American Demographics

There is always a danger when making long-range projections that the world as we know it may be turned upside down and remade in ways that no linear forecast can capture. Consider predictions in the mid-19th century that New York City would be buried in several feet of horse manure a century later. That thought was based on estimated population growth, transportation demand, and equine feces production. The invention of internal combustion spared the city from mountains of manure, but in the process polluted its air and helped alter the world's climate. Exit one anticipated problem, enter another unpredictable one.

In a similar vein, estimating how many people will inhabit the U.S. in 2100 is partly folly. Century-forward population predictions have been tried in the past, and most of them have been spectacularly off the mark.

Imagine trying to project the U.S. population in 2009 from the vantage point of 1909. The waves of immigrants coming to the U.S. in the early 1900s and the sky-high birth rate at the time would signal robust growth over the next century, but a 1924 law severely limiting immigration and a big drop in fertility due to depression and war dampened these numbers.

Conversely, a post-World War II baby boom (1948–1964) and a 1965 law expanding immigration added millions to the nation and bumped the U.S. growth rate back up. In the end, the nation's population managed to more than triple—growing from about 92 million in 1909 to about 306 million today. Most turn-of-the-20th-century estimates had the nation at 300 million by the middle of the 20th century, whereas that number was reached only in 2006.

So what is the official U.S. projection for the next 100 years? In 2000, as part of the worldwide millennium celebration, the Census Bureau projected U.S. population to the year 2100. Following its usual method, the agency developed three scenarios—low, medium, and high growth.

The lowest estimate predicted almost no population growth from the year 2000, with a starting population of 275 million and a population of perhaps 300 million by 2100 (whereas, again, the nation reached that level only a few years after this estimate was made). This scenario assumed a below-replacement-level fertility rate of 1.6 children per woman and sharp limits on immigration.

The middle scenario assumed fertility at slightly above replacement level and just fewer than one million immigrants per year. The result is a doubling of the 2000 population—or 571 million Americans—in 2100.
People, places, and densities a century from now.
By Robert E. Lang, Mariela Alfonzo, and Casey Dawkins

The high-growth scenario assumes that immigration will keep increasing and that high fertility among immigrants will lift the rate to 2.7 births per woman. Under this scenario, the U.S. population in 2100 clocks in at 1.2 billion—slightly larger than India’s current number and just behind the figure in today’s China.

Cornucopians versus doomsters

Is there a China-sized population in our future? That depends on whom you ask. At the 2008 American Planning Association Conference in Las Vegas, our colleague Arthur C. Nelson, FAICP (now at the University of Utah), presented the case that we are on track to hit the census’s high projection. He based his prediction in part on immediate past performance. Since 2000—the starting point for the Census Bureau’s century-long projection—the U.S. has gained people on the high side of the range. It could even reach 311 million residents by 2010, which is the upper benchmark for the decade (although it is more likely to fall a few million people shy of the mark).

As with the census’s high estimate, Nelson assumes continued immigration and high fertility, but he also adds much longer life expectancy. He argues, too, that the U.S. can sustain many more people than it does now in part because Americans can build much denser urban environments than we have currently. Nelson even speculates that all additional population growth to 2100 can fit onto the nation’s existing surface parking lots.

The Census Bureau and Nelson assume that the world’s resources will be used in a way that adequately supports or even greatly expands America’s population. The view can be seen as “cornucopian” because its advocates assert that improving technology will allow humans to use natural resources in a way that does not limit population growth. It should be noted that so far the cornucopian view has been correct.

Not everyone shares Nelson’s rosy vision of the nation’s future. An entire neo-Malthusian school has emerged that sees the nation shrinking back to its 19th century population size. We call these folks the “Doomsters.” Perhaps the best known Doomster is James Howard Kunstler, familiar to many planners for his influential 1993 book, The Geography of Nowhere.

