

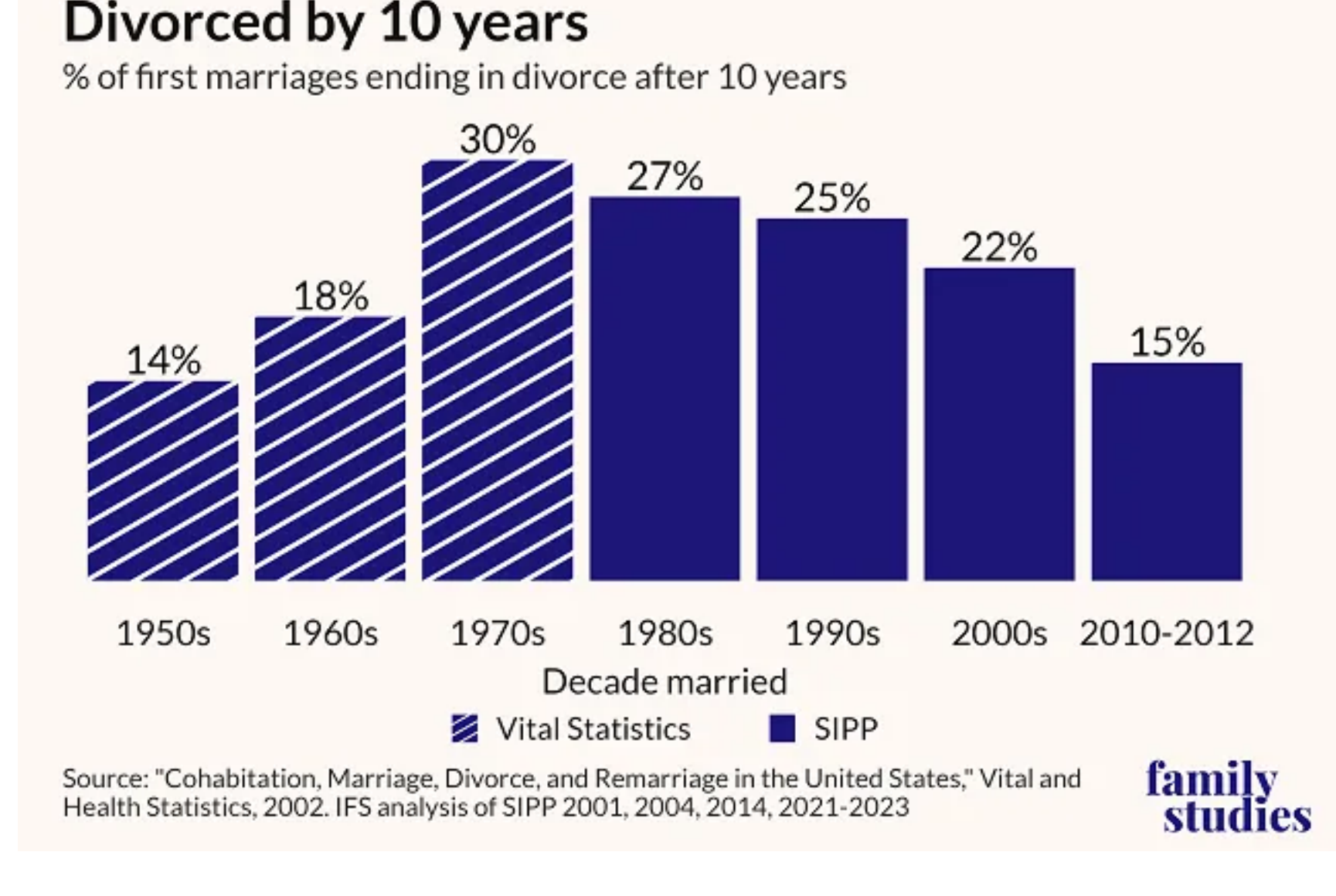
Announcements

- Our managing editor Chelsea Follett’s book, [Centers of Progress](#), was recently [republished in Korean](#). This new edition features a beautifully redesigned cover and many more photos and illustrations than the original.



