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A Letter to the People of Texas

Dear Fellow Texan –

Texas is special, a place like no other. It is a land of epic proportions and extreme contrasts. A land hemmed by mountains and deserts, forests and plains, and rivers and a sea. Of blizzards and heat, rain and drought, unique unto itself.

Texans are special, too — characterized throughout a rich history by an independent, pragmatic, persistent, and generous attitude, and a confidence in themselves and what they can accomplish. We are adaptable, willing to rise together to confront a challenge, and united in our sense of Texas pride. This is as evident today as it has ever been as we tackle the COVID-19 pandemic.

Generations of Texans have shared a sincere optimism that Texas' future will be even brighter than its past, a faith that has drawn millions of people to our state. As we work to recover from the coronavirus, we must not ignore the challenges and acute disparities this pandemic has surfaced. We must face them head-on and develop innovative new ways to solve them.

For Texas to be the best place to live and work for the next generation of Texans and generations after them, we need to come together, think strategically and find the right solutions for the Lone Star State.

Our Mission

In 2036, Texas will celebrate its bicentennial: 200 years of growth, change, perseverance through adversity, and achievement, the likes of which has rarely been seen. By then, nearly 10 million more people will call Texas home.

As we look to Texas' third century, it's time to take stock of where we have been as a state, where we are today, and where we want to go in the future.

Texas 2036 is a non-profit organization, led by a diverse, statewide, bipartisan board. It was born out of a love for Texas and a recognition that long-term, data-driven strategies and an ongoing vigilance are required to ensure we
enjoy a future that sustains and expands opportunity for all Texans. Smart strategies and systematic changes represent an essential foundation for that future.

This is why Texas 2036 has been building a case for action, amassing and contextualizing hundreds of data sets that show where Texas is today on different policy areas at the state and county level, and where we are heading.

Generations of Texans before us took deliberate and difficult steps to ensure the prosperity and quality of life many of us enjoy today. Now, we must look ahead to what the future could be, build upon our legacy of success, and overcome challenges that lie beyond the horizon.

**Texas Challenges**

As the COVID-19 outbreak shows, past prosperity can be derailed by out-of-control events. Texas' vast resources, optimistic spirit, and growing, diverse population represent significant opportunity for the 38 million expected to live here by 2036. These Texans will tend to be younger and more diverse than Texans today, and accommodating them all will challenge our state’s infrastructure and services, especially because this growth will not be uniform – it will likely be concentrated in major urban areas.

The challenges will be many. Texas has struggled to effectively educate all students so they can actively participate in an increasingly modern economy. Health expenditures are balloonsing, while Texas ranks in the bottom half of U.S. states on many health measures. We must prepare for a radical shift in how people and goods are moved, as alternative types of mobility become commonplace. We must ensure responsible use of our natural resources and balance economic value with stewardship for future generations. We must better protect our most vulnerable populations. And we must think differently about how this $250 billion enterprise we call the State of Texas best allocates resources to provide the greatest opportunity for the greatest number of Texans.

Texas 2036 isn’t focused on solving problems overnight or only getting through the political crisis of the moment. Instead, we are looking further
down the field to help Texas leaders and the public think about the challenges that Texans will confront down the line – beyond the tyranny of the urgent.

**Strategic Framework**

In pursuit of a vibrant future for Texas, we offer this Strategic Framework. It is rooted in a commitment to tackle the most pressing issues our state faces in the best way we know how: the “Texas way.” We take pride in our state’s business-friendly climate and competitive tax structure. We cherish individuals’ rights, responsibilities, independence, and autonomy. We believe the private, public, and philanthropic sectors must all work together to make Texas better — we do not and cannot look to our government to do it all.

We believe that policy solutions work best when state and local governments are pulling in the same direction, when top-down meets bottom-up. We believe in facts over ideology, action over accusation, solutions over stalemates.

The Texas 2036 Strategic Framework is the result of more than two years of research and analysis, focusing on the most important issues facing the state – issues that will shape Texas’ future quality of life and shared economic prosperity. The Framework articulates a vision for the future of Texas. This vision is built on seven policy pillars representing the most significant drivers of Texans’ quality of life: prosperity and well-being, education and workforce, health, infrastructure, natural resources, justice and safety, and government performance.

In this Framework, we lay out 36 ambitious but achievable goals across these pillars, and we undergird them with more than 160 indicators that can help evaluate Texas' progress toward these goals.

Collectively, the goals represent an interconnected set of priorities that can guide the way forward. This wide-lens perspective sets Texas 2036 apart as an organization. We are not focused on a single issue or silo, but rather on looking at the numerous interconnections between policy areas. By taking a long-term, disciplined approach to policy change, we believe Texas can achieve systemic meaningful outcomes across these areas.
In short, we want Texans to use this Framework to think long-term about the critical issues facing our urban and rural communities, and options for addressing challenges in ways that will extend prosperity in communities across the state well into the future.

Commitment to Data

The numerous, detailed indicators described in this Framework speak to the very heart of Texas 2036. We are informed by the facts — we do not shirk from what the data tells us. Texas 2036 has assembled hundreds of datasets to shape this work, and this fealty to data is an important differentiator for it.

Comprehensive and relevant data can break down divisions to unify Texans seeking pragmatic solutions. Today, Texans have sufficient data to help us plan for the future. In coming years, we will work with state and local governments and other stakeholders to improve the quality of data available for policymakers, ensuring decisions are being made with the most meaningful and telling information.

Our commitment to data also led us to develop a set of peer states against which Texas can compare itself. This cohort serves as a barometer of Texas’ standing and progress, setting out an assessment of how we are faring against those states with which we most often compete for business and talent.

Long-Term Horizon

Texas 2036’s mission is to enable Texans to make fact-driven decisions through accessible data, long-term strategic policy planning, and statewide engagement — all to ensure Texans’ wellbeing and economic prosperity through our bicentennial and beyond. So, Texas 2036 has invested much research, data analysis, input from experts, constructive criticism, and healthy debate into the development of this Framework.

This document should not remain static. Rather, we see the Framework as the starting point for a robust conversation across Texas about the future of our great state.
We are eager to hear from you, our fellow Texans, about how we can strengthen our work and partner together to help create a better future for Texas. And given that the vast majority of work and analysis in this Framework was completed before the onset of the COVID-19 pandemic, updates and reassessments will be necessary to reflect the rapid changes that have occurred over the last few months.

**Generous Support**

A document of this scope would not have been possible without the contributions and collaboration of many people across the state and nation. First and foremost, Texas 2036 would like to thank our financial supporters, many of whom have championed our efforts from the very beginning, for making this work possible. We are grateful for their generosity and for their ongoing commitment to the state’s long-term wellbeing.

Texas 2036 would also like to thank the numerous consultants, experts, members of the Texas 2036 policy advisory committees, and state and business leaders who engaged with Texas 2036 during the development of this report, in particular the Boston Consulting Group for their contributions to the Framework’s structure, peer states, goals, and indicators.

**The Future is Bright**

Our vision is that Texas is a land of opportunity, prosperity and wellbeing for all generations of Texans. We present this Strategic Framework to help shape this bright future. We know this goal and this work are bold and audacious, but if anyone can do it, Texans can. We have resources, time, pragmatic policymakers, a vibrant business sector, a generous philanthropic community, and tremendous size, scale, and location on our side. And, most importantly, we have each other — Texans intent on leaving Texas better than they found it for those who will come after them.

We hope this Framework will spur the right conversations about what matters the most to Texans. This is where you come in. We hope you see the importance of these future-focused, data-driven efforts to ensure Texas is the best place to live and work, and we hope you add to this coalition of Texans that, just like our state, is large and diverse. We encourage you to join
us by reaching out to our team, visiting www.texas2036.org, and following us on social media. Please be part of this critical conversation about what’s next for Texas.

Let’s get to work.

Tom Luce,  
FOUNDER AND CHAIRMAN OF THE BOARD  
TEXAS 2036

Margaret Spellings,  
PRESIDENT AND CHIEF EXECUTIVE OFFICER  
TEXAS 2036
Influences Shaping the Future of Texas

After substantial research and analysis, Texas 2036 has developed a broad focus on the most important factors that continue to shape Texas today and the trends that will influence its future. As proud as Texans are, we are all aware after the coronavirus pandemic that the world is interconnected and Texas is subject to broader forces beyond its control. The Strategic Framework can inform policy discussions and solutions, keeping in mind these powerful drivers of change:

Geography and a Changing Global Economy

Texans have a strong shared identity across dramatically different regions. In water supply and agriculture, or in health care and education, needs are very different in East Texas and West Texas, or in the Panhandle and the Valley. These very different regions all need access to world markets, but it is harder for “one size fits all” solutions to work in Texas, given the tremendous variety among the places Texans live and work.

- **Urban and Rural.** About 90% of Texans live in urban areas today and that trend will continue through 2036. At the same time, Texas’ rural counties provide invaluable energy, water supplies, agriculture production, and exports to fuel our state economy. Our interdependency will shape state policies and programs to reflect and respond to these unique needs.

- **A Vibrant and Vital Border.** The Texas/Mexico border is an extraordinary asset as well as a challenge, but there is no question that it is key to Texas’ economic growth and export success. The coordination of state and national policies on border issues — trade, transport, energy, immigration, water, and environment — is critical and will continue to require Texas’ leadership.

- **A Long and Valuable Coastline.** Texas is a global maritime powerhouse. Refineries, fishing, shipping, cruises, and tourism are driven by Texas’ central location on the Gulf of Mexico. From the Sabine River at Texas’ border with Louisiana to the Rio Grande at the Mexican border, Texas’ coastal counties (including Harris County) accounted for 33.4% of total Texas real gross product in 2014.

- **An Interconnected Economy.** Trade agreements and technology have made it far more efficient for businesses to cross borders and coordinate international supply chains. Thanks in large part to free trade agreements and abundant, low-cost energy, Texas has become the nation’s export powerhouse and one of the most globalized states in the nation. "In recent years, exports have accounted for 17.8% of the state’s GDP and supported an estimated 910,000 jobs." Texas depends on world markets, with 35% ($109.7 billion) of the state’s total goods exports going to Mexico in 2018 — Canada and China are our next-biggest trading partners. But uncertainty and changes in trade policies could have a disproportionate negative effect on Texas.
Demographics
Population growth helps drive economic growth. By this measure, Texas is successful. It is the second most-populous state in the country and has five of the 15 fastest-growing cities in the nation. By 2036, Texas is expected to add nearly 10 million people, increasing our state population to 38 million. Shifts within the Texas population will have major impacts on state government services such as education and infrastructure.

- **Population Diversity.** Recent projections indicate that Texas’ Hispanic and African American populations will both increase more than 40% by 2036, and the state’s Asian population will be its fastest growing, more than doubling in size. The Anglo population is projected to steadily increase, although at a slower rate than other groups. This increasingly diverse population will bring new skills, ideas and perspectives, helping the state retain talent, promote competitiveness and increase economic growth.

- **Poverty.** Economic growth has not equally benefited all Texans. Even though the overall poverty rate in Texas has largely held steady, the share of Texas students deemed low-income in our school system (i.e., qualifying for free and reduced-priced lunch) has increased from 35% in 1988 to 61% today.

- **Aging Population.** By 2036, the population of Texans 65 years of age and older is projected to grow by 78%, while the overall population will grow by less than half that (33%). Since older Texans use more health care than younger Texans, an increasing over-65 population will create pressures on the state budget and on Texas families.

- **Slowing Migration.** Domestic and international migration into Texas provides an important boost for the state’s economy — nearly half of the state’s workers are non-native Texans. And the higher educational attainment rates of these Texas transplants have created a better-educated workforce. Texas has especially benefited from international migration to fill high-skill jobs in fields such as science, technology, and health care. However, migration of all kinds is beginning to slow, making it increasingly important to prepare Texas students to meet our workforce needs.

Separation of Powers
Under our nation’s federal system, states have significant authority to impact the 36 goals outlined in this framework, but state governments do not operate in a vacuum. Federal laws and regulations often limit state efforts and can restrict innovation by the states. Changing federal regulations may also limit Texas’ ability to help the nation achieve and sustain energy independence.

And while this framework focuses primarily on state-level goals, much of the day-to-day government activity impacting Texans occurs in local communities, spearheaded by city and county officials, as well as local school boards. Aligning all levels of government to address these goals will ensure that Texas is best able to tackle the problems it faces today and will face in its third century.
Adaptability and Resilience
Texas cherishes tradition but has excelled at change throughout its history. With a modest economic start in cotton and cattle, the Texas economy has vaulted into leadership in fields such as medical research, telecommunications, energy production, and space exploration, among many others. Each of these key industries is facing competitive pressures to adapt and change, and so must Texas.

Making sure our infrastructure, business climate, and workforce skills are ready for unprecedented types of change is well within our state’s ability, with the right focus and preparation.

- **Climate.** More frequent extreme weather events will pose a threat to Texans’ safety and affect the state’s water supply, production of food and fiber, resiliency of infrastructure, and more — all of which have an impact on the state’s budget. While Texas weather has always had wild day-to-day extremes, potential long-term changes to the state’s climate increase the risk and intensity of weather events exponentially. In the past decade, Texas has experienced everything from its worst one-year drought on record (2011) to its wettest year (2015) to the greatest single-storm rainfall in the nation’s history (2017). Texas also has more billion-dollar weather disasters than any other state.

- **Technology.** Advancements in technology — from big data and advanced analytics to artificial intelligence to robotics — have the potential to stimulate economic growth and greatly improve Texans’ quality of life. However, these advancements also have the potential to disrupt industry and transform the labor market, meaning government needs to adapt at the speed of technological change.

- **Job Displacement.** Our economic health may hinge on how quickly Texas can adapt to the automation age, as technological advancements increasingly automate routine, low-skilled jobs. The state is projected to have 19% job growth by 2030, the most of any state and more than double the national average. But Texas could also experience a 23% job displacement rate, which translates into 3.6 million job displacements. More than one-in-four displacements are likely to affect workers with less than a bachelor’s degree.

- **Connected Living.** Texans are increasingly integrating technology and connectivity into their daily lives, affecting everything from shopping and entertainment to health and wellness to education and work. This can especially benefit rural areas, where digital technologies can improve access through online learning, telemedicine, remote work, and more. However, this also brings challenges, including an increased need for digital literacy skills and access to high-speed internet — particularly in rural areas. And it will be important for policymakers to keep pace with the regulatory, privacy, and other concerns in an area primarily driven by the private sector.
Peer States

For Texas to be the best place to live, work, and do business, we need to understand how we are doing today. The Strategic Framework measures Texas’ performance against all 49 states and also compares Texas to a competitive peer state group consisting of California, Colorado, Florida, Georgia, Illinois, New York, North Carolina, Ohio, Pennsylvania, Virginia, and Washington.

We identified these Peer States through an index of 15 metrics across three key categories:

- Which states are our primary competitors for business?
- Which states are our primary competitors for talent?
- Which states are similar in size to Texas?

Competitors for business were identified by factors such as overall economic growth, the number of businesses (including Fortune 500 headquarters, Inc. Magazine’s 5000 fastest-growing companies, new small businesses, and venture capital investments); and rankings on national indices assessing how attractive states are to businesses.

Competitors for talent were identified by factors such as overall increase in the talent pool (including net migration gain); rankings on a national index assessing quality of life (measuring factors such as cost of living, education, health, crime, commute times, weather, and cultural and recreational opportunities); and measures of per capita personal income.

States similar in size to Texas were identified using both the size of the economy, the size of the population, and the number of major metropolitan areas.
Ultimately, 11 states and Texas were at the top of this index.

Texas and these 11 Peer States account for 58% of the total U.S. population and 62% of the nation’s GDP.

We have also based many of the Strategic Framework targets on where we believe Texans want to be relative to our peers in the future. Throughout the report, where the data is available, we have included benchmarks that indicate where Texas currently ranks among these peers.

We believe there is a significant opportunity for Texas and its Peer States to partner on collecting and disseminating data, and to convene for discussions about common challenges and innovative policies and practices. These actions will allow all states and the nation to move forward on these important goals.
State of the Data

Texas 2036 is committed to helping build the strongest future for Texas through research grounded in transparent and accessible data. This Strategic Framework refers to 57 primary indicators and 110 additional indicators that were used to determine where we are today and measure progress in the future. To find these data sets and many others, visit Texas 2036’s Data Lab on our website. As you review these indicators, it is important to recognize the following limitations regarding these data sets.

Data is not always collected regularly. In some cases, the best data we want to use does not exist. In others, it is not reported regularly — which makes it challenging to measure progress consistently. Additionally, some data is inaccessible or not in a format that can be easily analyzed.

Additional data and indicators will be necessary as Texas progresses through the 21st century. As Texas approaches 2036, external influences impacting the state will necessitate additional datasets and indicator adjustments to ensure we are appropriately measuring progress.

Benchmarking against Peer States is sometimes difficult due to a lack of comparable data methods. Understanding Texas’ performance relative to our Peer States is important. But comparable data is not available for some indicators, either because no standardized methodology exists or because the data isn’t separated out by state.

The indicators we decided to use represent the best data currently available. As better data is developed, we will update our indicators. Six goals in the Strategic Framework currently lack certain key indicators; those will be developed over time as better data becomes available.

- **Workforce Needs**: Texans meet the state’s current and future workforce needs.
- **Availability of Health Care**: Texans have access to basic health care.
- **Wisely Managed State Spending**: Texas strategically manages state expenditures to deliver the best value to taxpayers.
- **Proven Modern Methods**: Texas government uses data-driven and proven modern methods to drive toward shared goals.
- **Customer Service**: Texas people and businesses can access public services they want and need through user-friendly methods and devices.
- **Aligned Accountability**: Texas officials at all levels collaborate well.

**Education & Workforce Data**

Standards set by the state may be overestimating progress. When comparing student outcomes on state assessments versus national assessments, the Texas Education Agency (TEA) shows much higher student performance than its national counterparts. The State of Texas Assessments of Academic Readiness (STAAR)
assessment estimates 45% of third-graders are reading on grade level,[00-40] versus 30% of fourth-graders in the National Assessment of Educational Progress (NAEP). [00-41]

Similarly, the TEA’s College Ready indicator suggests 50% of high school graduates are ready for postsecondary education.[00-42] That figure is much lower on national assessments such as the ACT, SAT, AP™, and IB™ exams.[00-43], [00-44], [00-45] We have included a discussion on both sets of indicators to address these issues.

**Comparable data is not collected across Peer States.** On some measures, methodologies differ by state. For example, many states have an indicator to measure postsecondary readiness but differ on how they define it. On other measures, data is not being collected. For example, while postsecondary completion may be tracked for all students at an institution, few states distinguish between residents and non-residents. Given such limitations, we are using Texas-specific indicators in the near term but believe there would be value in aligning measures across states.

**The data we want is not always available — at least not today.** Seamless longitudinal data is needed to understand the educational performance of all participants — students, teachers, and institutions — but isn’t widely available. And although organizations such as the Bureau of Labor Statistics and the Texas Workforce Commission publish projections, data is available only at the occupation level, not the skill level. Available data also may not reflect the complexities of the changing labor market. Similarly, data collected by the TEA on postsecondary credentials covers only certificates, two-year degrees, and four-year degrees, even though employers are increasingly issuing their own credentials. Texas 2036 can help highlight the need to make these important datasets more comprehensive and readily available.

**Data on Texas teachers is limited.** Teachers are the single largest in-school factor contributing to student achievement.[00-46] However, limited publicly available data exists on important topics such as the quality of teacher preparation programs and teacher pay practices. Better data would help Texas to attract, develop, and retain high-quality teachers — which is critical to improving student achievement.

**Health Data**

**Because of privacy concerns, it is difficult to evaluate health system value.** Data exchange is an important source of value creation in the health system.[00-47] The past decade has seen a consistent push for nationwide interoperability — the ability to exchange, access, and edit data — as a way of promoting value in the health system. At the same time, concerns about health data privacy are increasing. Health Insurance Portability and Accountability Act (HIPAA) regulations allow for electronic data sharing but also add needed barriers that protect patient privacy.[00-48] However, these regulations also make it harder for health care organizations to use data efficiently. And these kinds of rules appear likely to get stricter in the future.[00-49]

**There is currently little public access to data on health care costs at a state level,** a critical piece of the value equation. The Center for Medicare and Medicaid Services (CMS), which publishes its state health care spending estimates every five years, is
forced to rely on a combination of survey data and billing rates to make projections. We have based our estimates of future health care cost growth on this CMS dataset. Hopefully, in the future, better data sharing and increased price transparency will make it possible for CMS and other market participants to measure these costs more directly.

**Publicly available data has not kept pace with innovations in health care delivery.** Telemedicine and other means of health care are improving access to care for Texans across the state. With the spread of COVID-19 and subsequent mass quarantines, innovative forms of delivery have become widely adopted by providers and patients. Yet Texas does not adequately track access to and participation in such innovative forms of care, meaning we know little about the state’s changing health care landscape.

**Infrastructure Data**

**Digital connectivity indicators could be improved with a more nuanced methodology.** The current Federal Communications Commission data likely overestimates the population with broadband coverage, according to a 2018 Microsoft report.[00-50] The data uses census blocks as the unit of measurement, which assumes the entire census block has access to broadband service if at least one customer does. Additionally, the broadband subscription data from the American Community Survey does not capture speeds received by respondents.[00-51] As a result, we cannot currently determine how many users are subscribed to broadband at the federal minimum threshold of 25/3 Mbps. Filling the data gap is critical to tracking progress, and external organizations are working to improve these existing measures.

**Data on the economic dimensions of crisis readiness is not currently readily available.** While the current National Health Security Preparedness Index rigorously measures preparedness and response regarding human protection, data addressing the economic dimensions of resiliency is not currently available.

**Natural Resources Data**

**Data on water quality may be incomplete or underreported.** The Environmental Protection Agency has stated that the existing data may not reflect all monitoring done at the state level.[00-52] Furthermore, not all water systems reported data or received site visits. Some water systems in Texas fail to conduct monitoring or submit required samples to laboratories.[00-53] Even so, the Environmental Protection Agency’s Enforcement and Compliance History Online database represents the most complete and detailed dataset publicly available.

**Justice & Safety Data**

**There are many organizations supporting vulnerable and at-risk Texans** across the public, private, and non-profit sectors. Better data sharing practices would allow organizations to better serve the needs of Texans in crisis. Due to technological
limitations, data privacy restrictions, and the lack of integrated and interoperable data systems among these service providers, this data is not readily accessible.

**Across the country, data on the criminal justice process and outcomes is full of gaps.** This is partly due to the sheer numbers, with thousands of counties — each often with multiple agencies — storing data in their own siloed databases. To make matters worse, standard definitions of key concepts do not exist in Texas or across the nation, which makes data classification and access extremely challenging. As a result, it is difficult to evaluate justice system performance in any kind of comprehensive manner.

To address some of these data gaps, the Texas Criminal Justice Coalition has begun posting data on court dispositions in Dallas and Harris counties to an online dashboard. This tool, which highlights racial and gender disparities as well as the tendencies of specific judges, allows public stakeholders and policy makers to explore bail and sentencing trends in detail. But this is just a first step. We need the same level of rigor in tracking and analyzing data throughout the criminal justice system.

Texas 2036 has relied on imperfect recidivism measures to compare justice system performance across Peer States. Hopefully, more robust data tracking will enable a more comprehensive evaluation of justice system performance in the future.

**Government Performance Data**

There are data problems across government functions. Some datasets are not linked longitudinally or across service populations. Moreover, datasets often include self-reported agency data without quality checks. These drawbacks limit the ability of policy makers and public stakeholders to assess public services.

In many cases, significant data gaps emerge because legacy technology systems cannot interact smoothly with new business and data formats. In this report, we have proposed introducing proprietary assessments to evaluate the performance of government functions in the absence of reliable data. We will encourage the state to update outdated technology and build robust data collection systems so Texans in the future can rely on more current and useful information.

Weak analytic capabilities further limit Texas’ ability to make good decisions based on the most current facts. In a 2018 survey of 78 state agencies, only 13 of them (under 17%) reported employing staff whose primary duty was data management, a number that is unchanged from 2016. A mature data management and governance program depends on dedicated and highly-invested staff, which is something few state agencies report having.

The point of better data analysis in government is to be sure our public spending is addressing the highest service priorities in a cost-effective way. Many operational goals are focused more on spending totals, numbers of cases, and personnel rather than value measured in the quality and timeliness of service to Texans. To collect
and analyze the right data, we need to agree on what the most important shared goals are. Texas 2036 has proposed several “value of service” measures that will rely on clearer priorities and better data and planning.

COVID-19 Pandemic and Data Collection

The COVID-19 pandemic has disrupted, among many other things, Texas’ ability to collect valid and reliable data. For example, the annual STAAR exams that are administered to Texas public school students were suspended for the 2019-20 school year. Without this critical data, we cannot determine student learning, best practices, achievement gaps, and other critical points of understanding that drive instruction and policymaking.

The 2020 U.S. Census is another source of vital data at risk of being affected. While the Census will be completed (largely through online and mail submissions), some communities could be at greater risk of miscounts. With billions of dollars in federal funding at stake from Census findings, accuracy matters. In Texas, an undercount of 1% could result in a loss of $300 million in federal funding.
Executive Summary

The Texas 2036 Strategic Framework is the result of more than two years of research and analysis, focusing on the most important issues facing the state — issues that will shape Texas’ future quality of life and shared economic prosperity. The framework articulates a vision for the future of Texas:

Through our bicentennial and beyond, Texas is a land of opportunity, prosperity, and well-being for all generations of Texans.

This vision for Texas is built on seven broad policy pillars and 36 aspirational goals. While the policy pillars and goals comprise a wide range of topics, this framework is not meant to be a comprehensive plan for Texas. Nor should it necessarily be seen as a final product; rather, the Strategic Framework is designed to spark conversations across the state about what matters most to Texans and how we can effectively work together to build a bright future for our state.

Understanding the Strategic Framework:

The Strategic Framework rests on 36 important goals in a broad Prosperity and Well-Being section and six more specific policy pillars. Together, they comprise a set of priorities for Texas to address to sustain and expand prosperity in the future. We identified goals that are:

• **Critical:** Addressing the biggest challenges for Texas and the issues that matter most to Texans.
• **High impact:** Driving impact in opportunity, prosperity, and well-being for all generations of Texans.
• **Ambitious:** Bold in envisioning an even better Texas.
• **Unifying:** Bringing Texans together to support a stronger future for Texas.
• **Enduring:** Remaining relevant in 2036 and beyond, adapting to changing contexts.

Each policy pillar has an introductory section, followed by sections addressing each of the individual goals. The seven policy pillars and 36 goals are:

**Prosperity and Well-Being:** Two broad goals aim to ensure that Texas is the best place to live, work, and do business. These goals cut across the other six policy pillars.

1. **Economic Growth:** Texas spurs economic growth through an innovative and business-friendly climate.
2. **Quality of Life:** Texas is the best place to live and work.
**Education & Workforce:** Texans have the knowledge and skills needed to succeed in the 21st century.

3. **Early Learning:** Texas children get a strong early start to succeed in school and life.
4. **K-12:** Texas students graduate high school ready for postsecondary success.
5. **Postsecondary Education:** Texas students earn a postsecondary credential to access the jobs of today and tomorrow.
6. **Jobs:** Texans have the knowledge and skills to access careers enabling economic security.
7. **Workforce Needs:** Texans meet the state's current and future workforce needs.

**Health:** Texans are able to live healthy lives through an efficient and effective health system.

8. **Availability of Health Care:** Texans have access to basic health care.
9. **Affordability of Health Care:** Texans are able to afford the basic health care they need.
10. **Population Health:** Texans live long, healthy, and productive lives.
11. **Public Health:** Texans and their communities are empowered to adopt healthy lifestyles.
12. **Return on Health Care Investment:** Texas has a high-value health system that manages costs and delivers results.

**Infrastructure:** Texas ensures people, goods, information, and energy can move within and across our borders.

13. **Mobility of Individuals:** Texans can travel to their destinations effectively and efficiently.
14. **Mobility of Goods:** Texas enables economic growth by moving goods efficiently.
15. **Transportation Safety:** Texas maintains a safe transportation infrastructure.
16. **Digital Connectivity:** Texans can digitally participate in economic opportunities and essential services.
17. **Energy Distribution:** Texas maintains a sufficient, reliable, and cost-competitive energy infrastructure.
18. **Crisis Readiness:** Texas is ready to address the human, economic, and environmental consequences of natural disasters and hazards.

**Natural Resources:** Texas manages natural resources to promote quality of life, economic advantage, and environmental stewardship.

19. **Quality of Air:** Texans have clean air.
20. **Sufficient Water:** Texans can rely on a sufficient water supply.
21. **Quality of Water:** Texans have clean water.
22. **Parks and Wildlife:** Texas enhances and protects its state parks, public and private open spaces, and wildlife.
23. **Agricultural Production:** Texas leads in agricultural production with responsible natural resource stewardship.
24. **Energy Production**: Texas leads in energy production with responsible natural resource stewardship.

**Justice & Safety**: Texas ensures the safety and fair treatment of Texans.

25. **Public Safety**: Texans are protected from threats to their well-being and property.
26. **Protection for the Vulnerable**: Texas protects the vulnerable from traumatic experiences.
27. **Safety Net**: Texans have access to resources to meet basic needs when they are in crisis.
28. **Justice System**: Texans are served effectively, efficiently, and impartially by the justice system.

**Government Performance**: Texans are well served by accountable government at all levels.

29. **Confidence in Government**: Texans have confidence in the public institutions that serve them.
30. **Civic Engagement**: Texans actively participate in governing their communities.
31. **Broad, Stable Revenue Base**: Texas people and businesses contribute taxes and fees to meet strategic needs and remain competitive as we grow and change.
32. **Wisely Managed State Spending**: Texas strategically manages state expenditures to deliver the best value to taxpayers.
33. **Talent in Government**: Texas government attracts and retains the critical talent to deliver excellent service and get results.
34. **Proven Modern Methods**: Texas government uses data-driven and proven modern methods to drive toward shared goals.
35. **Customer Service**: Texas people and businesses can access public services they want and need through user-friendly methods and devices.
36. **Aligned Accountability**: Texas officials at all levels collaborate well.

Within each of the 36 goals, the document is divided into subsections, including:

- **Texas Today and Tomorrow**: An overview of the current data on how the state is performing on the relevant goal and where the state can aspire toward in the future.
- **Context**: Background information that may aid a reader with limited experience on the topic.
- **Assessment**: Includes indicators to help track progress over time. These indicators may change as better data is identified.
- **Connections**: Identifies many of the interconnections between the 36 goals. Making progress in achieving one goal may assist in progress toward another goal.

**Summary of Findings**: While not every goal and indicator should be seen as equally important, they do reveal uneven success across key policy areas and help identify both areas for pride and areas for improvement. In the cross-cutting Prosperity and Well-Being goals – economic growth and quality of life – Texas ranks
well compared to Peer States. Economic success in Texas has been supported by strong infrastructure, abundant natural resources (especially energy), and a state government that has maintained a relatively broad, stable revenue base and has wisely managed its spending, among other things. These strengths should continue to serve Texas into the future.

Indicators also reveal major challenges facing Texas. As our economy modernizes, it will increasingly depend on a talented, healthy workforce. Yet Texas lags behind Peer States in its most important goals related to human capital. While the Legislature has recently acted to pass House Bill 3, the impacts of education reform are not immediate and may be undercut by significant absences tied to the COVID-19 pandemic. Today, Texas is among the lowest-performing Peer States in metrics such as fourth-grade reading proficiency and educational attainment. In Health, poor outcomes are paired with health care that is unaffordable and difficult to access for
many Texans.

While these challenges are concerning, the overall picture is far from hopeless. With strong economic fundamentals and a growing and vibrant population, Texas is still very much in control of its fate. By identifying and addressing our most pressing challenges now, our state can live up to its full potential — a land of opportunity, prosperity, and well-being for all generations of Texans.

**Note on Timing:** Much of the work that informed this document occurred prior to the societal and economic disruption caused by the COVID-19 pandemic. Indicators and explanatory text reflect the most up-to-date information available at the time the document was compiled in early 2020, though changes may have occurred in subsequent months. This Strategic Framework will adapt and evolve over future years, just as the state will adjust due to positive reforms achieved by lawmakers.
Pillar 01
Prosperity & Well-Being

Through our bicentennial and beyond, Texas is the land of opportunity, prosperity, and well-being for all generations of Texans.

Goal: ECONOMIC GROWTH
GDP growth

Goal: QUALITY OF LIFE
Quality of life Index
Focus

Economic growth is key to ensuring prosperity for all generations of Texans. Texans have enjoyed decades of economic growth and increased income. This has been made possible by many different attributes, including the talented workforce our state educates and attracts, a supportive infrastructure, and a business-friendly environment. Continuing such successes into 2036 will ensure Texans of all generations have the opportunity to prosper.

Quality of life is key to ensuring well-being for all generations of Texans. Texas is projected to add nearly 10 million people by 2036. This diverse population, like previous generations, will be drawn by, or enticed to stay by, a low cost of living, abundant natural resources, and a wide array of cultures. A rising quality of life will complement the economic benefits Texans enjoy.

These two broad goals — a prosperous, growing economy and a strong quality of life shared widely among Texans — are tied to progress in all six of our major policy pillars. To achieve these two overarching goals, our state will need to make significant advances in each of the policy pillars discussed in this Strategic Framework.

Goals and Targets for Texas 2036

Goal #1 - Economic Growth: Texas spurs economic growth through an innovative and business-friendly climate.

- **Target:** Texas ranks first among Peer States for economic growth.
- **Baseline:** Texas ranks first in the nation and among Peer States for economic growth with 4.4% GDP growth.

Goal #2 - Quality of Life: Texas is the best place to live and work.

- **Target:** Texas ranks first among Peer States for quality of life.
- **Baseline:** Texas ranks #15 in the nation and #6 among Peer States for quality of life.

Context

By adapting to dramatic economic changes for almost 200 years, Texas has increased job growth, wages, exports, and its general productivity. But the future economy of Texas will increasingly depend on knowledge-based companies and talented people. During times of rapid change, states will need to be dynamic to recover from dramatic disruptions. Texas encourages students to aim for postsecondary and
continuing lifetime education to improve its workforce. To nurture entrepreneurship, Texas also has programs in place to support business startups and expand high-tech industries. Our universities are home to more scientific and medical research than ever before and will continue to do more to help Texas build and expand its innovation economy.

