

Assessing Changing Employment Trends Driving Commercial Real Estate Development

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The NAIOP Research Foundation was established in 2000 as a 501(c)(3) organization to support the work of individuals and organizations engaged in real estate development, investment and operations. The Foundation's core purpose is to provide these individuals and organizations with the highest level of research information on how real properties, especially office, industrial and mixed-use properties, impact and benefit communities throughout North America. The initial funding for the Research Foundation was underwritten by NAIOP and its Founding Governors with an endowment fund established to fund future research. For more information, visit www.naiopr.org.

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Requests for funding should be submitted to research@naiop.org. For additional information, please contact Sheila Vertino, NAIOP Research Foundation, 2201 Cooperative Way, Herndon, VA, 20171, at (703) 904-7100, ext. 121 or vertino@naiop.org.

About This Report

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Executive Summary

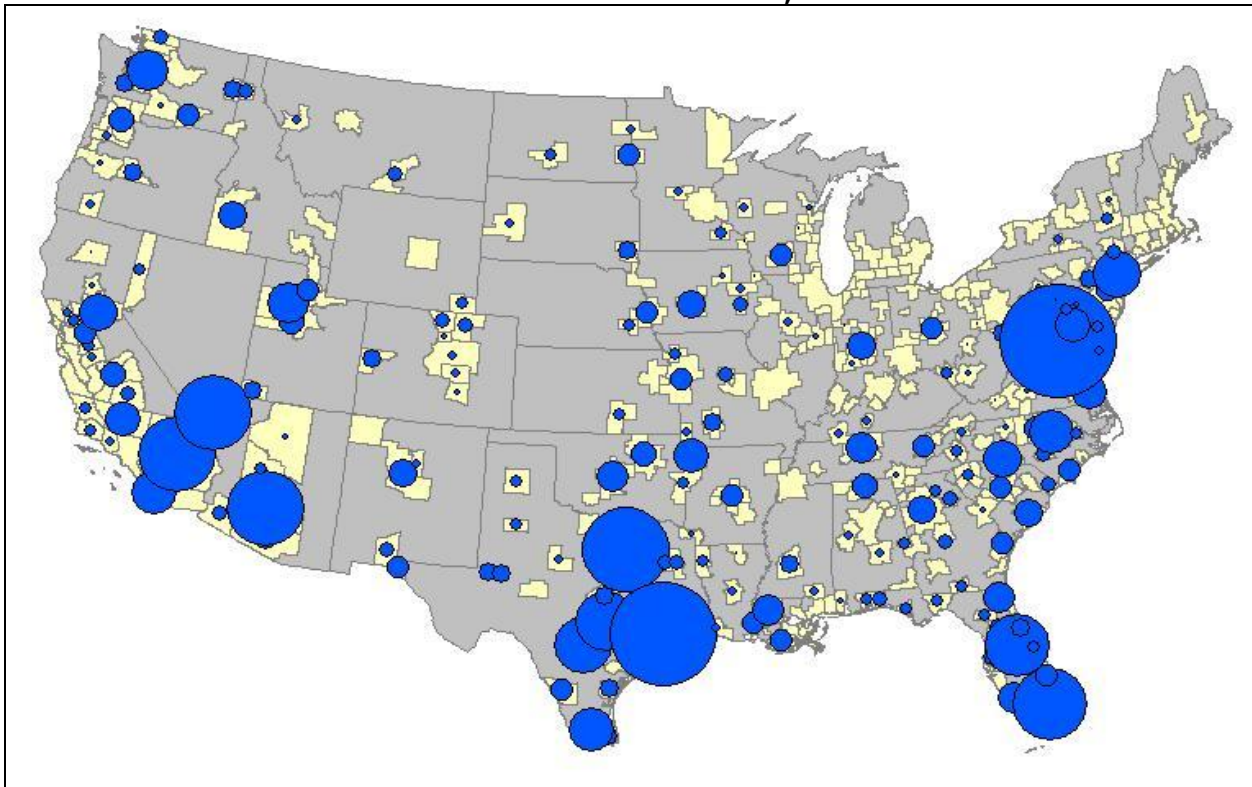
Trends in employment are very important to developers, lenders, and others interested in the health of the commercial real estate industry. From January 2000 through December 2007, total employment in the U.S. rose at an average annual rate of 0.7 percent. *Office employment* rose 0.9 percent annually, as the nation's workforce shifted increasingly into services. In contrast, *industrial employment* declined an average of -2.6 percent a year.

