Migration and Geographic Mobility in Metropolitan and Nonmetropolitan America: 1995 to 2000

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Geographic mobility has long been an important aspect of American life, directly affecting both people and geographic areas. At an individual level, moving has a number of potential impacts, such as the potential for expanding economic opportunity or raising residential satisfaction. Given the relative stability of current birth and death rates in the United States, the critical demographic factor for any area's population growth or decline is the movement of people. From the national to the local level, residential mobility, domestic migration, and international migration are paramount to explaining population growth and decline. Finally, federal, state and local governments, as well as the private sector, need to understand where people move when planning needed services, facilities, and businesses.

This report looks at 5-year mobility data from Census 2000 and focuses on migration and mobility patterns for metropolitan areas and territory outside metropolitan areas (hereafter referred to as nonmetropolitan territory) in the United States.[1] The first section addresses general

[1]All mobility and migration data in this report are for the population 5 years old and over. Movers are defined as those who did not live in their current house or apartment 5 years previously; thus, previous residence is measured 5 years prior to the Census and does not track any other moves made within that 5-year period. Similarly, the residence-five-years-ago question does not measure those who moved away from a place of residence and later returned to that same residence during that 5-year period.

The estimates in this report are based on responses from a sample of the population. As with all surveys, estimates may vary from the actual values because of sampling variation or other factors. All comparisons made in this report have undergone statistical testing and are significant at the 90-percent confidence level unless otherwise noted.

Common Migration Terms

Movers can be classified by type of move and are categorized as to whether they moved within the same county, to a different county within the same state, to a different county from a different state or region, or were movers from abroad. *Migration* is commonly defined as moves that cross jurisdictional boundaries (counties in particular), while moves within a jurisdiction are referred to as *residential mobility*. Moves between counties are often referred to as *intercounty* moves, while moves within the same county are often referred to as *intracounty* moves. Further, migration can be differentiated as movement within the United States (*domestic, or internal*, migration) and movement into and out of the United States (*international* migration). *Inmigration* is the number of migrants who moved into an area during a given period, while *outmigration* is the number of migrants who moved out of an area during a given period. *Net migration* is the difference between inmigration and outmigration during a given time. A positive net, or *net inmigration*, indicates that more migrants entered an area than left during that time. A negative net, or *net outmigration*, means that more migrants left an area than entered it.

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Table 1.
Type of Move by Area of Residence in 2000: 1995 to 2000

(Data based on a sample. For information confidentiality protection, sampling error, nonsampling error, and definitions, see *www.census.gov/prod/cen2000/doc/sf3.pdf)*

Residence in 2000	Total, 5 years and over	Same residence (non-movers)	Movers				
			Total	Same county	Different county, same state	Different state	From abroad[1]
NUMBER							
United States	**262,375,152**	**142,027,478**	**120,347,674**	**65,435,013**	**25,327,355**	**22,089,460**	**7,495,846**
Metropolitan	210,418,424	111,658,605	98,759,819	54,506,465	19,393,335	17,984,001	6,876,018
Central city	79,368,285	39,187,934	40,180,351	23,257,702	6,353,320	7,095,376	3,473,953
Suburbs	131,050,139	72,470,671	58,579,468	31,248,763	13,040,015	10,888,625	3,402,065
Nonmetropolitan	51,956,728	30,368,873	21,587,855	10,928,548	5,934,020	4,105,459	619,828
PERCENT							
Total	**100.0**	**54.1**	**45.9**	**24.9**	**9.7**	**8.4**	**2.9**
Metropolitan	100.0	53.1	46.9	25.9	9.2	8.5	3.3
Central city	100.0	49.4	50.6	29.3	8.0	8.9	4.4
Suburbs	100.0	55.3	44.7	23.8	10.0	8.3	2.6
Nonmetropolitan	100.0	58.5	41.5	21.0	11.4	7.9	1.2

[1]This category includes movers from foreign countries, as well as movers from Puerto Rico, U.S. Island Areas, and U.S. minor outlying islands.

