol. 21, No. 3, p. 47.
- Pass/Fail: Meeting the Challenges of the State ABC and Federal "No Child Left Behind" Accountability Programs, by Trip Stallings, Vol. 21, No. 3, p. 32.
- Safe at Home? Fighting Family Violence in North Carolina, by Renee Elder, Adrienne Allison, and Mike McLaughlin, Vol. 21, No. 4, p. 2.
- State Superintendent of Public Instruction's 10-Point Plan To Close the Achievement Gap Between Whites and Minority Students, Vol. 21, Nos. 1-2, p. 101.
- State Working Hard To Address the Achievement Gap While Balancing the Needs of All Students, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 90.
- Title I and No Child Left Behind, by Trip Stallings, Vol. 21, No. 3, August 2004, p. 41.
- What's in Store for Schools Not Progressing Under No Child Left Behind, Vol. 21, No. 3, p. 45.
- **Courts:** Deliberate Supreme Court Accelerates Pace on Matters of Taxation and Education, by Katherine White, Vol. 21, No. 4, p. 90.
- Family Court—A New Vehicle for Addressing Domestic Discord, by Renee Elder and Mike McLaughlin, Vol. 21, No. 4, p. 73.
- Criminal Justice: Conclusions and Recommendations for Fighting Family Violence, by Mike McLaughlin, Vol. 21, No. 4, p. 83.
- Family Court—A New Vehicle for Addressing Domestic Discord, by Renee Elder and Mike McLaughlin, Vol. 21, No. 4, p. 73.

- Funding for Domestic Violence Services in North Carolina, by Adrienne Allison, Vol. 21, No. 4, p. 34.
- Infant Abandonment: A Unique Form of Child Maltreatment, by Lori Feezor, Vol. 21, No. 4, p. 88.
- Resources on Domestic and Family Violence, by Tammy Bromley, Vol. 21, No. 4, p. 32.
- Safe at Home? Fighting Family Violence in North Carolina, by Renee Elder, Adrienne Allison, and Mike McLaughlin, Vol. 21, No. 4, p. 2.
- State-Funded County Level Programs for Victims of Domestic Violence, Vol. 21, No. 4, p. 57.
- What Is the Impact of Race and Ethnicity on Outcomes in Public Policy? by Joanne Scharer, Vol. 21, Nos. 1–2, p. 16.
- What the Polls Show About Attitudes Toward Public Policy and Race Relations: Race Matters, by Lynn Bonner, Vol. 21, Nos. 1–2, p. 104.
- **Demographics:** The Condition of African Americans Improves—But Has a Ways To Go, by Ran Coble and Mike McLaughlin, Vol. 21, Nos. 1–2, p. 12.
- John Hope Franklin's Perspective on Racial Progress, Vol. 21, Nos. 1–2, p. 34.
- North Carolina's Changing Demographic Mix: New Challenges for State Government, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 2.
- Recommendations on Race, Ethnicity, and Public Policy Outcomes, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 66.
- **Domestic Violence:** Conclusions and Recommendations for Fighting Family Violence, by Mike McLaughlin, Vol. 21, No. 4, p. 83.
- Family Court—A New Vehicle for Addressing Domestic Discord, by Renee Elder and Mike McLaughlin, Vol. 21, No. 4, p. 73.
- Funding for Domestic Violence Services in North Carolina, by Adrienne Allison, Vol. 21, No. 4, p. 34.
- Infant Abandonment: A Unique Form of Child Maltreatment, by Lori Feezor, Vol. 21, No. 4, p. 88.
- Resources on Domestic and Family Violence, by Tammy Bromley, Vol. 21, No. 4, p. 32.

