



DEEP DIVE

Road to 100: How the shale boom broke Georgetown, Texas' renewables spell

In 2017, the city of about 50,000 became the largest in the U.S. able to claim it ran on 100% renewable energy. But after customer bills spiked last year, its utility department is facing an overhaul.

By Catherine Morehouse

Published Nov. 25, 2019

This is the second of a four part series based on Utility Dive visits to cities that produce more renewable power than they consume. All four installments can be found here.

G EORGETOWN, TEXAS — Texas won't be boxed into a stereotype.

Booming progressive cities sprawl across the central and eastern parts of the state, pushing commerce further out into vast suburbs. Populations drop dramatically in the northwest corner where highway networks fade to broad stretches of land dotted with cattle, crops and resource extraction.

Natural gas and oil pump jacks bob obediently below the looming slow churn of wind turbines. The two sit unassumingly side-by-side, unaware of the billion dollar war their steady production wages.

That war came to a head in Georgetown around a year ago.

Demand for reliable, predictable energy pricing for commercial customers led Georgetown, Texas, to contract for 318 MW of wind and solar, making it the largest city in the U.S. to be 100% renewable capable and driving the city and its conservative mayor Dale Ross into environmental infamy in April 2017.

"See, this just proves Republicans can do environmentally-friendly things as well as Democrats," Mayor Ross told Sen. Bernie Sanders, I-Vt., at the senator's fourth annual national town hall meeting in December of last year.

But the city's clean energy success was marred just a year and a half later by high energy prices, the product of over-purchasing energy in anticipation of new demand and selling that excess on the market at a loss. Surging power bills led to a political tug-of-war across a city whose mayor prides himself on basing policy on "facts and what's best for the people we serve" rather than "partisan politics."

Oil and gas-backed groups such as the Texas Public Policy Foundation mocked the city, after big names like Al Gore had tapped the city as a darling of the environmental movement.

"Mayor Ross can get on television. But can he fix a pothole?" Texas Public Policy Foundation Vice President Chuck DeVore asked in a 2018 Forbes op-ed.

Under the partisan debris is the story of a city whose earnest efforts to appeal to its red district's fiscal and progressive sides led to a lawsuit against its solar provider, leaving its future power mix unclear.

A blue college finds common ground with a red city

Despite criticisms that carelessness led to the contract failures, the city's story began very cautiously in 2010, when the small, liberal arts Southwestern University contracted with Georgetown for 100% renewable power.

It was a test case for the city, which was in the process of negotiating its contract with power provider Lower Colorado River Authority. Fluctuating natural gas prices made the city's leadership concerned about long-term stability in power supply pricing, and it happened to be exploring alternative power generation at the same time Southwestern was pushing for climate action.



The university of less than 1,500 is a bright blue dot in a very red city, according to Long, but the two parties were able to find common ground on affordable, clean energy in 2010. | Credit: Julia von Alexander, former Southwestern University student



Credit: Joshua Long, Southwestern University



Credit: Catherine Morehouse, Utility Dive

"The folks at the city of Georgetown were like 'Southwestern just knocked on our door and asked for 100% renewable, let's go for

it'," Associate Professor of Environmental Studies at Southwestern University Joshua Long told Utility Dive.

Wind contracts were attractive at the time because of incredibly favorable economics specific to Texas as a result of legislative action in the mid 2000s.

A 2005 law boosted Texas' renewable portfolio standard to require an additional 5 GW of renewables by 2015 and upped transmission infrastructure investments, totaling around \$7 billion, to transfer the growing amount of renewable power — largely wind — from the upper west to the eastern part of the state.

"George W. Bush at the time and then Rick Perry were both like, you know what? We're the energy state. Let's have all the energy," said Long. "Let's just do energy across the board. And so in building those lines, you connected up all these major potentials for solar and wind to Dallas, Fort Worth, Austin, Houston and the rest of the electrical grid."

That massive investment has now largely paid for itself in cheap wind deployments, according to research from the University of Texas at Austin, and others.

After the 100% renewable experiment with Southwestern proved financially stable, the city paid to exit its contracts with LCRA in 2012 and entered into four new contracts over the next few years. One for natural gas — 20 MW from Mercuria — and three for solar and wind — 20 MW of wind from AEP's South Trent wind farm, 144 MW from the Spinning Spur wind farm and 154 MW of solar from the Buckthorn solar project.