In the book, Kunstler offers a harsh critique of suburbia, mostly in design terms (i.e., it is ugly and alienating). But in Kunstler’s recent works, The Long Emergency and the fictional World Made by Hand, a grimmer assessment of the suburban future emerges. Kunstler now argues that the suburbs—and America overall—are doomed because
of resource depletion and global climate change. This is not a new idea. Thomas Malthus proposed it at the start of the Industrial Revolution. The idea's most recent previous incarnation was the Club of Rome's 1972 report, _The Limits to Growth_, which argued the world's population was about to overshoot the planet's carrying capacity.

In the modern version of this view, the most important single force leading to America's inevitable population decline is "peak oil," the notion that we have now extracted half the petroleum the world will ever produce and that it is all downhill from here. (See "Post Carbon Cities," December 2008.) While the idea that the world is nearing peak oil is an increasingly common view, it is Kunstler's interpretation of this event that makes him a doomsayer. He sees no possible substitution for oil. He argues that all alternative forms of carbon-based energy, such as coal, sand tar, and shale oil, are severely limited and impractical alternatives at best.

Künstler also believes the U.S. is near peak natural gas, despite recent breakthrough technology that has substantially increased U.S. gas reserves and production. (See "Fort Worth's Bonanza," July 2008.) As for other alternatives, including green technologies such as wind and solar energy, Kunstler says they can only help marginally at best.

The bottom line for Kunstler and his fellow doomsters is that the planet now has far too many people and that lots of them will die premature deaths because their food supply and basic needs are heavily energy dependent and we are running out of oil. There is even a term for this process—the "die off" (not to mention a website, www.dieoff.org, and well over a million Google citations for the term).

How many will die off? Kunstler is a bit vague on the number, but he is certain that the sustainable population of the U.S. will be similar to that of the late 19th century, before oil became widely used. Thus, in his view, the U.S. could shrink to 75 or even 50 million by 2100. The world population may fall to just a billion, and the most pessimistic doomsters—who see agriculture as a multimillennium failed experiment—caution that the world could be down to tens of millions.

**Our best guess**

We see U.S. population growth reaching the mid range of the census estimates at the start of the next century. That means there should be nearly 600 million Americans in 2109, or just under double our current population.

The estimate is based on several assumptions—first, that there will not be another world war or devastating global pandemic or that our current recession becomes a depression like the Great Depression of the 1930s. Further, we assume the _Mad Max_ scenarios laid out by the doomsters do not come to pass, but environmental stress and resource limits present enough of a technological challenge to at least slow world population growth.

Also, we assume that the U.S. remains attractive to immigrants but that the numbers decline in a few decades as world population growth slows. And, while some of us may want to live forever, humans will live only a bit longer throughout the 21st century. Finally, we assume fertility will remain stable, and perhaps more importantly the high fertility rates among immigrants should drop substantially after one generation here in the U.S.

A major factor in population growth choice is. As a nation, we make the public policy that can alter the course of how many people live here. For example, a dramatic shift in opinion can produce a new politics of immigration. Just a year ago it seemed like the Republican Party was becoming anti immigration. But the presidential candidate who emerged—Sen. John McCain—held the most open view on immigration (which he altered somewhat during the campaign).

The diverse coalition that helped elect President Barack Obama signaled a new demographic reality that even the Republicans are now starting to embrace. The GOP recently elected former Maryland Lt. Gov. Michael Steele, an African American, as its party chairman, and many see Indian American Louisiana Gov. Bobby Jindal as a rising star.

Yet there is no guarantee that the current open-door policy on immigration will last for decades. It could even fall victim to a prolonged economic downturn, like the one we may now be entering. Immigrants and the children born to immigrants make up such a large share of the projected population growth that even slight changes to the numbers entering the U.S. over the next decade could dramatically alter the final estimate of how many people will live here 100 years hence.

Predicting population growth is also like forecasting the weather—the further into the future one estimates the less accurate the forecast. In predicting the weather, one can rely on a high statistical probability that the forecast will be accurate a few days out but that there will be a dramatic fall-off in predictability with each additional day. Population is much more stable than the weather, and the time horizon for prediction is longer. Days become years and decades, and in the end both meteorology and demography often miss the mark.