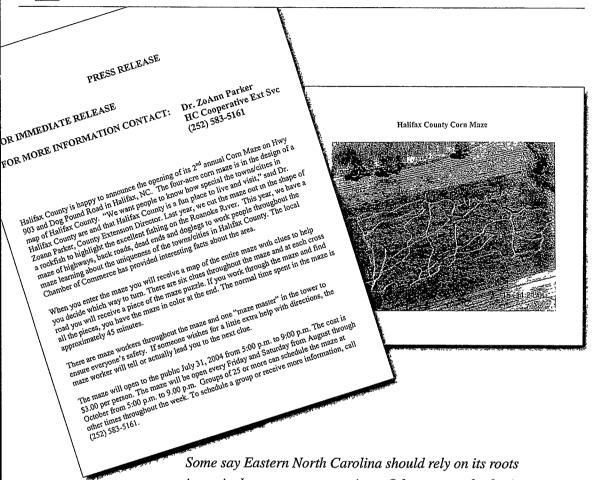
- Safe at Home? Fighting Family Violence in North Carolina, by Renee Elder, Adrienne Allison, and Mike McLaughlin, Vol. 21, No. 4, p. 2.
- State-Funded County Level Programs for Victims of Domestic Violence, Vol. 21, No. 4, p. 57.
- **Economy:** What Is the Impact of Race and Ethnicity on Outcomes in Public Policy? by Joanne Scharer, Vol. 21, Nos. 1–2, p. 16.
- **Education:** Cracking the Education-ese Code: Acronyms and Their Definitions, by Trip Stallings, Vol. 21, No. 3, p. 37.
- Deliberate Supreme Court Accelerates Pace on Matters of Taxation and Education, by Katherine White, Vol. 21, No. 4, p. 90.
- Educational Achievement: Bridging the Gap? by Kerra L. Bolton, Vol. 21, Nos. 1–2, p. 76.
- Federal Foray into School Accountability Brings Outcry from the States, by Mike McLaughlin, Vol. 21, No. 3, p. 53.
- Is the Federal "No Child Left Behind" Law an Unfunded Mandate on the States? by Mike McLaughlin, Vol. 21, No. 3, p. 47.
- Pass/Fail: Meeting the Challenges of the State ABC and Federal "No Child Left Behind" Accountability Programs, by Trip Stallings, Vol. 21, No. 3, p. 32.
- Recommendations To Address the Teacher Shortage in North Carolina, by Mike McLaughlin, Vol. 21, No. 3, p. 29.
- The Shortage of Teachers in North Carolina: Can We Attract and Retain Enough? by Dana Damico, Volume 21, No. 3, p. 2.
- State Superintendent of Public Instruction's 10-Point Plan To Close the Achievement Gap Between Whites and Minority Students, Vol. 21, Nos. 1–2, p. 101.
- State Working Hard To Address the Achievement Gap While Balancing the Needs of All Students, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 90.
- Title I and No Child Left Behind, by Trip Stallings, Vol. 21, No. 3, August 2004, p. 41.
- What Is the Impact of Race and Ethnicity on Outcomes in Public Policy? by Joanne Scharer, Vol. 21, Nos. 1–2, p. 16.
- What's in Store for Schools Not Progressing Under No Child Left Behind, Vol. 21, No. 3, August 2004, p. 45
- What the Polls Show About Attitudes Toward Public Policy and Race Relations: Race Matters, by Lynn Bonner, Vol. 21, Nos. 1–2, p. 104.
- **Family Violence:** Conclusions and Recommendations for Fighting Family Violence, by Mike McLaughlin, Vol. 21, No. 4, p. 83.

