Data centers are a location or dedicated space that are used to house computing infrastructure (such as servers, computational storage systems, power supplies, and various security devices). With the digital transformation trend that has been made possible by various technological improvements in society (e.g. 5G, cloud computing services, and the rise of Web3/cryptocurrency), data centers are and will continue to be hot commodities in the market. The market size of data centers is expected to grow by over $600 billion from 2021 to 2026[[1]](#footnote-1) with 35% of the growth happening in North America. This is due in part by the rise of specific US companies such as Alphabet, Alphabet, Google, Microsoft, and Cisco to name a few. Many software solutions rely on reliable cloud infrastructure only made possible by multiple, geospatially separate data centers. The availability of reliable utility and city infrastructure also makes the USA an ideal location in terms of data centers because of the US’s interconnectedness and reliability in energy production.

How do companies choose where to build their data centers? According to Google, they need a combination of energy infrastructure, proximity to users, available work force, and available land.[[2]](#footnote-2) Therefore, when looking for optimal real estate to for future data center growth, the elements in the prior statement are ideal. [[3]](#footnote-3) In addition to those factors, the passage of more environmentally friendly governmental policies are directing companies to be more sustainable and environmentally friendly. New initiatives in sustainable data centers are also rising: the building of data centers in colder regions to reduce coolant and energy usage, using recycled water to cool servers, or being near green energy sources. In addition, too much competition from nearby data centers or being too close to one another defeats the purpose of geo redundancy and therefore companies want to space out their data centers as well.

In terms of already saturated data center markets, they span all over heavily populated, business, and technology heavy locations such as dense urban locations. In general, space in cities are running out as land continues to be a primary consideration in data center site selection.[[4]](#footnote-4) Because of these considerations and primarily looking at my home state of Texas, I would recommend locations such as College Station, TX (in the center of all three major cities in Texas); Denton, TX (near Dallas), or Austin, TX. These locations each have an abundance of renewable energy (solar and wind), while also benefiting from generally lower energy prices when compared to the nation. Texas is experiencing a tech boom as well as may companies are moving to Dallas, Houston, and Austin, and would thereby be needing closer infrastructure to their data centers. In addition, land and real estate is comparatively cheaper in Texas when compared to similar cities where these companies usually operate in as well. Overall, all of these locations are aligned with the the standards for data center site selection.

1. [Data Center Market - 35% of Growth to Originate from North America |Evolving Opportunities with Alphabet Inc. & Amazon.com Inc| Technavio](https://www.prnewswire.com/news-releases/data-center-market---35-of-growth-to-originate-from-north-america-evolving-opportunities-with-alphabet-inc--amazoncom-inc-technavio-301551093.html#:~:text=The%20data%20center%20market%20size,data%20centers%20in%20North%20America.) [↑](#footnote-ref-1)
2. [Discovering Data Centers](https://www.google.com/about/datacenters/discover/) [↑](#footnote-ref-2)
3. [How to Choose a Data Center Location: Best Practices and Strategy](https://www.nexcess.net/blog/how-to-choose-a-data-center-location-best-practices-and-strategy/) [↑](#footnote-ref-3)
4. [How Important Is Location When Choosing a Data Center?](https://www.datacenterknowledge.com/industry-perspectives/how-important-location-when-choosing-data-center) [↑](#footnote-ref-4)