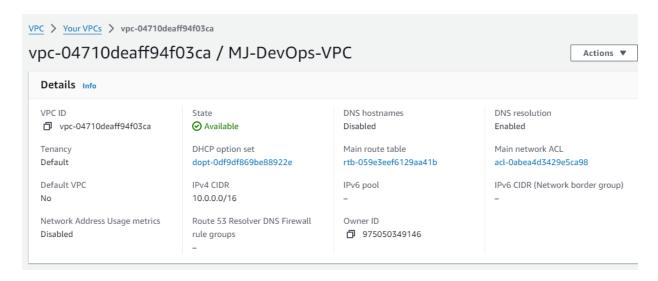
Create a VM in both public and private subnets. The private subnet instance should be accessible from the public subnet over SSH. Both the instances should be able to communicate to the internet: -

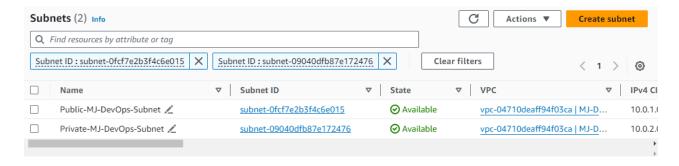
1: - Created a VPC: -



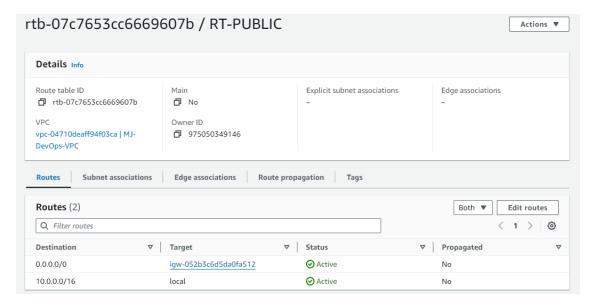
2: - Created an Internet Gateway: -



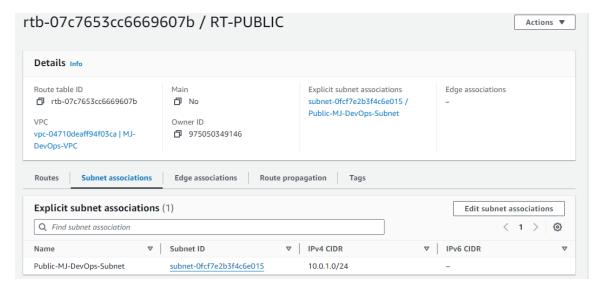
3: - Created a Subnets: -



4: - Created a route table for Public Subnet: -

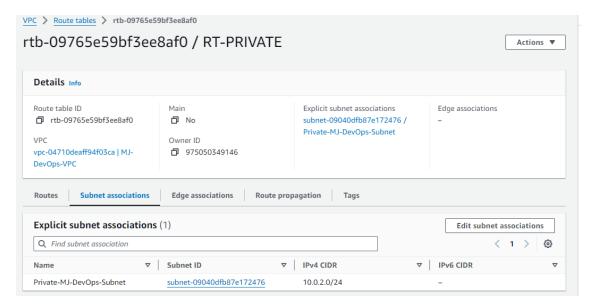


In the Public Subnet Route table I added the internet gateway



Added the subnet association rule in public route table for public subnet

5: - Created a route table for Private Subnet: -

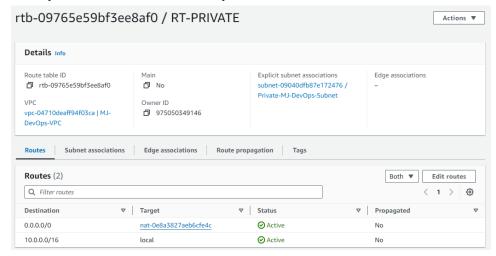


Added the subnet association rule to private route table

6: - Created a NAT Gateway: -

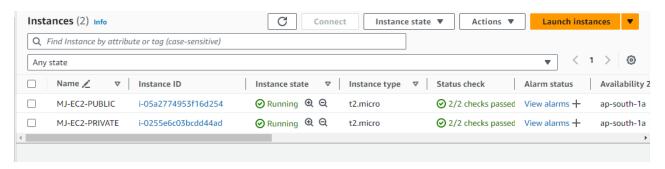


7: - Updated a route table for private subnet: -



 Added the NAT Gateway in the private route table for accessing the Internet through the Nat gateway

8: - Created a Two EC2 instances one for private and one for public :-



In the public and private EC2 instances we add one security group for HTTP

9: - Connect the public EC2 Instance remotely:-

Connected Through remotely Public Instance:-

```
C:\Users\mihir.jain\Downloads>ssh -i "Key-Pair-For-demo.pem" ubuntu@13.232.81.76
```