The Demand for Office and Industrial Space

The demand for office or industrial space is related to the number of office or industrial workers that firms employ as well as the price of space. A demand study of the office market focusing on a cross section of metropolitan areas shows a price elasticity of -0.62 and an employment elasticity of 1.12. These results indicate that office demand is relatively unresponsive to a change in rents, thus, a 1 percent increase in office rent is associated with a -0.62 percent decline in the demand for space. On the other hand, because office demand is very responsive to a change in employment, a 1 percent rise in employment is associated with a 1.12 percent increase in space demand.

A similar study of the demand for industrial space yields a price elasticity of -1.15 and an employment elasticity of 0.54. These results indicate that the demand for industrial space is very responsive to a change in rents: a 1 percent increase in industrial rent is associated with a 1.15 percent decline in the demand for space. On the other hand, industrial demand is relatively unresponsive to a change in employment: a 1 percent rise in industrial employment is associated with a 0.54 percent increase in space demand.

Net Job Growth in Metro Areas, 2000-09



Trends in Employment Growth

Looking at employment growth in 293 MSAs reveals there were a total of 2.5 million net new jobs created between January 2000 and June 2009. Most of these jobs were in cities on the East Coast, in Texas, and in the West. Washington, D.C., with a net gain in jobs of 346,800, had the largest number of net new jobs. It was followed by Houston and Dallas-Fort Worth with gains of 307,800 and 213,600 respectively. Among cities that lost employment during 2000-09, Detroit was the biggest loser, followed by Chicago and San Francisco. Interestingly, seven of the top 20 job losing metro areas are in the Sunbelt, which is normally considered an area of strong job growth.

Looking at the office market, the top 10 largest generators of office market jobs are all in the Sunbelt. The Washington, D.C., area is first, creating 118,700 net new office jobs since 2000. It is followed by Houston and Miami, where 54,400 and 52,400 office jobs were generated.

In the industrial sector, the total number of industrial jobs declined by 3.7 million since 2000 in the 293 MSAs tracked. Not all cities lost industrial jobs, although the magnitude of their job gains has been modest. Industrial employment gains have been concentrated in cities in the Sunbelt and the far west. The biggest gainers are Las Vegas, with 3,500 net new industrial jobs and Bakersfield, Calif., and Fort Walton Beach, Fla., with 2,900 and 1,700 respectively.

Recession Induced Changes

Since the recession began in December 2007, only 21 of the 293 metro areas (seven percent) have recorded increases in employment. Ten of the 21 MSAs that have had employment gains are in Texas. The largest employment gain since the onset of the recession has been in Austin, Texas with an increase of 5,900 jobs. It is followed by McAllen, Texas (3,300); Killeen, Texas (2,900); Odessa, Texas (2,700); and Kennewick, Wash. (2,700).

The biggest employment losses recorded since the recession started have been in the country's largest metro areas: Los Angeles (-293,300), New York (-243,100) and Chicago (-237,500). Large losses also have been recorded in formerly rapidly growing areas of the Sunbelt like Phoenix (-187,900), Atlanta (-152,000) and Miami (-141,700).

Office employment has increased in only 13 of the 293 cities (4 percent) since the recession began. The largest of these very modest increases have been in Austin, Texas (4,800), Charleston, S.C. (1,100), and Fayetteville, Ark. (700). The biggest declines in office employment have been in New York (-131,200), Los Angeles (-104,200), and Chicago (-90,900).