**Trends**

**Texas' population is growing and becoming more diverse.** Overall, population growth and diversity are key ingredient to continued economic growth and improving the state's quality of life. Texas is doing well in this regard. Texas is the second-most populous state in the U.S. and has 5 of 15 of the fastest-growing cities in the U.S. By 2036, Texas is expected to add nearly 10 million people, increasing our state's population to 38 million.
GOAL 1
Economic Growth
Texas Spurs Economic Growth Through an Innovative and Business-Friendly Climate.

Texas Today and Tomorrow

Texas has consistently been among the top-ranked states in the nation for GDP growth in recent years. Texas also ranks second in the nation for the size of its economy, with a state GDP of nearly $1.9 trillion in 2019. If Texas were a nation, it would be the 10th largest economy in the world. The latest economic forecasts indicate the Texas economy could more than double in size by 2036, to more than $4.3 trillion.

Texas' economic growth has been driven by an innovative and business-friendly climate. Multiple indices rate the state among the “Best States for Business.” Texas also consistently ranks in the Top 3 among its Peer States in attracting new business as measured by a number of indicators — from Fortune 500 headquarters to fastest-growing private companies, to new small businesses to venture capital investments.

Remaining very competitive for business expansion and relocations will continue to be important for the state as it works to add quality jobs and spur economic growth and prosperity.
GDP growth: Annual percent change in real GDP[^11]

**Target**
By 2036, Texas will rank first among Peer States in annual percent change in real GDP.

**Indicator Background**
Gross domestic product represents the total combined value of goods and services produced by the state’s economy. This indicator uses data from the U.S. Department of Commerce’s Bureau of Economic Analysis to compare real gross domestic product growth among Peer States on an annual basis.

**Target Background**
Texas has shown considerable strength in economic growth categories for much of the past decade and should seek to maintain its economic leadership among Peer States.

**Benchmark**
Texas ranks #1 in the nation and #1 among Peer States.[^14]

Annual percent change in real GDP, 2018-2019

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[^11]: 4.4% in 2019
[^12]: Improving
[^13]: Target
[^14]: Benchmark

---

[^1]: PROSPERITY & WELL-BEING
Other Indicators Texas 2036 is monitoring:

**Best for Business**: Ranking on Forbes "Best States for Business" Index

**Fortune 500**: Number of Fortune 500 headquarters

**Inc. 5000**: Number of Inc. 5000 headquarters

**New Small Businesses**: Number of new small businesses

**Venture Capital**: Amount of venture capital investment in emerging companies

**New Economy**: Ranking on Information Technology and Innovation Foundation State New Economy Index
GOAL 2
Quality of Life
Texas is the Best Place to Live and Work.

Texas Today and Tomorrow

An attractive quality of life enhances the well-being of all generations of Texans. Quality of life includes economic opportunity and much more: a low cost of living; affordable housing; short commute times; quality education and health systems; low crime rates; good weather; and vibrant cultural and recreational opportunities.

Quality of life is an important factor in attracting and retaining talent. Since 2010, Texas has ranked second among states in the net number of domestic migrants. More than 50% of migrants come here for jobs; another 20% choose Texas for other reasons, such as affordable housing. Migration into Texas has been slowing since 2015, however, and it will be increasingly important for the state to compete on quality of life — not just to attract new Texans, but to retain for the four out of five native Texans who continue to live and work in the state.
**Quality of Life Index**: Quality of Life ranking on Forbes "Best States for Business" Index

**Target**
By 2036, Texas will rank first among Peer States.

**Indicator Background**
Forbes annually publishes a “Best States for Business” Index that uses a multifactor analysis to identify the nation’s best business climate. Among the factors considered is a quality-of-life ranking based on many of the same metrics that are key to other goals in this framework. Specifically, the Forbes methodology includes: cost of living, school test performance, crime rates, climate, university rankings, cultural and recreational opportunities, commute times, and health rankings.

**Target Background**
Progress on all 36 goals in this framework will help ensure Texas is the best place to work, live, and raise a family.

**Benchmark**
Texas ranked #6 among peers in 2019. The top-ranked peer state, Virginia, is ranked #1 nationally.

**Quality of Life ranking on Forbes “Best States for Business” index - 2019**

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</table>
Other Indicators Texas 2036 is monitoring:

Per capita income: Real per capita personal income and real per capita income growth

Income inequality: Gini index of income inequality

Cost of living: Regional price parity

Housing affordability: Cost burden rates for household renters and household owners

Arts Vibrancy: Ranking on Arts Vibrancy Index

Well-Being: Ranking on Gallup National Health and Well-Being Index

Net Migration Gain: Net domestic migration gain or loss
Pillar 02

Education & Workforce

Texans have the knowledge and skills needed to succeed in the 21st century.

Goal: EARLY LEARNING
Third-grade reading
Fourth-grade reading

Goal: K-12
Postsecondary ready graduates

Goal: POSTSECONDARY EDUCATION
Postsecondary completion

Goal: JOBS
Living wages

Goal: WORKFORCE NEEDS
Workforce Needs

How to read
Baseline
- Not compared across states
- On target
- Approaching target
- Off target
- Texas vs peer states

Trend
- Not yet tracked
- Improving
- Flat
- Worsening
- Mixed
Focus

The Texas economy increasingly depends on a highly educated workforce. By 2036, 71% of jobs in Texas will require a postsecondary credential. But only 32% of high school graduates earn a postsecondary credential within six years of graduating from high school. When compared with Peer States, Texas comes in last in the percentage of its population with a postsecondary credential.

Texas also needs a stronger, more skilled workforce to be considered the best place to do business, both nationally and internationally. When searching for a location for its second headquarters, Amazon listed a highly educated labor pool as a critical requirement. Other companies will certainly do the same. Today, migrants from other states and countries are 1.5 times more likely than native Texans to have a bachelor’s degree, and Texas has relied on these migrants to meet workforce needs. But with migration slowing in recent years, it is increasingly important that today’s Texans are more highly educated.

The education system is a direct pipeline to a highly skilled workforce. Early learning prepares students for success in elementary, middle, and high school education, which in turn prepares them for success in postsecondary education; and then postsecondary prepares students for success in the workforce. Yet Texas is falling behind at every stage of the pipeline. Texas ranks last among Peer States in early literacy and only half of Texas students are graduating from high school ready for postsecondary education. Persistent achievement gaps exist throughout Texas’ educational pipeline based on student income, race, geography, and language proficiency.

A highly educated workforce is also critical to ensuring all Texans have the opportunity to have careers that bring economic security. Workers with a postsecondary credential are four times as likely to hold a good job (median earnings of $65,000 per year) as workers with no more than a high school diploma. Yet barely two out of five Texans have that level of education.

A strong public education system undergirds a strong society. With a growing and increasingly diverse population, Texas relies on its public schools to prepare students not only to be effective workers, but also to be engaged, productive members of society. Through civics, history, and other topics, students learn shared values as well as how participation and good citizenship strengthen our democracy.

A strong education system today ensures a strong workforce, a prosperous economy, and a civically engaged population tomorrow.
Goals and Targets for Texas in 2036

Goal #3 - Early learning: Texas children get a strong early start to succeed in school and life.
- **Target:** 75% of 3rd graders read on grade level and Texas ranks in the Top 3 in 4th grade reading among Peer States by 2036.
- **Baseline:** 45% of Texas 3rd graders read on grade level. Texas ranks 12th among Peer States in 4th grade reading, with 30% of students reading on grade level.

Goal #4 - K-12: Texas students graduate high school ready for postsecondary success.
- **Target:** 75% of high school graduates are prepared for postsecondary education by 2036.
- **Baseline:** 50% of high school graduates are ready for postsecondary education.

Goal #5 - Postsecondary Education: Texas students earn a postsecondary credential to access the jobs of today and tomorrow.
- **Target:** 75% of high school graduates earn a postsecondary degree or credential within six years of high school graduation by 2036.
- **Baseline:** 32% of high school graduates earn a postsecondary degree or credential within six years of high school graduation.

Goal #6 - Jobs: Texans have the knowledge and skills to access careers enabling economic security.
- **Target:** Texas ranks in the Top 3 among Peer States for households that earn a living wage by 2036.
- **Baseline:** Texas ranks sixth among Peer States, with 58% of Texas households earning a living wage.

Goal #7 - Workforce needs: Texans meet the state’s current and future workforce needs, minimizing the gap between supply and demand by 2036, especially in key sectors.

No indicator has been selected. While organizations such as the Texas Workforce Commission and the Bureau of Labor Statistics produce public workforce projections, data does not reliably reflect the changing labor market and is available only at the occupation level, not the skill level.

Context

**Approximately 5.4 million students attend Texas public schools,** with 94% enrolled in independent school districts and 6% in public charter schools.\(^{[22-24]}\) The state has 1,200 independent and charter school districts. While most districts are small and rural,\(^{[22]}\) the 10 largest districts combined enroll more than 1 million students.\(^{[22-24]}\) Approximately 52% of Texas public school students are Hispanic, 27% are white, and 13% are Black; 61% of students are economically disadvantaged, meaning they qualify for a free and reduced-price lunch, and 20% are English-language learners, meaning they have a different primary language and are in the process of learning English.\(^{[22,23]}\)
Texas public schools employ more than 700,000 people, 49.8% of whom are full-time teachers. Texas' teachers are overwhelmingly white (58%) and female (76%). On average, our teachers have over a decade of teaching experience and earn roughly $54,000 per year.

Texas public schools are overseen by local school boards and charter governing bodies, which have authority over priorities, policies, and budgets. The Texas Education Agency provides system-wide oversight, including funding distribution, educator preparation standards, curriculum standards, student assessments, and school accountability. In 2018, Texas public schools received more than $63 billion in funding. The majority of funding comes from local property taxes and state revenue, while federal funding accounts for roughly 10%. Funding is distributed to districts through formulas based on enrollment and other factors. In 2018, total per-pupil funding from all sources was approximately $11,700.

Approximately 1.7 million students attend Texas public higher education institutions, with 48% of students enrolled in four-year institutions and 52% enrolled in two-year institutions. 52% of students are economically disadvantaged, meaning they have received a Pell grant at one point.

Texas public higher education institutions are overseen by governing boards. Appointed by the governor at four-year universities and locally elected at two-year colleges, these boards have authority over institutional priorities and budgets. The Texas Higher Education Coordinating Board provides system-wide oversight through statewide planning, data collection and analysis, and the distribution of some funding. The Texas Legislature appropriated $21.9 billion in funding to public higher education institutions for the 2020-2021 biennium, with a combination of state funds, federal funds, institutional funds, and tuition and fees.

The Texas civilian labor force includes over 14 million workers. The Texas Workforce Commission collects and disseminates workforce data, including analysis of labor market trends and shifts in occupations and industries in the state. Together with 28 local workforce development boards, the Commission also oversees a wide array of services to both employers and job seekers, including job training, adult education programs, and employer-based learning programs. In addition, the Commission provides annual grants for workforce training and retraining through a partnership with businesses, public community and technical colleges, and economic development organizations. This program has trained more than 385,000 workers over the past 20 years.

Trends

In recent decades, Texas has depended on domestic and international migration to meet its workforce needs; nearly half of the state’s workers are not native Texans. Migrants into Texas are 1.5 times as likely as native Texans to hold a bachelor’s degree or higher and have been critical in meeting workforce needs. But overall migration has slowed in recent years, declining by more than 30% between 2015 and
If this trend continues, there won’t be enough new Texans to offset the lower educational attainment rates of native Texans, making the need to invest in our education system even greater.

Student demographics in Texas have shifted significantly over the past two decades. Today, more than half of Texas students are Hispanic; 3-in-5 are economically disadvantaged; and 1-in-5 is an English-language learner. Texas traditionally has had a stratified education system where some student groups achieve nationally competitive results while others - particularly students of color and those from low-income families - fall behind. In order to help Texas students meet the state’s future workforce needs, we need to better address these achievement gaps.
GOAL 3
Early Learning
Texas Children Get a Strong Early Start to Succeed in School and Life.

Texas Today and Tomorrow

Reading proficiency in early grades — from pre-kindergarten to third-grade — is a powerful predictor of later student success. Research shows that students are four times more likely to drop out of school if they are not reading on grade level in third-grade. Without strong foundational literacy skills, students cannot obtain the knowledge and skills needed to successfully complete their education, let alone their careers.

Building these foundational literacy skills starts early. Quality early childhood education programs such as pre-kindergarten improve language and literacy skills and close early achievement gaps among student groups. Investments in quality pre-K can also have major economic benefits: one study estimates that every dollar invested in pre-K can create an economic impact return as high as $12.90.

Today, only 45% of third-graders read on grade level. If Texas is to meet its future workforce needs, we need to address persistent achievement gaps between student groups. Only 35% of economically disadvantaged third-graders scored on grade level, compared to 61% of non-economically disadvantaged students. Significant achievement gaps also exist by race: 33% of Black students, 39% of Hispanic students, and 56% of white students met third-grade reading standards. And only 39% of English-language learners met grade level, below the statewide overall rate of 45%.

Higher early learning levels are also necessary for Texas to be competitive with peers. Over the past decade, reading proficiency rates have improved across the U.S., but not in Texas. Between 2005 and 2019, Texas dropped from 36th to 46th among states in fourth-grade reading proficiency rates on the national assessment. Today, Texas is ranked last among its Peer States. And by student demographics, Texas still lags its Peer States, ranking 10th out of 12 in reading proficiency rates for Hispanic students, 11th for Black students, and 12th for economically disadvantaged students.

Context

Early learning spans from birth through third grade and is delivered by early childcare providers, public and private pre-kindergarten programs for three- and four-year-olds, and K-12 schools. Multiple agencies provide oversight: the Texas Health and Human Services Commission regulates early childcare providers, the Texas Workforce Commission subsidizes and oversees childcare for low-income families, and the Texas Ed-
ucation Agency manages public pre-kindergarten through third grade. Capacity of quality early childcare centers, as well as the number of seats in public pre-kindergarten programs, has been a system-wide challenge.

In 2019, the Texas Legislature passed major school finance reform legislation (HB 3), which includes reforms to improve student outcomes, increase funding and equity, and support teachers, among others. The legislation provides $735 million for early literacy and mandates full-day pre-K for all eligible four-year olds, kindergarten readiness reading diagnostics, and training in reading instruction for kindergarten through third-grade teachers. The legislation also requires districts to set annual targets for improving third-grade reading outcomes.
Third-grade reading: Percentage of students at or above Meets Grade Level on the STAAR Grade 3 reading assessment

Target
By 2036, 75% of students will be at or above Meets Grade Level in third-grade reading.

Indicator Background
The STAAR exam is a standardized test administered annually to each Texas student in grades 3-12. Because earlier grades are not tested, the third-grade STAAR receives focus because it is the first standardized snapshot of whether a student is academically on pace. This indicator shows the percentage of students reading at or above grade level in Texas third-grade classrooms, which corresponds to the STAAR tiers of "Meets Grade Level" and "Masters Grade Level." [02-38]

Target Background
By 2036, experts anticipate that 71% of careers will require a postsecondary credential.[02-39] To ensure our students are going to be able to meet the 71% postsecondary goal, 75% of third-graders will need to be reading on grade level by 2036.

Benchmark
Because the STAAR exam is a Texas-specific test, this indicator is not compared to Peer States. Instead, Texas is compared against itself over time.

Percentage of Texas third-graders who scored "Meets Grade Level" or higher on the STAAR reading assessment, 2018-19

- 45% All students
- 35% Economically disadvantaged
- 61% Non-Economically disadvantaged
- 33% Black
- 39% Hispanic
- 56% White

Legend:
- Red: All students
- Yellow: Income
- Pink: Race
**Fourth-grade reading**: Percentage of students at or above Proficient on the NAEP Grade 4 reading assessment

**Target**
By 2036, Texas will rank in the Top 3 among its group of 12 Peer States.

**Indicator Background**
The NAEP exam is a standardized test administered biennially to a subset of students in each state as well as Washington, D.C. and Department of Defense Education Activity (DoDEA) schools. Because it is the largest nationally representative assessment of student performance in the U.S., it provides valuable context on how Texas students perform relative to their peers in other states. This indicator shows the percentage of students reading at or above grade level in Texas fourth-grade classrooms, which corresponds to the NAEP tiers of “Proficient” and “Advanced.” [02-42]

**Target Background**
With proven links between early literacy and important later outcomes such as high school graduation rates,[02-43] it is critical that Texas is a leader among Peer States in this indicator.

**Benchmark**
#12 (peers); Top 3 baseline at 38% or higher [02-46]

Percentage of fourth-graders who scored "At or Above Proficiency" on the NAEP reading assessment

- **Worst - Texas**
- **Best - Pennsylvania and Colorado**
- **Peer states**

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</table>
Other Indicators Texas 2036 is monitoring:

**Kindergarten readiness**: Percentage of public pre-K students ready for kindergarten

**Enrollment in public pre-K**: Percentage of eligible 3- and 4-year-olds enrolled in public pre-K

**Capacity of quality early childcare centers**: Number of seats in quality accredited childcare centers
GOAL 4
K-12
Texas Students Graduate High School Ready for Postsecondary Success.

Texas Today and Tomorrow

With more and more jobs requiring postsecondary credentials, Texas high school students need to graduate prepared for postsecondary education. Research shows that students who score at a certain level on the SAT, ACT, Advanced Placement (AP), and International Baccalaureate (IB) exams are more likely to be ready for college and, not surprisingly, exhibit higher postsecondary completion rates.\(^{[02-47]}\)

Today, 90% of Texas students graduate high school,\(^{[02-48]}\) but only 50% of these graduates meet the College Readiness requirements set by the Texas Education Agency.\(^{[02-49]}\) And even fewer students meet college ready benchmarks on national assessments: less than one-third of graduates meet required scores on the SAT or ACT,\(^{[02-50]}\) and only one-fifth meet required scores on AP or IB exams.\(^{[02-51]}\) These numbers are proof that Texas' K-12 education system is not helping enough students to be ready for the challenges ahead of them in advancing their education.

In addition, wide gaps exist in college readiness by student income and race. Only 39% of economically disadvantaged high school graduates are college-ready, compared to 61% of non-economically disadvantaged peers.\(^{[02-52]}\) By race, 32% of Black students and 44% of Hispanic students graduate postsecondary-ready, compared to 61% of white students.\(^{[02-53]}\)

K-12 education — including opportunities to participate in rigorous postsecondary-level coursework — is critical to prepare all students for personal success in whatever field they choose, and to produce a highly educated workforce for Texas.

Context

Texas has approximately 350,000 high school graduates every year.\(^{[02-54]}\) To be ready for more demanding levels of education, these graduates need to meet at least one of the College-Ready indicators set by the Texas Education Agency (TEA),\(^{[02-55]}\) such as: meeting college ready criteria on the Texas Success Initiative (TSI), SAT, or ACT assessments, high scores on AP or IB exams in any subject area, earning nine or more hours of dual course credit or earning an associate degree prior to graduation from high school. Currently, the majority of Texas high school graduates demonstrate college readiness primarily by meeting the TSI criteria, a minimum standard.\(^{[02-56]}\) However, the major school finance reform legislation (HB 3) passed by the Texas Legislature in 2019 requires the TEA to utilize a more rigorous indicator of college readiness when
allocating outcomes-based bonus funding to districts, relying upon TSI, SAT, and ACT scores paired with postsecondary enrollment.

Texas has made significant progress in participation in college credit-bearing courses: enrollment in AP courses has increased by 36%, and enrollment in dual credit has increased by 41%, in the past five years.[2-57, 2-58] Still, only 23% of ninth- through 12th-graders in Texas enroll in AP courses, and only 20% enroll in dual credit.[2-59, 2-60] Participation in these programs also does not always result in college credit; only 50% of students who took an AP exam scored high enough to earn credit,[2-61] and dual credits awarded in high school do not always transfer to colleges and universities.

Texas has led the nation in developing and expanding some innovative high school models, such as Early College High Schools and P-TECH campuses, which provide students (especially economically disadvantaged, Black, and Hispanic students) the opportunity to earn up to 60 hours of postsecondary credit or an associate degree while in high school. However, these models only serve a fraction of Texas high school students.[2-62]

### Postsecondary Ready Graduates: Percentage of annual graduates demonstrating college readiness

**Target**

By 2036, 75% of Texas high school graduates will be postsecondary-ready.

**Indicator Background**

The postsecondary readiness indicator is tracked by the Texas Education Agency as “College Readiness.”[2-63] This indicator is updated annually based on the percentage of high school graduates in Texas who have demonstrated college readiness in one of a number of ways, including meeting college ready standards on the SAT (530 on Mathematics and 480 on Evidence-Based Reading and Writing), the ACT (23 composite score), or the TSI (351 on Reading and 350 on Mathematics). Other pathways include meeting college-ready standards on an AP exam (3 or higher) or an IB exam (4 or higher), earning nine or more hours of dual credit in any subject, earning an associate degree while in high school, or completing an OnRamps course and receiving at least three hours of college or university credit. With the passage of major school finance reform legislation (HB 3) in 2019, the Texas Education Agency will begin utilizing a more rigorous College, Career, and Military Readiness indicator that pairs SAT, ACT, and TSIA performance with direct postsecondary enrollment and employment rates.[2-64] Texas 2036 will use this new indicator when it is adopted.

**Target Background**

By 2036, experts anticipate that 71% of careers will require a postsecondary credential.[2-65] To ensure our student pipeline is on track to meet the 71% postsecondary goal, 75% of high school graduates will need to be postsecondary-ready by 2036.

**Benchmark**

This indicator is not currently assessed against Peer States due to varying methodologies by state.
Percentage of Texas high school graduates who met TEA College Ready criteria, high school graduating class of 2017 - 2018

Other Indicators Texas 2036 is monitoring:

**College, Career, or Military Ready Graduates**: Percentage of annual graduates demonstrating college, career, or military readiness

**High School Graduation**: Percentage of students graduating from high school within four years

**STAAR Performance**: Percentage of students at or above Meets Grade Level on the STAAR assessments for all grades, all subjects

**Eighth-Grade Math**: Percentage of students at or above Proficient on the NAEP Grade 8 math assessment
GOAL 5
Postsecondary Education
Texas Students Earn a Postsecondary Credential to Access the Jobs of Today and Tomorrow.

Texas Today and Tomorrow

Postsecondary education is increasingly important for Texas students to access jobs; today, 80% of good jobs, meaning those with median earnings of $65,000 per year, require a postsecondary credential,[02-68] and by 2036, 71% of all jobs will require at least some form of postsecondary credential.[02-69]

Texas needs to ensure its students are earning postsecondary credentials. Given the fact that migration is slowing, the state can no longer rely so heavily on importing highly educated workers to meet its workforce needs.

Although 72% of Texas high school graduates enroll in a higher education institution within six years of graduating from high school,[02-70] only 32% actually complete their programs and obtain a postsecondary credential within that time frame.[02-71] Gaps between postsecondary enrollment and completion rates are even more pronounced for disadvantaged student groups in Texas. For example, while 63% of economically disadvantaged students enroll in postsecondary schools or programs, only 20% earn a degree or credential within six years of high school.[02-72] Similar completion disparities exist by student race, indicating that Texas’ education system is not preparing all students for success in postsecondary programs.

It is important for Texas high school graduates to not only be ready for postsecondary education, but to also pursue and obtain certificates and degrees. Completion is critical if we are to have a highly educated workforce.

Context

Postsecondary credentials include Level 1 and Level 2 certificates,[02-73], as well as two-year and four-year degrees. Currently, 75% of Texas high school graduates completing a postsecondary credential within six years of graduating from high school earn four-year degrees.[02-74] Twenty percent complete two-year degrees and 5% obtain certificates.[02-75]

The increasing costs of higher education institutions may be a barrier to earning a postsecondary credential; since 2003, net tuition and fees at public universities in Texas have increased by 90% in inflation-adjusted dollars.[02-76] About one-in-two students graduates with debt, with an average of nearly $27,000 in loans to pay back.[02-77] At both the state and local levels, there have been efforts to rein in the rising cost of
postsecondary education for students. For example, the Toward EXcellence, Access, and Success (TEXAS) Grant Program provides aid predominately for high-performing, low-income Texas students, while the Dallas County Promise is a local effort to make community college free for students in Dallas County.\(^{[02-78],[02-79]}\)

**Postsecondary completion**: Percentage of Texas high school graduates who earned a certificate or degree from a higher education institution within six years of high school graduation

**Target**

By 2036, 75% of Texas high school graduates will earn a certificate or degree from an institution of higher education.

**Target Background**

By 2036, experts anticipate that 71% of careers will require a postsecondary credential.\(^{[02-80]}\) To ensure our student pipeline is on track to meet the 71% postsecondary goal, 75% of high school graduates will need to be postsecondary-ready by 2036. Because this indicator tracks high school graduates only, the target overshoots workforce educational attainment estimates to account for students who do not graduate high school.

**Indicator Background**

This indicator is released on an annual basis by the Texas Education Agency. It is a compilation of postsecondary completion data provided by the Texas Higher Education Coordinating Board and the National Student Clearinghouse. It tracks whether students earn a degree or credential in a timely manner and includes institutions that are two-year and four-year, in-state and out-of-state, as well as public and private.

**Benchmark**

This indicator is not currently assessed against Peer States due to varying methodologies by state.
Postsecondary completion within 6 years of high school graduation by type of credential

Other Indicators Texas 2036 is monitoring:

**Postsecondary enrollment:** Percentage of high school graduates who enrolled in a Texas public higher education institution the fall semester following high school graduation

**Postsecondary persistence:** Percentage of high school graduates who enrolled in a Texas public higher education institution the fall semester following high school graduation and returned for a second year

**First-year earnings of postsecondary graduates:** Average first-year earnings of graduates who earned a certificate or degree from a Texas public higher education institution

**Earnings of postsecondary graduates age 25 to 30:** Median earnings of high school graduates who earned an associate or bachelor's degree from a Texas public higher education institution
GOAL 6

Jobs

Texans Have the Knowledge and Skills to Access Careers Enabling Economic Security.

Texas Today and Tomorrow

Texans who want living-wage jobs (in Texas, an average of about $53,000 for a family of four)\(^{[02-83]}\) are smart to plan for a postsecondary degree or credential because they provide significant wage premiums. On average, workers with a certificate earn a 20% premium over workers with a high school diploma.\(^{[02-84]}\) Those with an associate degree earn more than a 40% wage premium.\(^{[02-85]}\) And for workers with a bachelor’s degree, the premium jumps to more than 80%.\(^{[02-86]}\) Clearly, a postsecondary education is the key path to economic security, and ultimately, upward mobility in the future economy of Texas.

Across the United States, educational attainment is tied closely to employment and poverty status, as well. According to a 2019 report, adults with a high school diploma or less were roughly twice as likely as adults with a bachelor’s degree to be unemployed.\(^{[02-87]}\) Similarly, in 2018, the poverty rate for high school graduates was 14%, compared to 4% for adults with a bachelor's degree or higher.\(^{[02-88]}\)

Our education system also needs to support reskilling and upskilling for today’s working Texans as more and more routine, low-skilled jobs are automated. In the future, Texans will need to become lifelong learners who engage with the education system multiple times throughout their careers to keep their skills fresh as the job market evolves.

Postsecondary education — including reskilling and upskilling — is important to ensure all Texans have the knowledge and skills needed to attain living-wage jobs and upward mobility.
Living wages: Percentage of Texas households that earn above a living wage

Target
By 2036, Texas will rank in the Top 3 among Peer States.

Indicator Background
The United Way's ALICE (Asset Limited, Income Constrained, Employed) Project estimates the percentage of households across the United States that do and do not earn enough to afford basic necessities such as housing, food, transportation, child care, and health care. This indicator takes into account regional differences in the cost of living, as well as the differing demands of various family sizes and structures to give nuanced estimates of living wage thresholds. In Texas, the average ALICE (living wage) threshold for a family of four with one child and one toddler is $52,956. The ALICE Project is an original analysis by the United Way using U.S. Census American Community Survey Public Use Microdata Samples (2016 data) as source data.

Target Background
The percentage of Texas households that earn a living wage has a high impact on overall economic growth and quality of life. The ability of Texans to afford basic necessities without relying on government support can mean higher tax revenues and lower expenditures, as well as higher productivity and a better quality of life.

Benchmark
#6 (peers); Top 3 baseline at 60% or higher

Percentage of Texas households that earn above a living wage

- < 49%
- 49% - 56%
- 56% - 61%
- > 61%
Other Indicators Texas 2036 is monitoring:

**Postsecondary attainment (age 25 to 64):** Percentage of population age 25 to 64 with a postsecondary credential

**Postsecondary attainment (age 25 to 34):** Percentage of population age 25 to 34 with a postsecondary credential

**Connections**

With improved access to careers enabling economic security, Texans will be less likely to need a safety net (Goal #27). And fewer people needing a safety net means safety net programs will be less of a financial burden on the state.

There are proven links between a person’s job status and his or her health (Goal #10). Controlling for other factors, one study indicates that a 10-point rise in unemployment leads to a loss of roughly a year-and-a-half of life expectancy. [02-93]

Unemployment is also strongly associated with substance abuse and depression, among other things. [02-94][02-95]
GOAL 7

Workforce Needs

Texans Meet the State’s Current and Future Workforce Needs by 2036.

Texas Today and Tomorrow

Meeting the state’s workforce needs is critical to ensuring continued economic growth. But there is currently a mismatch between the Texas workforce and employer needs. This gap between supply and demand is projected to grow, leading to labor shortages and labor surpluses in key sectors. With the Texas population expected to grow by nearly 10 million people by 2036, the state will need to add 8 million new jobs to support strong economic growth — the majority of which will require advanced skills and education.

This is a complex challenge, thanks to a number of important trends that are increasing the demand for highly skilled labor. The labor market is transforming as technological advancements — such as big data and advanced analytics, artificial intelligence, and robotics — increasingly automate routine, low-skilled jobs and require large-scale reskilling and upskilling of the labor force. In addition, while urbanization is creating labor shortages in rural areas, increasing industrial concentration in major metropolitan areas is boosting demand for local sources of specialized labor. Meanwhile, slowing migration, an aging population, and other demographic shifts are shrinking the labor supply overall.

Addressing the gap between supply and demand — especially in key sectors — is critical to ensure the state’s workforce can fuel strong economic growth.
Assessment

Indicator
Indicator under development

Target
Current and future workforce gaps are being met in each region of Texas.

Indicator Background
Today, data on workforce needs in Texas is limited. An ideal workforce indicator would measure and project short-term and long-term gaps in the labor market with a particular focus on skill gaps.

Target Background
In partnership with state agencies and other stakeholders, Texas 2036 will work to ensure Texas has useful, valid, and reliable data in this critical area.

Connections
Texas must ensure it has the labor supply and quality necessary to maintain its economic leadership (Goal #1).
Pillar 03

Health

Texans are able to live healthy lives through an efficient and effective health system.

Goal: AVAILABILITY OF HEALTH CARE

- Availability of primary care providers
- Availability of mental health care providers
- Persons with usual source of health care

Goal: AFFORDABILITY OF HEALTH CARE

- Texans unable to get care due to medical cost
- Uninsured rate

Goal: POPULATION HEALTH

- Life expectancy
- Mortality
- Low birthweight

Goal: PUBLIC HEALTH

- Childhood immunizations
- Adult vaccination
- Obesity

Goal: RETURN ON HEALTH CARE INVESTMENT

- Preventable hospital admissions
- Health care expenditure growth
Focus

Physical and mental health directly affect our productivity and quality of life. The opportunity to enjoy good health is based on many factors, including access to and affordability of basic health care, as well as the quality of health services provided.

Because of rising health care costs and relatively poor health outcomes, good health remains one of Texas’ most profound challenges.

Health care costs in Texas continue to rise at unsustainable levels. Total per capita health care expenditures in Texas — including public and private spending — have risen an average of more than 4% annually over the last 10 years for which data is available, outstripping state population growth and state GDP growth. Services for aging and disabled Texans also play a role: these costs already account for up to 25% of direct state health expenditures, and will continue to grow as the population ages. For many Texans — even those with insurance — increases in price have made care unaffordable, and for the 18% of Texans lacking insurance, additional hurdles exist.

At the same time, health care access and outcomes for Texans remain poor. Measuring the ratio of providers to population, Texas ranks 45th in primary care providers and 49th in mental health care providers, with little change in the past decade. Texas continues to rank among the bottom half of states in key health measures such as diabetes and obesity. Meanwhile, practices with a low cost but a high return, like child immunizations, are slow to gain traction. As a result, Texas is ranked tenth among 12 identified Peer States for preventable deaths.

It is important for the Texas health ecosystem that patients and purchasers of health care be empowered to control the cost of health services, and that institutions have incentives to make high-value investments that will improve health outcomes.

Goals and Targets for Texas in 2036

Goal #8 - Availability of health care: Texans have access to basic health care.
• Target: Texas ranks in the Top 3 among 12 Peer States for availability and regular use of health care providers.
• Baseline: Today, Texas is ranked last among Peer States in both categories.

Goal #9 - Affordability of health care: Texans are able to afford the basic health care they need.
• **Target:** Texas ranks in the Top 3 among Peer States for health care affordability.
• **Baseline:** Texas is ranked #11 among Peer States for its high level of adults who could not see a doctor in the past year because of costs, and last among Peer States in the rate of uninsured people.

**Goal #10 - Population health:** Texans live long, healthy, and productive lives.
• **Target:** Texas ranks in the Top 3 among Peer States for long-term health outcomes, including life expectancy and preventable deaths.
• **Baseline:** Life expectancy in Texas is currently comparable with the national average, but there are disparities in long-term health outcomes across population segments.

**Goal #11 - Public health:** Texans and their communities are empowered to adopt healthy lifestyles.
• **Target:** Texas ranks in the Top 6 among Peer States in key public health metrics that impact long-term outcomes.
• **Baseline:** While Texas is middle of the pack on some public health outcomes, the state ranks last in obesity.