- Family Court—A New Vehicle for Addressing Domestic Discord, by Renee Elder and Mike McLaughlin, Vol. 21, No. 4, p. 73.
- Funding for Domestic Violence Services in North Carolina, by Adrienne Allison, Vol. 21, No. 4, p. 34.
- Infant Abandonment: A Unique Form of Child Maltreatment, by Lori Feezor, Vol. 21, No. 4, p. 88.
- Resources on Domestic and Family Violence, by Tammy Bromley, Vol. 21, No. 4, p. 32.
- Safe at Home? Fighting Family Violence in North Carolina, by Renee Elder, Adrienne Allison, and Mike McLaughlin, Vol. 21, No. 4, p. 2.
- State-Funded County Level Programs for Victims of Domestic Violence, Vol. 21, No. 4, p. 57.
- From the Center Out: Democrat-Republican Coalition Members Tops in Effectiveness Rankings, by Sam Watts, Vol. 21, No. 3, p. 58.
- New Generation of Influential Lobbyists Emerges in Center's Rankings, by Sam Watts, Vol. 21, No. 4, p. 103.
- **Health Care:** Summary of Health Outcomes: Minorities Fare Worse Than the White Majority, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 49.
- What Is the Impact of Race and Ethnicity on Outcomes in Public Policy? by Joanne Scharer, Vol. 21, Nos. 1–2, p. 16.
- **Housing:** What Is the Impact of Race and Ethnicity on Outcomes in Public Policy? by Joanne Scharer, Vol. 21, Nos. 1–2, p. 16.
- **Intergovernmental Relations:** Cracking the Education-ese Code: Acronyms and Their Definitions, by Trip Stallings, Vol. 21, No. 3, p. 37.
- Federal Foray into School Accountability Brings Outcry from the States, by Mike McLaughlin, Vol. 21, No. 3, p. 53.
- Is the Federal "No Child Left Behind" Law an Unfunded Mandate on the States? by Mike McLaughlin, Vol. 21, No. 3, p. 47.
- Pass/Fail: Meeting the Challenges of the State ABC and Federal "No Child Left Behind" Accountability Programs, by Trip Stallings, Vol. 21, No. 3, p. 32.
- Title I and No Child Left Behind, by Trip Stallings, Vol. 21, No. 3, p. 41.
- Legislature: Democrat-Republican Coalition Members Tops in Effectiveness Rankings, by Sam Watts, Vol. 21, No. 3, p. 58.
- New Generation of Influential Lobbyists Emerges in Center's Rankings, by Sam Watts, Vol. 21, No. 4, p. 103.

- **Lobbyists:** New Generation of Influential Lobbyists Emerges in Center's Rankings, by Sam Watts, Vol. 21, No. 4, p. 103.
- **Local Government:** The Shortage of Teachers in North Carolina: Can We Attract and Retain Enough? by Dana Damico, Vol. 21, No. 3, p. 2.
- State-Funded County Level Programs for Victims of Domestic Violence, Vol. 21, No. 4, p. 57.
- **Nonprofits:** Resources on Domestic and Family Violence, by Tammy Bromley, Vol. 21, No. 4, p. 32.
- **Polls:** What the Polls Show About Attitudes Toward Public Policy and Race Relations: Race Matters, by Lynn Bonner, Vol. 21, Nos. 1–2, p. 104.
- **Poverty:** What Is the Impact of Race and Ethnicity on Outcomes in Public Policy? by Joanne Scharer, Vol. 21, Nos. 1–2, p. 16.
- Race and Ethnicity: The Condition of African Americans Improves—But Has a Ways To Go, by Ran Coble and Mike McLaughlin, Vol. 21, Nos. 1–2, p. 12.
- Educational Achievement: Bridging the Gap? by Kerra L. Bolton, Vol. 21, Nos. 1–2, p. 76.
- John Hope Franklin's Perspective on Racial Progress, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 34.
- North Carolina's Changing Demographic Mix: New Challenges for State Government, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 2.
- Recommendations on Race, Ethnicity, and Public Policy Outcomes, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 66.
- State Superintendent of Public Instruction's 10-Point Plan To Close the Achievement Gap Between Whites and Minority Students, Vol. 21, Nos. 1–2, p. 101.
- State Working Hard To Address the Achievement Gap While Balancing the Needs of All Students, by Mike McLaughlin, Vol. 21, Nos. 1–2, p. 90.
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- State-Funded County Level Programs for Victims of Domestic Violence, Vol. 21, No. 4, p. 57.

MEMORABLE MEMO



in agriculture to attract tourists. Others argue for heritage tourism. Halifax County officials decided to try both with a corn maze shaped like a county map. How did it happen? Let's take a look. For a mere \$3, visitors to the site on Dog Pound Road wandered down dead ends, dog legs, and blind alleys in search of clues that would lead them out of the maze. The clues? Kernels of wisdom about Halifax County as a great place to live and visit. But the good folks of Halifax County were too kind to leave anybody lost in the stalks. Shucks, even the truly clueless – those still wandering in the corn field after 45 minutes or so – could rely on maze workers to give them the answers. Sounds corny to us, but dog-gone it, it makes a good memo. We're always on the lookout for those, corny or not. So send 'em if you've got 'em. Or at least send us a few good clues. Anonymity guaranteed.

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126

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