Patterns of Metropolitan and Nonmetropolitan Growth

Overall employment in metropolitan counties grew 0.68 percent annually during 2000-07, while non-metropolitan areas increased just 0.37 percent. Within metropolitan counties, the growth of total employment was substantially more rapid in counties on the metropolitan fringe than in larger, center city counties. Total employment grew 0.63 percent annually in center-city counties, compared to an increase of 1.56 percent in counties on the metro fringe. However, the higher gains in fringe areas came off a much

lower employment base. The absolute number of jobs created in central city counties was more than seven times as large.

Since the onset of the recession, U.S. employment from the household survey has fallen at an average annual rate of -4.85 percent. The fall off in employment has been more than twice as rapid in metropolitan counties than in non-metropolitan areas. Within metro areas, the decline in jobs has been most rapid in counties on the metropolitan fringe. However, outside metropolitan areas, the pattern has been exactly reversed, with more outlying areas sustaining smaller rates of job loss. By far the most rapid rates of job loss have occurred in the eastern half of the country and on the west coast. Areas of employment gain are concentrated in the middle of the country, west of the Mississippi.

Factors Fostering Growth and Decline

A look at metro areas since 2000 shows wide variation in the rate of employment growth. An analysis of 293 metropolitan areas reveals that six factors were most important in determining the pace of metro growth during 2000-09.

Positive Factors

1. High percent of the workforce with advanced degrees (masters and above)
2. High racial/ethnic diversity of the population

Negative Factors

3. High marginal income tax rate
4. High percent of employment in manufacturing
5. Large population
6. High per capita income (PCI)

The pace of metro employment growth since the start of the recession in 2007 was found to be dependent on a somewhat different set of factors. Here five factors were found to be most significantly related to the pace of growth:

1. High marginal income tax rate
2. High percent of employment in manufacturing
3. Large population
4. High per capita income
5. Large percentage of owner-occupied housing

In each case, the five factors listed above were found to be negatively associated with employment growth, that is, in those areas where the five factors are highest, metro growth is slowest.

The analysis also examined whether the same factors similarly influence the growth of office and industrial employment during 2000-09. Although the correlation between the growth in total employment and the growth of office and industrial employment is quite high, the factors that shape the growth of employment in office and industrial employment are not exactly the same as those that influence the growth of employment overall. In the case of office employment, only manufacturing intensity, population size and per capita income were found to significantly affect the growth of office employment. As with total employment growth, the three factors were negatively associated with the growth of office employment.

For industrial employment growth, the only two factors found to significantly affect growth rates were manufacturing intensity and population size. Both factors were negatively associated with the growth of industrial employment.

Assessing the Potential for Future Growth

Using updated economic and demographic information, the analysis ranks each of the 293 metro areas in terms of its prospects for future employment growth. The areas of highest growth potential are mainly in the southern half of the country, although cities of slow potential growth are also in the south and far west. The highest potential growth areas are Laredo, Texas and McAllen, Texas. The lowest potential growth areas are Elkhart-Goshen, Ind., and Sheboygan, Wis.

Among the nation's 50 largest metro areas, San Antonio, Texas; Las Vegas, Nev.; Orlando, Fla.; and Miami, Fla., are ranked as the areas of highest growth potential. These cities have no state income tax, a low percentage of employment in manufacturing and high racial and ethnic diversity.

The areas of lowest potential are San Jose, Calif.; Minneapolis-St. Paul, Minn.; Cincinnati, Ohio; and Milwaukee, Wis. While San Jose has a large fraction of its work force with advanced degrees and a high index of diversity, these advantages are offset by California's high state income tax and the area's high involvement in manufacturing. The low rankings for Minneapolis, Cincinnati and Milwaukee stem from the areas' high state taxes and manufacturing involvement coupled with low diversity and a relatively small percentage of workers with advanced education.

Projected Potential Employment Growth

(high potential shown in shades of blue, low potential in shades of red)