**Goal #12 - Return on health care investment:** Texas has a high-value health system that manages costs and delivers results.
• **Target:** Texas ranks in the Top 3 among Peer States for health system costs and value.
• **Baseline:** Texas is currently ranked tenth among Peer States for health system value based on preventable hospital admissions and ninth among states in annual per-person health care expenditure growth.

**Context**

Public and private health care programs and service providers are all part of an interconnected care delivery system. This health care network includes hospitals, primary care practices, medical equipment manufacturers, long-term care providers, mental health care providers, and other health care providers (such as dentists and specialists). It also includes state agencies, health insurance companies, and prescription drug companies. Federal law influences the health system, in part through regulatory control over much of the private health insurance market and administration of federally funded programs like Medicare. The state's role in this health network is primarily that of administrator and regulator.

In 2014, total health care spending on the Texas health system — including both publicly and privately funded services — was approximately $190 billion, or about $14,000 per person. The state directly spent about $42 billion on health and human services in 2019; this accounts for over 40% of the overall state budget. Historically, roughly 50% of direct state health expenditures are subsidized by federal funds.

The state funds and administers more than 200 health care programs and services, primarily through the Health and Human Services Commission (HHSC). The largest of
these programs is Medicaid, which accounts for about 81% of the state’s direct health and human services expenditures. The Children’s Health Insurance Program (CHIP) accounts for only about .5% of the state’s direct health and human services expenditures.[3-15] Medicaid serves more than 4 million low-income Texas children, parents, or adults with disabilities.[3-15] Almost all Medicaid enrollees receive coverage through health insurance companies that have contracts with the state, rather than from the state directly. CHIP is a joint federal and state program administered by HHSC for children whose parents make too much to qualify for Medicaid, but not enough to afford private insurance. Unlike Medicaid, CHIP operates similarly to private insurance in that program participants need to pay copays and premiums.[3-16]

As a regulator, the state oversees most providers in the health system, including doctors, nurses, pharmacists, dentists, home health providers, hospitals, nursing homes, and group homes for individuals with disabilities.[3-17] The Texas Department of Insurance also regulates select health insurance plans to ensure fair competition in the industry and the fair treatment of patients.[3-18]

Trends

The Texas population is aging. Between 2019 and 2036, the population 65 years old and over is projected to grow by more than 70%.[3-18] Most older adults have multiple chronic health conditions: 63% of Medicare beneficiaries aged 65 to 74 have multiple chronic conditions, and for those in the 75 to 84 age bracket, the number jumps to 78%.[3-20] Texas is already experiencing a shortage of primary care physicians in every region of the state. The state’s changing demographics will exacerbate demand.

Population aging has accounted for about 12% of growth in overall health system spending in recent years.[3-21] As Texas’ population ages, state-funded health care programs like Medicaid are expected to see costs rise. The Texas Medicaid budget currently comprises about 27% of the state budget.[3-22] While seniors and people with disabilities are only 24% of the Medicaid population, 61% of Texas Medicaid dollars are spent on these groups.[3-23] This asymmetry is likely to become more pronounced as the aging population increases.
GOAL 8
Availability of Health Care
Texans Have Access to Basic Health Care.

Texas Today and Tomorrow
Access to comprehensive, quality health care services is important for promoting and maintaining health, preventing and managing disease, and reducing unnecessary disability and premature death for all Texans.  

In 2017, the demand for primary care physicians in Texas was 9% higher than supply; by 2030, this number is projected to increase to 13%. The demand for psychiatrists exceeds supply by 49%; this large gap is projected to remain about the same through 2030. Texas needs intervention to increase access to health care so the system can meet demand.

Rural areas experience health care provider shortages more often than urban areas do. Texas ranks last in the nation for rural access to care. More than 100,000 Texans live in one of the 32 counties with no primary care doctor. Across rural counties, the population-to-provider ratio for primary care is 2,653:1, versus 1,611:1 in urban counties. Twelve percent of Texans — more than 3 million people — live more than 50 miles from a trauma center capable of providing care for the most serious injuries. Exacerbating the problem, rural areas are experiencing more and more hospital closures. In the last 10 years, almost 20% of the nation’s 113 rural hospital closures took place in Texas.

Additionally, Texans experience disparities in health care access related to race and income. Only 61% of Hispanic adults reported having a usual care provider in 2018, versus 71% of Black adults and 77% of white adults. Only 58% of low-income adults reported having a usual care provider in 2018, versus 68% of Texans overall.
Availability of primary care providers: Ratio of population to primary care providers

Target
By 2036, Texas will have one of the Top 3 best ratios among its group of 12 Peer States.

Indicator Background
While there are many ways for Texans to access health care beyond traditional primary care relationships — including telemedicine and nurse practitioners — the ratio of primary care providers to a population is routinely used as a benchmark for access to medical services. This data set includes medical doctors and osteopaths but excludes nurse practitioners.

Target Background
With the recent attention focused by the Legislature in addressing graduate medical education and the recent and planned openings of new Texas medical schools, the state is already taking significant steps to help address this gap that may pay dividends over upcoming years.

Benchmark
#12 (peers); Top 3 baseline at 1,220:1 or lower

Ratio of population to primary care providers, 2016-2017
Availability of mental health care providers: Ratio of population to mental health care providers

Target
By 2036, Texas will have one of the six best ratios among Peer States.

Indicator Background
This indicator measures the ratio between the overall population of Texas and the number of individual mental health care providers, including family therapists and mental health professionals who treat drug and alcohol abuse. While this ratio does not reflect the fact that certain regions of Texas have greater access to mental health care providers than other regions, it does provide a high-level picture of access to mental health care providers in Texas. It also does not reflect that technological and regulatory reforms may allow for more innovative and efficient means of delivering services.

Target Background
Access to mental health care providers has a high impact on economic growth and quality of life. Because mental health can affect physical health outcomes as well as educational attainment and earnings, Texas should rank among the six best Peer States in access to mental health care providers.

Benchmark
#12 (peers); Top 6 baseline at 410:1 or lower
Persons with usual source of health care: Percentage of adults who report having a usual source of health care, such as a primary care physician\[^{[03-41]}\]

**Target**
By 2036, Texas will rank in the Top 3 among its Peer States.

**Indicator Background**
A usual source of care is a doctor’s office, clinic, health center, or other place that a person would go if they are sick or in need of advice about their health. Having a usual source of care can indicate that health care is accessible and affordable to a person. One major advantage to a usual source of care is that medical professionals in this environment usually have access to patients’ medical records, allowing for more informed health care analysis. When additional metrics are identified, patient and provider access to medical records will also be tracked.

**Target Background**
Having a usual source of care can encourage people to seek care for medical issues before those issues become serious and costly. This can have a high impact on health care quality and affordability, as well as economic productivity and growth. For these reasons, Texas should rank among the Top 3 Peer States in the percentage of adults with a usual source of health care.

**Benchmark**
#12 (peers); Top 3 baseline at 80% or higher\[^{[03-44]}\]

Percentage of adults who report having a usual source of health care, such as a primary care physician, 2017-2018

<table>
<thead>
<tr>
<th>State</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Pennsylvania</td>
<td>85%</td>
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<tr>
<td>Illinois</td>
<td>82%</td>
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<tr>
<td>New York</td>
<td>80%</td>
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<tr>
<td>Ohio</td>
<td>80%</td>
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<tr>
<td>North Carolina</td>
<td>78%</td>
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<tr>
<td>Virginia</td>
<td>78%</td>
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<tr>
<td>National average</td>
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<td>Washington</td>
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<td>California</td>
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<td>Colorado</td>
<td>74%</td>
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<td>Florida</td>
<td>74%</td>
</tr>
<tr>
<td>Georgia</td>
<td>72%</td>
</tr>
<tr>
<td>Texas</td>
<td>68%</td>
</tr>
</tbody>
</table>
**Telemedicine:** Texas 2036 is currently seeking to identify an indicator to track telemedicine access

**Target**
Texans, regardless of geography, age, or income, have access to telemedicine resources.

**Indicator Background**
Telemedicine has the potential to bridge access to care gaps by leveraging technology and lower-cost service delivery models. Telemedicine has also played a role in allowing for medical consultation during the COVID-19 outbreak while minimizing contagion risk. However, access to telemedicine may be limited by technological, knowledge, and affordability gaps.

**Target Background**
As soon as a meaningful assessment has been identified, Texas 2036 will encourage a strategy to become a leader among Peer States in telemedicine services.

**Other Indicators Texas 2036 is monitoring:**

**Availability of dental health care providers:** Ratio of population to dental health providers in a county

**Distance to trauma center:** Percentage of population living more than 50 miles from a Level 1 or Level 2 trauma center

**Connections**
The lack of access to internet services (Goal #16) that enable telemedicine is an additional barrier to health care access. This barrier is particularly relevant in rural areas, where distance to health care providers is often greater than in urban areas.

Availability of health care providers also can be a key component in crisis response and readiness planning (Goal #18).
GOAL 9
Affordability of Health Care
Texans Are Able to Afford the Basic Health Care They Need.

Texas Today and Tomorrow

High prices put health care out of reach for many Texans. Fifty-five percent of Texas households report difficulty affording health care costs, and even more households – 60% – report postponing or skipping care (including medical treatments, diagnostics, dental care, and pharmacy) within the last year due to cost. Seventeen percent of Texans reported that there was a time in the past year when they personally needed to see a doctor but could not because of cost. For those that received care, 39% reported that their family had difficulties paying the subsequent medical bills.

Affordability is increasingly a barrier to health care access. Rising prices of health care account for three-quarters of overall health expenditure increases. Between 2016 and 2018, the average annual family premium for people with employer-sponsored insurance rose about 5% per year. Out-of-pocket medical costs — premiums plus deductibles — have reached about 14% of the median state income in Texas (ninth among Peer States). In addition to paying more for care, patients across the country are paying more for prescription drugs and medical supplies. The consumer price index for medical commodities consistently grows by more than 2% per year. Health care costs continue to increase, in part, because the health care market does not operate like other consumer markets. Market participants routinely lack knowledge of the price implications for their decisions and will often pay more when comparable services are available at a lower cost.

Although health insurance can help mitigate the burden of rising health prices on individuals in the short term, about 5 million Texans (18%) do not have health insurance. Texas has the highest rate of uninsured in the nation and almost twice the national average. Uninsured people are less likely to receive prevention and screening services and care to manage chronic disease, which could lead to more costly care in the future. This impacts not only the individual, but also the entire health system: Texas hospitals reported almost $4.5 billion in uncompensated care for uninsured patients in 2016.

Yet even for Texans with health insurance, affordability remains a major problem. According to the Episcopal Health Foundation, “4 in 10 (43%) of the nonelderly insured say it is difficult for their family to afford health care. Just over one-third (35%) report that they or a household member had problems paying medical bills in the past 12 months, and more than half (56%) have delayed or skipped any health care in the past 12 months because of cost.” Consistent health care affordability pressures face large proportions of Texans, whether or not they have insurance.
Insurance can help mitigate the impact of high health care costs for families, but a higher insured rate alone will not solve the affordability problems facing Texas families.

**Context**

Most Texans utilize health insurance to help pay for health care. Texans gain access to health insurance in different ways. Almost half have employer-sponsored insurance that is tied to their jobs. About 27% of Texans receive health insurance through a government program, such as Medicare, Medicaid, or CHIP. Another 6% buy insurance individually (the remainder are uninsured).

Texas has the most uninsured children in the country. There are several reasons for this. Texas has the highest rate of uninsured adults in the country, and children are less likely to be insured if their parents are not insured. In addition, Texas has a high proportion of Hispanic children; Hispanic Texans are less likely to be insured (29% uninsured) than white Texans (12% uninsured).

Although people may get health insurance from different sources, federal subsidies help fund insurance for almost everyone in the U.S., including those with private and employer-sponsored insurance. In 2018, federal insurance subsidies for Americans under 65 were estimated at $685 billion. This included tax breaks for employer-sponsored insurance that covered up to 30% of total costs, and subsidies for insurance purchased on the individual marketplace that cover about 50% of costs. Under the Affordable Care Act, 37 states – including eight of Texas’ Peer States – have expanded Medicaid to cover a larger portion of their low-income populations.

Texas, Florida, Georgia, and North Carolina have not expanded Medicaid.

The federal government, in an attempt to utilize market forces to drive down the cost of shoppable health services, has issued multiple executive orders that seek to increase transparency of medical prices. These executive orders have led to rulemaking at the U.S. Department of Health and Human Services to require disclosure of previously-confidential pricing information. Recognizing the role that informed consumers can have in reducing health care costs, the Texas Legislature in 2019 called for the
Teacher Retirement System and the Employees Retirement System to offer shared savings incentives programs for their health insurance plans. Shared savings plans utilize price transparency to incentivize health consumers to voluntarily choose lower-cost, comparable-quality providers for shoppable medical events. When price savings are achieved, the consumer shares that savings with the health plan.

**Texans unable to get care due to medical cost:** Percentage of adults who report needing to see a doctor in past year but could not due to cost

**Target**
By 2036, Texas will have one of the three lowest percentages among its group of 12 Peer States.

**Indicator Background**
Affordability and access to care all boil down to whether individuals can actually obtain health care when it is needed. This indicator tracks the percentage of Texans who reported that they did not see a doctor, despite medical need, because they could not afford to do so.

**Target Background**
While Texas is currently behind 10 of its Peer States in this area, the gap to enter the Top 3 is not insurmountable. Texas must reduce this figure to 11% or lower to rank among the Top 3 leading Peer States in the percentage of its population unable to get care due to medical cost.

**Benchmark**
Texas is #11 among Peer States; Top 3 baseline at 11% or lower
Percentage of adults who report needing to see a doctor in past year but could not due to cost, 2017-2018

Peer States

Pennsylvania 9%
Ohio 10%
Washington 11%
New York 11%
California 12%
Colorado 12%
Illinois 12%
Virginia 13%
National average 13%
North Carolina 15%
Florida 16%
Texas 17%
Georgia 18%

Texas
National average
Peer states
Percentage of adults who report needing to see a doctor in past year but could not due to cost, 2017-2018

Pennsylvania
Ohio
Washington
New York
California
Colorado
Illinois
Virginia
National average
North Carolina
Florida
Texas
Georgia
Uninsured rate: Percentage of population without health insurance

Target
By 2036, Texas will have one of the six lowest uninsured rates among its Peer States.

Indicator Background
While having insurance alone does not entirely insulate families from high medical costs, uninsured Texans will often avoid necessary medical care at times when early intervention could reduce the ultimate cost of restoring their health. When care is eventually obtained, it may cost the patient significantly more without the backstop of insurance, or costs may be passed along to society in general.

Target Background
Texas is the only state among Peer States that saw an increase in the uninsured rate in recent years. The uninsured rate in Texas declined significantly from 2008 (23.4%) to 2016 (16.6%) but increased in 2017 and again in 2018. For Texas to outperform its Peer States, it would need to not only reverse this trend but significantly reduce its overall uninsured rate. Texas will face additional challenges compared to Peer States due to its large undocumented population which may require policymakers to seek innovative solutions.

Benchmark
#12 (peers); Top 6 baseline at 7.5% or lower

Other Indicators Texas 2036 is monitoring:

Out-of-pocket health care spending: Premiums plus deductibles as percentage of income

Connections
Controlling health care costs will allow the state to better manage taxpayer dollars and invest in other priorities (Goal #32)
GOAL 10
Population Health

Texas Today and Tomorrow

Many different factors — not just the health care we receive at a doctor’s office or hospital — shape Texans’ health. While the large majority of state health spending is directed toward clinical interventions,[03-76] these services only account for about 20% of individuals’ health outcomes.[03-77] Community and behavioral factors such as income, education level, and community safety account for around 70% of individuals’ health outcomes.[03-78] Broadly, population health refers to the long-term health outcomes of Texans that are impacted by a range of factors, including health care, public health, and community and behavioral elements.

Population health complements the efforts of public health agencies by addressing a broader range of factors shown to impact the health of different populations, such as housing, transportation, and access to healthy foods.

The Texas population’s health risk is growing. More than 8% of babies born in Texas have low birthweight, which is an important indicator of maternal health and predictor of a child’s future health.[03-79] One-in-five adult Texans report having a chronic disease (e.g., diabetes, heart disease, or asthma),[03-80] and chronic diseases cause 60% to 70% of deaths in Texas.[03-81]

High risk populations in Texas often fall into gaps of quality service that result in poor health outcomes. Texas is ranked tenth among its group of 12 Peer States for preventable deaths.[03-82]

By focusing resources on people at higher risk, Texas can ultimately improve life expectancy and long-term health outcomes. Average life expectancy in the U.S. increased by 3.3 years from 1990 to 2010 (to 78.6 years) but has been flat since 2010.[03-83] Average national life expectancy is expected to grow to 81.4 by 2030, but then decline to 79.8 by 2040.[03-84] Texas will need to buck the national trend in order to extend life expectancy and improve population health.

To ensure Texans have longer, healthier lives, Texas will also have to address disparities based on race. There were 166 deaths from treatable conditions reported per 100,000 among the Black population in 2017, versus only 90 among white and 86 among Hispanic populations.[03-85]
**Life expectancy:** Number of years from birth a person is expected to live

**Target**
By 2036, Texas will rank in the Top 3 among its group of 12 Peer States.

**Indicator Background**
This indicator measures the number of years from birth that a person can expect to live, according to current age-specific death rates of the Texas population. It provides a rough, high-level view of the overall health of our state’s population.

**Target Background**
Life expectancy has a high impact on economic growth and quality of life in Texas, especially with regard to premature deaths. Our population’s overall health, as loosely indicated by life expectancy, is linked to individual productivity and other critical outcomes. Texas should place among the Top 3 Peer States in life expectancy.

**Benchmark**
#8 (peers); Top 3 baseline at 80.5 or higher

---

**Number of years from birth a person is expected to live, 2016-2018**

<table>
<thead>
<tr>
<th>Life expectancy in years</th>
<th>Peer States</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>100</td>
</tr>
<tr>
<td>25</td>
<td>80.5</td>
</tr>
<tr>
<td>50</td>
<td>79.3</td>
</tr>
<tr>
<td>75</td>
<td>78.3</td>
</tr>
<tr>
<td>100</td>
<td>81.6</td>
</tr>
<tr>
<td></td>
<td>California</td>
</tr>
<tr>
<td></td>
<td>New York</td>
</tr>
<tr>
<td></td>
<td>Colorado</td>
</tr>
<tr>
<td></td>
<td>Washington</td>
</tr>
<tr>
<td></td>
<td>Florida</td>
</tr>
<tr>
<td></td>
<td>Virginia</td>
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<tr>
<td></td>
<td>Illinois</td>
</tr>
<tr>
<td></td>
<td>Texas</td>
</tr>
<tr>
<td></td>
<td>Pennsylvania</td>
</tr>
<tr>
<td></td>
<td>North Carolina</td>
</tr>
<tr>
<td></td>
<td>Georgia</td>
</tr>
<tr>
<td></td>
<td>Ohio</td>
</tr>
</tbody>
</table>

- **Texas**
- **Peer states**
Mortality amenable to health care: Premature death from treatable medical conditions, deaths per 100,000 people\(^{(03-89)}\)

**Target**
By 2036, Texas will rank among the three lowest states in its peer group.

**Indicator Background**
Mortality amenable to health care measures the rates of death for people younger than 75 that can be considered preventable by timely and effective health care. Common examples include deaths related to diabetes, respiratory diseases such as pneumonia, and maternal and perinatal mortality\(^{(03-90)}\).

**Target Background**
The rate of deaths considered preventable provides meaningful insight into the ability of Texas’ health system to identify and treat health problems in an effective and timely manner. Texas should place among the Top 3 leading Peer States in mortality amenable to health care by 2036.

**Benchmark**
#10 (peers); Top 3 baseline at 71 or lower\(^{(03-93)}\)

---

**Premature death from treatable medical conditions, deaths per 100,000 people**

![Graph showing the number of premature deaths in thousands from 2010 to 2017. The graph shows a trend where the number of deaths decreases from 100 in 2010 to 95 in 2017. The label “Texas” is indicated on the graph.](image-url)
Low birthweight: Percentage of infants weighing less than 5.5 lbs. at birth

Target
By 2036, Texas will rank among the three lowest in its group of Peer States.

Indicator Background
This indicator measures the percentage of infants in Texas who weigh less than 5 pounds, 8 ounces (2,500 grams) at birth. Infants with low birthweights often have a hard time eating, gaining weight, and fighting infections. They are often at increased risk of health complications in infancy and beyond.

Target Background
Low birthweight is linked to numerous health challenges in infancy and later years; it has a significant impact on Texas’ economic growth and quality of life. Low birth weight increases the likelihood of chronic conditions such as asthma and obesity, mental health disorders, and lower academic outcomes in elementary and middle school. Texas should place among the three leading Peer States in its rate of low birthweight.

Benchmark
#5 (peers); Top 3 baseline at 8.1% or lower
Other Indicators Texas 2036 is monitoring:

**Physically unhealthy days:** Average number of physically unhealthy days within the last 30 days reported by adults

**Mentally unhealthy days:** Average number of mentally unhealthy days within the last 30 days reported by adults

**Infant mortality:** Number of infant deaths (before age one) per 1,000 live births

**Incidence of chronic disease:** Percentage of population who report having one or more of the following chronic conditions: diabetes, cardiovascular disease, and asthma

**Mental health:** Percentage of adults diagnosed with a depressive disorder including depression, major depression, dysthymia, or minor depression

Connections

Social factors addressed by safety net services (Goal #27), including hunger and housing, are key social determinants of health; therefore, safety net interventions should yield improved population health outcomes.

Population health — specifically low birthweight — can have significant effects on educational attainment (Goal #5) and jobs (Goal #6). Low birthrate has been found to negatively affect academic outcomes\[^{[03-101]}\] and decrease the likelihood of job promotion in adulthood,\[^{[03-102]}\] among other things.
GOAL 11
Public Health
Texans and Their Communities Are Empowered to Adopt Healthy Lifestyles.

Texas Today and Tomorrow
Public health refers to efforts within communities to empower healthy lifestyles through education, policy, and behavioral interventions. Targeted investments in public health programs could yield large returns in improved outcomes.

While doctors often treat people once they are sick, public health seeks to prevent people from getting sick in the first place. Public health strategies include immunizations, infectious disease control, smoking cessation programs, healthy eating and exercise campaigns, food safety, and clean water programs.

A core function of public health is to minimize the transmission of infectious diseases. Local, state, and federal health departments must seamlessly coordinate efforts to screen for diseases, conduct surveillance, and provide laboratory and epidemiology services to ensure effective infectious disease control. Infectious diseases do not stop at city and state borders.
**Childhood Immunizations**: Percentage of children between 19 and 35 months old who receive recommended vaccines

**Target**
By 2036, Texas will rank in the Top 6 among its group of 12 Peer States.

**Indicator Background**
This indicator measures the percentage of children between 19 and 35-months-old who received recommended vaccines, including diphtheria, tetanus and acellular pertussis (DTaP); measles, mumps and rubella (MMR); polio; Haemophilus; influenza type b (HiB); hepatitis B; varicella; and pneumococcal conjugate vaccines. These vaccines administered during childhood play a critical role in public health by preventing the spread of devastating diseases, both in vulnerable children and the population at large.

**Target Background**
The spread of infectious diseases can have devastating consequences on the state’s economic growth and quality of life. As seen with the spread of COVID-19, disease can quickly overwhelm health systems and lead to prolonged quarantines. In order to better protect vulnerable populations from infectious disease, Texas should rank in the Top 6 among Peer States.

**Benchmark**
#9 (peers); Top 6 baseline at 70%

---

**Percentage of children between 19 and 35 months old who receive recommended vaccines, 2016-2017**

<table>
<thead>
<tr>
<th>Peer States</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Virginia</td>
<td>77%</td>
</tr>
<tr>
<td>Florida</td>
<td>76%</td>
</tr>
<tr>
<td>Illinois</td>
<td>75%</td>
</tr>
<tr>
<td>Colorado</td>
<td>71%</td>
</tr>
<tr>
<td>North Carolina</td>
<td>71%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>70%</td>
</tr>
<tr>
<td>Washington</td>
<td>70%</td>
</tr>
<tr>
<td>California</td>
<td>69%</td>
</tr>
<tr>
<td>Texas</td>
<td>68%</td>
</tr>
<tr>
<td>New York</td>
<td>68%</td>
</tr>
<tr>
<td>Ohio</td>
<td>66%</td>
</tr>
<tr>
<td>Georgia</td>
<td>66%</td>
</tr>
</tbody>
</table>
**Adult Flu Vaccination**: Percentage of adults who receive a flu vaccine annually

**Target**
By 2036, Texas will rank in the Top 6 among its peer group.

**Indicator Background**
This indicator uses data from the Centers for Disease Control’s Behavioral Risk Factor Surveillance System (BRFSS) to measure the percentage of adults who reported that they received the flu vaccine within the past 12 months. Routine vaccination, a low-cost and time-efficient intervention, can help prevent much costlier and more significant medical interventions. According to the CDC, “vaccination is the primary way to prevent sickness and death caused by flu.”

**Target Background**
The CDC estimates that if the United States were to increase its flu vaccination rate by five percentage points, there would be 785,000 fewer illnesses and 11,000 fewer hospitalizations.[3-109] Reaching 70% coverage would prevent an additional 39,000 hospitalizations.[3-109] For Texas to enter the Top 6 among Peer States, it will need to increase its adult vaccination rate by 4.4%.

**Benchmark**
Texas ranks #8 among Peer States, Top 6 baseline at 47.6%.[3-113] Nationally, 45.3% of adults received a flu shot for the 2018-19 flu season.[3-114]
**Obesity: Percentage of adults[^13][^15] and children[^13][^16] who are obese**

**Target**
By 2036, Texas will rank among the six lowest states in its peer group.

**Indicator Background**
Obesity is defined as having a body mass index of 30.0 or higher based on reported height or weight. For a male adult who is six feet tall, 221 pounds is the obesity threshold. For children, alternative body mass indexes are used that take into account the child’s age and gender – obesity is defined as the 95th percentile in weight or higher. Obesity has a wide range of health risks associated with it, including heart disease and stroke, high blood pressure, diabetes, cancer, and other serious conditions.[^13][^14]

**Target Background**
Due to the many serious obesity-related health complications, Texas' high rates of adult and child obesity contribute to poor public health outcomes and burden our health system. Texas should rank in the Top 6 among its 12-state peer group for the lowest adult and child obesity rates, which would lessen the harmful health and economic consequences of obesity.

**Benchmark**
For adults, Texas is #12 among Peer States with a Top 6 baseline of 31% or lower.[^13][^12] For children, Texas is #11 among Peer States[^13][^12] with a Top 6 baseline at 31% or lower.

### Percentage of adults who are obese (BMI 30.0 - 99.8)

<table>
<thead>
<tr>
<th>State</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Texas</td>
<td>35%</td>
</tr>
<tr>
<td>National average</td>
<td>31%</td>
</tr>
<tr>
<td>North Carolina</td>
<td>33%</td>
</tr>
<tr>
<td>Georgia</td>
<td>33%</td>
</tr>
<tr>
<td>Ohio</td>
<td>34%</td>
</tr>
<tr>
<td>North Carolina</td>
<td>33%</td>
</tr>
<tr>
<td>Illinois</td>
<td>32%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>31%</td>
</tr>
<tr>
<td>Florida</td>
<td>31%</td>
</tr>
<tr>
<td>Virginia</td>
<td>30%</td>
</tr>
<tr>
<td>Washington</td>
<td>29%</td>
</tr>
<tr>
<td>New York</td>
<td>28%</td>
</tr>
<tr>
<td>California</td>
<td>26%</td>
</tr>
<tr>
<td>Colorado</td>
<td>23%</td>
</tr>
</tbody>
</table>

[^13]: Report Year
[^15]: Texas Health Indicator Collaborative (THIC)
[^16]: Texas Health and Human Services Commission (TX HHS)
**Smoking**: Percentage of adults who are smokers [03-124]

**Target**
By 2036, Texas will remain among the six lowest-ranked states in its peer group.

**Indicator Background**
This indicator reports on the percentage of adults who have smoked at least 100 cigarettes in their lifetime and currently smoke daily or some days. Smoking cigarettes is a significant challenge to public health, as it increases the risk of heart disease, stroke, and lung cancer, among other health problems. [03-126] Second-hand smoke and smoking while pregnant also carry serious risks for non-smokers. [03-127]

**Target Background**
Smoking poses major challenges to both the state’s public health and its health system. Smoking leads to chronic conditions that are debilitating and costly, decreasing productivity, quality of life, and other important outcomes. Texas should rank in the Top 6 among states in this metric in order to lessen the many devastating consequences of smoking for our population.

**Benchmark**
#4 (peers); Top 6 baseline at 14.5% or lower [03-130]

**Percentage of adults who are smokers, 2017-2018**

<table>
<thead>
<tr>
<th>Peer States</th>
<th>0</th>
<th>7.5%</th>
<th>15%</th>
<th>22.5%</th>
<th>30%</th>
</tr>
</thead>
<tbody>
<tr>
<td>California</td>
<td>11.2%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Washington</td>
<td>12%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New York</td>
<td>12.8%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Texas</td>
<td>14.4%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Colorado</td>
<td>14.5%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Florida</td>
<td>14.5%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Virginia</td>
<td>14.9%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Illinois</td>
<td>15.5%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Georgia</td>
<td>16.1%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>National average</td>
<td>16.1%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>17%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>North Carolina</td>
<td>17.4%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ohio</td>
<td>20.5%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Other Indicators Texas 2036 is monitoring:

**Public health expenditure**: State budget allocation for public health per capita

**Physical inactivity**: Percentage of adults who reported no physical activity

**Drug deaths**: Number of deaths due to drug injury per 100,000 population

**Excessive drinking**: Percentage of adults who reported either binge or chronic drinking

**Teen births**: Number of births per 1,000 females ages 15 to 19
GOAL 12
Return on Health Care Investment

Texas Has a High-Value Health System that Manages Costs and Delivers Results.

Texas Today and Tomorrow

Rising health care costs are taking a toll on Texas families, employers, and taxpayers. Total per capita health care expenditures in Texas — including public and private spending — are growing by 5.1% annually. While patient utilization of services and products is increasing, most of the annual growth in health costs is driven by higher prices for medical services. Prices for prescription drugs and medical supplies also are increasing, and hospital care remains expensive. Texas is ranked sixth among Peer States for hospital costs. While estimates vary, many experts believe that at least a third of all medical expenditures provide no tangible health benefits to patients.

The nation's current health system pays for the quantity of care provided, regardless of the outcome the care achieved. This system incentivizes and financially rewards a higher volume of care delivered, such as the number of visits or procedures. A “pay for quality” system, by contrast, provides reimbursements based on the outcome of the care provided. This system would incentivize activities such as care coordination, collaboration among providers, and investments in technology like electronic medical records, all of which could improve patient care.

In Texas, a large majority of state health spending is directed toward costly clinical interventions that seek to remedy health issues, rather than community-based or population-driven interventions that focus on preventing those issues. Preventative care like immunizations, cancer screenings, and regular primary care visits minimize emergency care — and the high attendant costs — down the road. Texas is currently ranked tenth among Peer States for preventable hospital admissions.

To achieve the best health outcomes for the cost, the health system may need to upgrade its data sharing infrastructure to better coordinate care across providers, allowing for better informed health care decisions by doctors and patients. Additionally, the state will need to leverage the power of price transparency, empowering health care consumers to help drive down both system-wide and individual costs. Price — a key data point in any financial transaction — is at the center of rising health care costs, yet market participants often are unaware of any price implications when making choices about health care.
In 2017, the U.S. Centers for Medicare and Medicaid Services approved a new five
year, approximately $25 billion Medicaid 1115 Waiver for Texas.[03-141] In addition to cov-
ering uncompensated care for patients without insurance, this waiver sets in place
requirements to reform health care delivery through incentive payments.[03-142] For ex-
ample, some funds are reserved for preventative care like primary care visits. Other
models compensate providers based on the population served or results achieved,
rather than specific services provided.

Value-driven health care also requires better coordination between a patient’s prima-
ry and specialty care doctors, which is enabled by technological platforms and data
sharing protocols.

The past decade has seen a consistent push for nationwide interoperability — the
ability to exchange, access, and edit data — as a way of promoting value in the health
system. The 21st Century Cures Act of 2016 called for enhanced health IT interoper-
ability requirements, incentive programs to spur increased electronic health records
and health IT adoption, and accountability measures for when meaningful use require-
ments were not met.[03-143][03-144]
Preventable hospital admissions: Potentially avoidable hospital admissions among adults per 1,000 insurance enrollees

Target
By 2036, Texas will rank among the Top 3 states in its 12-state peer group.

Indicator Background
This indicator tracks hospital admissions among adults with employee-sponsored insurance that were deemed preventable because patients were discharged for ambulatory care sensitive conditions (ACSCs). According to the Department of Health and Human Services, “ACSCs are conditions for which good outpatient care can potentially prevent the need for hospitalization, or for which early intervention can prevent complications or more severe disease.” Examples include diabetes, asthma, and appendicitis (which can be treated with fewer complications prior to perforation). Data limitations currently only allow this indicator to include populations with employee-sponsored insurance, so it does not track those individuals on public insurance or the uninsured population.

Target Background
To reduce system-wide costs, Texas should strive to be a leader in the prevention of otherwise-avoidable hospital admissions. Due to data limitations, this indicator only tracks adults with employer-sponsored insurance (47% of Texans). While the indicator covers less than half of Texans, the tracked population is also the one that faces the fewest barriers to improvement if successful strategies are pursued.