Source: U.S. Census Bureau, Census 2000.

mobility patterns for those living in metropolitan areas within central cities, those living in metropolitan areas outside central cities, and those living in nonmetropolitan territory. Section two examines migration patterns for nonmetropolitan residents, and the third section looks at migration patterns to and from metropolitan areas by size, and for the twenty largest metropolitan areas (metropolitan statistical areas [MSAs] and consolidated metropolitan statistical areas [CMSAs]).[2]

This report uses metropolitan areas as defined by the Office of Management and Budget (OMB) as of June 30, 1999. Census 2000 data releases use metropolitan area definitions in existence at the time of the census. This approach ensures that data tabulations and publications associated with Census 2000 use consistent definitions. (New definitions, based on Census 2000 population and commuting data will be announced by OMB in Summer 2003. The metropolitan status of some counties changed when new metropolitan area definitions were announced.)

GEOGRAPHIC MOBILITY BY METROPOLITAN STATUS

Residents of central cities of metropolitan areas were more mobile than suburban residents and those living in nonmetropolitan territory.

Over 120 million (45.9 percent) people 5 years old and older changed residence between 1995 and 2000 (see Table 1).[3] Over half (54.4 percent) of these moves were within counties, followed by moves to different counties in the same state (21.0 percent), moves between states (18.4 percent), and moves from abroad or Puerto Rico (6.2 percent).

People currently living in central cities were most likely to have moved, with 50.6 percent having changed residence within the past 5 years. Suburban residents (those living in metropolitan areas but outside central cities) were somewhat less mobile (44.7 percent), and those living in nonmetropolitan territory were the least mobile, with 41.5 percent reporting having moved within the past 5 years. That central city residents were more mobile than other metropolitan types could be attributable to the population in central cities having a younger age structure and lower homeownership rates than suburban and nonmetropolitan residents (both age and tenure are

[2]More detailed Census 2000 mobility and migration data are available on the Census Bureau's Web site: *www.census.gov/population/www/cen2000/migration.html.*

[3]To ease the flow of the text, numbers have been rounded. Complete numbers are presented in the tables.

Table 2.
Migration Between Nonmetropolitan Territory and Metropolitan Areas: 1975 to 1980, 1985 to 1990, and 1995 to 2000[1]

(Data based on a sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see *www.census.gov/prod/cen2000/doc/sf3.pdf)*

Flow	1975 to 1980	1985 to 1990	1995 to 2000
Metropolitan to Nonmetropolitan	6,618,149	6,020,438	6,166,532
Nonmetropolitan to Metropolitan	5,622,077	5,969,024	5,656,044
Net Migration to Nonmetropolitan territory	996,072	51,414	510,488

[1]The metropolitan status of some counties changed between censuses, as new metropolitan areas were recognized, and some metropolitan areas expanded their boundaries.

Source: U.S. Census Bureau, Decennial censuses of 1980, 1990, and 2000.

strongly correlated with the likelihood of moving).[4]

Suburban areas had the highest number of people who migrated across county borders and from abroad (27.3 million), followed by central city (16.9 million) and nonmetropolitan residents (10.7 million). However, central city residents were more likely to have made an intracounty move (29.3 percent), while nonmetropolitan residents were more likely to have moved to a different county within the state of current residence (11.4 percent). Residents of central cities were more likely to have been movers from abroad or Puerto Rico (4.4 percent) than residents in suburbs (2.6 percent) or in nonmetropolitan counties (1.2 percent).

MIGRATION PATTERNS FOR NONMETROPOLITAN AMERICA

Between 1995 and 2000, more people moved into nonmetropolitan territory from metropolitan areas than vice versa.