Culture & Tolerance

- According to [recent research](#) from the Institute for Family Studies, US marriages in the early 2010s were more stable than marriages during any other decade since the 1950s. They estimate that 15 percent of couples that first married between 2010 and 2012 were divorced after 10 years, down from a high of 30 percent in the 1970s.



Energy & Environment

Conservation and biodiversity

- The Baltic ringed seal population grew from around 5,000 in 1970 to an estimated [25,000 in 2024](#), thanks to hunting bans and a decline in environmental toxins.
- In Kazakhstan, the population of saiga antelopes has surged from fewer than [30,000 in 2003](#) to [over 4 million today](#). Now, the Kazakh government is sending [1,500 saigas to China](#) to accelerate the recolonization of the antelope's historic range.
- Reintroducing wolves to Yellowstone has triggered a [resurgence of aspen trees](#). A new study found that one-third of aspen groves in the park now have healthy young trees—something not observed since the 1940s—thanks to the reduced elk population.

Energy & Natural Resources

- A new oil discovery may [more than double](#) Poland’s known oil reserves.
- The nuclear fusion startup Marathon Fusion [published a paper](#) claiming that fusion reactors could one day transmute mercury into gold, potentially creating 5,000kg of the precious metal per gigawatt-year without sacrificing energy output.
- A startup in New Zealand has developed a [chemical process that can produce valuable materials from olivine, a cheap, common mineral](#). Using just olivine, sulfuric acid, water, and electricity, the method generates silica, magnesium hydroxide, and, most importantly, nickel-manganese-cobalt hydroxide, an important material in lithium-ion batteries.

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Health & Demographics

- Since 2010, [nearly 1.5 billion people](#) in Asia and Latin America have gained access to clean cooking stoves and fuels, helping reduce [deadly indoor air pollution](#) and environmental harm.
- Scientists have developed a [genetic tweak in mosquitoes that blocks the spread of malaria](#). By changing just one part of a mosquito protein, they made it so the insects can still carry the parasite but can’t pass it on when they bite. The change spreads naturally through mosquito populations and doesn’t harm their health, making it a promising tool for stopping malaria in the wild.
- A non-hormonal [birth control pill for men](#) has passed its first human safety trial.

Science & Technology

- AI models from Google and OpenAI achieved [gold medal-worthy scores in the International Mathematical Olympiad](#), a math competition for high school students.
- Google DeepMind has developed an [AI tool called Aeneas that can help historians decode and restore ancient Roman inscriptions](#). Trained on data from nearly 200,000 Latin texts, Aeneas can [suggest missing words, date inscriptions within 13 years, and identify the province of origin](#) with a fair level of accuracy.

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Progress Studies

Daniel Jeffries imagines life in a future of “ambient AI.”

F*

Freethink Media

A personal assistant for everyone: The promise of ambient AI

By Daniel Jeffries...

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Derek Thompson reviews the research on GLP-1 drugs and their wide-ranging effects.

Derek Thompson

If GLP-1 Drugs Are Good For Everything, Should We All Be on Them?

Several years ago, scientists took a close look at GLP-1 drugs, such as Ozempic, and learned that they were good at helping people lose weight. Then they took an even closer look and learned the drugs are also good at just about everything else...

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Matt Yglesias clears the air on AI water use.

Slow Boring

There's plenty of water for data centers

I've spent my whole life in the urban northeast, which is both soggy and light on water-intensive economic activity, so I haven't spent a lot of time thinking about water use or water scarcity...


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The Potential of Embryonic Screening

A new frontier in reproductive freedom rekindles old ethical questions.