Thus population projections to mid-century are more likely to be accurate than those extended out 100 years. Even so, adjustments to population projections are common. For example, when the U.S. population reached 300 million in 2006, the Census Bureau forecast that we would add another 100 million residents by 2043. In August 2008, however, the Census adjusted this estimate to reflect a faster-than-expected growth rate. Now, the Census predicts that the U.S. will get
Nevertheless, despite the small fluctuations in this projection, it is very likely that the U.S. population will be at 400 million by midcentury. After that point, the projections become fuzzier. If we had to guess, it may be the final jump from, say, 500 to 600 million that is the least certain. However, the probability remains high that the U.S. can reach at least a half billion people by 2109.

**How will the U.S. stack up?**

Where does this put the U.S. in the global context? This nation is the only developed country that is on track to add substantial population. Other G7 nations such as Germany and Japan will likely continue to contract, while the U.K. and France will grow slowly. If the U.S. jumps to 400 million by 2039, it will probably have added 100 million residents faster than all other nations except India and Pakistan, and will even outpace China.

Again, forces within our control will partly determine the rate of growth. If the U.S. lacks the will or the resources to substantially upgrade its crumbling infrastructure, its economic growth may slow and that may diminish its attraction to immigrants. But if the U.S. remains open to immigration and its economy booms, we could see the next 100 million people at an even earlier date.

There are also external forces driving immigration, including such push factors as how attractive the U.S. is compared to other nations. Contrary to all the hype, the baby boomers can retire with some reasonable certainty that they will receive most of what they were promised from Social Security. Barring some breakthrough medical technology that cures old age, all it would take to secure these benefits is a year or two added to the Social Security minimum retirement age and a bit more income subject to payroll taxes (say a jump from $100,000 per year to $125,000 and then indexed thereafter).

Why the rosy forecast on Social Security? You can thank the 1965 immigration reform for that outlook. Just as the baby boom ended, the U.S. reopened to immigrants. The numbers were small at first, but in the last 20 years they equaled the immigrant boom of the late 19th and early 20th centuries. The result is that

### How America Finally Solved its Race Problem

In 2110 the U.S., changing a few words in what was originally a 1901 gospel song, adopted a national anthem that was more uplifting than its original one. The new song was "We Have Overcome."

In its second century, the American planning field saw extraordinary events: the shrinkage of Philadelphia and Tampa to village size; the ensuing Great Scale-Up that created serious national and regional planning; the parallel emergence of the land consumer movement; the revival of Ohio; the triumph of the Buffalo Commons in the Great Plains.

No story was more remarkable than the one that led to the new anthem. It opened in the second decade of the 21st century in the Lower Mississippi River Delta. In 1986, the rock poet Paul Simon sang in "Graceland" that "the Delta shines like a national guitar." In 1948 Mississippi's David Cohn said that the Delta's core goes from the lobby of Memphis's Peabody Hotel to Catfish Row in Vicksburg, Mississippi—still true more than a century and a half later.

The Delta runs east and west along the Mississippi River, stretching across parts of seven states, from Illinois, Kentucky, and Missouri in the north 750 miles through Arkansas and Tennessee to Louisiana and Mississippi in the south. Many Delta counties had black majorities or near-majorities deep into the 21st century. The mainly rural and small-town Delta—and its attendant racism, violence, and poverty—vividly formed countless artists, writers, and musicians, both black and white.

### The Endless Flood and its aftermath

In the Delta the river always has the last word. That was certainly true during its legendary floods of 1861, 1927, and 1973. The performance of the Delta's dams, canals, locks, and levees determined its prospects, as if in Fugitive. All failed in 2015's Endless Flood, so called because it never seemed to ebb. It destroyed every major Delta city along the Mississippi, from Memphis to New Orleans, and much of the region's agriculture.

The rebuilding of the Delta gripped the nation. The Delta Planning Board was formed immediately after the 2019 flood and by midcentury it had become the nation's most powerful regional planning agency.