Nonmetropolitan-to-metropolitan migration patterns have long interested analysts, particularly during the so-called nonmetropolitan "turnaround" of the 1970s, when inflows to nonmetropolitan territory were greater than outflows for the first time since migration data had been available. The "turnaround" abated in the 1980s, as growth in nonmetropolitan territory slowed dramatically due to modest net outmigration flows. During the 1990s this trend fluctuated, but for the period 1995 to 2000, nonmetropolitan territory showed substantial net migration gain from metropolitan areas.

Table 2 shows migration exchanges between metropolitan and nonmetropolitan territory, as recorded in the censuses of 1980, 1990, and 2000. Between 1995 and 2000, about 6.2 million people moved to nonmetropolitan territory, and about 5.7 million moved in the opposite direction (from nonmetropolitan to metropolitan areas). As a result, nonmetropolitan territory experienced net inmigration of about 500,000 people between 1995 and 2000. Between 1985 and 1990, nonmetropolitan territory experienced a net gain of only about 50,000 people in the exchange of migrants with metropolitan areas. Between 1975 and 1980, nonmetropolitan territory's gain was nearly 1 million. In addition to migration, these numbers reflect changing boundaries, as new metropolitan areas are recognized and as metropolitan areas expand their boundaries.

Recent migration gains to nonmetropolitan territory, however, were not evenly distributed across all nonmetropolitan counties (see Figure 1). While Figure 1 shows that nonmetropoltian counties in a wide variety of settings showed net inmigration between 1995 and 2000, nonmetropolitan counties with high rates of net domestic migration gain were especially prominent near metropolitan areas that experienced relatively high growth rates. Examples include Dawson County, GA (adjacent to the Atlanta MSA); Elbert County, CO (southeast of the Denver CMSA); and Sumter County, FL (northeast of the Tampa-St. Petersburg MSA).[5] The nonmetropolitan county with the greatest net domestic inmigration was Yavapai County, AZ (near Phoenix), while Humboldt County, CA; Geary County, KS; and Cortland County, NY were among nonmetropolitan counties with the greatest net outmigration.[6]

[4]For examples of moving rates by age, see U.S. Census Bureau, 2001, *Geographical Mobility: March 1999 to March 2000,* by Jason Schachter, Current Population Report P20-538, Washington, DC: Government Printing Office.