CAMILLE MINER
JUL 26, 2025

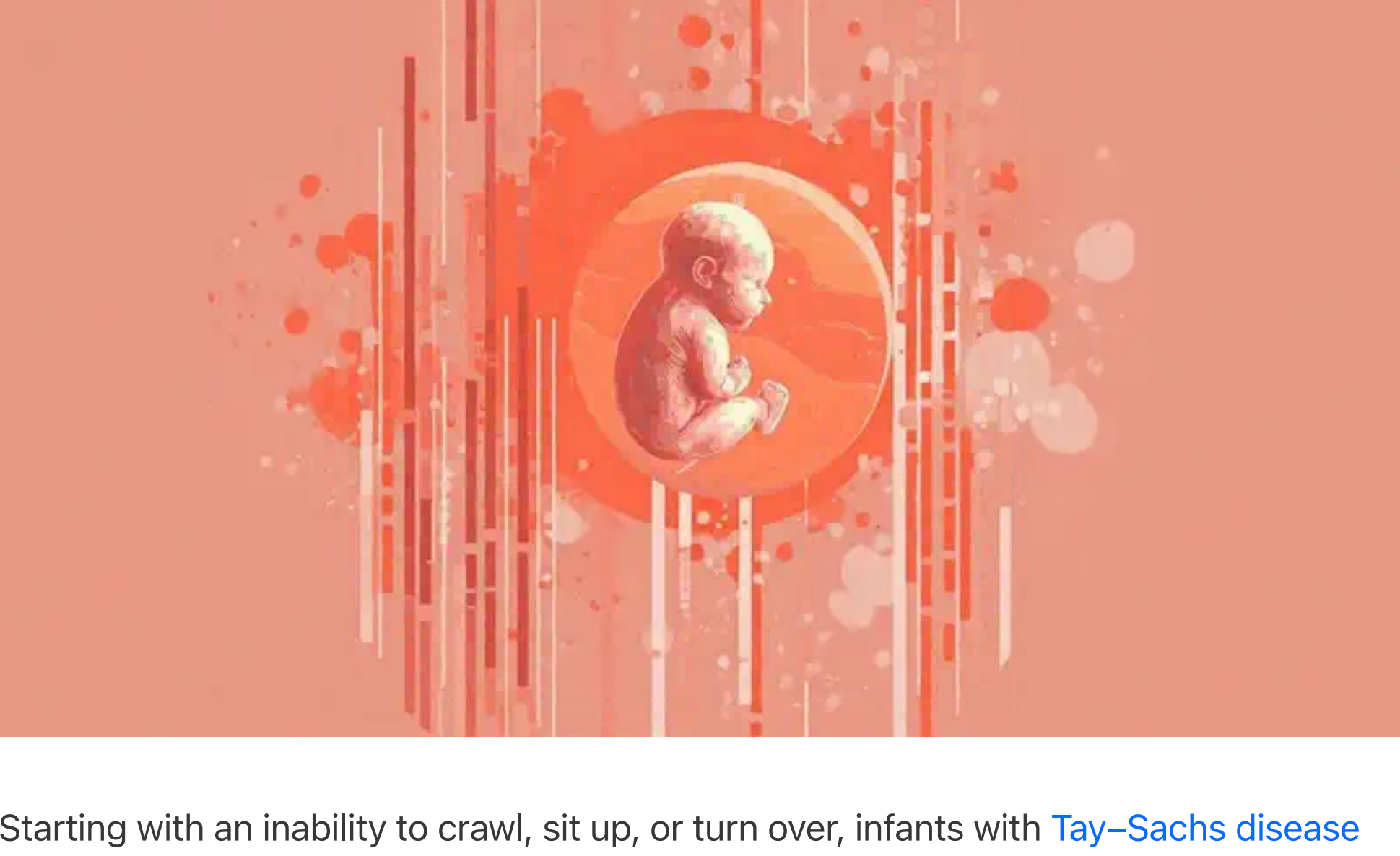
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Starting with an inability to crawl, sit up, or turn over, infants with [Tay–Sachs disease](#) soon experience seizures, severe hearing loss, and paralysis—and can expect to live no more than five years before the neurons in their spinal cord and central nervous system give out.