Benchmark
#10 (peers): Top 3 baseline at 5.9 or lower

Potentially avoidable hospital admissions among adults per 1,000 insurance enrollees, 2015-2016

<table>
<thead>
<tr>
<th>State</th>
<th>Rate (in %)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Washington</td>
<td>5.6</td>
</tr>
<tr>
<td>Colorado</td>
<td>5.8</td>
</tr>
<tr>
<td>California</td>
<td>5.9</td>
</tr>
<tr>
<td>New York</td>
<td>6.2</td>
</tr>
<tr>
<td>North Carolina</td>
<td>6.5</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>6.7</td>
</tr>
<tr>
<td>Virginia</td>
<td>6.7</td>
</tr>
<tr>
<td>Illinois</td>
<td>7.0</td>
</tr>
<tr>
<td>Georgia</td>
<td>7.2</td>
</tr>
<tr>
<td>Texas</td>
<td>7.2</td>
</tr>
<tr>
<td>Ohio</td>
<td>7.3</td>
</tr>
<tr>
<td>Florida</td>
<td>7.8</td>
</tr>
</tbody>
</table>

Legend:
- Texas
- Peer states
Health care expenditure growth: Annual percentage increase in per person health care expenditures

**Target**
By 2036, Texas will rank among the Top 3 states in its peer group.

**Indicator Background**
This indicator utilizes data from the Center for Medicare and Medicaid Services to track personal health care expenditures, including both medical care and medical products. While this data is updated with a significant lag (with the most recent year available being 2014), it offers a comprehensive look at health care expenditures across many sectors of the medical field.

**Target Background**
As Texas seeks to make health care more affordable, both for Texans and for state government, controlling growth in per capita health care expenditures will increase in importance. Focusing on lower-cost early interventions — rather than high-cost late interventions — should allow the state to reduce its annual expenditure growth rate and deliver better health care value to Texans. To enter the Top 3 among Peer States, Texas will need to reduce its annual expenditure growth to less than 4%.

**Benchmark**
Texas ranks #9 among Peer States, Top 6 baseline at 4.4%.

### Percentage increase in per person health care expenditures, 2013 - 2014

<table>
<thead>
<tr>
<th>Peer States</th>
<th>Percentage Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>North Carolina</td>
<td>3.4%</td>
</tr>
<tr>
<td>Virginia</td>
<td>3.4%</td>
</tr>
<tr>
<td>Washington</td>
<td>4.0%</td>
</tr>
<tr>
<td>California</td>
<td>4.0%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>4.3%</td>
</tr>
<tr>
<td>Illinois</td>
<td>4.4%</td>
</tr>
<tr>
<td>National average</td>
<td>4.5%</td>
</tr>
<tr>
<td>New York</td>
<td>4.6%</td>
</tr>
<tr>
<td>Texas</td>
<td>5.1%</td>
</tr>
<tr>
<td>Florida</td>
<td>5.1%</td>
</tr>
<tr>
<td>Colorado</td>
<td>5.1%</td>
</tr>
<tr>
<td>Ohio</td>
<td>5.1%</td>
</tr>
<tr>
<td>Georgia</td>
<td>5.4%</td>
</tr>
</tbody>
</table>
Other Indicators Texas 2036 is monitoring:

**Health screenings for seniors:** Percentage of adults ages 65 to 75 who reported receiving colorectal cancer screening within the recommended time period

**Connected system:** Percentage of primary care providers that have demonstrated meaningful use of health IT

**Share of budget:** Percentage of Texas state budget allocated to health and human services

**State budget impact:** Medicaid expenditures as percentage of state budget

**Direct state spend per capita:** State's direct expenditures on health care per capita

**Hospital expenses per inpatient day:** Estimated expenses incurred by hospital to provide one day of inpatient care

**Consumer price index for medical commodities:** Includes medicinal drugs and medical equipment and supplies

**Connections**

The rapidly-increasing costs experienced by state health care programs have limited the amount of available revenue to fund all other government priorities, including public education (Goals #3 and #4).

Controlling health care costs will allow the state to better manage taxpayer dollars (Goal #32).
Pillar 04
Infrastructure

Texas ensures people, goods, information, and energy can move within and across our borders.

**Goal: MOBILITY OF INDIVIDUALS**
Cost of congestion
Commute choice

**Goal: MOBILITY OF GOODS**
Total freight movement

**Goal: TRANSPORTATION SAFETY**
Traffic fatality rate

**Goal: DIGITAL CONNECTIVITY**
Broadband coverage
Broadband subscription

**Goal: ENERGY DISTRIBUTION**
Electricity sufficiency
Electricity prices

**Goal: CRISIS READINESS**
Emergency preparedness
**Focus**

Reliable and varied infrastructure is the backbone of the Texas economy — it includes roads, bridges, railways, mass transit systems, seaports, airports, pipelines, and data and electricity transmission networks. With our state’s population increasing nearly 40% by 2036, existing infrastructure will be sorely tested.\[04-01\]

Millions of working Texans and 1.2 trillion ton-miles of freight depend on Texas' transportation infrastructure, its roads in particular.\[04-02\],[04-03] Congestion of people and goods costs Texas an estimated $20.6 billion annually in wasted productivity and fuel.\[04-04\],[04-05] A diverse, multimodal transit network, including our seaports and airports, is essential for connecting Texas to economic growth and opportunity. Modern, well-maintained infrastructure also benefits public safety. Texas ranks 11th in its group of 12 Peer States for annual traffic fatality rates, with 3,639 deaths.\[04-06\]

Digital infrastructure enables movement of information and access to essential opportunities and critical services. Texas ranks in the bottom half among its Peer States on fixed broadband subscriptions and access — that lack of broadband access has an estimated negative economic impact of $5.1 billion.\[04-07\],[04-08]

Robust, reliable energy infrastructure is needed to power the economy and supply businesses and individuals with electricity. Reliable access to electricity requires Texas to have sufficient electricity reserves at times of peak demand. Texas’ reserve margin for electricity dropped to 8.6% during the summer of 2019, and it is projected to be 10.6% for summer 2020.\[04-09\]

Well-maintained infrastructure allows Texas communities to better prepare for natural disasters and crises. Natural disasters and extreme weather events are increasing in frequency and severity. From 2012 to 2017 extreme weather events have resulted in 1,076 injuries, 362 deaths, and $105 billion in property and crop damage.\[04-10\] The risks of infectious diseases and emerging hazards like cyber-incidents are also rising.

**Goals and Targets for Texas in 2036**

**Goal #13 - Mobility of individuals:** Texans can travel to their destinations effectively and efficiently.

- **Target:** By 2036, Texas reduces its cost of congestion to $922 per auto commuter and ranks in the Top 6 among Peer States for the highest use of sustainable transit modes.
- **Baseline:** Texas’ cost of congestion is $981 per auto commuter, and the state ranks 10th for sustainable transit modes among Peer States.
**Goal #14 - Mobility of goods:** Texas enables economic growth by moving goods efficiently.
- **Target:** By 2036, Texas maintains its ranking as the top state among its peers for highest total goods moved.
- **Baseline:** Texas ranks first in total goods moved among Peer States.

**Goal #15 - Transportation safety:** Texas maintains a safe transportation infrastructure.
- **Target:** By 2036, Texas ranks in the Top 9 among Peer States for lowest traffic fatality rates.
- **Baseline:** Texas ranks 11th among Peer States for the lowest traffic fatality rates with 1.29 fatalities per million VMT in 2018, equal to 3,639 fatalities.

**Goal #16 - Digital connectivity:** Texans can digitally participate in economic opportunities and essential services.
- **Target:** By 2036, all Texans have broadband access, and Texas' broadband subscription rate ranks in the Top 6 among Peer States.
- **Baseline:** 93% of Texans have broadband access, and Texas ranks last among Peer States for broadband subscriptions.

**Goal #17 - Energy distribution:** Texas maintains a sufficient, reliable, and cost-competitive energy infrastructure.
- **Target:** By 2036, Texas has a 13.75% reserve margin for electricity and remains in the Top 6 among Peer States for lowest electricity prices.
- **Baseline:** Texas has an 11% reserve margin and ranks second in electricity prices among Peer States.

**Goal #18 - Crisis readiness:** Texas is ready to address the human, economic, and environmental consequences of natural disasters and hazards.
- **Target:** By 2036, Texas remains in the Top 9 among Peer States for highest emergency preparedness.
- **Baseline:** Texas ranks ninth among Peer States for emergency preparedness.

**Context**

Texas is home to an enormous, multi-system infrastructure network, including 314,000 miles of public roads, 10,539 miles of railroad track, 21 total ports, and 469,737 miles of pipelines. For building and maintaining everything other than state-funded roads, local and private entities play a major role. More than 70% of Texas' public roadway miles, all urban and rural mass transit systems, commercial airports, and seaports are managed by local governments. Railways, pipelines, broadband networks, and electricity grid infrastructure are largely privately owned and operated. Resiliency and hazard infrastructure is primarily funded at the federal level, but execution during hazard events is provided by state and local governments. Alignment and partnerships among these stakeholder groups will be critical for meeting Texas' infrastructure challenges over the long term.
Trends

Demographic changes will create infrastructure challenges for both urban and rural areas. Texas cities are growing at a rapid pace, increasing demands on transportation, digital, and energy infrastructure. By 2036, Texas is expected to add nearly 10 million people, increasing our state population to 38 million, with 90% of population growth occurring in urban areas. Urban areas are expected to face higher congestion and safety hazards on Texas roadways, while rural areas may face population and tax base declines – limiting their ability to invest in local infrastructure.

More extreme climate effects are driving the need for effective and resilient infrastructure of all types. By 2036, the frequency of urban flooding is projected to increase 30%-50% due to more extreme rainfall patterns. Severe coastal flooding is expected to become the costliest hazard to Texas, accounting for an estimated 34% of all weather-related losses through 2023 at an estimated $5.6 billion. At the same time, higher temperatures and more frequent extreme heat will expand the areas at risk of wildfires eastward. Texas’ infrastructure needs to be able to support communities and remain reliable through more frequent and severe hazards.
GOAL 13

Mobility of Individuals

Texans Can Travel to Their Destinations Effectively and Efficiently.

Texas Today and Tomorrow

Congestion is a natural byproduct of economic growth, but it negatively impacts economic productivity if not managed correctly. In 2017, Texans in urban areas wasted $14.2 billion in fuel costs and lost time — equivalent to $981, or 54 hours, annually for each auto commuter.[04-20] If current trends continue, each Texan would waste another 63 hours in traffic annually by 2025, raising the per capita cost of congestion to $1,113, a 13% increase.[04-21]

Congestion is worsened by Texans’ high use of single-occupancy vehicles. Today, more than 80% of working Texans — 11 million individuals — commute alone in a vehicle, higher than the national average of 76%.[04-22][04-23] Statewide, the use of public transportation as a mode to work is on the decline and lags the national average, accounting for about 1% of commuter trips in Texas compared to 5% nationally.[04-24][04-25] Encouraging Texans to shift to more sustainable modes of transit, such as carpooling, public and mass transit, cycling, and telecommuting, is essential for easing congestion.

Context

The Texas Department of Transportation (TxDOT) is responsible for constructing, operating, and maintaining the state’s transportation infrastructure. In recent years, Texas made great strides in terms of transportation funding by passing two propositions in 2014 and 2015 dedicating new sources of tax revenues to transportation. Over the next decade, Texans will invest $131 billion in statewide infrastructure, with a total economic benefit of about $373 billion. Currently, TxDOT’s funding totals more than $15 billion per year.[04-26] Roughly one-third comes from traditional State Highway Fund sources, including gas taxes and vehicle registration fees.[04-27] Another 30% comes from oil and gas severance taxes and sales and use taxes, and 37% comes from the federal government.[04-28]

Highway construction costs have increased significantly faster than consumer inflation,[04-29] and technological disruption in the mobility industry is bringing both opportunities and challenges. Texas is a leading state for testing and deployment of autonomous vehicles, drones, and other new technologies. These innovations offer potential solutions to congestion through new transportation options, safer vehicles, and more efficient traffic management, but they also can have unintended side effects. For example, the rise of ride-sharing applications has contributed to congestion by increasing the total number of car trips.[04-30][04-31]
Changing consumer preferences, including demand for mixed-use developments and housing located closer to jobs, are affecting commuting patterns. Texas’ cities have grown as suburbs of major metropolitan areas have seen an influx of new residents.

However, adults under age 35 strongly prefer living in urban neighborhoods due to the availability of amenities and access to transit. In response to this demand, there are now a growing number of in-town developments and “walkable neighborhood” projects, with the potential to affect future congestion patterns by enabling walking, cycling, and mass transit as modes of transportation.
**Cost of congestion:** Annual cost of time lost and fuel spent from passenger car delays, per auto commuter

**Target**
By 2036, cost of congestion per auto commuter will be $922.

**Indicator Background**
Transportation infrastructure connects Texans to jobs, family, and commerce. Increased road congestion, mainly occurring in the urban areas, negatively impacts this movement, reducing economic growth and quality of life. The cost of congestion indicator, calculated by the Texas A&M Transportation Institute, estimates the amount of money urban Texans waste by being stuck in traffic each year.

**Target Background**
Experts and policy makers use the Texas 2030 Committee report as the fundamental guide to help shape transportation policy and funding decisions. This report sets benchmarks for acceptable cost of congestion measures for future years. The target adopts the 2035 benchmark as a proxy for 2036.

**Benchmark**
This indicator is not currently assessed against Peer States due to differences in demographics, industries, and urbanization.
**Commute choice**: Percentage of workers using any mode to access work besides single-occupancy vehicles[^04-38]

**Target**
By 2036, Texas will rank among the six highest in its group of 12 Peer States.

**Indicator Background**
Reducing the amount of single-occupancy travel is essential to easing congestion. The commute choice indicator measures the percentage of workers using any mode to access work except a single-occupancy mode. Options include buses, subways, commuter rail, light rail, ferryboats, bicycle, walking, and telecommuting as non-single-occupancy modes, but excludes taxicabs and motorcycles.

**Target Background**
To prevent congestion from worsening as the state's population grows, Texans can reduce the usage of single-occupancy modes of transport. Texas lags behind its Peer States and would need to rank in the Top 6 among Peer States to remain competitive among this group.

**Benchmark**
#10 (peers); Top 6 baseline at 24% or higher[^04-40]

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**Percentage of workers by means of transport, 2018**

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[^04-38]: Target: By 2036, Texas will rank among the six highest in its group of 12 Peer States.

[^04-39]: Indicator Background: Reducing the amount of single-occupancy travel is essential to easing congestion. The commute choice indicator measures the percentage of workers using any mode to access work except a single-occupancy mode. Options include buses, subways, commuter rail, light rail, ferryboats, bicycle, walking, and telecommuting as non-single-occupancy modes, but excludes taxicabs and motorcycles.

[^04-40]: Benchmark: To prevent congestion from worsening as the state's population grows, Texans can reduce the usage of single-occupancy modes of transport. Texas lags behind its Peer States and would need to rank in the Top 6 among Peer States to remain competitive among this group.
Other Indicators Texas 2036 is monitoring:

**Traffic severity:** Measured using Travel Time Index, comparing peak congestion period travel time to free-flow travel time

**Commute times:** Average time taken for an individual to travel from home to work, excluding telecommuting

**Transportation Affordability Index:** Transportation costs in an area as a percentage of area median household income

**Vehicle-less commuting:** Percentage of workers who access work by walking and biking

**Telecommuting:** Percentage of workers who access work by telecommuting

**Connections**

Congestion worsens air quality (Goal #19). Emissions from transportation, including from idle vehicles in traffic, are responsible for 50% to 80% of nitrogen oxide emissions that end up as ozone pollution.[04-40]

Reducing congestion among individual commuters will make mobility of goods (Goal #14) more efficient. Trucks often contribute to and are hindered by the same congestion that passenger vehicles experience.
GOAL 14
Mobility of Goods
Texas Enables Economic Growth by Moving Goods Efficiently.

Texas Today and Tomorrow

Texas’ effective and multimodal freight transportation system is the foundation of its booming trade economy. Texas has been the nation’s top exporting state for 15 consecutive years in terms of the value of goods exported.[4-42] In 2018, Texas moved 1.2 trillion ton-miles of freight, nearly 60% more than the second-ranked peer state (California).[4-43] The ability to move goods to market effectively is key to continued economic success, as total freight movement in ton-miles is projected to grow by nearly 24% through 2036.[4-44]

While total freight movement is expected to grow, Texas’ freight infrastructure is already experiencing limitations. Most of the growth in freight movement will be trucking, currently concentrated in the congested “Texas Triangle” region – the megalregion of Houston, Dallas-Fort Worth, and Austin-San Antonio connected by I-10, I-35, and I-45, where 70% of Texans live.[4-46] Texas already has more trucking freight bottlenecks than any state in the nation, with 13 of the nation’s Top 100 bottlenecks.[4-46]

Context

The Texas Department of Transportation (TxDOT) is most directly involved in trucking freight. The agency manages the freeways and highways located in the state, while providing planning and coordination for road construction and maintenance. While TxDOT plays a minor role in safety regulations and other guidelines for commercial airports and railways, the state provides almost no direct support for non-road freight modes. Of the 2,594 projects identified in the 2018 Freight Mobility Plan, costing an estimated $66 billion, 91% are planned highway projects.[4-47] The majority of railways are privately owned and operated, and seaports and airports are operated under local jurisdiction.

Exports play a major role in the Texas economy and are heavily supported by freight infrastructure. Texas has 29 official U.S. ports of entry — the most of any state — which are officially designated areas at U.S. land borders, seaports, and airports where international goods and passengers enter the country.[4-48] Goods exports accounted for 18% of Texas’ GDP in 2018; $316 billion in goods were exported, the most from any state.[4-49] Oil and gas are the biggest export products, growing to 23% of state exports since oil export restrictions were lifted in 2015.[4-50] Texas’ freight infrastructure is of national importance, as 80% of all U.S. crude shipments pass through pipelines and eventually ports in the Texas Gulf Coast.[4-51]
**Total freight movement**: Total freight moving through Texas annually by all transportation modes, in ton-miles[04-52]

**Target**

By 2036, Texas will continue to rank first among its group of 12 Peer States.

**Indicator Background**

The movement of the millions of tons of freight from, into, and within Texas directly supports economic prosperity, commerce, and quality of life.[04-53] The total freight movement indicator captures both the distance and volume of freight moved on Texas’ infrastructure and accounts for various modes of transportation, such as pipeline, rail, truck, water, air, and others. One ton-mile is equivalent to one ton of freight transported one mile.

**Target Background**

Texas must continue ranking as the top state for freight movement to sustain Texas’ economic growth and quality of life. The industry supports nearly 2.2 million jobs and accounts for $215 billion in gross domestic product.[04-54] Projections indicate freight movement in Texas will increase by 24% though 2036.[04-55] The state’s freight infrastructure will need to innovate to continue effective and efficient movement.

**Benchmark**

#1 (peers)[04-57]

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**Total freight moving through Texas annually by all transportation modes, in ton-miles, 2018**

<table>
<thead>
<tr>
<th>Peer States</th>
<th>Trillion Ton-Miles</th>
</tr>
</thead>
<tbody>
<tr>
<td>Texas</td>
<td>1.2</td>
</tr>
<tr>
<td>California</td>
<td>0.7</td>
</tr>
<tr>
<td>Illinois</td>
<td>0.5</td>
</tr>
<tr>
<td>Ohio</td>
<td>0.3</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>0.3</td>
</tr>
<tr>
<td>Florida</td>
<td>0.2</td>
</tr>
<tr>
<td>Washington</td>
<td>0.2</td>
</tr>
<tr>
<td>Georgia</td>
<td>0.2</td>
</tr>
<tr>
<td>Nt. Avg.</td>
<td>0.2</td>
</tr>
<tr>
<td>New York</td>
<td>0.2</td>
</tr>
<tr>
<td>Colorado</td>
<td>0.1</td>
</tr>
<tr>
<td>North Carolina</td>
<td>0.1</td>
</tr>
<tr>
<td>Virginia</td>
<td>0.1</td>
</tr>
</tbody>
</table>

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*InfrasTure*
Other Indicators Texas 2036 is monitoring:

**Port efficiency:** Measured using container dwell time, the average amount of time a container sits idle in a port

**Road efficiency:** Measured using Level of Service, grading from "A" to "F" of traffic operating conditions on the Texas Highway Freight Network

**PTI-95:** Measuring the amount of time shippers should budget to be on-time for 19 out of 20 trips

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**Connections**

Congestion worsens air quality (Goal #19). Emissions from transportation, including from idle vehicles in traffic, are responsible for 50% to 80% of nitrogen oxide emissions that end up as ozone pollution.\(^{04,58}\)

Reducing congestion for commercial trucking will make transit for individuals (Goal #13) more efficient. Trucks often contribute to and are hindered by the same congestion that passenger vehicles experience.
GOAL 15
Transportation Safety
Texas Maintains a Safe Transportation Infrastructure.

Texas Today and Tomorrow

In 2018 alone, 3,639 fatalities occurred on Texas roads. For more than 19 years straight, at least one person has died on a Texas road every day, with 10 people dying on the average day. Although fatalities and the fatality rate have declined recently, the total number of deaths is nearly 19% higher than in 2010. Traffic fatalities in rural areas account for a disproportionate 55% of the state’s traffic fatalities.

Unsafe roads are costly. The estimated economic loss of all motor vehicle crashes in Texas was $38.4 billion in 2018. While human error is the leading cause of fatalities, unsafe road conditions are a major contributor. Texas has 314,000 miles of public roads and over 54,000 state bridges, far more than any other state – and nearly 24% of these public roads are in poor condition. Texas’ booming oil, natural gas, and wind power industries have had a significant impact on safety in rural regions of West and South Texas, where roads and bridges were originally designed for lighter loads and lower traffic volume.

Context

Texas has state and federally funded traffic safety programs that focus on improving safety on the state’s roadways. The Texas Department of Public Safety and the Texas Department of Transportation are responsible for promoting the safety and protection of the public on the state’s highway system. In May 2019, the Texas Transportation Commission officially adopted a target of zero traffic fatalities by 2050 and a 50% reduction from current levels by 2035.
Traffic fatality rate: Number of fatalities on roads involving at least one motor vehicle, including pedestrians and cyclists per 100 million vehicle miles traveled (VMT)\[04-71]\n
Target
By 2036, Texas will rank in the Top 9 lowest among Peer States.

Indicator Background
Safety on Texas roadways must be a priority for all — too many people are losing their lives on Texas roadways. The traffic fatality rate indicator measures the number of fatalities on roads per 100 million vehicle miles traveled.

Target Background
Texas faces a difficult challenge in reducing its traffic fatality rate, due to Texans’ reliance on single-occupancy vehicles and the number of miles traveled. By improving its ranking among Peer States, the state can help ensure a better quality of life for all Texans.

Benchmark
#11 (peers); Top 9 baseline at 1.17 fatalities per 100M VMT or lower\[04-73]\n
Number of fatalities on roads involving at least one motor vehicle, including pedestrians and cyclists, per 100 million vehicle miles traveled, 2017 - 2018

- **Texas**: 1.29 per 100M VMT in 2018, equal to 3,639 fatalities
- **National average**: 1.13
- **Peer States**
  - New York: 0.76
  - Washington: 0.88
  - Ohio: 0.93
  - Illinois: 0.96
  - Virginia: 0.96
  - California: 1.02
  - Georgia: 1.14
  - Colorado: 1.17
  - Pennsylvania: 1.17
  - North Carolina: 1.19
  - Texas: 1.29
  - Florida: 1.41

Texas
Peer states
National average
Other Indicators Texas 2036 is monitoring:

**Bridge condition:** Percentage of bridges on national highway system rated in “good” or “fair” condition

**Railway accidents:** Number of combined passenger and freight railway accidents
GOAL 16
Digital Connectivity

Texans Can Digitally Participate in Economic Opportunities and Essential Services.

Texas Today and Tomorrow

Broadband — or high-speed internet connection — is necessary for global competitiveness in the 21st century. Internet connectivity enables individuals to run businesses, find jobs, telecommute, and connect to commerce. Some identify it as the farm-to-market road of the 21st century. Without complete connectivity Texas’ economy cannot tap its full potential. Connected Nation estimates disconnected Texas households cost the state more than $5.1 billion in unrealized economic potential.[04-74]

Broadband is critical infrastructure, essential for Texans to access important services and public information. The social distancing response to COVID-19 has demonstrated the importance of high-speed internet in today’s world. Connected Texans had some challenges adjusting to new public health and safety orders. But disconnected Texans faced significant challenges accessing health care, education, and other necessary services that broadband can help deliver.[04-75]

 Millions of Texans lack access to sufficient internet service, and Texas ranks last among Peer States in broadband subscription, threatening our long-term competitiveness. At least 7% of all Texans currently do not have access to fixed broadband internet at the Federal Communications Commission (FCC) minimum benchmark speed.[04-76] Rural areas are disproportionately affected, with more than 31% of rural Texans lacking broadband access.[04-77] The biggest barrier to coverage is often the high “last mile” cost of connecting dispersed homes and businesses in rural areas to a central broadband provider. Four major Texas cities — El Paso, Laredo, Dallas, and Brownsville — rank as some of the “worst connected” cities in the nation.[04-78] Thirty-five percent or more of households in these four cities lack fixed broadband subscriptions.[04-79] Existing income disparities are reflected in broadband subscription patterns: only 46% of Texas households earning less than $20,000 annually subscribe to fixed broadband, compared to 82% of households earning $75,000 or more.[04-80]

Context

The Federal Communications Commission (FCC) defines broadband internet as advanced telecommunications capability that enables users to originate and receive high-quality voice, data, graphics, and video telecommunications.[04-81] Currently, the FCC sets the official minimum benchmark for fixed broadband service as speeds of at least 25 Mbps for downloads and 3 Mbps for uploads.[04-82]

The official FCC minimum benchmark has increased over time as new digital technol-
ogy relies on higher bandwidth usage – 1 Gbps, equal to 1,000 Mbps, is an emerging standard among stakeholders, while fifth-generation (5G) technologies promise to deliver up to 20 Gbps.\[04-83\]

FCC data reporting may greatly underestimate how wide the digital divide really is. According to a Microsoft study, 13.7 million Texans do not currently have access to 25/3 Mbps broadband speeds, compared to the 2.1 million estimated by the FCC.\[04-84, 04-85\]

Broadband access is primarily driven by market forces. In Texas, the Public Utility Commission (PUC) has limited general authority over the telecommunications industry, which is largely deregulated at the state level.
**Broadband coverage:** Percentage of population with access to fixed broadband at FCC minimum standard (currently 25/3 Mbps or higher)[04-86]

**Target**
By 2036, all Texans have broadband coverage at the minimum federal standard.

**Indicator Background**
Broadband connectivity provides Texans access to economic opportunities, critical services, and communications that contribute to quality of life in the 21st century. The broadband coverage indicator measures the percentage of the population with access to fixed broadband. Although the FCC data overstates connectivity, this dataset offers the opportunity to compare across states and is continuously updated by the federal government.

**Target Background**
To ensure continued economic prosperity and quality of life, all Texans must have access to broadband by 2036.

**Benchmark**
#10 (peers)[04-88]

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**Percentage of population with access to fixed broadband at FCC minimum standard (currently 25/3 Mbps or higher) - 2017**

- < 50%
- 50% - 75%
- 76% - 94%
- > 94%
**Broadband subscription**: Percentage of households with subscription to fixed broadband service of any speed \(^{[04-89]}\)

**Target**
By 2036, Texas will rank among the six highest in its 12-state peer group.

**Indicator Background**
Broadband connectivity provides Texans access to economic opportunities, critical services, and communications that contribute to quality of life in the 21st century. The broadband subscription indicator measures the percentage of the population with subscriptions to fixed broadband. Although the FCC data overstates connectivity, this dataset offers the opportunity to compare across states and is continuously updated by the federal government.

**Target Background**
In order for Texas to remain economically competitive and help ensure a good quality of life for all Texans by 2036, Texas must rank among the Top 6 Peer States for highest broadband subscription rates.

**Benchmark**

\(^{[04-90]}\)

![Map of Texas showing broadband subscription rates]

- No data
- < 39%
- 39% - 45%
- 46% - 55%
- > 55%

INFRASTRUCTURE
Other Indicators Texas 2036 is monitoring:

**Choice in providers:** Percentage of population with access to only one fixed broadband provider

**Access at community anchor institutions:** Percentage of community anchor institutions (e.g., schools, libraries, and hospitals) served by fixed broadband of at least 1 Gbps

**Access in schools:** Percentage of students attending public schools with at least 1 Mbps of bandwidth per student

**Connections**

Online learning, both to obtain formal credentials and for on-the-job training, will be critical to help individuals gain in-demand skills and meet workforce needs (Goal #5 and #6).

Increased broadband penetration could improve health care availability (Goal #8) through telemedicine, especially in rural communities.

Broadband access enables greater access to telehealth and teleworking opportunities during public health crises, allowing additional options during public health emergencies (Goal #18).
GOAL 17
Energy Distribution
Texas Maintains a Sufficient, Reliable, and Cost-Competitive Energy Infrastructure.

Texas Today and Tomorrow

The reserve margin is the extra electricity supply in excess of demand that is needed to protect the reliability of Texas’ electric grid. The Electricity Reliability Council of Texas (ERCOT) has a reserve margin target of 13.75%. As coal plants retired in 2019, the actual reserve margin dropped to 8.6% for the summer of 2019. The expected reserve margin for 2020 is 10.6%. The tight reserve margin during the 2019 peak caused wholesale prices to temporarily reach historic highs. In addition, rural areas have faced serious constraints in energy distribution due to increased economic activity, which is being addressed through considerable investments by the utilities serving those areas.

The low cost of electricity helps attract businesses and individuals to the state. Texas’ electric prices have been among the lowest in the nation and stable for many years. Industrial users, including the major petroleum refining, chemical manufacturing, and high-tech manufacturing sectors, consume half of all electricity generated. Recently, Facebook, Google, and other large technology companies announced plans to invest hundreds of millions of dollars to build power-intensive data centers in the state — cheap electricity costs were cited as the most significant selection factor.

Context

Texas is the only one of the lower 48 states with its own electric grid, ERCOT, which serves 90% of the state’s electric load (equivalent to 25 million customers). El Paso, the Panhandle, and portions of East Texas are not served by ERCOT. The Texas electricity market is composed of investor-owned utilities, municipal-owned utilities, electric cooperatives primarily servicing rural Texas, and, and in the competitive market area of the state, a number of retail electric providers. Unlike other states that have a single provider regulated as a public utility, the competitive portion of the Texas electricity market is largely deregulated with multiple retail electric providers competing against each other. Deregulation allows many consumers to choose their retail electric provider, which purchases electricity from generators and aims to set the most competitive and attractive rates for consumers. To facilitate the deregulated market, ERCOT operates Texas’ electric grid and manages the flow of electricity. ERCOT is overseen by the Public Utility Commission of Texas as a membership-based non-profit with representation from independent generators, retail electric providers, and investor-owned utilities. Austin and San Antonio, among other jurisdictions, stand apart as ERCOT territories that lack market competition. Rather than allowing for customer choice, these areas operate under monopolies controlled by municipally-owned utilities.
Electricity sufficiency: Percentage difference between the forecast total generation available and the forecast peak demand in the following year[^04-105]

Target
By 2036, Texas will meet ERCOT’s standard reserve margin target for electricity of 13.75%.

Indicator Background
Reserve margins ensure sufficient power is available to meet future demands in case of unexpectedly high usage or the loss of generation. Texans expect their lights and air conditioners to turn on when they flip the switch. ERCOT sometimes experiences challenges maintaining the supply of electricity, especially during summer months, so the agency sets a reserve margin needed to ensure sufficient power is available for Texans and businesses. The electric sufficiency indicator measures the percentage difference between the forecast total generation available and the forecast peak demand.

Target Background
The ERCOT Board of Directors set 13.75% as the reserve margin, a level that should ensure Texans’ electric needs are covered in the case of unexpectedly high demand or generation plant outages.

Benchmark
No peer-state benchmark exists. Texas will be compared against itself because it is the only state in the lower 48 states with its own power grid.
Percentage difference between the forecast total generation available and the forecast peak demand in the following year.

**Demand and Capacity by year**

<table>
<thead>
<tr>
<th>Year</th>
<th>Peak demand</th>
<th>Capacity (including Planned Resources)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2020</td>
<td>76.7</td>
<td>82.4</td>
</tr>
<tr>
<td>2021</td>
<td>78.3</td>
<td>90</td>
</tr>
<tr>
<td>2022</td>
<td>80.2</td>
<td>91.4</td>
</tr>
<tr>
<td>2023</td>
<td>81.6</td>
<td>91.5</td>
</tr>
<tr>
<td>2024</td>
<td>83</td>
<td>91.2</td>
</tr>
</tbody>
</table>

**Reserve Margin During Peak Demand**

- Peak demand
- Capacity (including Planned Resources)

Reserve Margin Percentage:
- 0%
- 10%
- 13.5%
- 20%
Electricity prices: Average price paid for electricity across all end user sectors

Target
By 2036, Texas will remain among the six lowest in its 12-state peer group.

Indicator Background
Texas retail electric prices have been among the lowest in the nation and stable for many years, adding to Texas’ quality of life and business-friendly environment. The electric price indicator measures the average price paid for electricity across all end user sectors, including residential, commercial, industrial, and transportation sectors.

Target Background
Increasingly hot summers add to electricity demand and wholesale price peaks. In order for the state to preserve its quality of life and business-friendly environment, Texas must remain in the Top 6 among Peer States for electricity affordability.

Benchmark
#2 (peers); Top 6 baseline at 9.6 cents/kWh or lower

Other Indicators Texas 2036 is monitoring:

Grid congestion cost: Additional costs of moving power due to physical limitations of transmission infrastructure
GOAL 18
Crisis Readiness

Texas Is Ready to Address the Human, Economic, and Environmental Consequences of Natural Disasters and Hazards.

Texas Today and Tomorrow

Texas is at high risk for natural and manmade disasters. Since 2000, Texas has seen nearly 80 weather and climate disasters with losses exceeding $1 billion each, the most high-cost disasters in the U.S. Nearly every major city in Texas is vulnerable to flooding because of their proximity to Gulf Coast hurricanes or “Flash Flood Alley.” Hurricane Harvey alone inflicted $125 billion in damages and necessitated the evacuation of over 780,000 Texans.

Pandemics and emerging diseases have also significantly impacted Texas this decade. After successfully containing Ebola in the Dallas area in 2014, Texas is currently addressing the global uncertainties caused by the outbreak of COVID-19. The growth of urban populations in Texas has increased the risk and potential consequences of pandemics and other hazards. Simultaneously, rural communities can sometimes better manage the impact of disease and other hazards with a more dispersed population, but they often lack financial resources or hospital infrastructure to effectively prepare for and respond to such hazards.