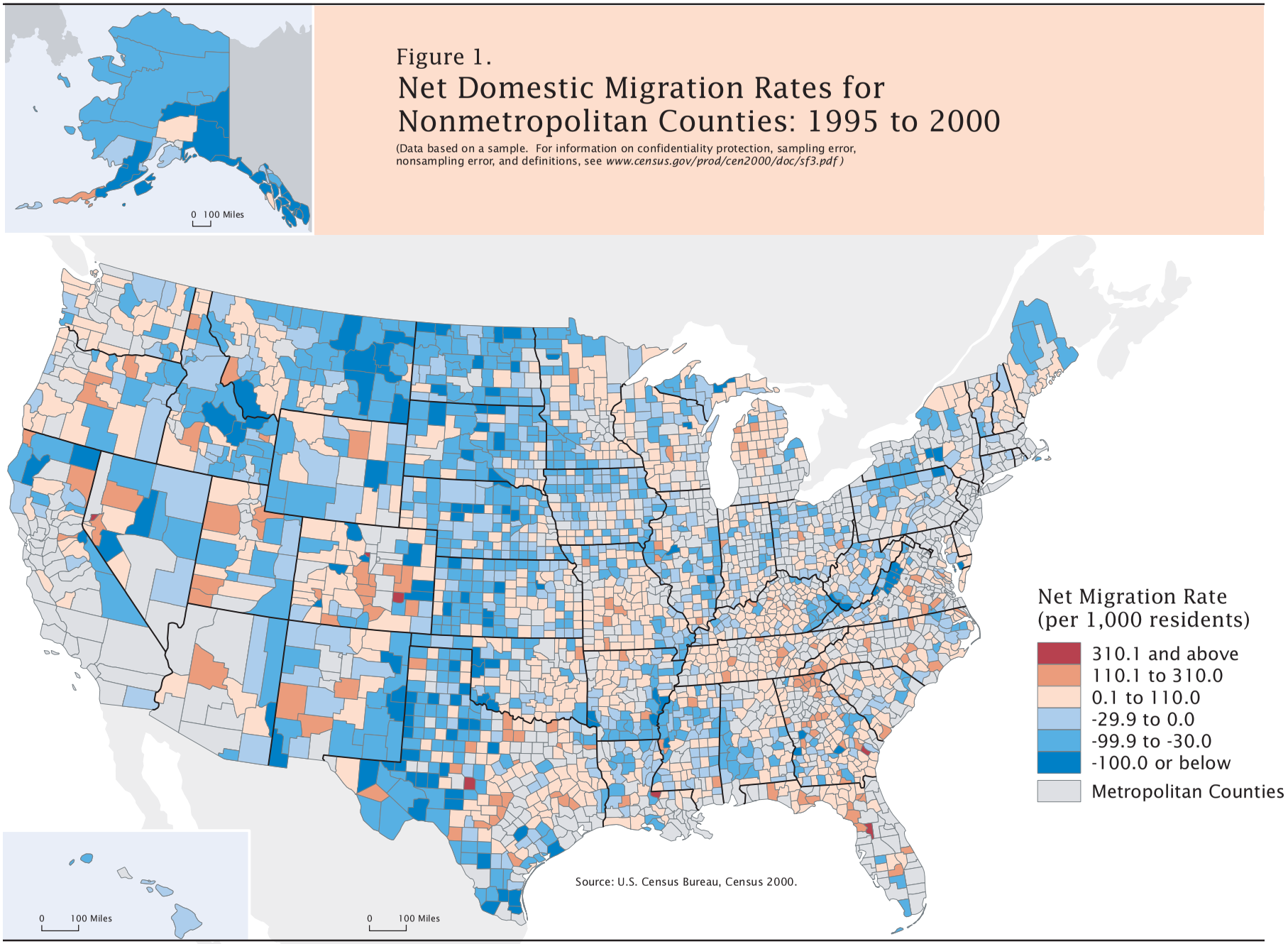
[5]Abbreviated titles of metropolitan areas are used in the text of this report. See Table 4 for the full names of the twenty largest metropolitan areas.

[6]Detailed tables with mobility data for all regions, states, counties (and minor civil divisions in New England), and metropolitan areas are available on the Census Bureau's Web site: *www.census.gov/population/www/cen2000/migration.html.*

Figure 1.

Net Domestic Migration Rates for Nonmetropolitan Counties: 1995 to 2000

(Data based on a sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see *www.census.gov/prod/cen2000/doc/sf3.pdf*)



Source: U.S. Census Bureau, Census 2000.

Table 3.
Net Domestic Migration and Movers From Abroad by Size Category of Metropolitan Area: 1995 to 2000

(Data based on a sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see *www.census.gov/prod/cen2000/doc/sf3.pdf)*

Size of area	Net domestic migration		Movers from abroad[2]
	Number	Rate[1]	
Total for all metropolitan areas	**–510,488**	**–2.5**	**6,876,018**
Less than 250,000	141,551	8.0	317,739
250,000 to 999,999	217,771	5.3	880,525
1,000,000 to 1,999,999	714,246	21.7	897,506
2,000,000 to 4,999,999	526,968	14.8	1,437,974
5,000,000 or more	–2,111,024	–27.4	3,342,274

[1]The net migration rate is based on an approximated 1995 population, which is the sum of people who reported living in the area in both 1995 and 2000, and those who reported living in that area in 1995 but now live elsewhere. The net migration rate divides net migration, inmigration minus outmigration, by the approximated 1995 population and multiplies the result by 1000.

