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How the history of electricity explains municipal broadband

By **Brian Fung** July 29  [Follow @b_fung](#)

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With the fight over net neutrality still simmering, the Federal Communications Commission has opened up another front in the battle over the Internet's future. The agency wants to explore the possibility of [helping cities build their own connections](#) to the Internet and bypassing the commercial broadband providers like Verizon and Comcast that have generally served as America's onramps to the Web. On Monday, the FCC opened up new proceedings for a pair of petitions asking for the government's help, and as with the net neutrality docket, members of the public [can now weigh in on the issue for themselves](#). Should the FCC try to preempt state laws that block cities from building out publicly owned Internet infrastructure?

Skeptics have raised questions as to whether the federal government can legally intervene in states that have not

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government can legally intervene in states that have put up barriers to greater public investment in municipal broadband networks. But others, including one of the cities petitioning for federal assistance, say that there's a valuable precedent in U.S. history that shows why Washington shouldn't be afraid to step in.

The analogy they have in mind is electricity.

Unlike today, electricity wasn't always common or plentiful in the United States. Direct-current electricity was hard to transmit over long distances, because the power faded over long distances. Those limitations gave rise to lots of power plants being built in the 1890s that were meant to serve very small areas within a city. As technology improved, those small power plants led to much larger ones serving wider areas and more customers. Eventually, the companies running these plants effectively got taken over by even bigger companies that held ownership stakes in numerous utility firms across the country. The Smithsonian Institution says that by 1932, the vast proportion of privately owned utility companies [were held by just eight holding companies](#) — and their operations were largely exempt from state regulatory oversight. The 1929 stock market crash did nothing to improve the holding companies' reputations. President Franklin Roosevelt vowed to reform the holding companies if he won reelection in 1932.

The following year, Roosevelt launched the Tennessee Valley Authority (TVA) and the Rural Electrification Administration, among a number of other offices meant to provide power to those who'd been passed over by the privately owned utilities because those areas weren't as profitable. TVA in particular worked with cities like

Chattanooga to provide affordable energy.

"TVA went in with the notion of, 'Let's make power cheap enough that the average person can afford it, and let's make money by selling on volume — not on massive margins,'" said Harold DePriest, chief executive of the public electric utility in Chattanooga, Tenn. "That worked for TVA. And at the time, it forced the private power companies to reduce the rates."

Chattanooga's electric utility, EPB, is among those who have petitioned for the FCC's help.

One of TVA's original directors, David Lilienthal, seemed to go about his work with a near religious belief in the power of technology, if applied correctly, to become a tool for what he called "grassroots democracy."

"Indeed this valley," he [wrote in 1939](#), "even in the brief span of a decade, supports a conviction that when the use of technology has a moral purpose and when its methods are thoroughly democratic, far from forcing the surrender of individual freedom and the things of the spirit to the machine, the machine can be made to promote those very ends."

To supporters of publicly owned broadband networks, the TVA's circumvention of commercially owned electric utilities to support public utility projects helps justify the rise of municipal Internet today — despite the protests of incumbents both then and now.

"At the time, the competitors to TVA here in Tennessee was [Commonwealth & Southern](#)," said DePriest. "They said exactly the same things that are being said about

broadband. They said electricity is not government's business."

The TVA eventually prevailed. Whether the FCC will meet with similar success, though, is hardly clear.

Brian Fung covers technology for The Washington Post.
