****HTTP/1.1****

1. **The first communication protocol that was established to exchange data between client and**

**Server using methods like GET,POST,PUT and DELETE.The server then responds to the client’s**

**request by sending appropriate response like texts,HTML,CSS etc which we could see in the client side as web pages through browser.**

1. **Before the communication begins,a TCP connection is established between the client and server.After this ,all the requests and responses are done only in this TCP connection.**
2. **There is a head of line blocking that blocks all the requests behind it until it doesn’t gets its all resources.This is one of the major shortcomings of HTTP/1.1 which has been resolved by the concept of multiplexing which is used in HTTP/2.**

****HTTP/2****

1. **This protocol was developed over SPDY protocol and it was developed to overcome all shortcomings that we had faced in HTTP/1.1.**
2. **HTTP/2 converts all data into a binary format.This helps in consuming less bandwidth and also in handling of elements like white spaces, capitalization and line endings.**
3. **HTTP/2 supports multiplexing in which multiple requests can be initiated by the client in parallel over a single TCP connection .As a result,web pages containing multiple elements are transferred over a single TCP connection and also the latency is reduced.**
4. **HPACK compression is used for the requests messages.**To speed up web performance, both HTTP/1.1 and HTTP/2 compress HTTP messages to make them smaller. However, HTTP/2 uses a more advanced compression method called HPACK that eliminates redundant information in HTTP header packets. This eliminates a few bytes from every HTTP packet. Given the volume of HTTP packets involved in loading even a single web page, those bytes add up quickly, resulting in faster loading.

****5.****HTTP/2 requests can be **pushed.**This means requests can be pre-sent (and be ready before they've even been requested). While that creates some interesting questions (mostly revolving around caches) it's a potentially exciting area of development.This mechanism helps in reducing the number of requests which is required for each web resources if this mechanism hasn’t been introduced or used.