[2]This category includes movers from foreign countries, as well as movers from Puerto Rico, U.S. Island Areas, and U.S. minor outlying islands.

Note: A negative value for net migration or the net migration rate is indicative of net outmigration, meaning that more migrants left an area than entered it. Positive numbers reflect net inmigration to an area.

Source: U.S. Census Bureau, Census 2000.

MIGRATION TO METROPOLITAN AREAS

The highest levels of net inmigration were found in mid-sized metropolitan areas of 1 to 2 million people.

Although Census 2000 showed renewed gains in net migration for many nonmetropolitan counties, the sheer numbers of migrants into metropolitan areas remained high. Between 1995 and 2000, nearly 25.8 million individuals were inmigrants to metropolitan areas. This flow was counteracted, however, by outmigration of 26.3 million people. The result was net outmigration of around 500,000 people, or a net migration rate of –2.5 (see Table 3).[7]

When all metropolitan areas are classified by size category, a more varied picture emerges, as can be seen for five categories of metropolitan areas shown in Table 3. Net migration from other parts of the United States was positive for all size categories except the largest, which covers all areas with a total population greater than 5 million in 2000. For the largest metropolitan area category, the net migration rate was –27.4, meaning there was a net loss of 27 people from those metropolitan areas for every 1,000 residents in 1995. Metropolitan areas in all other size categories experienced net migration gains during this period, although some saw more net inmigration than others. The two size classes under 1 million, for example, gained 8.0 and 5.3 migrants for every 1,000 residents, respectively, in 1995. In comparison, the net migration rate for the 2 to 5 million class was 14.8, much higher than the size classes under 1 million. Metropolitan areas with populations between 1 and 2 million experienced the greatest net inmigration; net migration to these areas was about 700,000, or a net migration rate of 21.7. Examples in this category were Las Vegas, NV; Orlando, FL; Austin, TX; and Charlotte, NC.

Movers from abroad are an increasingly large and important component of migration, particularly for the largest metropolitan areas. Of the 6.9 million people who moved to metropolitan areas from abroad, most went to the largest metropolitan areas (Table 3). The number of movers from abroad tended to decrease as size of the metropolitan areas decreased. Thus, metropolitan areas of 5 million or more received almost half of all people who moved from abroad to metropolitan areas. The smallest category, metropolitan areas with 250,000 or fewer residents, received over 300,000 migrants from abroad.

The net effect of domestic migration and movers from abroad varied even among the largest metropolitan areas. Migration figures for the 20 largest metropolitan areas, shown in Table 4, provide insight into migration patterns of the United States' largest metropolitan areas, the majority of which experienced net domestic outmigration

[7]The net migration rate in this report is based on an approximated 1995 population, which is the sum of people who reported living in the area in both 1995 and 2000, and those who reported living in that area in 1995 but now live elsewhere. The net migration rate divides net migration, inmigration minus outmigration, by the approximated 1995 population and multiplies the result by 1000.

Table 4.
Net Domestic Migration and Movers From Abroad for the 20 Largest Metropolitan Areas: 1995 to 2000

(Data based on a sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see *www.census.gov/prod/cen2000/doc/sf3.pdf)*