Because of congenital heart defects and fatal respiratory problems, only 60 to 75 percent of infants born with [Edwards syndrome](#) live past the first week of life, and only 10 percent live past their first year.

Without medical interventions, such as the \$2 million gene therapy [Zolgensma](#), infants with [spinal muscular atrophy type 1 \(SMA I\)](#) often die from respiratory failure within the first two years of life, making SMA I the [most common](#) genetic cause of death for infants.

On June 4, 2025, Nucleus Genomics [announced](#) that it will offer preimplantation genetic disorder screening for in vitro fertilization embryos, which can predict 900 conditions, including genetic abnormalities and [propensities](#) for Alzheimer’s, heart disease, and various cancers. Although the accuracy of polygenic screening is [contested](#), Nucleus’s founder, Kian Sadeghi, [argues](#) that prospective parents ought to be privy to what genetic variants will predispose their children to diseases.

For instance, although heart disease is in large part determined by one’s lifestyle choices, parents may prefer an embryo without a genetic predisposition for heart disease if they’ve lost loved ones to heart attacks and strokes. Thus, Nucleus’s screening would not only prevent tragic premature deaths from fatal genetic disorders but also increase potential well-being and longevity for individuals well into their adult lives.

Nucleus Genomics [plans to charge](#) \$5,999 for the service. As of July 2025, no other preimplantation screening of a similar scope is [offered at a price](#) that low—other companies’ prices often range from \$15,000 to \$20,000. Thus, there may be a future where extensive genetic prescreening is more affordable for couples undergoing in vitro fertilization (IVF). Nucleus also intends to include an accurate prediction of physical characteristics such as height, hair color, and eye color for the given embryos.

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What are we to think of this innovation? The philosopher [Jessica Flanigan](#) from the University of Richmond is finishing her book, *The Ethics of Expecting*, in which she argues that an important aspect of reproductive freedom is the freedom to access information on the embryos being implanted in your body. In an interview with Flanigan, I raised some common objections to embryonic screening. Here are her responses.

Some bioethicists worry that selection based on certain traits in embryonic screening [expresses](#) to the world that people with certain traits are less valuable (“the expressivist objection”). This is particularly pertinent for members of disabled communities, such as people who are deaf or blind, traits that may be routinely selected against.

Flanigan acknowledges that one can feel hurt that some of their particular traits are not selected for by other people. However, this harm is not too different from the harm one may feel when selected against in dating.

Furthermore, this harm does not oblige other people to select the traits the offended people have. Flanigan recognizes that the ableist discrimination some disabled people face is a serious injustice. “We should focus more on supporting existing disabled people, but this does not obligate us to create more disabled people so that the existing disabled people can feel supported,” says Flanigan. She adds that when it comes to reproductive rights, “disabled people are not entitled to limit the freedom of nondisabled people.”

Some worry that even at Nucleus’s lower price, only the rich will be using embryonic screening, and thus their offspring will be even more advantaged compared with low-income children.

As Flanigan argues, the US health care market drives innovation for the whole world. Its market incentives encourage more companies to invest in research and development and in quickly producing new drugs and medical technologies. When these drugs and technologies are first introduced to the market, they are often available only to those who can afford them and thus necessarily create short-term health inequalities.

Once a technology or drug is publicly recognized as effective, however, insurers begin to cover that innovation, and the treatment becomes more widely available to the public. Even if these short-term inequalities do harm, it’s hard to justify restrictions given the potential for long-term equality. “You would never say we should have never made the computer because early on only rich people had access to computer processing and that wasn’t fair. Because now you can get a laptop on Amazon for \$65,” Flanigan notes.

Furthermore, Flanigan argues that assisted reproduction at large can create greater social equality—for example, helping gay couples start families. Embryonic screening will also allow couples with genetic predispositions to severe diseases to ensure that their future children lead healthier lives than their ancestors.

