

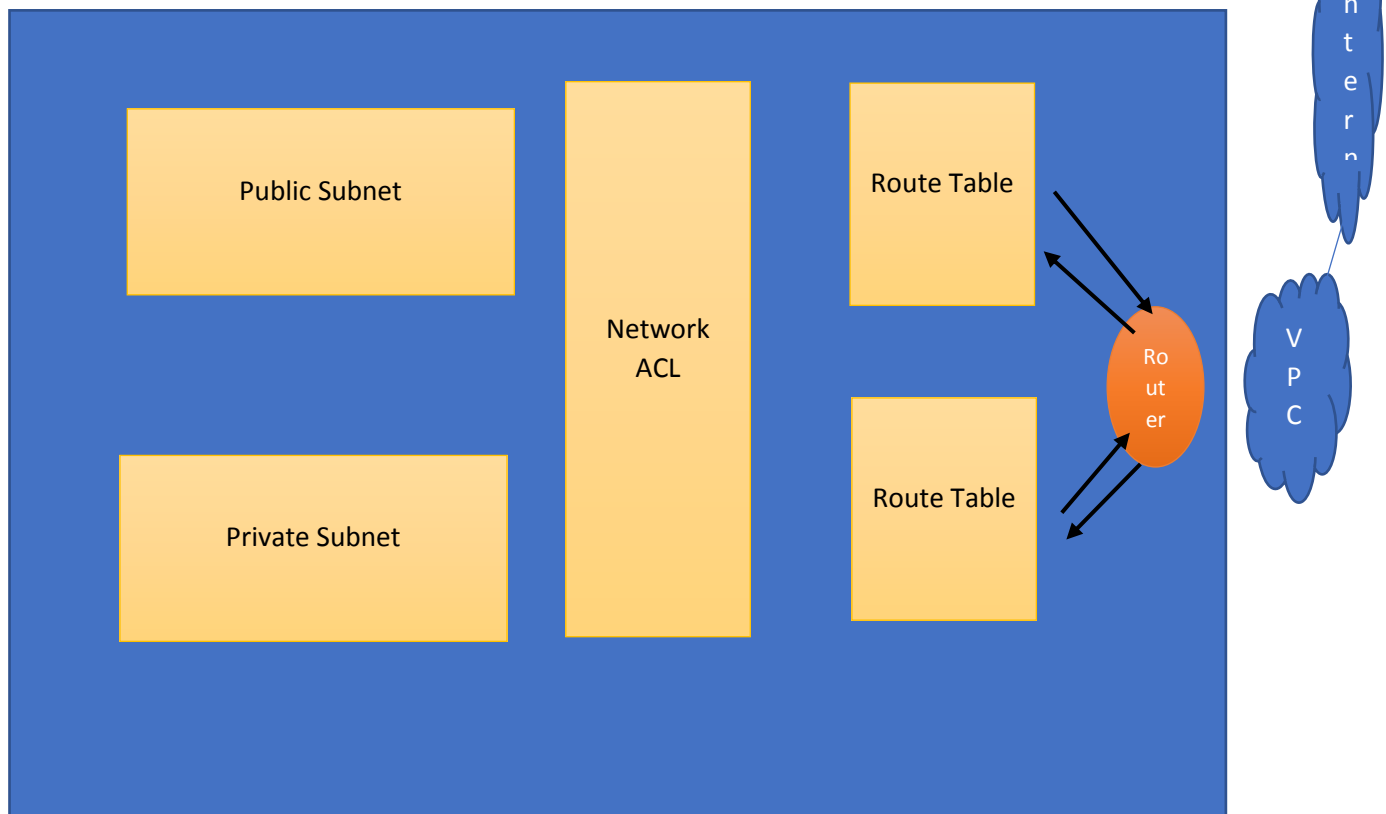
## Bastion Host

A bastion Host is a special purpose computer on a public ip designed and configured to withstand attacks

Proxy server

## VPC with Public & Private Subnet

VPC



## Key points about Bastion host

Bastion Host will be launched in public subnets it acts as a proxy to the private subnets.

It provides secured infra by reducing attacks

A bastion host is also used to administer EC2 instances using SSH securely.

The other name of Bastion Host is called as Jump Boxes

You cannot use NAT-Gateway as a Bastion Host

Whenever you want to SSH your private subnet you can configure a Bastion host.

1. Create VPC called “BasVPC”    CIDR-
  - a. 10.40.0.0/16
2. Create 1 public subnet & private subnet in the vpc
  - a. Public subnet 10.40.1.0/24
  - b. Private subnet 10.40.2.0/24
3. Configure the network by editing routing table and do the subnet associations
4. Launch instance(VM) in public subnet with public IP enabled
5. Launch 2 instances(VM) in private subnet where public IP is disabled
6. Do SSH to public VM
7. In Public VM create Bastion host
  - a. Copy paste the pem file of your private instance
    - i. vi bashtion.pem
  - b. Provide access rights to the pem file
    - i. Chmod 400 bashtion.pem
  - c. Add agent bash
    - i. ssh-agent bash
    - ii. ssh-add bashtion.pem
  - d. ping public instance to the internet

- i. ping [www.google.com](http://www.google.com)
- e. SSH to private instance via public instance
  - i. Ssh -A ec2-user@<<Private IP of VM>>
- f. Ping private instance to internet
  - i. Ping [www.google.com](http://www.google.com)

8. Through public vm connect(SSH) to private VM.