Rank	Metropolitan area	Total population in 2000	Net domestic migration		Movers from abroad[1]	
			Number	Rate[2]	To central city (cities)	To suburbs
1	New York-Northern New Jersey-Long Island, NY-NJ-CT-PA CMSA	21,199,865	–874,028	–44.4	614,057	369,602
2	Los Angeles-Riverside-Orange County, CACMSA	16,373,645	–549,951	–36.8	324,013	375,560
3	Chicago-Gary-Kenosha, IL-IN-WI CMSA	9,157,540	–318,649	–37.6	172,597	150,422
4	Washington-Baltimore, DC-MD-VA-WV CMSA	7,608,070	–58,849	–8.6	65,837	234,429
5	San Francisco-Oakland-San Jose, CA CMSA	7,039,362	–206,670	–32.2	194,220	179,649
6	Philadelphia-Wilmington-Atlantic City, PA-NJ-DE-MD CMSA	6,188,463	–83,539	–14.5	58,131	69,790
7	Boston-Worcester-Lawrence, MA-NH-ME-CT CMSA	5,819,100	–44,973	–8.5	99,790	93,708
8	Detroit-Ann Arbor-Flint, MI CMSA	5,456,428	–123,009	–24.2	36,179	72,796
9	Dallas-Fort Worth, TX CMSA	5,221,801	148,644	33.6	151,679	79,815
10	Houston-Galveston-Brazoria, TX CMSA	4,669,571	–14,377	–3.5	138,826	75,442
11	Atlanta, GA MSA	4,112,198	233,303	68.4	15,975	146,997
12	Miami-Fort Lauderdale, FL CMSA	3,876,380	–93,774	–27.4	60,493	239,412
13	Seattle-Tacoma-Bremerton, WA CMSA	3,554,760	39,945	12.6	47,001	75,765
14	Phoenix-Mesa, AZ MSA	3,251,876	245,159	93.6	104,609	30,408
15	Minneapolis-St. Paul, MN-WIMSA	2,968,806	34,207	12.9	31,145	34,975
16	Cleveland-Akron, OH CMSA	2,945,831	–65,914	–23.7	13,969	22,288
17	San Diego, CA MSA	2,813,833	–6,108	–2.4	63,695	45,127
18	St. Louis, MO-IL MSA	2,603,607	–43,614	–17.9	13,915	21,432
19	Denver-Boulder-Greeley, CO CMSA	2,581,506	93,586	42.3	44,472	49,498
20	Tampa-St. Petersburg-Clearwater, FL MSA	2,395,997	103,375	49.5	24,728	42,936

[1]This category includes movers from foreign countries, as well as movers from Puerto Rico, U.S. Island Areas, and U.S. minor outlying islands.

[2]The net migration rate is based on an approximated 1995 population, which is the sum of people who reported living in the area in both 1995 and 2000, and those who reported living in that area in 1995 but now live elsewhere. The net migration rate divides net migration, inmigration minus outmigration, by the approximated 1995 population and multiplies the result by 1000.

Note: A negative value for net migration or the net migration rate is indicative of net outmigration, meaning that more migrants left an area than entered it. Positive numbers reflect net inmigration to an area.

Source: U.S. Census Bureau, Census 2000.

between 1995 and 2000. In fact, the sole exception among the ten largest metropolitan areas was Dallas-Fort Worth, which had a net domestic migration rate of 33.6. The net migration rates for the remaining top 10 metropolitan areas varied from –3.5 in Houston to –44.4 for New York, the largest metropolitan area in the country. Among the second tier of top 20 metropolitan areas, most had positive net migration, and only four experienced negative net outmigration during this period: Miami (-27.4), Cleveland (-23.7), St. Louis (-17.9), and San Diego (-2.4). The net migration rate for the Phoenix metropolitan area, the 14th largest metropolitan area in the country, was 93.6, the highest net inmigration rate found in the top 20 metropolitan areas, while the second highest was for Atlanta at 68.4.

The number of movers from abroad was positively correlated with the size of the metropolitan area. As a result, of the top 20 metropolitan areas, the New York CMSA received the largest number of movers from abroad, close to 1 million (see Table 4). Movers from abroad to metropolitan areas are subdivided in Table 4 into those who moved to the central city and those who moved to the suburbs (the part of metropolitan areas outside central cities). The traditional concept about the destinations of movers from abroad, particularly those immigrating to the United States, has been that they first settle in the central city, and then move elsewhere. In 12 of the top 20 metropolitan areas, however, more movers from abroad went to the suburbs than went to the central city between 1995 and 2000. Although this imbalance tended to be concentrated in the lower half of the top 20, several of the largest metropolitan areas, including Los Angeles (ranked 2nd) and Washington-Baltimore (ranked 4th), experienced higher numbers of movers from abroad to their suburbs than to their central cities.

