1.4 Explain JWT in approx and prove its top 3 benefits

JSON Web Token (JWT) is an open standard that defines the compact and self - contained way for securely transmitting information between parties as a JSON object. This information can be verified and trusted as it is digitally signed. The tokens are signed either using a private secret or a public/private key.

JWT relies on other JSON - based standards: JSON Web Signature and JSON Web Encryption. The benefits of JWT are -

- More compact JSON is less verbose than XML, so when it is encoded, a JWT is smaller than a Security Assertion Markup Language (SAML). This makes JWT a good choice to be passed in HTML and HTTP environments.
- More secure JWTs can use a public/private key in the form of an X.509 certificate for signing. A JWT can also be symmetrically signed by a shared secret using the HMAC algorithm.
- More common JSON parsers are common in most programming languages because they map directly to objects. Conversely, XML doesn't have a natural document to object mapping. This makes it easier to work with JWT than SAML assertions.