Yardi® Matrix
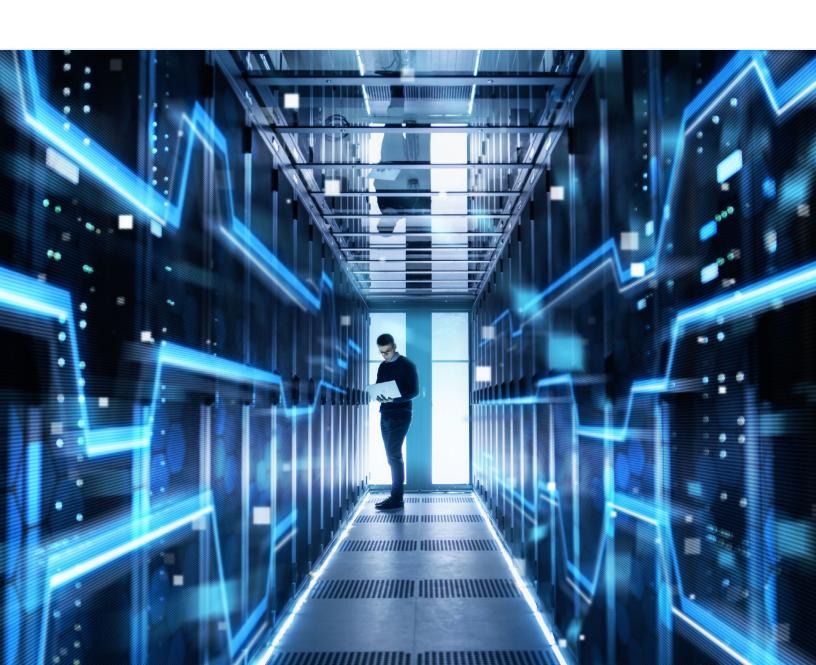
National Industrial Report

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AI Boosts Data Center Development

- Artificial intelligence has grown rapidly over the past year, requiring vast amounts of data and processing power, in turn generating increased demand for data centers. However, the resource-intensive demands of the technology are creating significant headwinds for development and shifting some construction into secondary and tertiary markets.

- In the 120 markets covered by Yardi Matrix, 27.4 million square feet of data center space are under construction and an additional 33.5 million square feet are in the planning stages. At a time when overall industrial starts are slowing, data center starts are on the rise. Data center starts increased in 2023, growing to 14.2 million square feet after averaging 10 million square feet during the previous three years. Between 2020 and 2022, data centers comprised 2.0% of all industrial starts, but in 2023 the share grew to 4.3%. Meta has fully embraced AI and is the most active owner of data centers under construction in Yardi Matrix markets, with 7.4 million square feet currently being built. Meta's largest project underway is the 2.0 million-square-foot Eagle Mountain Expansion in Utah.

- Northern Virginia, which has the highest concentration of data centers in the country, also has the most new development underway. The market has twice as much completed space as Dallas, the second-largest market, and the existing infrastructure provides an advantage over other locations. However, there are growing concerns about Northern Virginia's capacity to add more data centers due to the massive amount of power required by the facilities. This is especially true during an AI-fueled boom because AI model training requires power-hungry GPUs, using an estimated two to five times more power than a regular cloud server. Data center operators are now looking westward or to secondary markets such as Atlanta, which has 3 million square feet of data centers under construction (34% of stock), to find the power and land they require.

- In the Western U.S., land and power are cheaper, but water availability is a major headwind. Not only is water used in generating the massive amount of electricity to power data centers but it is also used directly in cooling the centers, which create a significant amount of heat. As of now, the amount of water used by data centers is relatively small when compared to other uses, but tech giants are engaged in an AI arms race and expanding rapidly. Water usage has become a major concern of residents and policy makers alike in places including Phoenix—which has 4.3 million square feet under construction and another 6.3 million in planning—Salt Lake City and Eastern Oregon.