A compelling argument against advanced embryo selection of this kind is that the world would lose an important diversity of human experience if all embryos were selected for the most advantageous qualities. In Denmark, for instance, [only 23 to 35](#) children per year were born with Down syndrome between 2004 and 2020 as a result of increases in prenatal screening, despite nearly all individuals with Down syndrome [reporting](#) high life satisfaction.

This diversity concern, Flanigan thinks, is a bit overblown. “The human genome is incredibly rich and diverse.” We live in a gene pool with more and more people reproducing outside of their race, region, and ethnicity. Even if we all select the tallest out of a given set of embryos, Flanigan argues, this would not meaningfully diminish the genetic diversity and randomness of the human genome.

Importantly, “there are some kinds of diversity we don’t experience, and that’s great! Today, there is less variation in how many children die before they’re five.” If we can limit the diversity of infant suffering or painful genetic diseases, this would improve the well-being of future generations.

Perhaps some will decide that they would rather select *for* rather than *against* Down syndrome, knowing that their children may be happier. That selection, however, ought not to be decided by anyone besides those procreating. Flanigan predicts that many couples will reject the practice of embryo selection completely and thus there will still be “naturally” genetically diverse embryos. Whether or not you are convinced by these arguments, it is important to note that embryo selection is not the same as a “designer baby” or using genetic tailoring such as CRISPR to control for particular traits. The embryo a couple selects could possibly have been the one that was born naturally; it was one probability among many.

Even if couples were more inclined to pick embryos with particular physical traits, it is unclear that these preferences would be stable across time, as cultural norms and beauty standards shift. For instance, despite a stronger preference for males during China’s one-child policy, *The Economist* recently [reported](#) a preference shift for females among new parents.

Nevertheless, IVF is still not widely used. It is characterized by high prices (\$15,000 to \$30,000 for each cycle) and invasive procedures, and we are far from a future where allsoon-to-be parents select among embryos. But if preimplantation genetic disorder screenings for IVF do become common and accurate, future generations may be healthier than ever before.

Author: Camille Miner, a rising senior at UC Berkeley studying Philosophy and Social Welfare and a Research Intern at Human Progress.

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Tire Abundance Has Been on a Roll Since 1920

Tires today are at least 1,000 times better than their 1920s precursors.

GALE POOLEY
JUL 25, 2025

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In 1920, you could buy a new Goodyear tire for your Ford, Chevrolet, Dort, or Maxwell for \$21.50. A tube for the tire would add another \$4.50. Unskilled workers at the time were earning about 29 cents an hour, putting the time price of the \$26 combination at almost 90 hours.

You Can Get Goodyear Tires for That Sturdy Smaller Car



30x3½ Goodyear Double-Cure Fabric, All-Weather Tread

\$23.50

30 x 3½ Goodyear Single-Cure Fabric, Anti-Skid Tread

\$21.50

Goodyear Heavy Tourist Tubes are built to protect casings. Why endanger a good casing with a cheap tube? Goodyear Heavy Tourist Tubes cost little more than tubes of less merit. 30x3½ size in waterproof bag

\$4.50



GOODYEAR

Today, Walmart [sells](#) the Goodyear Reliant 195/60R15 88V All-Season Tire for \$77. Unskilled workers today earn about \$17.17 an hour, indicating a time price of 4.46 hours.

For the time it took to earn the money to buy a single tire in 1920, you could get 20 of them today.

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Car tires today are also vastly superior to those manufactured in 1920 because of advancements in materials, design, and manufacturing.

