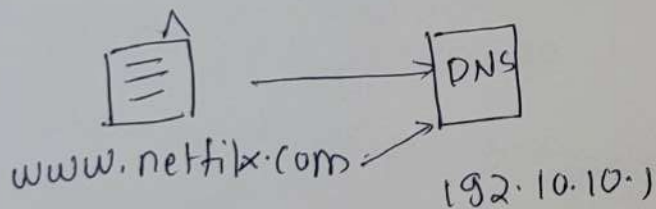
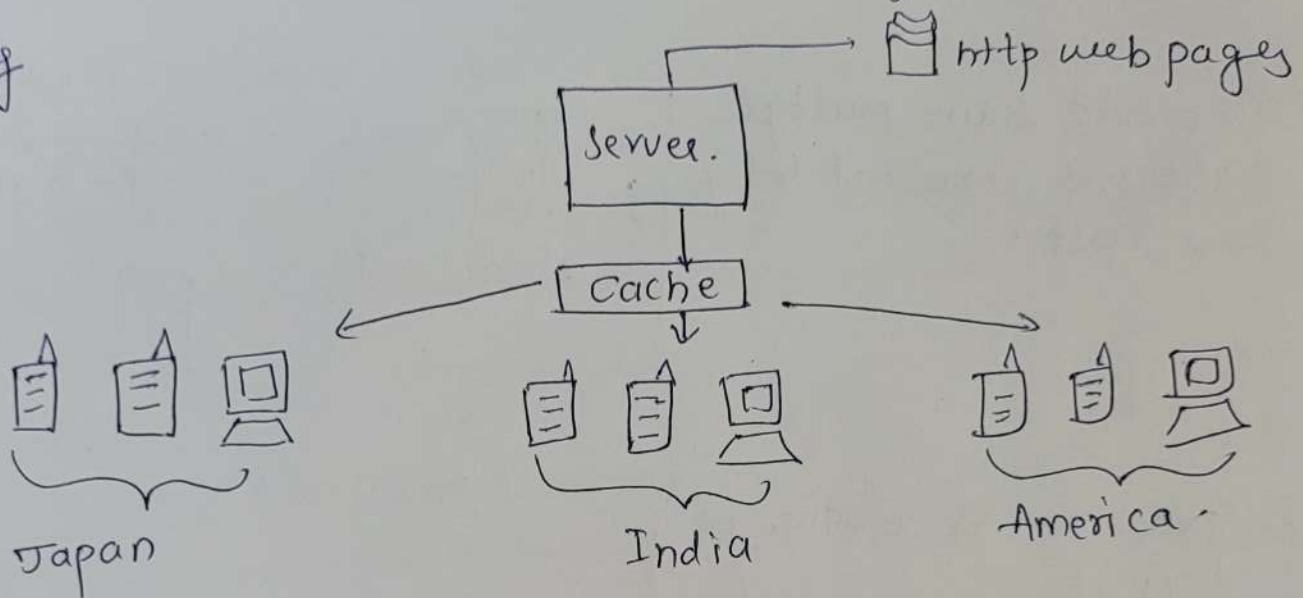


10) CONTENT DELIVERY

→ It is a black box that stores static content close to all of our clients, it's cheap and efficient for fast data access.

→ It makes our system cheaper and faster.

eg



Our device searches for a website, client req will go to dns and will ask DNS what is its ip address. → Once DNS provides IP address, our req will try to connect to that ip address. Req will go to that specific server that is connect to the http web page → that can be read and share the ~~response~~ response.

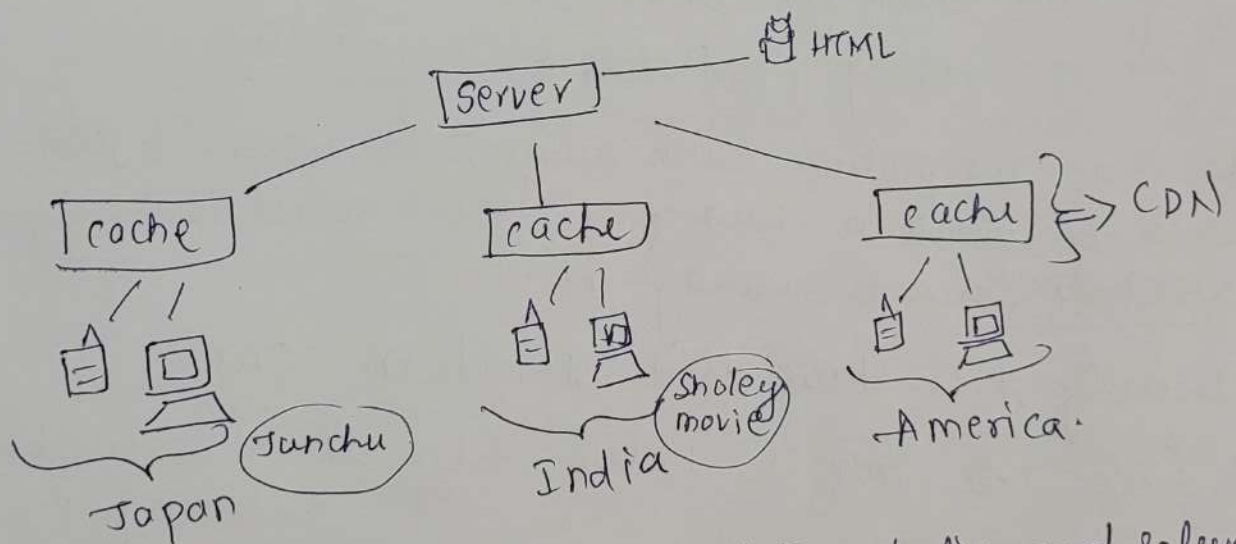
→ In order to do these operations quickly, we can directly store the webpages/data in our cache memory.

problem to get this web page depends where the cache is located

here in diagram cache & server are located in India region. so a person trying to access the same web page from India will get it quickly rather than a person trying to access that web page from Japan.

→ If we try to keep the cache at common distance area from India & Japan. In that case both might get the response late

Soln → Try to divide the cache into smaller chunks and distribute it globally i.e. at each region



so content that is most watched in India and relevant to India, can be kept in cache memory that is located in India region.

→ This is much faster cause the person trying to search for a content, they don't have to go and connect to Indian server. They can just connect to their local server.

→ It is observed from survey that people who get quick response that that site is more professional

→ All cache would have only the relevant data.
→ Suppose there are some movies famous in Japan but not in India.

→ So the local cache present in Japan region would only contain ~~relevant~~ most watched Japanese movies.

→ The cache is similar or like server.
We can connect to IP address and hit an API and it will give us the response.

→ It is mostly adapted by big companies.

→ The servers should be cheap & fast.

Eg of CDN → Amazon CloudFront

→ cheap, Reliable & easy to use.

It has integration with Amazon S3 where it just have to make a new file and event is triggered we don't have to manage it.

→ Usually it is static data stored in (CDN)

* like ~~the~~ images, videos, files that can't be changed.