

CDN

What is CDN?

A Content Delivery Network (CDN) is a globally distributed network of proxy servers deployed in a way to deliver web content based on the geographical location of the clients. This implies that CDNs are important for better site performance, improved reliability, scalability due to close-to-user caching of content, and definitely secure features such as DDoS protection. Being on a CDN is a must if one wants to deliver a fast, reliable, and secure web experience.

CDNs are commonly used to deliver static assets like images, videos, stylesheets, and scripts, ensuring a faster and more reliable user experience.

Proxy servers:

Proxy servers act as intermediaries between a user's device and the internet. They receive user requests, forward them to the destination server, and then relay the server's response back to the user.

How it caching content closer to the user's location?

1. **Geographically Distributed Servers:** CDNs have servers located in various geographic regions around the world. When a user requests content, the request is routed to the nearest CDN server.
2. **Caching Mechanism:** When the nearest CDN server receives the request, it checks if the requested content is already cached (stored) on that server. If it is, the server delivers the cached content directly to the user.
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By caching content in multiple locations, CDNs ensure that users receive data from the closest possible server, reducing latency and load times. This distributed approach enhances the speed and efficiency of content delivery, providing a better user experience.