That power totaled 1,067 MWh in 2018, with 822 of those MWh coming from renewable energy, according to the city. Because

Georgetown only consumed 678 MWh of power that year, consistent with other years, the city has been able to claim it receives 100% of its power from renewable resources since April 2017.

"Dale Ross pushed this initially as a purely financial decision. He didn't want anything to do with the environment," said Long.

An Inconvenient Truth 2 | Clip | Georgetown Texas



But after a period of time, "I think Georgetown sort of liked the attention," he said. And despite its ultra-conservative population, "citizens care about clean air and clean water. It's not that [Texas conservatives are] anti-environment. Texas just has some strong private property rights and anti-regulation mentality."

The city's 100% status "was really very popular until it became evident that everyone's electric bill was going to go up," he said.

Depressed natural gas prices, poor solar contracts. But wind remains competitive

At the time they were searching for these contracts, the city was experiencing a lot of growth, and purchased excess power, accounting for the city's expected demand growth. And, they assumed energy prices, particularly for natural gas, would remain high.

"The reality is that assumption was not a good one," new Georgetown city manager David Morgan told Utility Dive.

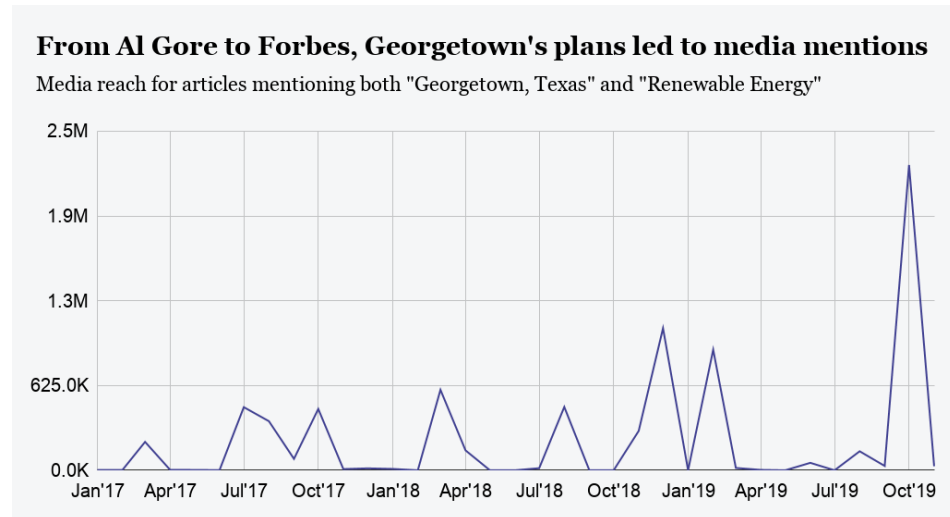
Two things went wrong: Natural gas prices dropped and the excess energy the city had contracted for in the short term was clearing into the ERCOT market for lower than what the city bought it for. As a result, power purchase prices rose and the city used up all its rate stabilization reserves in the process, causing customer bills to spike at the end of 2018.

Despite headlines blaming renewables, it was the natural gas contracts that ended up being the most expensive, according to Morgan. The city is unable to disclose its wholesale power costs under its purchase contracts, but in general, "wind-generated power tends to be competitively priced in the power market," city spokesperson Keith Hutchinson told Utility Dive in an email last week.

Because the city signed its natural gas contracts before the shale revolution shot down gas prices, they were fixed at prices that made it difficult to resell to Texas' grid, according to Morgan.

"We needed to better understand the risk of what happens if the forecasts aren't correct. What happens if the forecast ... goes the other direction?" he said. "I wish at that time the city was going through that [contracting] process that there would have been a more in-depth review of the risks."

The city had already been featured in Al Gore's second installment of *An Inconvenient Truth*, covered widely by national news outlets and pro-environmental groups and awarded a \$1 million grant from Bloomberg. Its national press reach hit 2.3 million people at its peak, according to data pulled from Industry Dive's audience team through LexisNexis.