Texas’ infrastructure systems are key to minimizing adverse outcomes when communities face hazards. Resiliency requires preparedness across all forms of infrastructure. For example, resiliency against floods depends on well-maintained dam infrastructure and fortified buildings. Rapid communication of information to the public and coordination of emergency response teams require available digital infrastructure. Resiliency against pandemics relies on coordination across all levels of the government and the private sector to prevent loss of life, maintain hospital capacity and ensure functioning supply chain for the public.

Investment in preparedness and resilience provides significant savings down the road. A report produced by the Texas General Land Office on the response to Hurricane Harvey found that “for every dollar invested in disaster mitigation, fortification of buildings, and resilience, four dollars are saved in the reduced need for hurricane response and recovery funding.” Similar analysis after the COVID-19 crisis subsides can provide additional insight into pandemic preparedness.

Context

Although on-the-ground response to hazards is managed at the state and local levels, the federal government plays the largest role in providing funding for hazard response. To receive disaster funding in the majority of cases, the federal government needs to
issue a disaster declaration. State and local funding matches are also required.[04-116] In the aftermath of Hurricane Harvey, Texas lawmakers passed several bills addressing disaster resiliency. These bills called for official regional and state flood plans to be developed and managed by the Texas Water Development Board.[04-117] Additionally, lawmakers created the Texas Infrastructure Resiliency Fund and the Flood Infrastructure Funds to provide disaster relief and assist communities with flood-control projects.[04-118]

New non-weather hazards have emerged due to rapid changes in technology and demographics. Texas’ critical communications, electricity, and industrial infrastructure are highly digitized and interconnected, making them potential targets for cyber-threats. [04-119] Because Texas has some of the busiest hubs for international trade and travel in the United States, history has shown that our state is also uniquely susceptible to emerging and re-emerging infectious diseases.[04-120]

**Emergency preparedness:** State preparedness for, response to, and recovery from large-scale emergencies, as measured by the National Health Security Preparedness Index (NHSPI)[04-121],[04-122]

**Target**

By 2036, Texas will remain among the Top 6 highest in its 12-state peer group.

**Indicator Background**

In order for the state to protect the safety, quality of life, and economic prosperity of all Texans, Texas must ensure that it can appropriately respond to and recover from any significant emergency event. The emergency preparedness indicator measures the state’s preparedness for, response to, and recovery from large-scale emergencies, including health consequences of large-scale emergencies, using a confidence interval scale of 1 through 10, with 10 being the best.

**Target Background**

Texas has shown resilience and grit through significant large-scale emergencies in the past. Texas’ current confidence interval is 6.5, ranking the state in the Top 9 of its peer group. Texas must improve on this ranking to help preserve the safety, quality of life, and economic prosperity of all Texans.

**Benchmark**

#9 (peers); Top 6 baseline at 6.7 or higher[04-125]
Other Indicators Texas 2036 is monitoring:

**Projected risk:** Estimated risk and impact to communities for various natural disaster types

**Natural disaster resiliency:** Percentage of counties that are less resilient compared to U.S. regional averages measured by the Climate Resilience Screening Index

**Influenza and pneumonia mortality:** Number of deaths in Texas where the underlying or contributing cause is reported as influenza and/or pneumonia
Pillar 05

Natural Resources

Texas manages natural resources to promote quality of life, economic advantage, and environmental stewardship.

Goal: QUALITY OF AIR
Air quality nonattainment

Goal: SUFFICIENT WATER
Water shortage

Goal: QUALITY OF WATER
Drinking water attainment

Goal: PARKS AND WILDLIFE
Preserved acres  Park utilization

Goal: AGRICULTURAL PRODUCTION
Agricultural output per capita  Agricultural water efficiency

Goal: ENERGY PRODUCTION
Traditional energy production  Renewable energy production  Carbon intensity
Focus

Millions of Texans currently lack clean air and water. Sixty percent of all Texans live in areas that fail to meet federal air standards. These individuals, especially children and the elderly, are at increased risk of chronic lung and breathing quality problems. Over 400 public water systems, most in rural areas, are designated as serious violators of federal water quality standards. These communities have water contaminated with chemicals, heavy metals, and microbes that are public health risks.

Texas industries and municipalities risk water shortages. Statewide, unmet water needs currently exceed 4.8 million acre-feet per year, and demand is growing. Unless these water needs are addressed, Texas could experience $73 billion in lost economic value annually. Growing water shortages — the difference between supply and demand during a drought — will limit the future viability of Texas agriculture, as major groundwater resources are being depleted faster than they can be replenished.

Texas’ open spaces and wildlife need to be preserved for future generations to enjoy. For the last 15 years, more than 80% of Texans have affirmed that “unless we protect Texas’ natural areas, we will lose the very things that make Texas a special place in which to live.” As urban development accelerates with population growth, preservation will become even more urgent.

Abundant natural resources have allowed Texas to prosper, but continued success depends on balancing economic growth with stewardship of air, water, and land. Texas’ agricultural and energy production contributes billions to state GDP and provides jobs for more than one-in-seven Texans. The state’s future success requires a balance between leading in these industries and ensuring Texans have sufficient and clean water, healthy air, and the ability to enjoy the land and wildlife.

Goals and Targets for Texas in 2036

Goal #19 - Quality of air: Texans have clean air.
- **Target:** All Texans live in areas that meet federal air quality standards by 2036.
- **Baseline:** 60% of Texans live in counties that fail to meet federal air quality standards.

Goal #20 - Sufficient water: Texans can rely on a sufficient water supply.
- **Target:** Texas reduces its water shortage by 40% in 2036 (2.3 million additional acre-feet of water per year).
- **Baseline:** Texas’ water shortage is 5.6 million acre-feet per year.

Goal #21 - Quality of water: Texans have clean water.
• **Target:** 100% of Texas water systems are in regular compliance with drinking water standards by 2036.
• **Baseline:** 97% of Texas water systems meet drinking water standards.

**Goal #22 - Parks and wildlife:** Texas enhances and protects its state parks, public and private open spaces, and wildlife.

• **Target:** Texas maintains current ratios of 68 acres of preserved lands per 1,000 Texans and 306 state park visits per 1,000 Texans in 2036.
• **Baseline:** Texas has 68 acres of preserved lands per 1,000 Texans and 306 state park visits per 1,000 Texans.

**Goal #23 - Agricultural production:** Texas leads in agricultural production with responsible natural resource stewardship.

• **Target:** Texas ranks in the Top 6 highest in agricultural output per capita among its group of 12 Peer States while maintaining water use of 0.55 acre-feet per acre cropland by 2036.
• **Baseline:** Texas is ranked eighth in agricultural output per capita among Peer States and has water use of 0.55 acre-feet per acre cropland.

**Goal #24 - Energy production:** Texas leads in energy production with responsible natural resource stewardship.

• **Target:** Texas leads Peer States in traditional and renewable energy production and ranks in the Top 3 for lowest carbon intensity by 2036.
• **Baseline:** Texas is ranked first among Peer States for traditional energy production, third for renewable energy production, and fourth in carbon intensity among Peer States.

**Context**

Responsibility for Texas’ natural resources is divided among all levels of government as well as private actors who hold water, mineral, and land rights.

The majority of standard-setting takes place at the national level, through federal legislation and regulatory agencies. The Environmental Protection Agency sets national standards for air and water quality and has a reduced role in quality monitoring. The U.S. Congress regularly passes new farm bills, which define guidelines and eligibility for risk management, disaster assistance, and conservation programs that provide support for farmers. State-level agencies are responsible for monitoring, permitting, and enforcing standards for natural resources. The Texas Commission on Environmental Quality has regulatory oversight over air emissions, water use, and water quality. The Texas Water Development Board assists Texas communities with financing water infrastructure, coordinates the state water planning process, and monitors water-related data. The Texas Railroad Commission regulates mineral activity, including permitting and reporting for oil and gas production.
The Legislature appropriated roughly $9 billion for the 2020-21 biennium for natural resources agencies.\[05-17\] Federal sources made up about 70% of these funds.\[05-18\] Outside of its legislative appropriations, the Texas Water Development Board has provided $29.2 billion in financing for water infrastructure projects since the agency’s inception in 1957.\[05-19\]

In Texas, private owners play a significant role in natural resource management. Eighty-three percent of land in Texas is classified as privately-owned working land, and under state law, groundwater and mineral rights can be transferred separately from the surface rights.\[05-20\]\[05-21\] Development of water, land, and mineral rights for economic benefit usually requires approval from state agencies and is subject to regulation.

**Trends**

Population growth is a major driver of increasing water need and worsening air quality. Municipal water use is projected to be the fastest-growing segment of water demand as the population of Texas increases. Municipal demand may increase 23% by 2040, requiring an additional 1.2 million acre-feet of water per year.\[05-22\] Additionally, with roughly 90% of Texas’ population growth projected to occur in urban areas, improving air quality in those areas will be a significant challenge.\[05-23\] Greater transportation emissions from traffic congestion and the use of traditional vehicles will play a large factor in increasing air pollution.

Climate effects will increase the challenge of meeting air quality, water supply, and water quality goals. The number of 100-degree days is expected to double, reaching 24 per year by 2036.\[05-24\] Since ozone is emitted faster from industrial and transportation sources at higher temperatures, air pollution is likely to worsen. The water supply will come under strain if extreme heat increases evaporation of surface water supplies, reduces regular rainfall, and produces drier soils – thus requiring more water for crop irrigation.\[05-25\] Finally, increased flooding associated with hurricanes will likely introduce foreign contaminants into water supplies.\[05-26\]
GOAL 19
Quality of Air
Texans Have Clean Air.

Texas Today and Tomorrow

Sixty percent of all Texans live in one of twenty-nine counties that fail to meet federal air standards — these are called nonattainment areas. This population has increased 8% since 2016, when stricter federal standards and population growth caused additional counties to be designated as nonattainment areas. At least 12 counties in Texas have failed to meet air quality standards since 1992. The economic implications are significant: a nonattainment county faces additional federal review and other requirements for transportation projects and emission sources (such as industrial plants), which can significantly affect local and state economies.

Of the 29 major metropolitan areas with the most-polluted air, Texas has three: Houston, Dallas-Fort Worth, and El Paso. This poses serious health risks to residents in those areas. The two major pollutants in Texas, ozone and particulate matter, can exacerbate asthma and cause chronic lung issues, especially among vulnerable populations like children and the elderly. An estimated 710,000 Texas children — 10% — have at one point been diagnosed with asthma.

Context

The Texas Commission on Environmental Quality (TCEQ) monitors air quality throughout Texas and ensures compliance with minimum federal standards for six air pollutants: carbon monoxide, nitrogen dioxide, ozone, sulfur dioxide, lead, and particulate matter. The Environmental Protection Agency (EPA) periodically revises these federal standards, most recently in 2015. The TCEQ also develops the State Implementation Plan (SIP), Texas’ federally required plan for ensuring air meets health standards. The SIP details how nonattainment counties should reduce emissions and improve air quality. The EPA provides deadlines for attainment that range from three to 20 years, based on how severe air pollution is in a county. Most Texas counties have a deadline to be compliant with federal air quality standards by 2021.
**Air quality nonattainment**: Percentage of population living in areas that do not meet attainment standards for all pollutants under current National Ambient Air Quality Standards (NAAQS) [05-38]

**Target**

By 2036, no Texans will live in nonattainment areas.

**Indicator Background**

Air pollution poses serious health risks to the public and significantly reduces quality of life for all Texans. The air quality nonattainment indicator measures the percentage of Texas' population living in nonattainment areas that have pollution levels higher than acceptable federal standards. Nonattainment areas are designated by the EPA based on air quality monitoring data; one nonattainment area may consist of multiple adjacent counties failing to meet federal standards.

**Target Background**

Living in areas with air quality that meets acceptable federal standards contributes to Texans’ quality-of-life. The state must ensure that no Texan lives in a nonattainment area by 2036 to ensure no Texan’s health is disproportionately impacted by air pollution.

**Benchmark**

#7 (peers) [05-40]

---

Population living in areas that do not meet attainment standards for all pollutants under current National Ambient Air Quality Standards (NAAQS), 2018

- < 118,000
- 118,000 - 349,000
- 350,000 - 1,715,000
- > 1,715,000
Other Indicators Texas 2036 is monitoring:

**Air quality warnings**: Number of days out of total reported days with an Air Quality Index (AQI) rating from "Unhealthy for Certain Groups" to "Hazardous"

**Particle pollution**: Percentage of population living in counties with annual particulate matter (PM) 2.5 values greater than the national standard

**Ozone pollution**: Percentage of population living in counties with 8-hour ozone values greater than the national standard

**Connections**

High levels of ozone pollutants, the most common cause for nonattainment in Texas urban areas, are generated from motor vehicle exhaust. Reducing congestion and use of single-occupancy vehicles (Goal #13) on Texas roads would materially improve urban air quality.\(^{(05-41)}\)

Poor air quality can harm overall population health and cause more serious harm to those with chronic health conditions (Goal #11).
GOAL 20
Sufficient Water
Texans Can Rely on a Sufficient Water Supply.

Texas Today and Tomorrow

Due to urban population growth, municipalities face a high risk of potential water shortages. Municipal water use represents 28% of all water use in Texas today, the second largest segment after irrigation.\textsuperscript{[05-42]} But demand for municipal water may increase as much as 23% by 2040, meaning municipalities will use an additional 1.2 million acre-feet of water annually.\textsuperscript{[05-43]} This growth will not be met by Texas' current water supplies. Municipal water demand is projected to exceed supply by 1.5 million acre-feet in 2040, leaving communities vulnerable to water shortages during droughts.\textsuperscript{[05-44]} These water shortages are impacting communities even before 2040: during the last major drought, from 2011 to 2015, 110 cities or water systems came within six months of running out of water.\textsuperscript{[05-45]}

The size of Texas' unmet water needs in a drought is widening, leading to greater economic losses during a water shortage. The statewide water need doubled between 2000 and 2020 due to increased economic activity and population growth.\textsuperscript{[05-46]} In 2020, the state's projected water shortage, should a drought of record occur, is 4.8 million acre-feet.\textsuperscript{[05-47]} Oil and gas production, agriculture, and energy generation constitute 70% of all water used in Texas.\textsuperscript{[05-48]} Additionally, due to intense use of groundwater for irrigation, groundwater supplies are projected to decrease by four percentage points each decade.\textsuperscript{[05-49]} If water needs are not met, Texas could experience an estimated $73 billion in economic losses annually.\textsuperscript{[05-50]}

Climate effects are decreasing water supply and increasing drought severity, but our water planning is not keeping up. Texas could see increased evaporation and faster depletion of surface-water supplies in the future, but water planning processes may not account for changing environmental conditions.\textsuperscript{[05-51]} According to the state climatologist, climate effects may affect the water supply by as much as 15% in the next 50 years, creating greater potential shortages that are not accounted for in the state water plan.\textsuperscript{[05-52]}

Context

Every five years, the state creates a State Water Plan to ensure that Texas has adequate water supplies in times of drought.\textsuperscript{[05-53]} The 77-month drought of the 1950s is used as the benchmark for water planning, representing the worst-case scenario when water demands are highest and supplies are lowest.\textsuperscript{[05-54]} Sixteen regional water planning groups develop water management strategies to ensure available water supplies meet local demands over a 50-year time horizon. The state resolves any conflicts between regional water plans before compiling a State Water Plan.\textsuperscript{[05-55]}
The State Water Plan provides detailed estimates of water use patterns for each of the next five decades. The estimated water demand represents how much water each category of users is expected to use. Estimated water supplies represent how much water is physically and legally available to be produced and delivered during drought of record conditions. Water shortages occur when the existing water supply is less than the projected future water demand.[05-56]

Texas has a complex water law system, due to separate legal treatments of surface water and groundwater rights. Generally, groundwater is the private property of the landowner that the water lies beneath.[05-57] The owner is allowed to pump as much groundwater as they can capture, regardless of the effects on neighboring wells.[05-58] However, 98 Groundwater Conservation Districts exist across Texas to manage groundwater use through local water withdrawal rules.[05-59]

Surface water, by contrast, is owned by the state and managed by the Texas Commission on Environmental Quality, which issues use permits to private users, businesses, and municipalities.[05-60] During times of shortage, the owner with the earliest permit date is entitled to receive all of their water before holders of permits with later dates.[05-61]
**Water shortage**: The gap between projected supply and projected demand of water under drought-of-record conditions in 2030[^05-62]

**Target**
By 2036, Texas will reduce its statewide water shortage by 40% of current projected levels[^05-63]

**Indicator Background**
Water is essential to human, animal, and plant life. Water shortages threaten Texas’ economic productivity and quality of life. The State Water Plan measures Texas’ water shortage — the difference between the projected water supply and projected demand under significant drought conditions — in 10-year increments. The most recent plan projects the state will have a statewide water shortage of 5.6 million acre-feet in 2030 should a significant drought occur. The water shortage indicator uses data from the State Water Plan to measure the state’s water shortage and uses 2030 as a proxy for 2036.

**Target Background**
The 2030 statewide water shortage is projected at 5.6 million acre-feet. The average water shortage across all 16 planning regions is 350,000 acre-feet, with five regions exceeding this amount. Reducing the average shortage in these five regions to the current average shortage for all 16 regions would, in turn, reduce the projected statewide water shortage by 40%. These five regions include some of the state’s largest municipalities and agriculture industries. Improving conservation practices statewide will ensure Texas maintains its quality-of-life and economic prosperity into 2036.

**Benchmark**
This indicator is not currently assessed against Peer States due to differences in demographics, industries, and methodologies for calculating water use across states.
The gap between projected supply and projected demand of water under drought-of-record conditions in 2030 in acre-feet

Other Indicators Texas 2036 is monitoring:

Daily water use per person: Amount of residential water used per day, per capita, delivered through Texas water utilities

- < 111
- 111 - 1959
- 1960 - 11,480
- > 11,480
GOAL 21
Quality of Water
Texans Have Clean Water.

Texas Today and Tomorrow

While most Texans have access to clean drinking water, more than 400 public water systems across the state have been designated "serious violators" by the Environmental Protection Agency (EPA). Serious violator water systems have chronic uncorrected violations, usually across multiple health-based standards. Chronic exposure to contaminated water can lead to severe health consequences. Drinking water contaminated with microbes can cause fevers, kidney failure, and infectious diseases. Exposure to chemicals like lead, copper, and radionuclides (radiation hazards) in water can cause birth defects, nervous system effects, gastrointestinal illness, and increased risk of cancer.

The number of serious violators has declined since 2013, but small public water systems, challenged by limited resources, are falling behind in efforts to maintain water quality. Of the 7,000 public water systems in Texas, 60% are designated as "very small" public water systems serving populations of 500 people or less. These systems are disproportionately located in rural communities. Nearly 10% of these systems are serious violators, more than twice the national average. These small public water systems are often insufficiently monitored — only 20% receive site inspection visits annually, half the national average. Consequently, many rural communities have potentially undetected violations.

Context

The Clean Water Act and the Safe Drinking Water Act establish minimum federal water quality standards, which Texas adopts and enforces. The state partners with local water districts to monitor and test the quality of drinking water and water bodies to ensure levels of contaminants do not exceed the maximum levels defined in federal standards. To determine serious violator status, the EPA assigns either one, five, or ten points to each uncorrected violation based on its severity. Any public water system scoring eleven points or more is designated a serious violator.
Drinking water attainment: Percentage of public water systems (PWS) not identified as a Serious Violator based on uncorrected violations [05-78]

Target
By 2036, 100% of Texas water systems will not be identified as Serious Violators.

Indicator Background
Safe drinking water is a basic necessity for all Texans to prevent the spread of disease and other contaminants. Under the authority of the Safe Drinking Water Act, the EPA sets standards and oversees implementation of the drinking water program. The drinking water attainment indicator uses data from the EPA and shows the percentage of public water systems not identified as serious violators.

Target Background
Safe drinking water is a basic necessity that needs to be available to all Texans. Therefore, 100% of Texas water systems will not be identified as serious violators by 2036.

Benchmark
#12 (peers) [05-80]
Other Indicators Texas 2036 is monitoring:

Non-compliant water systems: Percentage of public water systems not in compliance with major testing, monitoring, and reporting procedures

Surface water quality: Percentage of surface water bodies inspected found to have major impairments

 Connections

Poor water quality can negatively impact population health (Goal #10) and, in some circumstances, negatively impact academic performance for students (Goals #3 and #4).
GOAL 22
Parks and Wildlife

Texas Today and Tomorrow

Parks, open spaces, and wildlife provide significant ecological and economic benefits to communities while improving Texans’ quality-of-life. Natural lands filter air and water pollutants, and they minimize the impact of disasters through flood mitigation. They also provide unique cultural and recreational opportunities, which are listed as a factor in quality-of-life indices. Wildlife activities provide economic benefits to Texas communities. In 2019, the state spent $442.5 million on parks and wildlife recreation.

Acreage of public and private protected lands has grown, but not as fast as Texas’ rapid population growth and urban development. Maintaining the current ratio of 75.5 protected acres per 1,000 Texans in 2036 may require an estimated 718,096 additional acres of preserve lands. Historically, protected lands have not kept pace with population growth. However, the rapid growth of private conservation easements, through which landowners enter voluntary legal agreements to protect natural features of their land, shows promise as a means of protecting open spaces.

Visitor capacity at state parks cannot keep up with rapidly growing demand. Nearly 80% of state parks were established more than 30 years ago. Now in need of significant maintenance and additional capacity, some of Texas’ most popular state parks, including Enchanted Rock, Balmorhea, and McKinney Falls, are forced to turn away visitors. To ensure future generations can enjoy Texas’ natural heritage, cumulative park capacity may need to support a projected 2.9 million additional visits each year by 2036.

The Texas Parks and Wildlife Department is responsible for maintaining nearly 1.5 million acres in Texas’ Public Land System. The department operates 95 state parks, as well as wildlife management areas used for research and conservation. The department also manages wildlife by issuing hunting and fishing licenses. Since at least 83% of land in Texas is privately owned, individual landowners too play a large role in preserving open spaces. Conservation easements, a voluntary legal agreement through which landowners sell or donate partial rights regarding land development to qualified land trusts, are growing in popularity. Major land trusts in Texas are run by federal and state agencies or private organizations like The Nature Conservancy.
Preserved acres: Number of acres preserved in the Public Land System or through easements per 1,000 Texans

Target
By 2036, Texas maintains the current ratio of 75.5 acres of preserved lands per 1,000 Texans.

Indicator Background
The presence of natural lands, both publicly and privately owned, provides many economic and quality-of-life benefits. The preserved acres indicator uses data from the Texas Parks and Wildlife Department and the National Conservation Easement Database to measure the number of acres of land preserved for every 1,000 Texans.

Target Background
Maintaining Texas' current ratio of 75.5 acres of preserved lands per 1,000 Texans is the best way to protect the economic and quality-of-life benefits of natural lands as Texas' population grows.

Benchmark
This indicator is not currently assessed against Peer States.
**Park utilization**: Number of visits to Texas state parks per 1,000 Texans\(^{[05-101],[05-102]}\)

**Target**
By 2036, Texas maintains the current ratio of 306 visits to state parks per 1,000 Texans.

**Indicator Background**
Visits to state parks are increasing each year, and popular parks and those near major urban areas cannot keep up with growing demand. The park utilization indicator measures the number of total visits to Texas state parks per 1,000 Texans.

**Target Background**
Experts project park capacity in Texas may need to support 2.9 million additional visits each year by 2036. To ensure future generations can enjoy Texas' natural heritage, Texas will need to add park capacity to maintain the current ratio of 306 visits to state parks per 1,000 Texans.

**Benchmark**
This indicator is not currently assessed against Peer States.
Other Indicators Texas 2036 is monitoring:

**Wildlife Management Plans with private landowners**: Percentage of total land acreage in Texas with approved Wildlife Management Plans with private landowners

**Hunting and fishing licenses**: Number of official hunting licenses and fishing licenses purchased through the Texas Department of Parks and Wildlife

**Connections**

Parks enable individuals to pursue healthy lifestyles (Goals #10 and #11) while benefiting quality-of-life (Goal #2). Parks can also serve as a driver for rural economic development (Goal #1) and a potential resource in addressing rural broadband accessibility (Goal #16).
GOAL 23
Agricultural Production

Texas Leads in Agricultural Production with Responsible Natural Resource Stewardship.

Texas Today and Tomorrow

Agriculture is integral to the Texas economy, with the state producing $20.6 billion in value from crops and livestock in 2018. Texas is the nation’s leading producer of cattle and cotton; other major products include corn and grains. Agriculture is a significant contributor to Texans’ livelihoods: nearly one-in-seven working Texans holds an agriculture-related job. In regions like the High Plains, agriculture accounts for as much as 40% of the local economy.

Texas needs to maintain sustainable water use in agriculture to support economic growth in 2036. Half of all water in Texas today is used for irrigation purposes. Widely grown products like cotton, rice, and soybeans are listed as some of the most water-intensive crops, requiring up to 13,200 liters of water to produce one pound of output. As a result, High Plains agriculture is highly dependent on the Ogallala Aquifer, where water levels are already depleted by 30% and could be reduced by another 39% within 50 years. Yet agriculture water use efficiency has been steadily improving in the last decade, as farmers, policymakers, and researchers developed innovative conservation solutions and alternatives to irrigation. Continued efforts in water efficiency are needed to ensure agriculture can be a sustainable source of economic growth for future generations of Texans.

Context

Texas has more farms and ranches than any other state, covering 127 million acres. Cattle ranches make up the majority of the total annual value of commodities produced in Texas, at $12.3 billion. The Texas Department of Agriculture works with all agricultural industries and landowners to promote production, consumer protection, economic development, and healthy living.
**Agricultural output per capita**: Market value in dollars of all sold crop, livestock, and animal products produced in Texas, divided by state population.\(^{[05-115]}\)

**Target**

By 2036, Texas will rank among the Top 6 in its 12-state peer group.

**Indicator Background**

Agriculture plays an important role in Texas’ economy, as nearly one-in-seven working Texans holds an agriculture-related job.\(^{[05-116]}\) The agricultural output per capita indicator measures the market value in dollars per capita of all sold crops, livestock, and animal products produced in-state.

**Target Background**

The strength of Texas agriculture is key to Texas’ continuing global competitiveness. It is vitally important that Texas maintains its leadership and remains in the Top 6 among Peer States for the highest agricultural output per capita by 2036.

**Benchmark**

#8 (peers); Top 6 baseline at $822 or higher.\(^{[05-117]}\)

Per capita market value of all sold crop, livestock, and animal products produced by state, 2017

![Diagram showing per capita market value of agricultural output in various states, with Texas at $731, national average at $1,119, and peer states ranging from $347 to $1,334.]
**Agriculture water efficiency:** Amount of water used for irrigation per acre of cropland in Texas [05-119, 05-120]

### Target
By 2036, Texas maintains the current ratio of 0.55 acre-feet of water per acre of cropland.

### Indicator Background
Texas will continue to lead in innovative water conservation practices to reduce its water shortage risk (see Goal #20). The agriculture industry will be a key contributor. The agriculture water efficiency indicator measures the amount of water used for irrigation, per acre of cropland.

### Target Background
In order to reduce Texas’ projected water shortage, Texas will need to maintain the current ratio of 0.55 acre-feet of water per acre of cropland by 2036.

### Benchmark
This indicator is not currently assessed against Peer States.

---

**Acre-feet of water used for for irrigation per acre of cropland in Texas, 1998, 2008, 2018**

<table>
<thead>
<tr>
<th>Year</th>
<th>Acre-feet of water</th>
</tr>
</thead>
<tbody>
<tr>
<td>1998</td>
<td>0.74</td>
</tr>
<tr>
<td>2008</td>
<td>0.60</td>
</tr>
<tr>
<td>2018</td>
<td>0.55</td>
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</tbody>
</table>

Texas

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Other Indicators Texas 2036 is monitoring:

- **Share of national agricultural output:** Value of agricultural output from Texas as a percentage of total U.S. agricultural output

- **Farm profitability:** Net farm income measured by revenue less expenses from production in the current year

- **Water intensity of livestock:** Average amount of ground and surface water used for livestock, per head of livestock

### Connections

By 2036, irrigation is projected to account for 50% of the state’s potential water shortages (Goal #20), a gap equal to 3.6 billion acre-feet of water per year [05-121]. Given this enormous quantity, efficiency in agriculture is key to reducing Texas’ unmet water needs.
GOAL 24

Energy Production

Texas Leads in Energy Production with Responsible Natural Resource Stewardship.

Texas Today and Tomorrow

Energy production is and will continue to be central to Texas’ economy. The oil and gas sector contributed an estimated $229 billion, or 12% of total state GDP, to Texas in 2019. It provides the state with more than $16 billion in state and local taxes and royalties. Riding the boom in Permian Basin activity, energy production helped Texas lead the nation in GDP growth for most of 2019. While the oil and gas industry often faces disruption due to swings in commodity values, Texas has the largest proven natural gas and oil reserves in the nation, and the energy sector will continue to support Texas’ future innovation and growth.

Renewables will play a critical role in the future of Texas’ energy industry. Due to an abundance of land and robust energy infrastructure, Texas has become one of the Top 3 states in renewable energy production. Texas leads the nation in wind generation and in 2019 produced 28% of all wind-generated electricity in the country. Despite leadership in wind, Texas produces less renewable energy overall than Washington, which leads the nation due to abundant hydroelectric sources, and California, which is ranked second due to its abundant solar and hydroelectric generation.

Responsible natural resource stewardship ensures both continued economic prosperity and quality-of-life for Texans. Texas is ranked fourth among its 12 Peer States in carbon intensity of the energy supply, which is the amount of carbon generated per unit of energy produced. However, Texas is the largest emitter of carbon in absolute measures. Major Fortune 500 businesses and Peer States are increasingly committed to low-carbon and net-zero economies, and Texas needs to remain competitive on renewable energy to attract major employers. Additionally, rapid growth in Permian Basin exploration requires regulators to ensure Texas adequately monitors air and water conditions surrounding oil and gas fields.

Context

Texas has robust production of both traditional and renewable energy. It is responsible for 41% of the nation’s crude oil production and 24% of natural gas production. Early investments in transmission infrastructure — the Competitive Renewable Energy Zone (CREZ) initiative — from 2005 to 2013 have connected remote wind and solar farms in rural Texas to urban demand centers. As a result, nearly 30% of Texas’ electricity is carbon-free today. In 2020, Texas is projected to produce more electricity from wind than from coal, with wind power continuing to be the state’s fastest growing generation source. Solar power, while representing less than 1% of the
16,787 trillion BTU in 2017

**Traditional energy production**: Amount of energy from oil, natural gas, coal, and nuclear energy extracted from the ground or generated in-state.

**Target**
By 2036, Texas continues to rank first among its group of 12 Peer States in traditional energy production.

**Indicator Background**
Both traditional and renewable energy sources are commonly measured by the amount of BTUs they produce: a British Thermal Unit (BTU) is the amount of energy required to raise the temperature of one pound of water by one degree Fahrenheit. Using this standard measure to track energy produced in Texas from oil, natural gas, coal, and nuclear energy highlights the major impact these industries have on the state’s economy, global competitiveness, and revenues.

**Target Background**
Texas-based companies and investors have pioneered new techniques to adapt to changes in the world economy and they will continue to do so, taking advantage of the state’s vast natural resources. New technologies and an entrepreneurial spirit will enable Texas to continue ranking first among Peer States in traditional energy production and remain economically competitive on a global scale.

**Benchmark**

<table>
<thead>
<tr>
<th>Year</th>
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<th>WA</th>
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<tbody>
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</tr>
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<td>1987</td>
<td>20</td>
<td>15</td>
</tr>
<tr>
<td>1997</td>
<td>25</td>
<td>20</td>
</tr>
<tr>
<td>2007</td>
<td>30</td>
<td>35</td>
</tr>
<tr>
<td>2017</td>
<td>40</td>
<td>45</td>
</tr>
</tbody>
</table>

#1 (peers)
**Renewable energy production**: Amount of energy generated from renewable sources in-state [05-141]

**Target**
By 2036, Texas ranks first among Peer States.

**Indicator Background**
Renewables will play a critical role in the future of Texas' energy industry as innovation and technology advances. Texas leads the nation for wind generation, but produces less renewable energy overall than some other Peer States, due largely to limited hydroelectric generation. The renewable energy production indicator measures the energy content generated from renewable sources in Texas.

**Target Background**
Texas has opportunities to continue to expand its wind and solar energy production and can strive to rank first among Peer States in renewable energy production.

**Benchmark**
#3 (peers); Top state baseline at 1,115 trillion BTU or higher [05-143]

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**Amount of energy generated from renewable sources in-state in trillions of BTU, 2017**

- **Texas**: 786 trillion BTU in 2017
- **National average**: 217 trillion BTU
- **California**: 1,115 trillion BTU
- **Washington**: 942 trillion BTU
- **Texas**: 786 trillion BTU
- **New York**: 450 trillion BTU
- **Illinois**: 370 trillion BTU
- **Georgia**: 272 trillion BTU
- **Florida**: 237 trillion BTU
- **North Carolina**: 218 trillion BTU
- **Pennsylvania**: 201 trillion BTU
- **Ohio**: 154 trillion BTU
- **Colorado**: 151 trillion BTU
- **Virginia**: 138 trillion BTU

---

**Legend**
- Red: Texas
- Light blue: Peer states
- Dark blue: National average
Carbon intensity: Quantity of carbon produced in-state from generating one unit of energy \[05-144\]

**Target**

By 2036, Texas ranks among the three highest in its group of Peer States.

**Indicator Background**

Major Fortune 500 businesses and Peer States are increasingly committed to low-carbon and net-zero economies. Responsible natural resource stewardship ensures both continued economic prosperity and quality of life for Texans. The carbon intensity indicator measures the quantity of carbon produced in-state from generating one unit of energy.

**Target Background**

In order to remain attractive to businesses and provide a good quality of life to Texans, Texas will decrease its carbon production and rank among the three states in its peer group producing the least amount of carbon.