The board's new emphasis on land use, ecological restoration, and innovative laser work approaches to the river averted destruction from major floods, particularly after the agency took control of the Delta operations of the now-defunct Army Corps of Engineers. At the turn of the 22nd century, it was clear that the Grand Reconciliation—as the rebuilding movement was called—had made the Delta's recovery the most successful large redevelopment project in American history.

The Grand Reconciliation created a vast new interracial Great Reverse Migration that stemmed the Delta's population outflow, inspiring the baby boomers' children and later generations to spend their years of national service in the Delta, invest in it, and retire there. The rebuilt cities of Memphis and the re-sited New Orleans flourished as gateways to the region, with Baton Rouge, Natchez, and Vicksburg as its nodes.

The Grand Reconciliation enlarged many kinds of Delta tourism: musical, literary, antebellum, slavery, Civil War, civil rights, great house, Native American, food, farming, and environmental. It fostered culture, including schools of computer art, kudzu-based architecture, and the newly influential social science of improving race relations.

Because of the Grand Reconciliation the Delta bloomed in ways the nation had never seen. Americans responded to the flood with a will to overcome the horrors they had allowed to occur after Hurricane Katrina in 2005. If they again had not prevented a flood, at least they could improve on the aftermath.

The Delta showed the country and the world how racial integration really worked. By 2065, the widely celebrated bicentennial of Appomattox, it had...
assimilated its fast-growing Latino population, then a third of the region. The lessons took elsewhere in the country. They arrived slowly, well after the nation's 2076 tricentennial, in the urban North and Midwest. But in the end the Delta set an effective national example for decency, goodwill, optimism, and hard work. It became a secular (and also highly religious) version of Paul Simon's Graceland, a place where all sufferers went to be received and redeemed.

Free at last
The ceremony adopting “We Have Overcome” as the national anthem took place on the National Mall amid the cherry blossoms. The president was an Austrian-Comanche-American, a self-made trillionaire from Delta Tennessee and a founder of the dominant New Lincoln Party. From the steps of the King Memorial, she addressed a spillover crowd estimated at five million. Allensonvision carried her speech to a global audience more than 1,000 times as large, nearly half the world's population.

President Alta Koch spoke in her soft Delta drawl: “Welcome y buenvenido. Today we renew our vast national journey: e pluribus unum—Out of Many, One. I want to mention some of our compatriots on what Dr. King called the long walk to freedom. We must never forget the millions who lived and died in the Delta and elsewhere to make this day possible.

“Condoleezza Rice—do any of you remember who she was?—regarded slavery as America's original sin, its moral birth defect. To the memory of W.E.B. Du Bois, we say with assurance that today America no longer has the color line you rightly saw as the 20th century's worldwide curse. In our country it lasted much too long into the 21st. Please join me and the Marian Anderson Choir in singing the first verse and the 21st Please join me and the Marian An-

Who will be white?
Many believe that by the mid 21st century, the U.S. population will have a majority of nonwhite residents. It is unlikely, however, that this will ever come to pass. It is more probable that current racial categories will be redefined—in particular, that the definition of ‘white’ will change.

Because the vast majority of Hispanics are already categorized as a subethnicity under ‘white,’ an overwhelmingly large proportion of the country is now ‘white.’ The term minority majority currently refers mostly to Hispanic whites. While it is true that Hispanic whites are the fastest growing ethnic group, many are intermarrying with non-Hispanic whites. In fact, both Hispanic whites and Asians, which are the fastest growing populations, are now often intermarrying with non-Hispanic whites.

When including Hispanic whites, whites are indeed the majority of the U.S. population. By midcentury, it is more likely that the Hispanic ethnic barrier will fade. So while whites in 2109 may not “look” like whites today, whites as defined by the Census will still be the majority. A 2005 report on intermarriage put out by the Population Reference Bureau concluded that “most intermarriage still involves a white person married to a minority spouse. In this sense, intermarriage is ‘whitening’ U.S. minority populations.”