Media mentions reached around 2.3 million people at its peak. | Credit: Utility Dive, data from LexisNexis

The city council pulled out of the Bloomberg grant in August, but backlash was much quicker.

Conservative groups jumped on the city immediately, blaming wind and solar for the spike in customer bills. The most critical was the Texas Public Policy Foundation.

"Texas town's environmental narcissism makes Al Gore happy while sticking its citizens with the bill," read a Texas Public Policy Foundation op-ed published by Fox News and written by the group's vice president Chuck DeVore. "Texas Taxpayers Pay For Political Virtue Signaling With Costly Renewable Energy," read another op-ed also written by DeVore and published in Forbes.

"Georgetown learned that lesson the hard way, right? They made a bet and they lost and they lost because renewable energy can't meet their needs," the policy group's vice president of research Bill Peacock told Utility Dive.



The picturesque city of Georgetown, just an hour from Austin, seems smaller than 50,000 with its quiet streets and historic buildings that allow it to brag it has the "Most beautiful town square in Texas." But national media attention put the city's leaders on the map for both the good and the bad. | Credit: Catherine Morehouse, Utility Dive



Credit: Catherine Morehouse, Utility Dive

"Obviously, we made a lot of press for being 100% renewable. And then we made a lot of press based on the financial challenges that we've had," said Morgan. "I think what's important to know is that our main goal is to provide reliable energy at a competitive rate and the city's effort at the time ... was to do just that."

Now, the city is hoping to move past its time in the national spotlight, and focus instead on bringing down power bills. Which in part will rely on getting out of its solar contract.

On Oct. 8, the city filed a lawsuit with its provider, Buckthorn. In its suit, the city alleges that during negotiations "Buckthorn possessed material confidential information, to which it knew Georgetown had no access nor knowledge of, concerning the expected performance of the facility."

The city also claimed that breaches in the contract, the details of which also remain undisclosed, "resulted in unnecessary financial losses to the City."

As a result, the city claims it has tried to address those breaches with the developer since March, but unsuccessful negotiations left the city with no choice but to sue on the grounds of fraud and breach of contract.

Georgetown is demanding \$1 million in damages, along with litigation fees, and cancellation of the contract.

And to replace the loss of 154 MW in solar, plus overcome its previous financial challenges, the city's energy leaders must overhaul its energy strategy.

Georgetown's power future

"While we've made a lot of publicity about being 100% renewable, we do not have a policy to be," Morgan said. "I don't want to speak for [city] council, but our goal, again, is to provide reliable energy at a competitive price. And so ... we'll see what the future holds in terms of how we contract for energy in the future."

After a third-party management assessment in the spring of this year, the city was told it not only needed an electric utility-only manager, but also a third-party portfolio manager and a better grip on risk assessment. Shell Energy and Tenaska are the two finalists for the city's new portfolio manager, with negotiations in the final stages, according to Morgan.

And the city's costly power prices are not long term, according to Morgan. Georgetown is exiting its problematic gas contract in 2022. They were not able to comment on the Buckthorn lawsuit beyond the scope of the city's press release, because of confidentiality requirements of the agreement.

"I think that there's a misconception saying, 'Hey, cities should never get into long-term contracts,'" said Morgan. "That's the nature of public power, not just in Georgetown. That's the nature of public power across the country."

"What Georgetown tried to do makes a whole lot of sense," despite "unfortunate" impacts to customers, Adrian Shelley, director of Public Citizen, told Utility Dive. "The reason that a long-term renewable contract works is that the price doesn't fluctuate because there [are] no fuel costs."

What made Georgetown's situation more complicated was that it was selling back some of that power, making the city subject to market fluctuations, and "as [prices] continued to decline, they ended up in the red with that surplus energy," he said.

A partisan narrative also made things complicated, according to Long. The city almost succeeded in marrying two philosophies — environmental and fiscal — but when the seesaw tilted, things fell apart rapidly.

"People think of things in black and white, and it's so difficult to implement those multiple shades of gray, as well as communicate that to a population that doesn't necessarily want to hear it," he said.

Correction: Research from the University of Texas at Austin found that transmission investments ultimately saved costs, not the International Association for Energy Economics.