**Benchmark**

#4 (peers); Top 3 baseline at 48 kg / MMBTU or lower \[05-146\]

![Graph showing carbon intensity over time for Texas and peer states](image.png)
Other Indicators Texas 2036 is monitoring:

**Share of oil and gas production:** Total oil and gas production in Texas, as a percentage of total U.S. production

**Share of oil and gas exports:** Percentage of total U.S. oil and gas exports originating from Texas

**Share of renewable production:** Total renewable energy produced in-state, as a percentage of total U.S. production

**Methane emissions:** Gas disposed through venting and flaring per unit of oil and gas produced

Connections

Texas governments rely heavily on oil and gas revenues and royalties, which contribute to the Permanent School Fund (which funds Goals #3 and #4), Permanent University Fund (which funds Goal #5), State Highway Fund (which funds Goals #13 and #14), and Economic Stabilization Fund (which ensures state funds are available in a downturn, Goal #31).

Many local governments also benefit from significant property taxes paid for plants and equipment. The jobs and production associated with the industry have powered the state’s economic growth (Goal #1).
Pillar 6

Justice & Safety

Texas ensures the safety and fair treatment of Texans.

Goal: PUBLIC SAFETY

Violent crime rate

Property crime rate

Goal: PROTECTION FOR THE VULNERABLE

Adverse Childhood Experiences

Goal: SAFETY NET

Supplemental poverty rate

Goal: JUSTICE SYSTEM

Recidivism

State Lawsuit Climate

How to read

Baseline

- Not compared across states
- On target
- Approaching target
- Off target
- Texas vs peer states

Trend

- Not yet tracked
- Improving
- Flat
- Worsening
- Mixed
Focus

Over the past few decades, Texas has enjoyed tremendous economic growth and prosperity, but not all Texans have the same access to opportunity and quality of life. With our state’s future prosperity increasingly dependent on the talents of our population, it is important that the state do more to help all Texans succeed. A number of often-interrelated factors hold many people back, including unsafe neighborhoods, food and housing insecurity, and traumatic experiences. By investing early in evidence-based programs that focus on such factors, Texas can reduce lost potential and future costs to society, taxpayers, and individuals. We can better protect our communities and begin to break long cycles of poverty and incarceration. State leaders should collaborate across justice and safety net systems to ensure all partners — state agencies, local governments, and private sector entities — spend tax dollars most effectively.

Texas’ civil and criminal justice systems face different pressures, and both should strive for data-informed improvements. While the Texas criminal justice system has three-year recidivism rates better than the national average, these numbers — 63% in 2018 for state jails and 46% for state prisons — still show room for significant improvement. Likewise, the civil court system is perceived by the business community as one of the nation’s least fair and reasonable, ranking 38th in the nation in a recent U.S. Chamber of Commerce survey.

As a state, we are far stronger when all Texans participate to the best of their abilities. By working to uphold an effective, efficient, and impartial justice system, and by offering people in crisis resources to meet basic needs, Texas can expand access to opportunity and sustain prosperity into the future.

Goals and Targets for Texas in 2036

Goal #25 - Public safety: Texans are protected from threats to their well-being and property
- **Target:** Texas ranks among the nine lowest in its 12-state peer group for violent crimes rates and remains among the nine lowest for property crime rates.
- **Baseline:** Texas is currently ranked in the bottom half for both violent crime and property crime rates.

Goal #26 - Protection for the vulnerable: Texas protects the vulnerable from traumatic experiences
- **Target:** Texas ranks among the nine lowest peer states for incidence of adverse childhood experiences.
- **Baseline:** Texas currently ranks sixth among peer states.
Goal #27 - Safety net: Texans have access to resources to meet basic needs when they are in crisis
- **Target:** Texas ranks among the three lowest peer states for the population below the supplemental poverty line.
- **Baseline:** Texas is currently ranked ninth.

Goal #28 - Justice system: Texans are served effectively, efficiently, and impartially by the justice system
- **Target:** Texas has a lower rate of recidivism than the national average and ranks among the top 3 peer states for its lawsuit climate.
- **Baseline:** Texas currently has a better-than-average recidivism rate and is ranked seventh in legal climate among peer states.

**Context**

Federal, state, and local governments all play roles in providing resources and services for Texans in need. The federal government funds the Temporary Assistance for Needy Families (TANF) grant, of which Texas receives $860 million annually; the Supplemental Nutrition Assistance Program (SNAP), which provides $4.8 billion; and the Women, Infants, and Children (WIC) grant, which provides $478 million. The Texas Health and Human Services Commission (HHSC), with a $38.0 billion annual operating budget, oversees large programs such as TANF and SNAP and operates more than 200 other programs (including Texas’ Medicaid managed care system). The Department of Family and Protective Services (DFPS) manages programs that protect children, the elderly, and adults with disabilities in Texas from abuse and neglect, and it partners with community-based programs for prevention and early intervention of juvenile delinquency and child abuse and neglect.

Texas’ criminal justice system is highly decentralized. Two hundred fifty-four different county justice systems are responsible for promoting community safety and adjudicating cases. These systems need to balance the goals of advancing public safety and appropriately punishing crime, and of rehabilitating and upholding the constitutional rights of individuals with justice system involvement. In Texas, as in most states, local jurisdictions fund and oversee most law enforcement activity, prosecution of cases, and the court system. Texas has 465 district courts serving as the primary trial courts for serious criminal and civil issues. More than 2,000 additional county and municipal courts handle less serious matters such as traffic citations and divorces. In 2018, Texas courts handled 8.6 million cases, 23 times the number of all federal court cases that year.

For the 2020-2021 biennium, the Legislature appropriated $12.5 billion for public safety and criminal justice, plus another $934 million to support the judiciary; together, these funds constitute 5% of the state budget. These figures do not include significant local expenditures on various components of the system.

Two state agencies provide oversight for corrections. The Texas Department of Criminal Justice (TDCJ) operates 106 state correctional facilities (including 89 prisons for
those convicted of violent offenses\textsuperscript{[6-12]} and 17 state jails for less serious convictions\textsuperscript{[6-13]}, which held approximately 136,000 people in 2018.\textsuperscript{[6-14]} The TDCJ spends $2.9 billion each year to incarcerate adults.\textsuperscript{[6-15]} It also provides funding for 123 adult probation departments overseen by local judicial boards. In 2018, local judges ordered nearly 370,000 Texans to community supervision.\textsuperscript{[6-16]}

The Texas Juvenile Justice Department (TJJD) works in partnership with counties and local juvenile boards to administer services for the more than 40,000 juveniles who are arrested or referred each year.\textsuperscript{[6-17]} TJJD runs five secure state institutions for juveniles and oversees 86 locally operated secure facilities, with a budget of roughly $330 million.\textsuperscript{[6-18]}
GOAL 25
Public Safety

Texans Are Protected from Threats to Their Well-Being and Property.

Texas Today and Tomorrow

Texas is currently experiencing relatively low rates of crime, but crime remains a significant problem. The violent crime rate, which measures murders, rapes, robberies and aggravated assaults, peaked in the early 1990s and has since declined by almost half. Over the past decade, the property crime rate, including arson, burglary, larceny, and motor vehicle theft and damage, has also been in decline.

But the violent crime rate remains higher than the national average, with 411 crimes per 100,000 people, compared to 381 nationally. And crime has a disproportionate effect on certain populations. Low-income households are more than twice as likely as high-income households to be victimized by violent crime.

Two factors — organized crime and human trafficking — could pose a greater threat to the safety of Texas communities in the future. With more than 100,000 gang members in Texas at any one time and high levels of gang-related violence in some cities, gang violence represents a major threat to public safety in Texas. Human trafficking is also an increasingly serious concern: in 2016, there were thought to be 300,000 victims of human trafficking in Texas, with nearly 80,000 of them children. But these are only estimates because most of these crimes go unreported. In 2016, only 280 arrests were made for human trafficking; across the country, less than 30% of arrests have led to convictions.
11

Violent crime rate: Number of violent crimes (i.e., murder, rape, robbery, and aggravated assault) reported per 100,000 people

Target
By 2036, Texas will rank among the nine lowest states in Texas’ peer group of 12 states.

Indicator Background
Violent crime in Texas has been on a generally downward slope since 1993, dropping by more than 50% during this time. Despite the state’s progress, the Texas violent crime rate has consistently exceeded national averages over the past two decades.\[06-26\]

Target Background
Texas has significantly improved its crime rate over recent decades, but Peer States have also improved over the same period. By 2036, Texas should seek to improve at a faster rate than its Peer States and move into the Top 9.

Benchmark
Texas is ranked #11 among peers states.\[06-29\] The current baseline to enter the Top 9 is 397 or lower.

Number of violent crimes (i.e., murder, rape, robbery, and aggravated assault) reported per 100,000 people, 2019

<table>
<thead>
<tr>
<th>State</th>
<th>Violent Crimes per 100,000 Residents</th>
</tr>
</thead>
<tbody>
<tr>
<td>Texas</td>
<td>411</td>
</tr>
<tr>
<td>Georgia</td>
<td>327</td>
</tr>
<tr>
<td>Florida</td>
<td>385</td>
</tr>
<tr>
<td>North Carolina</td>
<td>378</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>306</td>
</tr>
<tr>
<td>New York</td>
<td>351</td>
</tr>
<tr>
<td>Illinois</td>
<td>404</td>
</tr>
<tr>
<td>Colorado</td>
<td>397</td>
</tr>
<tr>
<td>Illinois</td>
<td>404</td>
</tr>
<tr>
<td>Virginia</td>
<td>200</td>
</tr>
<tr>
<td>Ohio</td>
<td>280</td>
</tr>
<tr>
<td>Washington</td>
<td>312</td>
</tr>
<tr>
<td>Georgia</td>
<td>327</td>
</tr>
<tr>
<td>New York</td>
<td>351</td>
</tr>
<tr>
<td>North Carolina</td>
<td>378</td>
</tr>
<tr>
<td>National average</td>
<td>381</td>
</tr>
</tbody>
</table>

The current baseline to enter the Top 9 is 397 or lower.
**Property crime rate**: Number of property crimes (i.e., arson, burglary, larceny, motor vehicle theft and damage) reported per 100,000 people

**Target**
By 2036, Texas will remain among the nine lowest states in its peer group.

**Indicator Background**
In the FBI’s Uniform Crime Reporting (UCR) data, property crimes include burglary, larceny, motor vehicle theft, and arson. According to the FBI, the theft offenses in this category involve “the taking of money or property, but there is no force or threat of force against the victims.” Arson data, while defined as a property crime, may involve victims being subjected to force.

**Target Background**
Texas has decreased property crime at a faster rate than any other peer state (approximately 5% decrease annually over past ten years, versus approximately 3% average across Peer States), moving from last place to middle of the pack. After years of positive momentum, Texas should avoid regression.

**Benchmark**
Texas was ranked #7 among Peer States for 2018. The ninth ranked state, North Carolina, had a property crime rate of 2,494 per 100,000 residents.

Number of property crimes (i.e., arson, burglary, larceny, motor vehicle theft and damage) reported per 100,000 people, 2018

<table>
<thead>
<tr>
<th>Peer States</th>
<th>Number of Property Crimes</th>
</tr>
</thead>
<tbody>
<tr>
<td>New York</td>
<td>1,441</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>1,490</td>
</tr>
<tr>
<td>Virginia</td>
<td>1,666</td>
</tr>
<tr>
<td>Illinois</td>
<td>1,933</td>
</tr>
<tr>
<td>Ohio</td>
<td>2,177</td>
</tr>
<tr>
<td>National average</td>
<td>2,199</td>
</tr>
<tr>
<td>Florida</td>
<td>2,282</td>
</tr>
<tr>
<td>Texas</td>
<td>2,367</td>
</tr>
<tr>
<td>California</td>
<td>2,380</td>
</tr>
<tr>
<td>North Carolina</td>
<td>2,494</td>
</tr>
<tr>
<td>Georgia</td>
<td>2,574</td>
</tr>
<tr>
<td>Colorado</td>
<td>2,672</td>
</tr>
<tr>
<td>Washington</td>
<td>2,946</td>
</tr>
</tbody>
</table>

**Connections**
Low crime rates are a key component of quality of life metrics (Goal #2).
GOAL 26
Protection for the Vulnerable
Texas Protects the Vulnerable from Traumatic Experiences.

Texas Today and Tomorrow

Vulnerable populations include victims of domestic violence\textsuperscript{6-36}, children being tracked by the Texas Department of Family and Protective Services (DFPS)\textsuperscript{6-37} or juvenile justice system\textsuperscript{6-38}, veterans\textsuperscript{6-39}, refugees\textsuperscript{6-40}, and the homeless.\textsuperscript{6-41} At any given time, these populations are estimated to total almost 2 million people, or 6% of the Texas population.\textsuperscript{6-42} Vulnerable populations may need to access state and local systems for support when dealing with traumatic experiences, such as physical, sexual, psychological, or emotional abuse.

Domestic violence is widespread in the U.S. and Texas. Nationwide, one-in-three women and one-in-four men have experienced some form of physical domestic violence.\textsuperscript{6-43} In Texas, 87 domestic violence assistance organizations serve over 7,000 people per day,\textsuperscript{6-44} but this represents just 15% to 20% of the victims of domestic violence overall.\textsuperscript{6-45} The Center for Disease Control and Prevention (CDC) estimates that an individual’s lifetime economic cost of domestic violence — including medical services, lost productivity, criminal justice costs, and other costs — is $103,767 for women and $23,414 for men.\textsuperscript{6-46}

There is significant overlap between domestic violence and child abuse victims. Studies show that men who frequently assault their wives are also likely to abuse their children.\textsuperscript{6-47}

It is especially urgent to improve support for at-risk children. Research shows that certain potentially traumatic events in childhood, called “adverse childhood experiences” (ACEs),\textsuperscript{6-48} can have a significant negative impact on a variety of outcomes later in life — including physical and emotional health, educational attainment, and employment.\textsuperscript{6-49} ACEs include experiencing violence or abuse, witnessing violence in the home or community, and living in a household with someone experiencing substance abuse, mental health challenges, or parent separation.\textsuperscript{6-50} Multiple ACEs dramatically increase the odds of negative health and economic outcomes later on.\textsuperscript{6-51} In Texas, one-in-five children have experienced at least two ACEs.\textsuperscript{6-52} A recent CDC study estimates that preventing adverse childhood experiences could eliminate 1.9 million cases of coronary heart disease, 2.5 million incidences of being overweight or obese, 21 million cases of depression, and 1.5 million incidences of high school non-completion.\textsuperscript{6-53}
Support for overcoming trauma comes largely from private and philanthropic sources. Total philanthropic donations for human services organizations in the U.S. — including food banks, homeless shelters, youth services, and family and legal services — came to nearly $52 billion in 2019.\textsuperscript{[06-54]}

Through the Family Violence Prevention and Services Act, every state has a formally designated, federally funded domestic violence coalition, like the Texas Council on Family Violence (TCFV). Dedicated to preventing family violence, TCFV partners with government, private industry, non-profit and faith-based communities, and other stakeholders to shape public policy and improve the services available to victims.\textsuperscript{[06-55]}

State policy makers can also support vulnerable populations directly through regulations on background checks, legal protections for victims and reporters of abuse, and custody requirements.
Adverse Childhood Experiences: Percentage of children under age 17 who have experienced two or more ACEs

Target
By 2036, Texas will remain among the nine lowest states in its 12-state peer group.

Indicator Background
Adverse Childhood Experiences include economic hardship; divorce or separation of parents; living with someone with a substance abuse problem; being a victim of or witness to neighborhood violence; living with someone who is mentally ill, suicidal, or severely depressed; witnessing domestic violence; having a parent who has served time in jail; and suffering the death of a parent. ACEs have a wide range of negative consequences on important outcomes later in life, including health, educational attainment, employment, and earnings.

Target Background
Because ACEs have such serious and wide-ranging effects on important life outcomes, it is important that Texas works to prevent such experiences. The share of Texas children who have experienced two or more ACEs should remain among the nine lowest percentages in Texas’ peer group of states by 2036.

Benchmark
#6 (peers); Top 9 baseline at 23.6% or lower

Percentage of children under age 17 who have experienced two or more ACEs, 2018
Other Indicators Texas 2036 is monitoring:

Child maltreatment: Injury or death of population less than age 18 due to maltreatment per 100,000 population

Domestic violence: Incidents of domestic violence

Domestic violence assistance programs: Average number of people served per day by domestic violence assistance organizations per 100,000 population

Connections

Adverse childhood experiences can negatively influence a student’s educational attainment (Goals #3, #4, and #5) and employment (Goal #6). Other factors addressing vulnerable populations can be directly linked to health outcomes (Goal #10).
GOAL 27
Safety Net
Texans Have Access to Resources to Meet Basic Needs when They Are in Crisis.

Texas Today and Tomorrow

Safety net benefits — which include food stamps, housing vouchers, tax exemptions, and cash assistance — are intended to serve Texans in times of crisis. They fill in gaps in basic needs such as food, housing, and utilities so that people can get back on their feet.

A large number of Texans struggle to make ends meet. An estimated 42% of households statewide earn less than the cost of living. Fourteen percent of households live below the supplemental poverty line — in other words, the combination of income and safety net services is still not sufficient to cover basic needs such as food, clothing, shelter, and utilities. Nearly half of Texas renters are burdened by housing costs, meaning they spend more than 30% of their income on housing. Nearly 4.3 million people (15% of Texas’ population) lack a sufficient quantity of affordable food.

Poverty does not affect all Texas communities equally. About 20% of Black and Hispanic Texans live below the poverty line, compared to about 10% of white and Asian Texans. On average, rural Texans have lower incomes than Texans as a whole, making around $40,000 in 2018 compared to roughly $50,000 statewide.

Poverty in childhood can be especially devastating. About 20% of Texas children live in poverty, which is higher than the national rate (16%). Hispanic and Black children are three times more likely to live in poverty than white children. The challenges and instability associated with child poverty can lead to low educational attainment, difficulty obtaining steady employment later in life, poor health outcomes, and criminal behavior in adolescence and adulthood.
Supplemental poverty rate: Percentage of population below the supplemental poverty line [06-72]

**Target**
By 2036, Texas will rank among the three lowest states in its 12-state peer group.

**Indicator Background**
Beginning in 2011, the U.S. Census Bureau began publishing the Supplemental Poverty Measure, a poverty metric designed to account for government assistance to low-income families. This indicator sets poverty thresholds based on the estimated costs of basic necessities such as food, shelter, clothing, and utilities, and it varies by geography, family size and structure. This metric provides a more comprehensive and nuanced understanding of poverty in Texas and across the nation.

**Target Background**
Because the challenges associated with poverty have significant effects on a range of critical life outcomes, it is essential that Texas work to reduce its supplemental poverty rate. In order to lessen these serious consequences, Texas should have one of the three lowest supplemental poverty rates among its Peer States by 2036.

**Benchmark**
#9 (peers); Top 3 baseline at 10.8% or lower [06-75]
Other Indicators Texas 2036 is monitoring:

**Housing cost burden:** Percentage of renters paying more than 30% of their income for housing

**Homeless population:** Number of people homeless per 10,000 population

**Food insecurity:** Percentage of households with limited or uncertain access to food

**Access to healthy food:** Percentage of population living in food deserts

**Connections**

Estimates of the cost of child poverty to the U.S. economy in 2018 range from 4% to 5.4% of GDP.[65-76] Providing more effective safety net services in Texas could make a big difference, whether in the form of higher educational attainment (Goal #5), or the elimination of barriers to employment (Goal #6).
GOAL 28
Justice System
Texans Are Served Effectively, Efficiently, and Impartially by the Justice System.

Texas Today and Tomorrow

By traditional measures, Texas has reduced its incarceration rate significantly in the past two decades. However, we continue to have the sixth highest rate of incarceration in state and federal facilities in the nation, and the highest among Texas’ 12 Peer States. Incarceration in county jails has increased over that time, driven by increasing numbers of pre-trial detainees. County jail admission rates are higher in rural counties than in urban areas. Racial disparities exist across all correctional facilities, with incarceration rates for Black Texans more than three times higher than for white Texans.

Texas’ criminal justice reform efforts have reduced incarceration rates but have not improved outcomes for the thousands of people who still cycle through the system each year. The rate of recidivism — which reflects the percentage of formerly incarcerated individuals who are rearrested within three years of release — is the metric most often used for gauging the effectiveness of prisons as a rehabilitation program. Recidivism rates have remained persistently high for those who commit less serious crimes (63% for state jails) and adjudicated youth (75% for state facilities). Many substance abuse rehabilitation, job training, and peer counseling programs have been designed to reduce recidivism among individuals who commit lower-level crimes. But because of inadequate resources and poor implementation, these programs often do not perform to expectations.

The quality of a state’s civil court system can directly impact whether businesses choose to locate and/or grow in that jurisdiction. In the Forbes “Best States for Business” survey, one of the underlying data inputs for a state’s regulatory environment is the quality of its legal climate. By this metric, Texas is among the nation’s worst — 38th overall — with particular concerns identified regarding trial judge impartiality (44th) and trial judge competence (41st). Jefferson County, home of Beaumont, was rated as the nation’s fifth worst legal jurisdiction.

During the 2019 Legislative Session, the Legislature passed HB 3040, which created the Texas Commission on Judicial Selection. This Commission is charged with preparing a report to the Legislature by December 2020 addressing “the fairness, effectiveness, and desirability of selecting a judicial officer through partisan elections” and “the fairness, effectiveness, and desirability of judicial selection methods proposed or adopted by other states.”
Context

The state’s incarceration rate quadrupled from 1978 to 2003 due to escalating crime rates and “tough on crime” policy responses. In 1980, a landmark federal court ruling declared overcrowding in Texas prisons to be “cruel and unusual punishment.” The state spent $3 billion on 100,000 new prison beds but still faced overcrowding issues. In 1993, Texas began enacting reforms to divert people convicted of lower-level drug and property crimes from long prison terms. Combined with declining crime, these reforms allowed the state to close eight adult and eight juvenile facilities over the ensuing 25 years. [06-87]
**Recidivism**: Percentage of individuals released from incarceration who are rearrested within three years

**Target**
By 2036, Texas will remain below the national average.

**Target Background**
Because states define recidivism in a non-uniform way, this target seeks to ensure that Texas remains better than the national average for recidivism.

**Indicator Background**
This indicator utilizes the Legislative Budget Board’s (LBB) analysis of the three-year rearrest rate for the cohort released in 2015 as its benchmark. The LBB’s rearrest data includes adults and juveniles who were rearrested for “a Class A or B misdemeanor or any type of felony within three years of release or within three years of the start of supervision. Referrals to juvenile probation departments for the same types of offenses also were analyzed and included in the rearrest rates for juvenile populations.”

**Benchmark**
The national average three-year recidivism rate is 68.4%.

---

**Percentage of individuals released from incarceration who are rearrested within three years**

<table>
<thead>
<tr>
<th>Year</th>
<th>State Prison</th>
<th>State Jail</th>
</tr>
</thead>
<tbody>
<tr>
<td>2013</td>
<td>46.4%</td>
<td>62.7%</td>
</tr>
<tr>
<td>2014</td>
<td>46.3%</td>
<td>63.1%</td>
</tr>
<tr>
<td>2015</td>
<td>45.4%</td>
<td>62.8%</td>
</tr>
</tbody>
</table>

- State Prison
- State Jail
State lawsuit climate: Ranking of state civil courts systems in lawsuit climate survey

Target
By 2036, Texas will be in the Top 3 among its 12-state peer group and in the top half among all states.

Indicator Background
The U.S. Chamber’s Institute for Legal Reform conducts a survey of in-house general counsel, senior litigators or attorneys, and other senior executives of large companies to identify those jurisdictions with the best and worst legal climates. Because lawsuit climates impact business decisions, this metric is used by Forbes in tabulating the Best States for Business.

Target Background
To ensure Texas retains its standing among the best places to do business in the nation, improving the state’s court systems — and creating the necessary regulatory framework to support them — can provide a differentiator against Peer States. To be among the Top 3 Peer States, Texas would need to pass the current #3, Colorado (#21 nationally). Virginia (#12 nationally) leads all Peer States, followed by North Carolina (#16 nationally).

Benchmark
#7 (peers)

Scaled scores of state civil court systems in lawsuit climate survey, 2019:

- Texas: 67.1
- National average: 68.3
- Peer states: 66.1 to 71.3
- Texas rank: 38th in the nation in 2019
Other Indicators Texas 2036 is monitoring:

**Incarceration rate:** The number of sentenced prisoners under the jurisdiction of state or federal correctional authorities per 100,000 people

**Collateral consequences:** Count of legal restrictions that limit people with criminal records from accessing employment, occupational licensing, housing, voting, and education

**Criminal justice spending:** Criminal justice expenditures per capita

**Prison spending:** Average cost per inmate

**Share of budget:** Corrections expenditures as percentage of total state general funds expenditures

**Prison diversions:** Percentage of TDCJ budget allocated to prison diversions

**Connections**

The state's lawsuit climate is a relevant factor in its economic growth as it impacts business relocations and expansion decisions (Goal #1).
Pillar 07
Government Performance

Texans are well served by accountable governments at all levels.

Goal: CONFIDENCE IN GOVERNMENT
Confidence

Goal: CIVIC ENGAGEMENT
Voter participation

Goal: BROAD, STABLE REVENUE BASE
Fiscal Sustainability  Business tax burden  Individual tax burden

Goal: WISELY MANAGED STATE SPENDING
Value of state services  Long-term liabilities

Goal: TALENT IN GOVERNMENT
Retention

Goal: PROVEN MODERN METHODS IN DATA & ANALYTICS, IT, AND CONTRACTING/PURCHASING
Transformation progress

Goal: CUSTOMER SERVICE
User satisfaction

Goal: ALIGNED ACCOUNTABILITY
Results through teamwork

How to read
Baseline
- Not compared across states
- On target
- Approaching target
- Off target
- Texas vs peer states

Trend
- Not yet tracked
- Improving
- Flat
- Worsening
- Mixed
Focus

High-quality, cost-effective public services drive economic growth, improve the quality of life for Texans, and build trust in government. Many talented Texans and innovative Texas-based companies are transforming industries and customer services in every area of 21st century life; state and local governments can also adopt these lessons to dramatically improve the ways government serves Texans.

Not every budget will be handed large surpluses. To provide for more water, schools, health care, and other vital services, Texas should ensure its revenue structure remains broad and provides stability for wise investments in the state’s future. Residents and businesses need to be able to foresee their share of service costs and plan their futures. Public expenditures should align with long-term needs and all unfunded liabilities addressed responsibly. State and local elected officials deserve encouragement and support from all Texans to make some of these hard decisions.

A higher priority is needed for state-of-the-art technologies, better data, and talented and skilled workers to spur greater innovation in state government. It’s hard for these programs to compete in the budget process with pressing immediate needs — such as education and health care funding — but state leaders can greatly improve customer services and accountability by investing in talent and funding proven modern methods for better planning, data and analytics, information technology, and purchasing.

Texas will need to rely on partnerships more than ever — between state and local entities, non-profits, and the private sector. Teamwork is driving much of the innovation in the private sector and governments can use these methods as well.

Goals and Targets for Texas in 2036

Goal #29 - Confidence in government: Texans have confidence in the public institutions that serve them.

- **Target:** Texas maintains its ranking in the Top 9 among Peer States with the highest levels of confidence.
- **Baseline:** Texas ranks second among Peer States with the highest levels of confidence.

Goal #30 - Civic engagement: Texans actively participate in governing their communities.

- **Target:** Texas ranks in the Top 9 among Peer States for voter participation.
- **Baseline:** Texas ranks twelfth among Peer States for voter participation.
Goals #31 - Broad, stable revenue base: Texas people and businesses contribute taxes and fees to meet strategic needs and remain competitive as we grow and change.
  • **Target:** Texas ranks in the Top 3 among Peer States for fiscal sustainability, Top 6 among Peer States for the lowest business tax burden, and Top 3 among Peer States for the lowest individual tax burden.
  • **Baseline:** Texas ranks fifth among Peer States for fiscal sustainability, sixth among Peer States for the lowest business tax burden, and fifth among Peer States for the lowest individual tax burden.

Goal #32 - Wisely managed state spending: Texas strategically manages state expenditures to deliver the best value to taxpayers.
  • **Target:** Texas will raise its standing among Peer States in a Taxpayer Return on Investment Index and will rank in the Top 3 among Peer States for the lowest long-term liability as a percentage of total personal income.
  • **Baseline:** Taxpayer Return on Investment Index is in development. Texas ranks ninth among Peer States for the lowest long-term liability as a percentage of total personal income.

Goals #33 - Talent in government: Texas government attracts and retains the talent needed to deliver excellent service and get results.
  • **Target:** Texas improves its voluntary turnover rate.
  • **Baseline:** Texas' voluntary turnover rate was 12.4% in 2019.

Goal #34 - Proven modern methods in data and analytics, information technology (IT), and contracting/purchasing: Texas government uses data-driven and proven modern methods to drive toward shared goals.
  • **Target:** Texas 2036 will utilize a rubric-based self-assessment across key functions of state administration to track modernization progress, and Texas will achieve progress in all critical milestones and be competitive with Peer States.
  • **Baseline:** Transformation progress indicator is in development.

Goal #35 - Customer service: Texas people and businesses can access the public services they want and need through user-friendly methods and devices.
  • **Target:** Texas will make progress in improving digital customer service and will be among the top Peer States in quality and satisfaction.
  • **Baseline:** User satisfaction indicator is in development.

Goals #36 - Aligned accountability: Texas officials at all levels collaborate well.
  • **Target:** Texas governments have clear roles and shared responsibilities for serving Texans, regularly performing rubric-based self-assessments to monitor progress toward achieving this goal.
  • **Baseline:** Results through teamwork indicator is in development.
Context

Texas’ executive agencies are highly decentralized. The Governor doesn’t have as much direct authority as in most other states. Nor is there a cabinet of major agency heads as at the federal level and in many other states. Of the six top constitutional officers in Texas, only the Secretary of State is appointed by the Governor. Some major agencies have an elected board (for example, the Railroad Commission and the State Board of Education) or a single elected official (Attorney General, Comptroller). Texas state government has an additional 200 boards and commissions, appointed by the Governor, that operate or oversee the majority of state services. These board appointments are critically important because they, rather than the Governor, hire the chief executives who run these agencies.

The Texas Legislature has significant authority, even though its members — 150 Representatives and 31 Senators — meet every other year for only 140 days. Every two years, the Texas Legislature is required to pass a balanced budget. The 2020-21 State of Texas budget totals $248.3 billion. The Legislature has professionally staffed oversight agencies — Legislative Budget Board, State Auditor’s Office, and Sunset Advisory Commission — and a range of standing committees with wide powers to fund, investigate, evaluate, and audit the performance of state government.
GOAL 29
Confidence in Government

Texans Have Confidence in the Public Institutions that Serve Them.

Texas Today and Tomorrow

In 2018, Americans reported the lowest confidence ratings in the federal government in four decades, with only 12% of people saying they had a great deal of confidence in the U.S. government.[07,04] Texans view their state government more favorably: in 2019, 43% said that things in our state are on track (ranking second among 12 Peer States on this measure).[07,05] As the state focuses on data-driven solutions that improve the lives of all Texans and empower economic growth, confidence in state government should become even stronger.
**Confidence:** Percentage of Texans who believe that "things in my state are on track"

**Target**
In 2036, Texas will remain among the nine highest in its group of 12 Peer States.

**Indicator Background**
This is a well-recognized and widely-used survey question in national, state, and local opinion research. It is a neutral way (without political, personal, or specific issue references) to gauge general comfort with the overall direction of government leadership and services.

**Target Background**
Many factors, including the health of the local economy, can influence this survey measure, but Texas ranks highly among Peer States today and will seek to maintain public support regardless of economic circumstances.

**Benchmark**
#2 (peers); Top 9 baseline at 35% or higher[^7.10]
GOAL 30
Civic Engagement
Texans Actively Participate in Governing Their Communities.

Texas Today and Tomorrow

Texas consistently ranks near the bottom nationally in electoral participation. In the 2016 presidential election, only 55% of Texas citizens aged 18 and over voted — one of the lowest turnouts of any state in the nation.\textsuperscript{[07-11]} Voter participation is historically even lower in non-presidential years. In 2018, Texas had a significant increase in turnout for the midterm elections, with the sixth largest mid-term jump among all states,\textsuperscript{[07-12]} showing that civic engagement can be increased. Even with this increase, Texas still placed in the bottom 10 states in the nation, with just a 48% turnout among citizens aged 18 and over.\textsuperscript{[07-13]}

On other measures of civic engagement, Texas also lags other states. Twenty eight percent of Texas’ residents volunteer, ranking 37th in the nation.\textsuperscript{[07-14]} However, Texans donated over $295 million in campaign contributions to federal candidates, PACs, and parties, which is the fourth-highest total in the nation;\textsuperscript{[07-15]} a subset of Texans, at least, is highly engaged in the political process.

Texas government needs the active participation of its residents to ensure the state is held accountable for the priorities that are most important to Texans.
Voter participation: Percentage of voting-age citizens who vote in major elections\textsuperscript{[07-16]}

Target
By 2036, Texas will rank in the Top 9 among Peer States.

Indicator Background
This indicator tracks Census Bureau estimates for the percentage of voting-age citizens in each state who cast ballots in federal elections. Because presidential election years usually exceed midterm election turnouts, both are tracked.

Percentage of voting-age citizens who vote in major elections, 2018-2019

Target Background
For Texas to reach the Top 9 among Peer States, it would need to exceed 52.4% turnout in a midterm election and 59.5% turnout in a presidential election.

Benchmark
Texas is #12 among its Peer States both for presidential-year and midterm election turnout.

Other Indicators Texas 2036 is monitoring:

Volunteerism: Percent of adults who volunteer
GOAL 31
Broad, Stable Revenue Base

Texas People and Businesses Contribute Taxes and Fees to Meet Strategic Needs and Remain Competitive as We Grow and Change.

Texas Today and Tomorrow

State and local revenues have grown in Texas due to our robust economy, but Texas does not rank at the top of its peers in fiscal stability and sustainability. Texas ranks fifth among its 12 peers and 22nd among all states on an index of fiscal sustainability measures, including revenue volatility and sustainability in the face of rising obligations. Left unaddressed, revenue gaps and volatility will create growing pressure on state budget writers for short-term solutions, deferring critical long-term needs. State taxes and fees need to be broad-based so we can maintain low tax rates and still cover the cost of adequate government services as our economy and population grow.