- **Materials:** In 1920, tires were made from natural rubber with cotton or fabric cords, prone to punctures and rapid wear. Modern tires use synthetic rubber, steel belts, and advanced compounds (e.g., silica) for better durability, grip, and fuel efficiency. Today’s tires last between 50,000 and 80,000 miles versus the 1,000 to 2,000 miles tires lasted in 1920.
- **Construction:** Early tires were bias ply; their plies were arranged diagonally, with stiff sidewalls that limited handling and comfort. Radial tires, introduced in the 1940s and made standard by the 1970s, offer better traction, stability, and ride quality because of their flexible sidewalls and steel-reinforced treads.
- **Performance:** Modern tires are engineered for specific conditions (e.g., all-season, winter, high-performance), with optimized tread patterns for grip, water dispersion, and noise reduction. Tires made in 1920 had basic treads, poor wet performance, and frequent blowouts at speeds above 30 to 40 miles per hour. Today’s tires can handle speeds above 100 miles per hour safely.
- **Safety:** Tubeless tires, common since the 1950s, reduce blowout risks compared with 1920s tube-type tires. Many modern tires also feature puncture-resistant layers and run-flat technology, absent in 1920.
- **Manufacturing:** Precision engineering and computer-aided design ensure consistent quality in modern tires, unlike the handmade, inconsistent tires of 1920.

Quantitatively, modern tires are 40 to 60 times more durable, support 3 to 4 times higher speeds, and provide 5 to 10 times better grip, based on historical tire performance data and industry standards. These improvements stem from decades of innovation driven by safety, performance, and efficiency demands.

Applying a conservative 50x multiplier for all these qualitative improvements to the 20x reduction in time price suggests that today’s car tires are at least 1,000 times better than their 1920 counterparts.

The next time you’re cruising down the interstate at 75 miles per hour, say a little prayer of gratitude for the relentless pursuit of better tires—driven by ingenuity, competition, and the quest for progress.

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Lifting the Bottom: How Western Economies Are Growing Fairer and Richer

The headlines and the data disagree on inequality.

HUMAN PROGRESS
JUL 23, 2025



by [Daniel Waldenström](#)

Rethinking the Inequality Story

It is easy to get the impression that inequality in Western societies is out of control. Media and social platforms tell us that billionaires are soaring ever higher while the middle class is disappearing and democracy is under threat. These concerns feel real, especially with expensive housing, rising tech fortunes, and gaps in public services exposed during the pandemic.

But these narratives often rely on narrow or incomplete data. When we consider all the pieces—taxes, transfers, pension rights, homeownership, and people’s changing income over their lifetimes—the picture is more balanced. Western societies are not as unequal as many fear.

This doesn’t mean we should ignore inequality. Some people still live in deep poverty, and extreme concentrations of wealth can distort both markets and politics. But to shape the right policies, we must start with the right facts. Mistaken beliefs lead to harmful solutions—like high wealth taxes and bloated public sectors that risk doing more harm than good.

Instead, we should aim to grow the economic pie while ensuring that its benefits are widely shared. The best way to do this is by *lifting the bottom*—helping more people build personal wealth and take part in prosperity.

What the Numbers Really Show

The most famous story about inequality comes from economist Thomas Piketty’s “U-shaped curve”: inequality was very high in the early 1900s, dropped after the World Wars, and then rose again after the 1980s. It seems backed by the rise of tech billionaires, stagnant wages for many, and the top one percent’s growing share of pretax income.

But Piketty’s view leaves out several important things. Starting in 1980 is actually misleading. That was a time of unusually low inequality, due to high taxes and strict rules that discouraged risk-taking. Compared to the early 20th century, today’s inequality is far lower. The previous narrative mostly ignores taxes and welfare. Looking only at pretax income misses how taxes and public spending reduce inequality—especially in healthcare, education, and pensions. Finally, it misreads wealth data. Many studies overlook middle-class assets like home equity and pension savings, which are huge stores of personal wealth.

More complete data paints a different picture. Economists Gerald Auten and David Splinter, for example, show that when you account for unreported income, retirement savings, and government benefits, income inequality in the U.S. has barely changed since 1960. And in Europe, the trend is even flatter.

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Mass Wealth, Not Mass Disparity

A closer look at household wealth shows some surprising results.