SUMMARY

Although nonmetropolitan residents were less likely to change residence than metropolitan residents, nonmetropolitan counties showed substantial net migration gain from metropolitan counties. Nonmetropolitan net migration gain was particularly high in counties near metropolitan areas, while the largest metropolitan areas (over 5 million) lost population, and medium-sized metropolitan areas gained population, due to domestic migration. Movers from abroad helped offset this domestic migration loss in the largest metropolitan areas, while also contributing to the growth of other metropolitan areas. Whether movers from abroad went to central cities or suburbs varied by specific MSA/CMSA.

ACCURACY OF THE ESTIMATES

The data contained in this report are based on the sample of households who responded to the Census 2000 long form. Nationally, approximately 1 out of every 6 housing units was included in this sample. As a result, the sample estimates may differ somewhat from the 100-percent figures that would have been obtained if all housing units, people within those housing units, and people living in group quarters had been enumerated using the same questionnaires, instructions, enumerators, and so forth. The sample estimates also differ from the values that would have been obtained from different samples of housing units, people within those housing units, and people living in group quarters. The deviation of a sample estimate from the average of all possible samples is called the sampling error.

In addition to the variability that arises from the sampling procedures, both sample data and 100-percent data are subject to nonsampling error. Nonsampling error may be introduced during any of the various complex operations used to collect and process data. Such errors may include: not enumerating every household or every person in the population, failing to obtain all required information from the respondents, obtaining incorrect or inconsistent information, and recording information incorrectly. In addition, errors can occur during the field review of the enumerators' work, during clerical handling of the census questionnaires, or during the electronic processing of the questionnaires.

Nonsampling error may affect the data in two ways: (1) errors that are introduced randomly will increase the variability of the data and, therefore, should be reflected in the standard errors; and (2) errors that tend to be consistent in one direction will bias both sample and 100-percent data in that direction. For example, if respondents consistently tend to underreport their incomes, then the resulting estimates of households or families by income category will tend to be understated for the higher income categories and overstated for the lower income categories. Such biases are not reflected in the standard errors.

While it is impossible to completely eliminate error from an operation as large and complex as the decennial census, the Census Bureau attempts to control the sources of such error during the data collection and processing operations. The primary sources of error and the programs instituted to control error in Census 2000 are described in detail in Summary File 3 Technical Documentation under Chapter 8, "Accuracy of the Data," located at *www.census.gov/prod/cen2000/doc/sf3.pdf*.

All statements in this Census 2000 report have undergone statistical testing and all comparisons are significant at the 90-percent confidence level, unless otherwise noted. The estimates in tables, maps, and other figures may vary from actual values due to sampling and nonsampling errors. As a result, estimates in one category may not be significantly different from estimates assigned to a different category. The estimates in tables, maps, and other figures may vary from actual values due to sampling and nonsampling errors. As a result, estimates in one category may not be significantly different from estimates assigned to a different category. Further information on the accuracy of the data is located at *www.census.gov/prod/cen2000/doc/sf3.pdf.* For further information on the computation and use of standard errors, contact the Decennial Statistical Studies Division at 301-763-4242.

FOR MORE INFORMATION

More detailed information on Census 2000 migration products, including additional tables and other product announcements, is available on the Internet and can be accessed via the Census Bureau's decennial migration Web page at:
www.census.gov/population/www/cen2000/migration.html

The decennial migration Web page contains additional detailed migration tables not included in this report, a schedule of upcoming migration data releases, and migration-related Census 2000 Special Reports.

For more information on decennial migration products, please contact:

Population Distribution Branch
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Census 2000 information and data can also be accessed via the Census 2000 Gateway Web page at: *www.census.gov/main/www/cen2000.html.*

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