Texas' tax structure was designed in a different time, and the changing economy highlights weaknesses in the diversity of our revenue streams. More than half of the state’s tax revenue is collected from businesses, which pay 8.3% of their pre-tax gross operating surpluses in taxes. The energy and manufacturing industries contribute the relatively largest amounts, which make Texas vulnerable to the economic volatility these sectors experience. Many service industries are excluded from collecting sales tax on their services, even though they are growing fast. In the most recent state budget period, this sales tax omission reduced state revenues by an estimated $17 billion over two years.

Growth in tax exemptions threatens the state’s fiscal sustainability. Tax exemptions have grown in value by 57% between 2011 and 2019. Hundreds of tax exemptions — including the services excluded from taxes, as described above — will add up to $76 billion in foregone revenue by 2024. Even though some exemptions assist worthwhile causes, Texas should frequently evaluate the return on investment of these exemptions to ensure the state is best prioritizing scarce public dollars.

The Texas Economic Stabilization Fund, also known as the Rainy Day Fund, exists to help ensure fiscal stability when downturns in the economy result in revenue losses. While a supermajority vote of the Legislature is required to access the Economic Stabilization Fund, this fund has no spending priorities or restrictions. In practice, it has been tapped inconsistently since its creation and has often been used to address state priorities other than covering budget shortfalls. Priorities need to be clearer if the Economic Stabilization Fund is going to be an effective tool to limit future tax increases and address true emergency budget shortfalls.
**Fiscal Sustainability**: Ranking on Fiscal Sustainability Index[^7-28]

**Target**
By 2036, Texas will rank in the Top 3 among its 12 Peer States.

**Indicator Background**
There are several well-designed national benchmark studies of state government finance. Bond rating agencies, national magazines, and academic think tanks conduct periodic assessments of state expenditures, revenues, and obligations. Some focus on budget and accounting procedures, while others track levels of spending and taxes per person. The fiscal health dashboard that most closely mirrors priorities reflected in this Strategic Framework has been produced for the past five years by the Mercatus Center at George Mason University in Virginia. Mercatus has indicated that it may not continue this report card, but it will share its data and procedures with Texas 2036 or a research partner who will carry this report forward on Texas’ behalf.

**Target Background**
Texas ranks above the midpoint of all 50 states and our peers in 2016. This is an important performance area in which a strong and stable state government will be better situated to maintain our competitive economic position and support needed service improvements across all goals. This target assumes Texas will increase its ranking among Peer States to be among the Top 3 by 2036.

**Benchmark**
#5 (peers); Top 3 baseline at #13 or lower[^7-23]

[^7-28]: Fiscal Sustainability Index
[^7-29]: Texas ranked #22 in the nation in 2016
[^7-30]: Flat
**Business tax burden**: Combined state and local taxes paid by business as percent of pre-tax gross operating margin

**Target**
By 2036, Texas will continue to have one of the six lowest tax burdens among Peer States.

**Indicator Background**
A favorable business climate is improved by avoiding excessive tax burdens. The Anderson Economic Group tracks business tax burdens across the states utilizing a pre-tax gross operating margin calculation that roughly approximates how much of a company’s profits are paid in state and local taxes.

**Target Background**
While Texas is squarely in the middle of its Peer States in overall business tax burden, it leads among those states that have no personal income tax. Washington ranks ninth among Peer States with a 9.2% business tax burden, and Florida ranks 10th among Peer States with a 9.6% business tax burden.

**Benchmark**
Texas is ranked sixth among its peers and 18th among all states.

### Combined state and local taxes paid by business as percent of pre-tax gross operating margin, 2016

<table>
<thead>
<tr>
<th>State</th>
<th>Tax Burden</th>
</tr>
</thead>
<tbody>
<tr>
<td>North Carolina</td>
<td>6.9%</td>
</tr>
<tr>
<td>Georgia</td>
<td>7%</td>
</tr>
<tr>
<td>Ohio</td>
<td>7.8%</td>
</tr>
<tr>
<td>California</td>
<td>8.2%</td>
</tr>
<tr>
<td>Colorado</td>
<td>8.2%</td>
</tr>
<tr>
<td>Texas</td>
<td>8.3%</td>
</tr>
<tr>
<td>Virginia</td>
<td>8.6%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>9.1%</td>
</tr>
<tr>
<td>Washington</td>
<td>9.2%</td>
</tr>
<tr>
<td>National average</td>
<td>9.4%</td>
</tr>
<tr>
<td>Florida</td>
<td>9.6%</td>
</tr>
<tr>
<td>Illinois</td>
<td>9.7%</td>
</tr>
<tr>
<td>New York</td>
<td>11.3%</td>
</tr>
</tbody>
</table>

*Texas is ranked sixth among its peers and 18th among all states.*

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**GOVERNMENT PERFORMANCE**

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8.3% in 2016 rankings

Worsening
Individual tax burden: Combined state and local taxes paid by individuals as percent of income

Target
By 2036, Texas will have one of the three lowest tax burdens among Peer States.

Indicator Background
The proportion of state and local taxes varies greatly from state to state and most measurements therefore combine the two sources of tax obligations. Many services, such as education and health care, are shared by state and local governments; the share paid by each may vary from year to year without a corresponding change in the amount owed by taxpayers. Income is more appropriate than headcount because it reflects the ability to pay and the success of the underlying economy. The Urban-Brookings Tax Policy Center publishes a consistent and credible report annually, drawn from U.S. Census State and Local Government Finance reports.

Target Background
Without a personal income tax, Texas has relied more than most states on sales and property taxes. Dramatic increases in property values have made the property tax less affordable for many Texans as property taxes have increased. As a result, this measure of individual tax burden has been moving in the wrong direction. This target does not assume a particular solution but projects that Texas will address its tax structure in some ways to remain competitive and attractive and rank in the Top 3 among Peer States.

Benchmark
#4 (peers); Top 3 baseline at 8.7% or lower[^7-37]
Combined state and local taxes paid by individuals as percent of income - 2017

<table>
<thead>
<tr>
<th>State</th>
<th>Tax Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Texas</td>
<td>8.8%</td>
</tr>
<tr>
<td>Peer States</td>
<td></td>
</tr>
<tr>
<td>Florida</td>
<td>7.7%</td>
</tr>
<tr>
<td>Georgia</td>
<td>8.5%</td>
</tr>
<tr>
<td>Virginia</td>
<td>8.7%</td>
</tr>
<tr>
<td>Washington</td>
<td>9.3%</td>
</tr>
<tr>
<td>North Carolina</td>
<td>9.0%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>9.7%</td>
</tr>
<tr>
<td>Colorado</td>
<td>8.9%</td>
</tr>
<tr>
<td>North Carolina</td>
<td>9.0%</td>
</tr>
<tr>
<td>California</td>
<td>10.3%</td>
</tr>
<tr>
<td>Illinois</td>
<td>10.6%</td>
</tr>
<tr>
<td>New York</td>
<td>13.9%</td>
</tr>
<tr>
<td>National average</td>
<td>9.8%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>9.7%</td>
</tr>
<tr>
<td>Ohio</td>
<td>10.0%</td>
</tr>
<tr>
<td>Illinois</td>
<td>10.6%</td>
</tr>
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<td>California</td>
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<td>8.5%</td>
</tr>
<tr>
<td>Florida</td>
<td>7.7%</td>
</tr>
</tbody>
</table>

Other Indicators Texas 2036 is monitoring:

**Tax revenue volatility:** Standard deviation of yearly percent change in total tax revenue, excluding the effect of known tax policy changes

**Tax exemptions:** Revenue foregone annually due to exemptions as percent of total revenue

**Connections**

Sustaining a broad, stable revenue base and minimizing tax burdens requires close collaboration with local entities (Goal #36), which are assigned most of their responsibilities and authorized most of their revenues by state law. High-growth cities and school districts, as well as geographically dispersed rural governments, face unique challenges, and it is hard to address their needs without careful attention and a more permanent commitment to the structure of property and sales taxes.
GOAL 32
Wisely Managed State Spending

Texas Strategically Manages State Expenditures to Deliver the Best Value to Taxpayers.

Texas Today and Tomorrow

While the state has been a careful steward of tax resources, costs to deliver critical services are rising and will require increased prioritization and commitment to conservative budgeting practices. Optimizing taxpayer value requires both controlling costs that inevitably rise each budget cycle while also finding efficiencies in areas where technology and population growth allow. The state must also consider its long-term liabilities and future needs: pension commitments require attention to be sustainable, and facilities and information technology infrastructure require capital investment to support more direct online services to Texans and better data reporting and analysis.

The Texas Constitution restricts the state’s spending to available revenue estimated by the Comptroller, requiring the state to “pay as you go” within a balanced budget. To balance the budget, lawmakers have, at times, failed to address some of the state’s long-term needs and obligations. Unfunded pension obligations, other post-employment benefit obligations, and deferred maintenance of facilities and information technology have grown to over $12.0 billion. Even in plentiful times, many of these unfunded obligations and needs have been allowed to grow. Should Texas’ economic growth and corresponding tax revenue growth slow down in future years, it will be harder for Texas to fill gaps caused by deferred payments or under-budgeting in prior years.

The best measure of wise public spending is whether Texas takes care of its obligations and delivers necessary services effectively and with the lowest possible expenditure. The complexities of our growing state budget and various two-year “fixes” do not allow the public to have a clear picture of our overall future obligations or current service results, compared to past years or to other states. To be more transparent and accountable to the public, Texas needs a better yardstick of the value added by tax-funded government programs. Texas 2036 will create a Taxpayer Return on Investment Index (Taxpayer ROI) comparing our taxes collected to the quality of our services to track whether state spending produces satisfactory results.
**Value of state services**: Texas provides valuable services in relation to revenues collected

**Target**
By 2036, Texas will raise its standing among Peer States in a Taxpayer Return on Investment Index, accounting for the quality of public services delivered for the combined state and local taxes per capita.\(^{[07-41]}\)

**Indicator Background**
There are many national rankings of state services that compare the quality and effectiveness of services among all 50 states. And there are numerous scorecards that measure taxation of individuals and businesses in every state. Texas 2036 will combine these two types of data — service effectiveness and taxation — to create a ratio that can track the ways public funds are used and compare Texas’ progress over time and against our peers.

**Target Background**
Establishing a new kind of value ratio between the cost and quality of public services will allow a more specific performance goal to be set. Above-average ratios of value may exist for high-tax, high-service states as well as lower-tax, lower-service ones. Whatever the initial Texas ratio turns out to be, the target will be to steadily improve our standing among competitive Peer States for the value added cost-effectively by our public services.

**Long-term liabilities**: Tax-supported debt and net pension liabilities as a percentage of total state personal income\(^{[07-42]}\)

**Target**
By 2036, Texas will have one of the three lowest liabilities among its group of 12 Peer States.

**Indicator Background**
In addition to balancing the budget each year, state governments must also ensure their long-term liabilities are adequately managed for future generations. The long-term fiscal sustainability indicator uses data from Fitch Ratings to measure the tax-supported debt and net pension liabilities relative to total state personal income, an economic measure representing the resource base from which liabilities will ultimately be repaid.

**Target Background**
Long-term burden is a key rating driver in overall evaluation of credit quality for many rating agencies. Texas must improve its long-term burden to rank in the Top 3 among Peer States to ensure its future economic competitiveness and quality of life.

**Benchmark**
#9 (peers); Top 3 baseline at 5.2%\(^{[07-45]}\)
Tax-supported debt and net pension liabilities as a percentage of total state personal income - 2018

Other Indicators Texas 2036 is monitoring:

**Budget flexibility:** Percentage of state budget not pre-committed

**Budget maneuvers:** Non-recurring revenue (includes Rainy Day Fund, single-use accounts, etc.) as percent of state budget expenditures

**Deferred investments:** Cost of deferred infrastructure maintenance

**Connections**

This goal is explicitly connected with goals that focus on controlling spending, such as return on health care investment (Goal #12).

This goal is also directly connected to state government’s operational functions (Goal #34). While there is agency-level strategic planning as a part of the state budget process, room for significant improvement exists in leveraging data across agencies to solve larger problems for the state in a more coordinated and cost-effective manner.
GOAL 33
Talent in Government
Texas Government Attracts and Retains the Needed Talent to Deliver Excellent Service and Get Results.

Texas Today and Tomorrow

The Texas workforce needs more highly trained teachers and health care providers, as discussed in other goals. But all of state government needs talented workers to meet the demands and expectations of our growing and evolving state.

Texas needs highly skilled leaders and employees to improve services with teamwork and technology. State agencies employ just over 150,000 people.\[07-46\] Despite a 57% growth in population and a 237% growth in budget, the number of state employees is roughly the same today as in 1993.\[07-47\] Technology has supported this increase in productivity, but more investment in the skills of state employees is needed to keep up with change and growth.

At this time, there is not meaningful data tracking state workforce quality. Instead, the best available data records voluntary turnover of state employees. State employee turnover (voluntary and involuntary) reached a 10-year high in fiscal year 2019, peaking at 20.3%.\[07-48\] Voluntary turnover, excluding retirements, increased from 11.4% in fiscal year 2018 to 12.4% in fiscal year 2019.\[07-49\] The State Auditor’s office attributes the increased voluntary turnover in large part to employees seeking better pay and benefits at a time when the state’s unemployment rate hit historical lows.\[07-50\] The turnover rate among employees under the age of 30 was nearly double the state average, and more than half of all departures had not been with the state for five years.\[07-51\]

Texas has underinvested in developing talented staff. By the standards of other large organizations, Texas is notable for the absence of valuable resources to support recruiting across all agencies, for uneven management development practices, and highly variable working conditions and policies. It will be particularly important to improve the management and talent available to transform planning, data analytics, IT, and contracting/purchasing. This will require best-in-class HR strategies and systems to attract and train needed talent. In some sectors, efforts should be made to retain and develop expertise; in others, like IT, a more frequent exchange of knowledge with the private sector may allow for more routine refreshes at times of rapid technological change.

The skills required for state jobs need to better reflect the increasing importance of data analytics, contract management, and customer service technologies. And more sophisticated training programs are needed to raise the skills of existing employees, improve morale and working conditions, and create promotional opportunities.
Retention: Voluntary turnover rate of state employees excluding retirements[^7.52]

**Target**
By 2036, Texas will improve its voluntary retention of state employees.

**Indicator Background**
At this time, there is no readily available measure of the quality of the state’s workforce. The best available data tracks whether the state is able to retain its current workforce against private sector competition. This indicator tracks voluntary turnover, for reasons other than retirement, for state agency employees.

**Target Background**
While some voluntary turnover is good, especially in fields like IT where sharing knowledge back and forth with the private sector can improve state operations, generally the state should seek to have pay and benefits that allow it to develop and retain high-performing employees. Because no comparable benchmark data exists at this time, the target is simply improvement from the 2019 base year. Broader qualitative measures of state workforce skills and leadership will be valuable and should be included when available.

**Benchmark**
Limited data prevents a good comparison among Peer States.

**Other Indicators Texas 2036 is monitoring:**

- **HR - sourcing**: Number of applicants per job
- **HR - spending per employee**: Aggregated state HR spending divided by total number of state employees

**Connections**
This goal is explicitly connected to those goals that will require the state to lead changes in service improvements and data collection. It is particularly important in improving the state’s core administrative functions (Goal #34).
GOAL 34
Proven Modern Methods in Data & Analytics, IT, and Contracting/Purchasing

Texas Government Uses Data-Driven and Proven Modern Methods to Drive Toward Shared Goals.

Texas Today and Tomorrow

Texas needs an effective mechanism to bring officials together around long-term goals. Texas adopted a performance-based budgeting process that directly links the state budget to goals and performance measures outlined in the strategic plans of more than 200 agencies. Texas remains one of only three states that use this as the primary budget strategy. However, with so many goals and performance measures mostly measured on a two-year basis, there is no clear way to prioritize these goals or to ensure resources are devoted to the most problematic performance areas. Without aligned priorities and accountability measures, there is a risk that agencies continue to work in functional silos, lacking a more unified strategic direction. This may serve the immediate needs of the two-year budget process, but Texas needs broader planning to achieve major goals.

The collection, use, analysis, and reporting of data is critical to informed decision making. Only a third of the state’s agencies have adequate data analysis capabilities. A lack of dedicated employees with the right skill sets has made it difficult to address this challenge. Texas needs quality data and rigorous analytics across agencies to enable strategic investment.

Many areas of the state government use antiquated legacy IT systems that prevent efficient operations and management. An additional issue is Texas’ decentralized approach to managing technology, which makes state agencies largely responsible for managing their own technology budget and needs. The state’s technology agency, the Department of Information Resources, primarily provides coordination, standards, and statewide contracts for agencies to use in shared services, many of which are voluntary. Texas needs a coordinated IT strategy to drive modernization internally for agencies and externally for the public.

Current procurement practices are too driven by outdated order processing methods that need to become more strategic. Between 2008 and 2018, total state spending on goods and services rose by 168% to $59.9 billion, but three-fourths of this spending was performed through emergency or exceptional purchases, not managed contracts. Effective state procurement depends on the ability to leverage volume for certain commodities and innovative use of technology and better strategies for other new and complex services. Many agencies do not have a full-time purchasing
staff or access to highly skilled central purchasing assistance to negotiate better contracts. Texas needs to improve and expand centralized procurement practices to take full advantage of better strategies and greater scale of state purchases.

**Transformation progress**: Texas 2036 will utilize a rubric-based self-assessment across key functions of state administration to track modernization progress

**Target**
By 2036, Texas will achieve progress in all critical milestones and be competitive with Peer States.

**Indicator Background**
Both information technology and contracting produce volumes of data, but much of it focuses on budget and equipment inputs, not customer service outcomes. Budget resources are tracked, contract overruns are reported, and volumes of transactions processed are compiled. Some of this input data is used for national report cards on equipment modernization. There are a few efforts underway to develop highly strategic report cards on state government modernization that will be focused on application of the most effective technologies and processes, customer satisfaction drivers, and transparent performance measurement. Texas 2036 will seek broad support in state government and industry to develop agreement around actionable performance steps that use high-quality best practices as guideposts.

**Target Background**
As soon as a meaningful assessment can be developed, Texas 2036 will encourage a strategy to become a leader among Peer States.

**Other Indicators Texas 2036 is monitoring:**

- **Planning**: Percentage of targets submitted by state government agencies met on time
- **Procurement**: Percentage of contract spending under pre-negotiated contracts for agencies statewide
- **IT - legacy debt**: Percentage of legacy systems in state government
- **IT - spending per employee**: Aggregated state IT spending divided by total number of state employees
- **Data analytics**: Percentage of state agencies with data analytics capabilities

**Connections**
Improved technological capabilities will greatly assist the state government in tackling most of the goals in this document, and wisely managing state spending (Goal #32) will be necessary to achieve this goal.
GOAL 35
Customer Service
Texas People and Businesses Can Access the Public Services They Want and Need with User-Friendly Methods and Devices.

Texas Today and Tomorrow

Texas needs to reshape how it delivers government services. Texans have become accustomed to instant and responsive user experiences in other areas of their lives, and the traditional bureaucratic methods of government are often out of touch. Texans don’t just want to wait in shorter lines — they want to renew licenses and obtain valuable information online and on their phones. This is a different issue than simply upgrading the technology platforms where state government keeps data. It represents a new priority: to use digital data in ways that save time for Texans, provide faster and better information, and serve the needs of residents as the top priority. Texas needs a modern digital infrastructure that automates processes, reduces duplication, and delivers services using the very best of new technologies.

As an early step, the Texas.gov website now offers more than 1,000 online services to Texans. To take one example: while only 900,000 tax filers with the Texas Comptroller’s Office filed online in 2007, program improvements enabled over 5.4 million returns to be filed electronically in 2017. Moving forward, Texas has many more opportunities to transform its customer services, using user-friendly methods to save Texans time and increase satisfaction.

User satisfaction: Percentage of population using government services who indicate they are satisfied with digital services

Target
By 2036, Texas will make progress in improving digital customer service and will be among the top Peer States in quality and satisfaction.

Indicator Background
National magazines and professional associations are developing assessments of innovative digital applications that reduce the time and cost of accessing some government services. These reports are compilations of progress rather than detailed benchmarks, but Texas has made progress in some of these early surveys of best practices. This target assumes that an effective measurement of progress can be developed in the near future but does not exist at this time. Texas 2036 will encourage the state to engage all interested Peer States in an effort to adopt a common set of high-priority standards for digital customer services.

Target Background
Texas will make progress on all aspects of digital customer service and be among the top Peer States when a national measure is established.
Other Indicators Texas 2036 is monitoring:

**Govtech index:** State ranking on Govtech Digital States Survey

**Digital take-up rate:** Percentage of government interactions with users happening online

**Cost to serve:** IT spend for digital services/number of users

**Connections**

This goal is connected to the value of state services and spending (Goal #32) and the respect and engagement from Texas residents who are served by state government (Goals #29 and #30).
GOAL 36
Aligned Accountability
Texas Officials at All Levels Collaborate Well.

Texas Today and Tomorrow

State and local governments often find it difficult to jointly plan and deliver key services to Texans. There are many reasons for this, including political polarization and jurisdictional overlap. State officials are accused of meddling in local affairs, while local officials are charged with encroaching on areas that historically belonged to the state. Local governments sometimes represent that they are on the hook for services for which they have inadequate funding, while the state struggles to define and monitor services and laws which should be applied uniformly across Texas.

Planning and delivery of many services have been done well in various regional collaborations and user groups. These can be good models to use to improve statewide collaboration efforts. Texas needs to invest its energy and leadership skills in renewing an updated model for collaboration across all levels of government.

Results through teamwork: Texas maintains a model partnership between state and local governments to plan, fund, and deliver effective services jointly as needed

Target
By 2036, Texas governments will have clear roles and shared responsibilities for serving Texans, regularly performing rubric-based self-assessments to monitor progress toward achieving this goal.

Indicator Background
There is no defined set of practices that clearly establishes how state and local governments interact. There are written constitutional and statutory rules and court decisions, as well as informal traditions. Every state is different, and what works in one state may not apply in many others. In addition, the pace of change is creating new pressures on Texas laws and customs. A careful discussion will be needed, with considerable support from state and local officials, to define better ways to work together. Accountability for better teamwork can come into play only after some effort is put into an updated set of guidelines for collaboration. Almost every major service need discussed in this Framework anticipates that Texas will find ways to avoid the gridlock that often stymies action at the national level. Texas has the opportunity to make teamwork an exception to national norms.

Target Background
Until discussions produce a roadmap, it is not clear what the best measure of improvement in intergovernmental teamwork will be. The results may surface in public confidence surveys, voter participation, or productive legislative sessions. An appropriate target can be set after a broad participatory process to define areas of needed improvement.
Connections

Successful collaboration between the state government and local entities impacts many of Texas 2036’s strategic goals. The state provides the legal framework and some funding for educational services but relies on local school boards for implementation (Goals #3 and #4). The state regulates water rights and authorizes water districts to implement services in state water plans (Goals #20 and #21). The civil and criminal legal system is framed in the state constitution and statutes, and state courts interact with county and municipal courts (Goal #28). The state provides major transportation funding and builds and maintains parts of transportation networks, but local governments plan the interconnections with city and county roads and transit services (Goal #13). In emergency responses — whether to floods, tornadoes, chemical spills, or health pandemics — state, city, county, and education institutions plan for coordinated services and work closely together (Goal #18).
Cross-Cutting Theme: Equity

As state policies and economic growth improve quality of life for Texans, it's important that all Texans — regardless of their race, gender, age, or zipcode — have the opportunity to share in these gains. Although Texas has been a great place to live and work for many people for generations, not all Texans have had the opportunity to equally participate in the growth and success of Texas. Though all Texans are affected by these inequities, many communities disproportionately bear the impact. The younger and more diverse population transforming our state's demographics provides Texas an opportunity for innovative, systemic, and sustained approaches for developing our institutions to better serve all Texans.

Education achievement gaps exist by race and economic status. Texas traditionally has had a stratified education system in which some student groups achieve nationally competitive results while others — particularly students of color and those from low-income families — fall behind. For example, according to the National Assessment of Educational Progress (NAEP), only 16% of Black 4th graders and 21% of Hispanic 4th graders read on grade level, compared to 48% of white 4th graders.\[08-01\] These results indicate a school system in Texas that has historically underserved the very students who rely on it most for economic opportunity and upward mobility. House Bill 3 in 2019 represented a major step by the Legislature to address this historical inequity, driving resources — including both additional funding and access to high-quality teachers — to school districts based on identified student needs rather than the property values surrounding the students' homes. Implementation is still in the early days and progress should be closely monitored, In advancing a more equitable education system, every student should have access to resources and rigor to help them achieve success, and school districts should be accountable for eliminating equity gaps.

Gaps in postsecondary readiness, enrollment, and completion rates are even more pronounced for disadvantaged student groups in Texas. Only 16% of Black high school graduates in Texas and 18% of Hispanic graduates meet postsecondary readiness criteria on the SAT or ACT, compared to 43% of white graduates.\[08-02\] Similarly wide disparities exist for postsecondary enrollment and completion, indicating that Texas' education system is not preparing students for success in postsecondary programs or for the job market.

To ensure Texans have longer, healthier lives, Texas will also have to address health disparities based on race and income. Only 61% of Hispanic adults reported having a usual care provider in 2018, versus 71% of Black adults and 77% of white adults.\[08-03\] Additionally, there were 166 deaths from treatable conditions reported per 100,000 among the Black population in 2017, versus only 90 among white and 86 among Hispanic populations.\[08-04\] These facts suggest a healthcare system that is unaffordable or inaccessible to all Texans.

Existing income disparities are reflected in broadband subscription patterns creating digital inequities across the state. Some of this has been caused by a
lack of infrastructure in rural areas. Other disparities have been created because of income. Only 46% of Texas households earning less than $20,000 annually subscribe to fixed broadband, compared to 82% of households earning more than $75,000.

As COVID-19 has shifted schools, healthcare providers, and employers from physical to virtual environments, this lack of digital equity threatens to exacerbate pre-existing disparities in educational achievement, health, and employment due to the opportunities for e-learning and telemedicine. As the state continues to evolve after COVID-19, all Texas communities will need access to broadband for residents to fully engage in civic life and to avail themselves of career, educational, and health care opportunities. Digital equity and inclusion require strategies that ensure access to cost-effective and robust broadband internet service in both urban and rural areas.

Many of Texas 2036 performance indicators reflect further inequities. We are committed to disaggregating data in order to bring to view disparities masked by aggregate data. Income inequality indices, housing affordability, and Texans living in poverty are a few of the additional indicators we are working to make available to the public and policy makers. Accurate data is critical to understanding and addressing the challenges facing Texans now and in the future.

Summary of goals included in cross-cutting theme

Quality of life: Texas is the best place to live and work

Early learning: Texas children get a strong early start to succeed in school and life.

K-12: Texas students graduate high school ready for postsecondary success.

Postsecondary: Texas students earn a postsecondary credential to access the jobs of today and tomorrow.

Jobs: Texans have the knowledge and skills to access careers enabling economic security.

Availability of health care: Texans have access to basic health care.

Affordability of health care: Texans are able to afford the basic health care they need.

Population health: Texans live long, healthy, and productive lives.

Public health: Texans and their communities are empowered to adopt healthy lifestyles.

Mobility of individuals: Texans can travel to their destinations effectively and efficiently.

Digital connectivity: Texans can digitally participate in economic opportunities and essential services.
Crisis Readiness: Texas is ready to address the human, economic, and environmental consequences of natural disasters and hazards.

Quality of air: Texans have clean air.

Quality of water: Texans have clean water.

Parks and Wildlife: Texans enhances and protects its state parks, public and private open spaces, and wildlife.

Public safety: Texans are protected from threats to their well-being and property.

Protection for the vulnerable: Texas protects the vulnerable from traumatic experiences.

Safety net: Texans have access to resources to meet basic needs when they are in crisis.

Justice system: Texans are served effectively, efficiently, and impartially by the justice system.

Civic engagement: Texans actively participate in governing their communities.

Broad and stable revenue base: Texas residents and businesses contribute taxes and fees to meet strategic needs and remain competitive as we grow and change.

Talent in government: Texas government attracts and retains the critical talent to deliver excellent service and get results.
Cross-Cutting Theme: Rural

Rural communities are vital to Texas’ economic health, providing food, fiber, energy, and talent. Texas’ rural population of 3 million people is larger than the population of 18 states. From West to East Texas, from the Panhandle to the Valley, Texas’ rural communities are home to 10% of all Texans, as well as key industries such as agriculture and energy production. In 2018, oil and gas production contributed $162 billion — or 9% of Texas’ GDP — to the state, with the two largest production fields located in rural Texas. Texas agriculture production, which provides a critical portion of the U.S. food supply, contributed $25.3 billion to the Texas economy in 2018. Rural communities also frequently demonstrate the entrepreneurial values and economic drive that have made Texas successful. Rural small businesses make up 24% of all business in the state of Texas, contributing more than 20% of the state’s economic output. Nonetheless, Texans in rural communities face unique challenges; overcoming them will be critical to achieving many of the goals outlined in this Strategic Framework.

Students in rural communities have less access to postsecondary education. Over half of the independent school districts in Texas are located in rural areas, enrolling nearly 840,000 students — the most rural students in the nation. However, these students do not always have access to the advanced coursework they need to be postsecondary ready; nearly 60% of rural districts do not offer Advanced Placement courses. Similarly, rural students have additional challenges accessing higher education institutions; for example, in West Texas, the average distance from a high school to a higher education institution is 39 miles — but in some areas, that distance can be as much as 141 miles.

Rural areas face both a lack of access to health care and worsening outcomes. Texas ranks last among Peer States in rural access to care. Sixty-three Texas counties have no hospitals, and thirty-five have no primary care physicians. Health behaviors leading to obesity — and obesity itself — are more common in rural regions versus urban areas. For these reasons, health outcomes are poor, with rural Texans dying of heart disease and stroke at rates far higher than Texans overall.

Lack of broadband internet access prevents rural areas from tapping into critical services and economic opportunities. Broadband access is central to improving health, education, and economic outcomes in rural areas, delivering telemedicine, online learning, and remote work services. Nearly one-third of all rural Texans do not have internet access at adequate speeds (as defined by the Federal Communications Commission), compared to just 3% of Texans in urban areas. These disconnected households cost the state an estimated $5.1 billion in lost potential economic activity.
Rural areas often lack the infrastructure and resources they need. Rural roads see a greater proportion of traffic fatalities and are more likely to be in poor condition than in the rest of the state. Small water systems, which often serve rural areas, are more likely to have violations and are less likely to have adequate monitoring. And limited investment in water management projects reduces the available water supply that can be used for agriculture.

**Summary of goals included in cross-cutting theme**

**Early learning:** Texas children get a strong early start to succeed in school and life.

**K-12:** Texas students graduate high school ready for postsecondary education success.

**Postsecondary education:** Texas students earn a postsecondary education credential to access the jobs of today and tomorrow.

**Availability of health care:** Texans have access to basic health care.

**Population health:** Texans live long, healthy, and productive lives.

**Public health:** Texans and their communities are empowered to adopt healthy lifestyles.

**Transportation safety:** Texas maintains a safe transportation infrastructure.

**Digital connectivity:** Texans can digitally participate in economic opportunities and essential services.

**Crisis readiness:** Texas is ready to address the human, economic, and environmental consequences of natural disasters and hazards.

**Sufficient water:** Texans can rely on a sufficient water supply.

**Quality of water:** Texans have clean water.

**Agricultural production:** Texas leads in agricultural production with responsible natural resource stewardship.

**Energy production:** Texas leads in energy production with responsible natural resource stewardship.

**Safety net:** Texans have access to resources to meet basic needs when they are in crisis.
Cross-Cutting Theme: Children

Texas depends on the success of its children. There are currently 7.4 million children in Texas — 26% of the state population.[08-23] Nearly 50% of the state’s children are Hispanic, while 40% of all Texans are; this difference reflects a major ongoing demographic shift.[08-24]

Too few children are prepared for the jobs of the future, which will require a highly educated workforce. By 2036, 71% of jobs will require a postsecondary credential,[08-25] but Texas children are not being equipped to access these economic opportunities. Only 50% of high school students are postsecondary ready,[08-26] and only 32% actually go on to complete a postsecondary credential within six years of graduation.[08-27]

Children face unique health challenges. Texas has the highest rate of uninsured children in the country.[08-28] Over the last 20 years, the state has seen an increase in the number of newborns with low birthweight, which is a predictor of poor health outcomes later in life.[08-29] Texas is ranked 11th among 12 Peer States for childhood obesity, although that rate has been decreasing.[08-30] Additionally, one-in-ten Texas children has asthma, which is exacerbated by issues with air quality.[08-31]

Lifetime opportunities for many Texas children are limited by poverty, trauma, and other adverse experiences that lead to major challenges in adulthood. Nearly 20% of Texas children live in poverty,[08-32] with gaps in basic needs such as food and housing. Additionally, one-in-five children have experienced traumas that are likely to lead to chronic health issues, mental illness, and job instability later in life.[08-33][08-34]

Prudent state budget practices will necessitate that lawmakers pursue strategies with the highest returns on taxpayer investment. Investing in children can save the state significant costs in the long run. On average, a person with a bachelor’s degree earns roughly $1 million more ($2.3 million) in their lifetime than someone with just a high school diploma ($1.3 million).[08-35] Healthy, educated children become productive, taxpaying adults.

Summary of goals included in cross-cutting theme

Early learning: Texas children get a strong early start to succeed in school and life.

K-12: Texas students graduate high school ready for postsecondary success.

Postsecondary: Texas students earn a postsecondary credential to access the jobs of today and tomorrow.

Availability of health care: Texans have access to basic health care.

Population health: Texans live long, healthy, and productive lives.
Public health: Texans and their communities are empowered to adopt healthy lifestyles.

Quality of air: Texans have clean air.

Protection for the vulnerable: Texas protects the vulnerable from traumatic experiences.

Safety net: Texans have access to resources to meet basic needs when they are in crisis.