After Public instance is connect then we have to connect from public to private

```
ubuntu@ip-10-0-1-40:~$ touch access-private.pem
ubuntu@ip-10-0-1-40:~$ vi access-private.pem
ubuntu@ip-10-0-1-40:~$
ubuntu@ip-10-0-1-40:~$ ls -l
total 4
-rw-rw-r-- 1 ubuntu ubuntu 1679 Feb  2 20:37 access-private.pem
ubuntu@ip-10-0-1-40:~$ chmod u=r--,g=---,o=---
chmod: missing operand after 'u=r--,g=---,o=---'
Try 'chmod --help' for more information.
ubuntu@ip-10-0-1-40:~$ chmod u=r--,g=---,o=--- access-private.pem
ubuntu@ip-10-0-1-40:~$ ls -l
total 4
-r----- 1 ubuntu ubuntu 1679 Feb 2 20:37 access-private.pem
ubuntu@ip-10-0-1-40:~$ ssh -i access-private.pem ubuntu@10.0.2.193
Welcome to Ubuntu 22.04.3 LTS (GNU/Linux 6.2.0-1017-aws x86_64)
 * Documentation: https://help.ubuntu.com
                  https://landscape.canonical.com
 * Management:
                  https://ubuntu.com/advantage
 * Support:
  System information as of Fri Feb 2 20:38:32 UTC 2024
                                                         97
  System load: 0.0
                                 Processes:
  Usage of /:
               20.5% of 7.57GB
                                 Users logged in:
                                                        Θ
                                 IPv4 address for eth0: 10.0.2.193
  Memory usage: 21%
  Swap usage:
```

- Then We copy the private key from local private key form public instance.
- Then we create a file public instance
- We create a file and copy the private key
- Then we ssh the private key from public key
- After that we connect the private instance
- Then we can access the internet from private instance

tu@ip-10-0-2-193:~\$ curl www.google.com

doubt.com | characteristics | , kEXPI:'0,793108,572359,207,4804,1132070,1963,868573,327164,380791,441798,23792,12319,17580,4998,17075,41316,2891,8349,34
05,606,63304,13721,1014,1,16916,2652,4,59617,27038,6636,7596,1,42154,2,16737,23024,6700,31122,4568,6255,24673,330644,2,2,
1,10956,15676,8155,23351,8702,13733,22194,30044,20199,33564,34492,5122,3930,15816,1804,7734,15103,4257,8174,13449,8406,5
601,3692,22249,15977,5210139,2,377,954,104,36,562,124,5992808,2806666,31746,34,1,98,3,3,1,1,78,17,2,10,5,7443466,1649629
4,2738068,123562,1183087,15665,43887,3,1603,3,262,3,234,3,2121276,2585,22636438,392913,8163,10336,2708,3332,4706,872,200
3,5764,13021,4428,10576,1910,3964,2,2,14606,2849,7650,1,5886,9210,2,1291,2,6,2370,4832,1365,210,2870,7621,3305,49,5521,2
202,435,4795,1359,853,149,517,1553,3140,1,6,2816,4135,591,3190,218,3,2103,2,521,2481,2158,246,2097,5,126,2835,1,4502,2,1
899,1822,174,2591,92,880,2854,2434,289,4020,1643,1261,108,112,668,139,40,4,187,950,1213,487,61,285,75,2,1062,261,6,323,2
13,2978,1,643,4,774,1,2529,507,79,489,36,2,4,96,3555,2,532,1459,4,99,33,1805,2873,655,302,1259,13,54,162,323,72,419,867
1,219,1,775,91,375,94,509,526,155,2,1193,280,243,378,388,218,351,136,173,25,453,1763,54,179,1,651,50,58,280,80,3,89,82,275,1537,51,432,41,394,52,244,8,47,241,1,301,3,5,80,444,4,47,109,318,101,1200,2561,2454,1212,21343804,360645,218,6618,5
31,433,965',kBL:'Uggt',kOPI:89978449};{function(){{var a; funll==(a-window.google.kEI=-g.kEI:window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window.google.kPI=-window

var h=this||self;function l(){return void 0!==window.google&&void 0!==window.google.kOPI&&0!==window.google.kOPI?window.google.kOPI?window.google.kOPI:null};var m,n=[];function p(a){for(var b;a&&(!a.getAttribute||!(b=a.getAttribute("eid")));)a=a.parentNode;return b||m}function q(a){for(var b=null;a&&(!a.getAttribute||!(b=a.getAttribute("leid")));)a=a.parentNode;return b}functi on r(a){/^http:/i.test(a)&&"https:"===window.location.protocol&&(google.ml&&google.ml(Error("a"),!1,{src:a,glmm:1}),a="");return a}

// Feturn a/function t(a,b,c,d,k){var e="";-1===b.search("&ei=")&&(e="&ei="+p(d),-1===b.search("&lei=")&&(d=q(d))&&(e+="&lei="+d));d

="";var g=-1==b.search("&cshid=")&&"slh"!==a,f=[];f.push(["zx",Date.now().toString()]);h._cshid&&&&f.push(["cshid",h._
cshid]);c=c();null!=cs&f.push(["opi",c.toString()]);for(c=0;c<f.length;c++){if(0===c||o<cd)d=="\frac{10}{2}";d+=f[c][0]+"="+f[c][1]}

return"/"+(k||"gen_204")+"?atyp=i&ct="+String(a)+"&cad="+(b+e+d)};m=google.kEI;google.getEI=p;google.getLeI=q;google.ml=
function(){return null};google.log=function(a,b,c,d,k,e){e=void 0===e?l:e;c||(c=t(a,b,e,d,k));if(c=r(c)){a=new Image;var

q=n.length;n[g]=a;a.onerror=a.onload=a.onabort=function(){delete n[g]};a.src=c}};google.logUrl=function(a,b){b=void 0==}
</pre>