

Digital signature

- Digital signature is Asymmetric Key cryptography.
- It uses both Public and Private key.
- In case of encryption Private key is used.
- In case of decryption Public key is used.
- It provides Authentication and also non-repudiation.
- Signature means Proof of identity is it from correct sender (or) not.
- They are two algo Digital

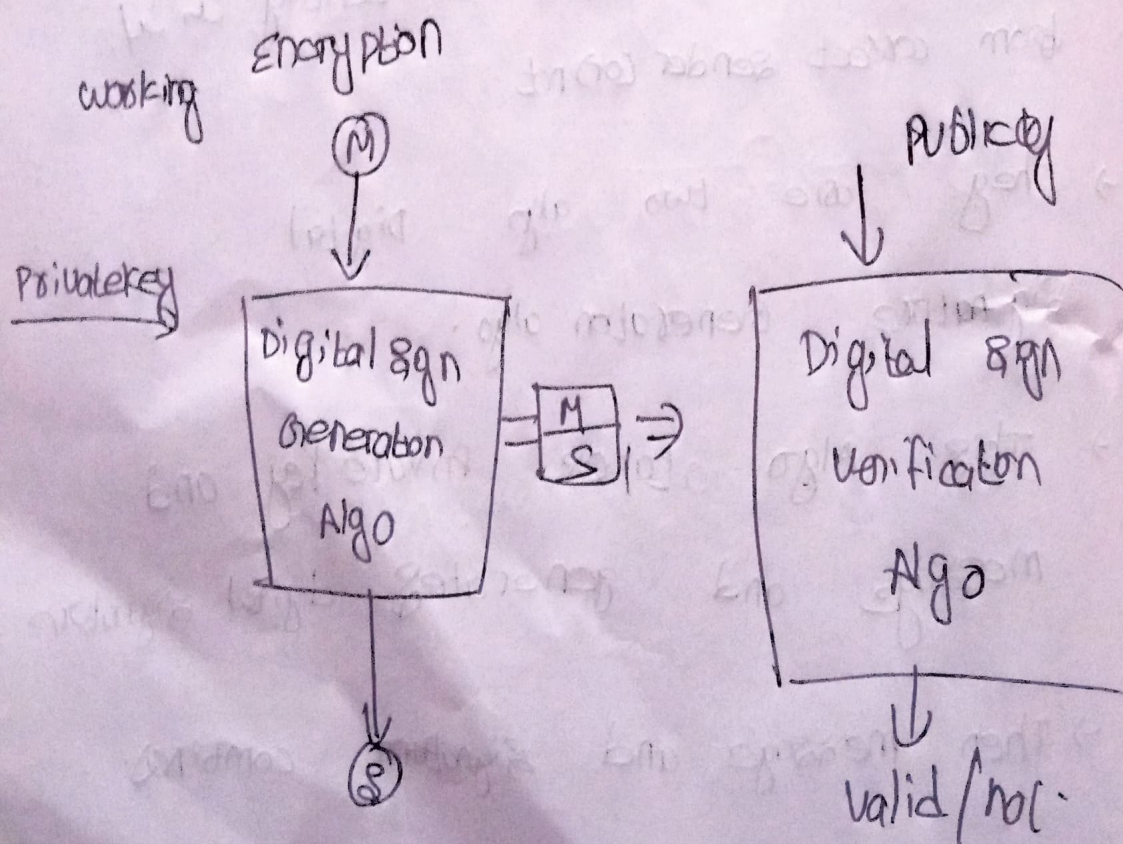
Signature Generation algo.

- This Algo takes Private key and message and generates digital signature.
- Then message and signature combined.

→ The combined Message and signature is sent as input for Public key.

→ using Public key and digital signature verification Algo.

→ It verifies produces the output whether it's valid or not.



- If msg matches then it is valid
- else it is not valid

Advantages of digital signature

- ① Authentication
- ② non-repudiation
- ③ Integrity
- ④ Digital certificate

Applications of DS

- ① online transaction
- ② Email security
- ③ Document Authentication