“Whiteness” has been redefined before. Early in the 20th century, there was a considerable social distance between Eastern and Southern Europeans (Italians, Russians, and Poles) and Americans descended from Northwestern European immigrants who had arrived earlier. The newer groups were “hyphenated whites” or simply “white ethnic.” Think of a solidly middle-class, old-stock European American living in 1909 and that person’s attitude toward the so-called “new immigrants” from Southern and Eastern Europe. We know the opinion was not high because in 1924 the older, established groups called for strict immigration laws to keep out other Europeans.

People from one part of Europe fought to keep out immigrants from another part of Europe. In today's context that seems almost quaint.

A century ago, it was difficult to imagine that Northwestern Europeans would routinely intermarry with white ethnics and that their children and grandchildren would form a composite of pan-European-US. We have overcame, We have overcome, We have overcome today. Oh, deep in my heart, I do believe, We have overcome today.

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continent, and the Census had declared the frontier closed nearly two decades earlier.

Every one of today's top 50 metropolitan areas was already established 100 years ago—the last one being Las Vegas in 1905. The subsequent 100 years of growth, during the 20th and early 21st centuries, involved tremendous population growth within and extension of these urban areas, including the emergence of the metropolitan Sunbelt in the South and West.

A simple indicator—the center point population estimate—designed by Francis Walker of The Massachusetts Institute of Technology, the census director in 1870 and 1880, vividly showed western movement. This measure, which has been in use by the Census Bureau since 1870 (but projected back to 1790, the first census), is described as "the point at which an imaginary, flat, weightless, and rigid map of the United States would balance perfectly if weights of identical value were placed on it so that each weight represented the location of one person on the date of the census."

In 1790, this point was 23 miles east of Baltimore in Kent County, Maryland. By 1800 it had jumped the Chesapeake Bay to a spot west of Baltimore, and it has continued to head west ever since. From 1800 to 1940, the center moved pretty much due west from the Mid Atlantic region, varying just a degree or two north and south every census.

Beginning in 1950, the center of population took a distinctly southern turn and has headed in a southwest direction henceforth. The turn corresponds with the rise of the Sunbelt, where states such as California, Texas, and Florida emerged as major population centers that dragged the center southward. In 2000, the center stood in south central Missouri—about 120 miles southwest of the symbolic Gateway Arch in St Louis.

If the current rate of growth and expansion in the West and the South continues, the center of population in the year 2109 is likely to be somewhere in Oklahoma, along the Turner Turnpike between Tulsa and Oklahoma City, perhaps in Lincoln County or Creek County. This projection is based on the number of decades that the mean center of population has been calculated, projected population growth, and current settlement patterns. It also assumes a relatively stable world climate that does not cause rising sea levels to flood major coastal cities of the South and does not dampen mountain snowpacks and monsoonal flows in the West. These are, of course, real possibilities.

What a country!

We estimate that by 2109, nearly 600 million people will call America home. This is almost double our current population. Our cities will expand to accommodate this additional growth, while the resource base fueling this expansion becomes stressed but should not snap.

Our ethnic identity will become more complex, and traditional racial and ethnic categories such as "white" and "Hispanic" will lose meaning. Intermarriage between whites and minorities will dramatically shift the social definition of racial and ethnic identities. Likewise, our neighborhoods will also become more diverse, as ethnic and racial minorities move to suburbs in record numbers, black-white residential segregation continues to decline, and high-income households continue repopulating our cities.

Our plans and policies will shape this future. The ongoing debate over immigration reform may impact the pace and character of future immigration flows. The future of fair-housing policy will shape the diversity of our cities and suburbs. Energy and environmental policies will determine the size of the future population's environmental footprint. And transportation policies will influence the economic and social interactions within and among metropolitan areas. Local plans will also continue to play an important role in altering the character and location of where new growth occurs.

These forces will ultimately determine whether we can accommodate 300 million additional people within our existing parking lots, as Chris Nelson argues, or if our desire for suburban lifestyles fuels a 300-million-acre expansion of our urbanized space.

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