Wisely managed state spending: Texas strategically manages state expenditures to deliver the best value to taxpayers.
Reading the Data Visualizations

This framework draws from numerous sources, each of which has its own way of collecting and reporting data. In order to provide a more cohesive presentation of the data and information in this report, Texas 2036 developed standards and processes for presenting data and information. This section provides a summary of how to read the indicator glyphs and visual models used in this document.

Indicator Glyphs

Each indicator has some overall information that is summarized in a small table; the main takeaways are:

- Baseline: Absolute value of the indicator based on most recent data point
- Target: Desired value for the indicator
- Benchmark: Value against which the actual value is compared
- Trend: Percent change of the indicator over 2+ most recent data points
The Baseline colors are based on the comparison of Texas and its Peer States as defined in the following table:

<table>
<thead>
<tr>
<th>Target Rank for Texas among Peer States</th>
<th>Baseline Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>On Target</td>
</tr>
<tr>
<td>First</td>
<td>Rank: 1</td>
</tr>
<tr>
<td>Top 3</td>
<td>Rank: 1 - 3</td>
</tr>
<tr>
<td>Top 6</td>
<td>Rank: 1 - 6</td>
</tr>
<tr>
<td>Top 9</td>
<td>Rank: 1 - 9</td>
</tr>
</tbody>
</table>
The **Bar chart** displays information as a categorical aggregate; the compared values are different but are hierarchically equivalent. In particular, the bar charts enable us to compare different indicators that share the same context and same category or location.
The Line chart displays information as a time series, where single data points are simply connected by a line. It's particularly useful to show changes over short and long periods; given different needs, different aggregations can be displayed and the ticks of the axis could be distanced by different amount of time.

When smaller changes exist, it’s better to use line graphs than bar graphs. Line graphs can also be used to compare changes over the same period of time for more than one group.

Cartography directly recalls existing geographical patterns to the reader and gives them instant knowledge; choropleths are very useful to show big picture information while relying on the user's knowledge about the plotted location's various social and economical background.
Notes & Sources

Introduction
[00-01] Texas Demographic Center, Texas Population Projections Program, Population Projections for the State of Texas in 1-year increments, 2036 value. https://demographics.texas.gov/data/TPEPP/Projections/Index


[00-05] Ibid


[00-08] Texas Demographic Center, Texas Population Projections Program, Population Projections for the State of Texas in 1-year increments, 2036 value. https://demographics.texas.gov/data/TPEPP/Projections/Index

[00-09] Based on percent change from 2018 to 2036. Texas Demographic Center, Texas Population Projections Program, Population Projections for the State of Texas in 1-year increments, 2036 value. https://demographics.texas.gov/data/TPEPP/Projections/Index

[00-10] White population projected to increase by approximately 9% between 2018 and 2036. Texas Demographic Center, Texas Population Projections Program, Population Projections for the State of Texas in 1-year increments, 2036 value. https://demographics.texas.gov/data/TPEPP/Projections/Index


[00-12] Based on percent change from 2018 to 2036. Texas Demographic Center, Texas Population Projections Program, Population Projections for the State of Texas in 1-year increments, 2036 value. https://demographics.texas.gov/data/TPEPP/Projections/Index


[00-14] Ibid


[00-20] Ibid

[00-21] Ibid


[00-23] Based on annual percent change in Real Gross Domestic Product (GDP). U.S. Bureau of Economic Analysis, Gross Domestic Product by State, Table 1. Percent change in Real Gross Domestic Product by State, 2019 Annual. https://www.bea.gov/data/gdp/gdp-state


[00-31] Based on net domestic migration gain, calculated as total gain in population from other states minus total loss in population to other states for people who lived in a different residence a year ago. 2018 American Community Survey 1-Year Estimates, State-to-State Migration Flows, Table 1. Current State of Residence with Different State of Residence 1 Year Ago. https://www.census.gov/data/tables/time-series/demo/geographic-mobility/state-to-state-migration.html


[00-37] Overall rank calculated as unweighted average of scores for three

[01-11] The assessment reflects the most current data at the time of this printing and may not reflect the current market trends. Please visit the Texas 2036 Data Lab to see the most current data. [01-add url]


[01-13] In 2018, Texas was #3 among peers states and tied for 5th in the nations with 4.6% real GDP growth. Washington led among Peer States and the nation with 5.6% growth. In 2017, Texas was #6 among Peer States and #12 in the nation with 2.9% real GDP growth; Washington led among Peer States and the nation with 5.2% growth


[01-17] Based on total number of domestic and international migrants from 2015 to 2017. The Dallas Morning News, Import talent or grow your own? As the flow of migrants slows, Texas needs both. 2018. https://www.dallasnews.com/opinion/editorials/2018/05/07/import-talent-or-grow-your-own-as-the-flow-of-migrants-slows-texas-needs-both/


[01-20] Based on Quality-of-Life ranking on Forbes "Best States for Business" Index, which includes factors such as cost of living, education, health, crime, commute times, weather, cultural and recreational opportunities. Forbes "Best States for Business," 2019. https://www.forbes.com/best-states-for-business/list/

[01-21] Ranked thirtieth in 2017 and ninth in 2018

[01-22] Peer States ranked above Texas include Virginia (ranked first), Ohio (second), Colorado (sixth), Illinois (eleventh), Pennsylvania (twelfth), New York (fourteenth)

Pillar 02 - Education & Workforce

[02-01] Georgetown University Center on Education and the Workforce, Custom Projection for Texas 2036, March 2020

[02-02] Percentage of Class of 2011 high school graduates who earned a certificate or degree from a higher education institution within six years of high school graduation; includes Level 1 and Level 2 certificates, two-year degrees, and four-year degrees. Texas Education Agency, Texas Academic Performance Report, 2017-18 State Postsecondary Outcomes Summary. https://ptsvr1.tea.texas.gov/cgi/sas/broker?_service=marykay&debug=0&who_box=&who_list=_STATE


[02-08] Workers with a postsecondary degree or credential account for 80% of good jobs in the United States; workers with a high school diploma or less account for 20% of good jobs. Georgetown University Center on Education and the Workforce, “Three Educational Pathways to Good Jobs,” 2018. https://gyhqoq79uf49s42y9x7n8wrjv-wperengine.netdna-ssi.com/wp-content/uploads/3ways-FR.pdf


[02-12] Ibid

[02-13] Ibid


[02-16] Ibid


[02-18] Ibid.


[02-20] Based on percentage of students categorized as ever received Pell and within one or two years of graduation. Texas Higher Education Coordinating Board, 2019 Texas Public Higher Education Almanac, Enrollment of Economically Disadvantaged Students. https://reportcenter.thecb.state.tx.us/agency-publication/almanac/2019-texas-public-higher-education-almanac/


[02-24] Ibid


[02-28] 52.6% Hispanic, 60.6% economically disadvantaged, 19.5% English Learners. Texas Education Agency, Texas Academic Performance Report, 2018-19 State Student Information. https://tea.texas.gov/student-testing-and-accountability/accountability/state-accountability/performance-reporting/texas-0


[02-33] Ibid


[02-36] Ibid


[02-39] Georgetown University Center on Education and the Workforce, Custom Projection for Texas 2036, March 2020


[02-41] Statewide STAAR “meets grade level” or higher rates in 3rd grade reading were 45% in 2017 and 43% in 2018


[02-45] 28% in 2009, 28% in 2011, 28% in 2013, 31% in 2015, and 29% in 2017


[02-50] 28.3% for Class of 2018; percentage of annual graduates at or above criterion on SAT/ACT (530 on the mathematics section of the SAT and 480 on the evidence-based reading section; composite score of 23 on ACT). Texas Education Agency, Texas Academic Performance Report, 2018-19 State CCMR-Related Indicators: SAT/ACT Results (Annual Graduates). https://tea.texas.gov/student-testing-and-accountability/

[02-51] 20.4% for Class of 2018; percentage of annual graduates of Class of 2018 that met the College Ready indicator of AP/IB Met Criteria in Any Subject (score of 3 or higher on AP, 4 or higher on IB). Texas Education Agency, Texas Academic Performance Report, 2018-19 State College, Career, and Military Readiness (CCMR): College Ready Graduates. https://tea.texas.gov/student-testing-and-accountability/accountability/state-accountability/performance-reporting/texas-0


[02-53] Ibid


[02-55] College-ready indicators include meeting Texas Success Initiative (TSI) criteria in both ELA and mathematics based on meeting college ready criteria on TSI assessment, SAT, ACT, or successfully completing and earning credit for a college prep course in both ELA and mathematics; meeting criterion score on AP (score of 3 or higher) or IB (score of 4 or higher) examination in any subject area; completing and earning dual course credit for at least three credit hours in ELA or mathematics or at least nine credit hours in any subject; completing an OnRamps dual enrollment course and qualifying for at least three hours of university or college credit in any subject area; earning an associate degree prior to graduation from high school


[02-57] Based on AP Examination Participation of students in Grades 9-12 from 2013-14 to 2017-18. Texas Education Agency, Advanced Placement and International Baccalaureate Examination Results in Texas Public Schools,


[02-60] Fall of 2018 total dual credit enrollment (152,569 students) taken as a percentage of total 9th-12th graders enrolled in Texas Higher Education Coordinating Board, Dual Credit and Total Enrollment, Fall Semesters, 2017-18. http://www.txhighereddata.org/index.cfm?objectid=AE9A640-D971-11EB-BB650050560100A9


[02-65] Georgetown University Center on Education and the Workforce, Custom Projection for Texas 2036, March 2020


[02-67] 47% in 2017

[02-68] Georgetown University Center on Education and the Workforce, Three Educational Pathways to Good Jobs, 2018. https://cew.georgetown.edu/cew-reports/3pathways/

[02-69] Georgetown University Center on Education and the Workforce, Custom Projection for Texas 2036, March 2020

[02-70] Percentage of Class of 2011 high school graduates who earned a certificate or degree from a higher education institution within six years of high school graduation; includes Level 1 and Level 2 certificates, two-year degrees, and four-year degrees. Texas Education Agency, Texas Academic Performance Report, 2017-18 State Postsecondary Outcomes Summary. https://rptsvr1.tea.texas.gov/cgi/sas/broker?_service=marykay&_debug=0&single=N&batch=N&napp=PUBLIC&ctype=H4_program=perfrep.perfmast.sas&level=state&search=distnum&namenum=&prgopt=2019/tapr/ps_outcomes_sum.sas

[02-71] Percentage of Class of 2011 high school graduates who earned a certificate or degree from a higher education institution within six years of high school graduation; includes Level 1 and Level 2 certificates, two-year degrees, and four-year degrees. Texas Education Agency, Texas Academic Performance Report, 2017-18 State Postsecondary Outcomes Summary. https://rptsvr1.tea.texas.gov/cgi/sas/broker?_service=marykay&_debug=0&single=N&batch=N&napp=PUBLIC&ctype=H4_program=perfrep.perfmast.sas&level=state&search=distnum&namenum=&prgopt=2019/tapr/ps_outcomes_sum.sas

[02-72] Ibid

[02-73] Level 1 certificates awarded for programs of at least 15 semester credit hours, Level 2 for at least 30 semester credit hours; examples of certificates include Heating, Air Conditioning, and Refrigeration; Manufacturing Technology; Business Administration

[02-74] Percent of Class of 2011 high school graduates who earned a certificate or degree from a higher education institution within six years of high school graduation; includes Level 1 and Level 2 certificates, two-year degrees, and four-year degrees. Texas Education Agency, Texas Academic Performance Report, 2017-18 State Postsecondary Outcomes Summary. https://rptsvr1.tea.texas.gov/cgi/sas/broker?_service=marykay&_debug=0&single=N&batch=N&napp=PUBLIC&ctype=H4_program=perfrep.perfmast.sas&level=state&search=distnum&namenum=&prgopt=2019/tapr/ps_outcomes_sum.sas

[02-75] Ibid


[02-80] Georgetown University Center on Education and the Workforce, Custom Projection for Texas 2036, March 2020


[02-82] 33% for Class of 2009, 32% for Class of 2010, 32% for Class of 2011


[02-85] Ibid

[02-86] Ibid


[02-90] Ibid

[02-91] 59% of Texas households earned a living wage in 2014

[02-92] Based on comparison to selected Peer States [Texas, California, Colorado, Florida, Georgia, Illinois, New York, North Carolina, Pennsylvania, Ohio, Virginia, and Washington]; Top 3 Peer States include a tie between Washington (64%) and Illinois (64%) and Pennsylvania (60%). Based on United Way ALICE Project data (most recent for each state). https://www.unitedforalice.org/national-comparison


[02-96] Texas Demographic Center, Texas Population Projections Program, Population Projections for the State of Texas in 1-year increments, 2036 value. https://demographics.texas.gov/data/TPEPP/Projections/Index

[02-97] Assumes same labor force participation rates and migration rates similar to 2000-2010.

**Pillar 03 - Health**

[03-01] Basic health care includes emergency services, hospitalization, outpatient care, laboratory and radiology services, prescription drugs, rehabilitative services and devices, pregnancy, maternity, and newborn care, and treatment of mental illness and/or substance abuse (including counseling), as well as preventative services (e.g. screening tests, immunizations, and pediatric oral and vision care). U.S. Centers for Medicare & Medicaid Services, National Prevention Strategy, Office of the Surgeon General, 2011 (https://www.hhs.gov/sites/default/files/disease-prevention-wellness-report.pdf)


[03-13] Ibid


[03-15] Medicaid uses the same qualification for disability as the Social Security Administration; adults with disabilities include individuals with medical conditions that significantly limit their ability to do basic work — such as lifting, standing, walking, sitting, and remembering — for at least 12 months. Texas Health and Human Services Commission, The Texas Medicaid and CHIP Reference Guide, 2018. https://hhs.texas.gov/services/health/medicaid-chip/about-medicaid-chip/reference-guide

[03-16] Ibid


[03-28] Texas 2036 analysis of Texas Department of State Health Services Data, Primary Care Physicians, 2019

[03-29] Approach based on U.S. Census designation of counties without metro-area (*non-metro counties) as “rural,” versus counties with metro area as “urban;” list of non-metro counties provided by The Federal Office of Rural Health Policy (FORHP)


[03-31] Level I and Level II trauma centers are verified by the American College of Surgeons to be able to provide care for any injury; these centers are more advanced than Level III and Level IV trauma centers, which are only verified to assess and stabilize patients with very serious injuries prior to transfer to a more advanced center. Texas State Health Plan, 2019 - 2020


[03-34] Low-income defined as 0%-199% of federal poverty level income. Ibid


[03-36] The ratio has improved from 1,660:1 in 2016 and 1,670:1 in 2015

[03-37] Currently, Peer States ranked in the Top 3 include Washington (1180:1), Colorado (1220:1), and New York (1220:1)


[03-39] From 2017 to 2019, all Peer States significantly improved the population to mental health care provider ratio, likely due to increasing awareness of and demand for mental health care; in Texas, the ratio decreased by approximately 13%

[03-40] Currently, Peer States ranked in the Top 3 are, in descending order, Washington (270:1), California (280:1), Colorado (280:1), New York (350:1), North Carolina (410:1), and Ohio (410:1)


[03-42] Ibid

[03-43] Baseline has remained between 67% to 69% since 2011. Ibid

[03-44] Currently, Peer States ranked in the Top 3 are, in descending order, Pennsylvania (85%), Illinois (82%), and New York (80%)


[03-49] Kaiser Family Foundation presentation of data from the Agency for Healthcare Research and Quality, Center for Financing, Access and Cost Trends, Medical Expenditure Panel Survey (MEPS), Insurance Component, https://www.kff.org/other/state-indicator/family-coverage/?currentTimeframe=0&sortModel=%7B%22colId%22:%22Location%22,%22sort%22:%22asc%22%7D

[03-50] Currently, Peer States ranked in the Top 3 include Pennsylvania (9%); Illinois (82%), and New York (80%)

[03-51] The Bureau of Labor Statistics defined medical commodities as medicinal drugs, medical equipment, and medical equipment and supplies (e.g., brace, inhaler, wheelchair, at home medical tests, needles); this excludes personal care products like anti-aging produce, feminine hygiene products, and sports equipment


[03-54] Institute of Medicine, America's Uninsured Crisis: Consequences for Health and Health Care, February 2009. http://www.nationalacademies.org


[03-58] "Care" in this context includes the aggregated totals of: "Skipped dental care or checkups" (43% for all Texas households), "Put off or postponed getting health care they needed" (44% for all Texas households), "Skipped a recommended medical test or treatment" (33% for all Texas households), "Not filled a prescription for a medicine" (3%), "Cut pills in half or skipped doses of medicine" (22%), and "Had problems getting mental health care" (15% of all Texas households)

[03-59] Kaiser Family Foundation analysis U.S. Census Bureau Data. State Health Facts, Health Insurance Coverage of the total population, 2018. https://www.kff.org/other/state-indicator/family-coverage/?currentTimeframe=0&sortModel=%7B%22colId%22:%22Location%22,%22sort%22:%22asc%22%7D

[03-60] Ibid


[03-62] Ibid


[03-67] See, e.g., Executive Order 13813 (October 2017) and Executive Order 13877 (June 2019)


[03-70] Question text: "Was there a time in the past twelve months when you needed to see a doctor but could not because of cost?" The "Behavioral Risk Factor Surveillance System" survey is conducted annually via telephone with a sample of approximately 400,000 U.S. residents


[03-72] The percentage of Texans reporting that they skipped medical care due to cost has dropped significantly since 2011 (23%); this number generally correlates with and slightly lags the rate of uninsured

[03-73] Currently, Peer States ranked in the Top 3 include Pennsylvania (9%),
Ohio (10%), and New York (11%), in that order


[03-75] Currently, Peer States ranked in the Top 6 are, in descending order, New York (5.4%), Pennsylvania (5.5%), Washington (6.4%), Ohio (6.5%), Illinois (7.0%), and California (7.2%)


[03-77] According to the Robert Wood Johnson Foundation population health model

[03-78] According to the Robert Wood Johnson Foundation population health model, remaining 10% determined by physical environment (i.e., water quality, air quality)


[03-84] Ibid


[03-87] Very little change from 2013 life expectancy at birth in Texas (78.3)

[03-88] Currently, Peer States ranked in the Top 3 are California (81.6), New York (81.3), and Colorado (80.5), in that order

[03-89] “Premature death” is considered to be death before age 75. Causes considered at least partially treatable or preventable with timely and appropriate medical care for children (age 0 to 14)—infection, welling cough, measles and respiratory disease; for adults (until age 74)—tuberculosis, tetanus, diphtheria, septicemia, polio, multiple types of cancer, epilepsy, diabetes, heart disease, influenza, pneumonia, appendicitis, abdominal hernia, gallstones, kidney disease, and any death due to malpractice or during a medical care, including surgery and birth (for both mother and child)


[03-92] Number of premature deaths from treatable medical conditions per 100,000 population dropped from 98 in 2009 to 92 in 2011; over 2011 to 2017, the rate increased from 92 to 95, and has been stable at 95 since 2013

[03-93] Currently, Peer States ranked in the Top 3 are Colorado (62), Washington (63), and California (71); in that order


[03-98] In 2017, 8.1% of births in Texas had low birth-weights, compared to 8.4% in 2015. United Health Foundation, America’s Health Rankings, Low birthweight, 2017. https://www.americashealthrankings.org/explore/annual/measure/birthweight/state/TX

[03-99]Rate of babies born in Texas under 5.5 lbs. has been steadily increasing since the early 1990’s

[03-100] Currently, Peer States ranked in the Top 3 are, in descending order, Washington (6.6%), California (6.9%), and New York (8.1%)


[03-106] Texas’ rate of child immunizations declined from 71% in 2016 to 68% in 2017

[03-107] Virginia (77%) leads the Top 6 rankings for child immunizations, followed by Florida (76%), Illinois (75%), Colorado (71%), North Carolina (71%), and Pennsylvania (70%)


[04–56] Total freight movement has increased year-over-year since 2016 and is up from 1.03T ton-miles in 2013

[04–57] The Top 3 rankings are, in descending order, Texas (1.27), California (0.77), and Illinois (0.57)


[04-88] The top 6 rankings are, in descending order, New York (98%), Washington (97%), California (97%), Florida (96%), Pennsylvania (95%), and North Carolina (95%)

[04-89] Measured using percentage of respondents indicating they have “broadband such as cable, fiber optic or DSL.” United State Census Bureau, 2018 American Community Survey, Percentage of Households with Subscription to Any Broadband Service. https://data.census.gov/cedsci/table?tid=ACSST3Y2018.S2801&vintage=2018

[04-90] Broadband subscription has increased year over year since 2015 (62.7%)

[04-91] Rankings are, in descending order, Washington (77%), second, Colorado (76%), third, California (75%), fourth, New York (73%), fifth, Pennsylvania (72%), and sixth, Florida (71%)


[04-105] Calculated as firm peak load divided by total capacity, and uses peak demand times reported by the Electric Reliability Council of Texas (ERCOT) seasonally. Cannot benchmark against Peer States due to independent Texas demand/texas-power-prices-nearly-triple-to-record-high-as-heat-bakes-state-idUSKCN1V61CG

[04-106] The ERCOT reserve margin has slightly declined from 13% in 2014 but is expected to improve in 2020


[04-109] Average price per kWh decreased by less than 1% from 2016 to 2017, and increased by 1% 2017 to 2018

[04-110] Rankings are first, Washington (8.00), second, Texas (8.48), third, North Carolina (9.25), fourth, Virginia (9.48), fifth, Illinois (9.60), and sixth, Georgia (9.60)


[04-121] Index uses 140 measures grouped in to 6 domains (detection and incident management, healthcare delivery, countermeasure management, environmental and occupational health) against multiple threats (e.g., cybersecurity incidents, resurgent and newly emerging infectious diseases, political instability, violence, and terrorism risks, and growing antibiotic resistance). National Health Security Preparedness Index, 2017-2019. https://nhspi.org/

[04-122] Updated data sets will be considered in the aftermath of the COVID-19 pandemic

[04-123] The normalization method employed in the 2019 Index uses the maximum state value to define the upper boundary or “frontier” of preparedness for each measure; NHSPI defines “optimal” preparedness based on observed state values rather than based on a theoretical maximum value

[04-124] Overall preparedness score has increased 12.3% since 2013, from 5.8

[04-125] Rankings are first, Virginia (7.2), second, Colorado (7.1), third, New York (6.9), Florida, Georgia, Pennsylvania, North Carolina, and Illinois (6.7) tied for eighth, and Texas and Washington (6.5) tied for ninth

Pillar 05 - Natural Resources

[05-02] Environmental Protection Agency, "Particle Pollution and Your Patients' Health, Particle Pollution Exposure." https://www.epa.gov/pmcourse/particle-pollution-exposure


[05-06] Acre-feet is a common measure of water. One acre-foot is the amount of water it would take to flood one acre to the depth of one foot


[05-18] Ibid


[05-21] Ibid


https://3hr27o3s9jn8m84dw4489f13-wpengine.netdna-ssl.com/wp-content/uploads/2020/03/ClimateReport-1900to2036-1.pdf

[05-25] Ibid


[05-34] Environmental Protection Agency, Criteria Air Pollutants, NAAQS Table. https://www.epa.gov/criteria-air-pollutants/naaqs-table


[05-38] Nonattainment areas designated by EPA based on air quality monitoring data, recommendations submitted by the states and tribes, and other technical information; one nonattainment area may consist of multiple adjacent counties failing to meet NAAQS standards. Environmental Protection Agency, Criteria Pollutant Nonattainment Summary Report, 2019. https://www3.epa.gov/airquality/greenbook/anci3.html

[05-39] Percentage of population living in nonattainment zones increased by 8ppt, up from 2016 to 2018

[05-40] Rankings are first Washington (0.0%), second, North Carolina (0.0%), third, Florida (10.5%), fourth, Virginia (29.6%), fifth, Georgia (39.1%), and sixth, Ohio (54.6%)


[05-43] Ibid


[05-45] Commission on Environmental Quality, Information Request, April 2019


100,000 as "large," and more than 100,000 as "very large." as "very small," 501-3,300 as "small," 3,301 to 10,000 as "medium," 10,001 to

Ibid. The EPA classifies systems serving a population of 25 to 500 as "very small," 501-3,300 as "small," 3,301 to 10,000 as "medium," 10,001 to

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[05-90] Ibid.


[05-92] Texas Department of Agriculture, Texas Ag Stats. 2017 https://www.texasagriculture.gov/About/TexasAgStats.aspx


[05-97] Ibid


[05-99] Ibid

[05-100] Ibid

[05-101] Ibid

[05-102] Ibid

[05-103] Ibid

[05-104] Ibid

[05-105] Ibid

[05-106] Ibid


[05-108] Ibid

[05-109] Ibid

[05-110] Ibid

[05-111] Ibid

[05-112] Ibid

[05-113] Ibid

[05-114] Ibid

[05-115] Ibid

[05-116] Ibid

[05-117] Ibid

[05-118] Ibid

[05-119] Ibid

[05-120] Ibid

[05-121] Ibid

[05-122] Ibid

[05-123] Ibid

[05-124] Ibid

[05-125] Ibid

[05-126] Ibid

[05-127] Ibid

[05-128] Ibid

[05-129] Ibid

[05-130] Ibid

[05-131] Ibid
data-complete.php?sid=US.
[06-139] Oil production includes crude oil, natural gas liquids (NGLs), and additive; gas production calculated as gross withdrawals less gas used for repressuring, quantities vented and flared, and nonhydrocarbons gases removed. Measured in British Thermal Units (BTU), where 1 BTU is heat required to raise the temperature of one pound of water by one degree Fahrenheit. United States Energy Information Administration, State Profiles and Energy Estimates, State Energy Data System (SEDS): 1960-2017 (complete). Primary energy production in BTU. https://www.eia.gov/state/seds/seds-data-complete.php?sid=US.
[06-140] 2017 production has increased from 2012, but declined from 2015
[06-141] Includes biomass, geothermal, hydroelectric, solar thermal and photovoltaic, and wind
[06-142] Renewable energy production has consistently increased year-over-year from 2012 value of 4.25T BTU
[06-143] Rankings include first, California (1,115), second, Washington (942), and third, Texas (786)
[06-144] Carbon is attributed to the state where fuels are combusted, not necessarily the state where energy is consumed. United States Energy Information Administration, Carbon Intensity by State, 2005-16. https://www.eia.gov/environment/emissions/state/analysis/pdf/table8.pdf
[06-145] Carbon intensity has remained between 48 and 50 kg/MMBTU annually since 2012
[06-146] Rankings are first, Washington (35.3), second, New York (45.5), and third, Illinois (47.7).

Pillar 06 - Justice & Safety

[06-12] State prison sentences assigned for third-degree felonies or higher (e.g., murder, rape, kidnapping, arson, fraud, aggravated assault, child molestation, transmission of pornography)
[06-13] State jail sentences assigned for fourth-degree felonies (e.g., involuntary manslaughter, burglary, larceny, resisting arrest); sentences are less than 2 years


[06-28] Minor increase from 400 in 2013. Violent crime rate is decreasing on average 1.4% across Peer States, and Texas has not exceeded this average improvement to gain ground on peers, historically ranking in the bottom quartile among Peer States for about three of every four years.

[06-29] Top 9 rankings for violent crime are first, Virginia (200), second, Ohio (280), third, Pennsylvania (306), fourth, Washington (312), fifth, Georgia (327), sixth, New York (351), seventh, North Carolina (378), eighth, Florida (385), and ninth, Colorado (397).


[06-31] Ibid

[06-32] Ibid


[06-34] Decrease from 3,250 in 2013

[06-35] Top 9 rankings for property crime are first, New York (1,441), second, Pennsylvania (1,490), third, Virginia (1,666), fourth, Illinois (1,933), fifth, Ohio (2,177), sixth, Florida (2,282), seventh, Texas (2,370), eighth, California (2,380), and ninth, North Carolina (2,494).

[06-36] Domestic violence includes but is not limited to: physical abuse, sexual abuse, verbal abuse, emotional abuse, reproductive coercion, digital abuse, or financial abuse.


[06-38] TJJD cites 50,000 cases per year, Texas Department of Juvenile Justice, The Juvenile Justice System in Texas. http://www.tjjd.texas.gov/index.php/juvenile-system#the-numbers


[06-42] Calculation, based on assumptions for each segment defined as “vulnerable populations” (see notes 20-24)


[06-48] ACEs include economic hardship; divorce or separation of parents; living with someone with a substance abuse problem; a victim or witness of neighborhood violence; living with someone who is mentally ill, suicidal, or severely depressed; witnessing domestic violence; a parent who has served time in jail; and the death of a parent


[06-58] Percentage of children experiencing two or more ACEs has had minor decrease over the prior three years from 23% in 2016

[06-59] Top 9 rankings for ACEs are first, California (15%), second, New York (16%), third, Illinois (16%), fourth, Washington (18%), fifth, Pennsylvania (19%), sixth, Texas (20%), seventh, Virginia (20%), eighth, Colorado (20%), and ninth, North Carolina (24%)

[06-60] Total victims served per day adjusted to account for survey response rates; assumed constant volume per organization within each state


[06-72] Supplemental poverty rate calculated based on households' sum of cash income, plus noncash benefits that resource units can use to meet their food, clothing, shelter, and utilities needs, minus taxes (or plus tax credits), minus work expenses, medical expenses, and child support paid to another household; thresholds differ by geographic region depending on cost of living


[06-74] In 2016, supplemental poverty rate in Texas was not statistically different from the national average, but by 2018 it was statistically significantly below the national average

[06-75] Currently, Peer States ranked in the Top 3 include first Ohio (10.4%), #2 Washington (10.5%), and third, Colorado (10.8%)


[06-77] “incarceration rate” refers to the number of people incarcerated in state and federal facilities per 100,000 residents, excludes county jails; in Texas, about 550 people per 100,000 population are currently incarcerated in state and federal facilities


[06-87] Meadows Mental Health Policy Institute analysis prepared for Texas 2036, Adult Incarceration in Texas, February 22, 2019


[06-91] State jail recidivism has increased slightly from 62.7% for the 2013 cohort to 62.8% for the 2015 cohort. Prison recidivism has dropped slightly from 46.4% for the 2013 cohort to 45.5% for the 2015 cohort


[06-93] Texas was ranked #39 in 2017 and #40 in 2015

[06-94] Criminal justice spend includes police, judicial and legal, and corrections spend across state, county, and municipal levels.

Pillar 07 - Government Performance


[07-09] Percent of Texas agreeing that our state is “on track” has remained consistent since 2015 to 2016 (44.2%)

[07-10] Top 9 rankings for confidence in government include first Georgia (44%), second, Texas (43%), third, Colorado (42%), fourth, Ohio (41%), fifth, Florida (40%), sixth, Virginia (39%), seventh, Washington (38%), eighth, Pennsylvania (37%), and ninth, North Carolina (35%)


[07-16] Number of voters divided by number of voting-age residents, including non-citizens


[07-18] Minor increase in major election turnout from 53.8% in 2012 to 55.4% in 2016, significant increase in midterm election turnout from 34.6% in 2014 to 48.4% in 2018


[07-20] Ibid


[07-22] Industry sector contributions reported by school district property taxes only, taken as indicative of all business taxes based on assumptions majority of property taxes are represented by school district taxes and property taxes are an indicative share of all business taxes; Texas Comptroller of Public Accounts, Tax Expenditures and Tax Incidence Report, November 2018. https:// comptroller.texas.gov/transparency/reports/tax-expenditures-and-incidence/

[07-23] Ibid


[07-25] Ibid

[07-26] Texas Constitution, Article 3 Section 49-g. https://statutes.capitol.texas.gov/Docs/CN/htm/CN.3.html#3.49-g


[07-28] Fiscal Sustainability Index based Mercatus Center State Fiscal Ranking, reflects a government’s ability to sustain current and planned spending with projected revenue; ranking is based on 1) cash solvency — enough cash to cover short term bills; 2) budget solvency — enough budgeted revenue to cover projected spending within the year (versus deficit); 3) long-run solvency — ability to meet long-term obligations (e.g., pensions); 4) service level solvency — expenses and liabilities per capita versus taxes and fees per capita; 5) trust-fund solvency — debts and unfunded pensions and healthcare liabilities


[07-30] Ranked 20th in the nation in 2012

[07-31] Currently, Peer States ranked in the Top 3 include, in descending order, Florida, North Carolina, and Virginia


[07-33] Texas was ranked 16th nationally with an 8.2% business tax rate in 2017 rankings (which used 2015 data)

[07-34] Currently, Peer States ranked in the top three include #1 North Carolina (6.9%), #2 Georgia (7.0%), and #3 Ohio (7.8%)


[07-36] Ranked fourth among Peer States with a 8.7% tax burden in 2016

[07-37] Currently, Peer States ranked in the top three are Florida (7.7%), Georgia (8.5%), and Virginia (8.7%) respectively


[07-41] WalletHub index calculates public services ranking based on 30 indicators across policy areas—Education, Health, Safety, Economy, and Infrastructure & Pollution; data from Brookings Institution Tax Policy Center with analysis by WalletHub


[07-44] Improved from #30 in the nation in 2017 to #28 in the nation in 2018. However, Long-term burden increased by 1 percentage point from 2017 to 2018

[07-45] Currently, Peer States ranked in the Top 3 are FL (3.1%), NC (3.4%), and VA (5.2%)


[07-49] Ibid

[07-50] Ibid

[07-51] Ibid

[07-52] Includes classified, regular, full- and part-time employees, does not include elected officials or appointed officials


[07-54] Steadily increasing from 10% turnover in 2014


[08-33] Trauma based on two or more “adverse childhood experiences” (ACEs). Definition of ACEs include economic hardship; divorce or separation of parents; living with someone with a substance abuse problem; a victim or witness of neighborhood violence; living with someone who is mentally ill, suicidal, or severely depressed; witnessing domestic violence; a parent who has served time in jail; being judged unfairly due to race or ethnicity; and death of a parent

[08-34] Survey conducted by U.S. Census Bureau via mail and web-based survey, with parents responding on behalf of their children; Child and Adolescent Health Measurement Initiative (CAHMI), National Survey of Children’s Health, 2016-2017. https://www.childhealthdata.org/browse/survey/results?q=5545&r=1

Rather than yield the future to a course of events imposed from outside, we are confident that Texans will choose to rely on a great, long-standing asset: the determination to shape their own destinies.

- Preface, Texas 2000 Commission Report