Firstly, private wealth has risen sharply across the West since 1950. But importantly, this growth has been shared. Most wealth is now held in homes and retirement accounts—not in elite corporate shares. Today, 60–70 percent of households in Western countries own their homes, and most workers have pension savings in funds that track the stock market. This is financial democratization.

Secondly, wealth is less concentrated. In Europe, the richest 1 percent now hold only about one-third of the wealth share they had in 1910. In the U.S., there has been an uptick since the 1970s, but even there, wealth concentration is closer to its 1960s level than to the early 20th century. The most recent data show that U.S. wealth inequality has actually fallen slightly since the mid-2010s. Thus, the main story is not growing inequality, but growing ownership.

Thirdly, mobility matters. People move between income brackets over their lifetimes. Many in the bottom 10 percent today won’t stay there long, and some at the top may fall due to job losses or market changes. Also, pension rights and welfare reduce inequality further. For instance, in Sweden, counting public pensions cuts measured wealth inequality nearly in half. In the U.S., if we add Social Security and employer-provided health insurance, middle-class living standards look far better than raw income data shows.

Success at the Top Can Lift Everyone

Some worry that billionaire success is a sign that the system is rigged. But often, these fortunes reflect broad economic growth. Tech giants, for instance, didn’t just enrich their founders—they created jobs, boosted productivity, and expanded the tax base.

Since 1980, life expectancy in advanced economies has increased by six years. High school completion has become nearly universal. Goods once considered luxuries—like personal computers—are now common. These are signs of a system that has *lifted the bottom* even as some at the top thrived.

Growth matters not just for individuals, but for public finances. Every percentage point added to GDP generates billions in tax revenue. That supports schools, hospitals, and infrastructure. Policymakers should focus on policies that both grow the pie and spread its gains—such as promoting homeownership, making retirement saving easy and cheap, and keeping financial markets open and competitive.

Smarter Taxation and Sensible Policy

Some are now calling for new taxes on wealth, including proposals discussed by the G-20 and the UN. But these taxes are problematic. They often fall on assets that are hard to sell, like private businesses or farms, forcing owners to take on debt or sell prematurely. In Scandinavia, wealth taxes were tried and largely abandoned—they raised little money, were expensive to manage, and drove capital abroad.

A less worse, though far from ideal way to tax capital is through its *income*: dividends, capital gains, and corporate profits. This approach is more efficient, and it doesn’t punish people for owning assets.

Don’t Misdiagnose the Problem

Focusing too much on inequality can distract from real challenges: slow productivity growth, aging populations, and the costs of adapting to climate change. These issues will require investment and innovation—both of which depend on a healthy private sector.

Overreacting to inequality can also be regressive. Taxing housing wealth, for example, may hit retirees who are rich in assets but poor in cash. Heavy taxes on small businesses might force them to sell to multinational corporations with easier access to credit.

Mistrust also grows when people are told that only the elite benefit from capitalism—even when their own lives are improving. That opens the door to populist promises that often worsen the situation.

A Balanced Agenda for the Future

I believe that unchecked wealth concentration can hurt democracy. But the solution is not to attack wealth itself. It’s to build systems that let more people share in success.

Governments should:

- Support entrepreneurship by cutting red tape
- Keep labor taxes low to encourage work and saving
- Focus public spending on giving people the tools to succeed—especially through education and infrastructure
- Make it easier for households to build personal wealth

This is not a call for total laissez-faire nor for extreme equality. It is a recognition that the most important achievement of Western economies is the broad rise in living standards—not the fortunes of a few billionaires, but the everyday comfort of millions whose grandparents lived without antibiotics, central heating, or higher education.

Before declaring a crisis, policymakers should double-check the data. And they should keep doing what works: protecting markets, encouraging wealth-building, and *lifting the bottom*.

Author: Daniel Waldenström, a professor of economics at the Research Institute of Industrial Economics and the author of [Richer and More Equal: A New History of Wealth in the West](#).

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