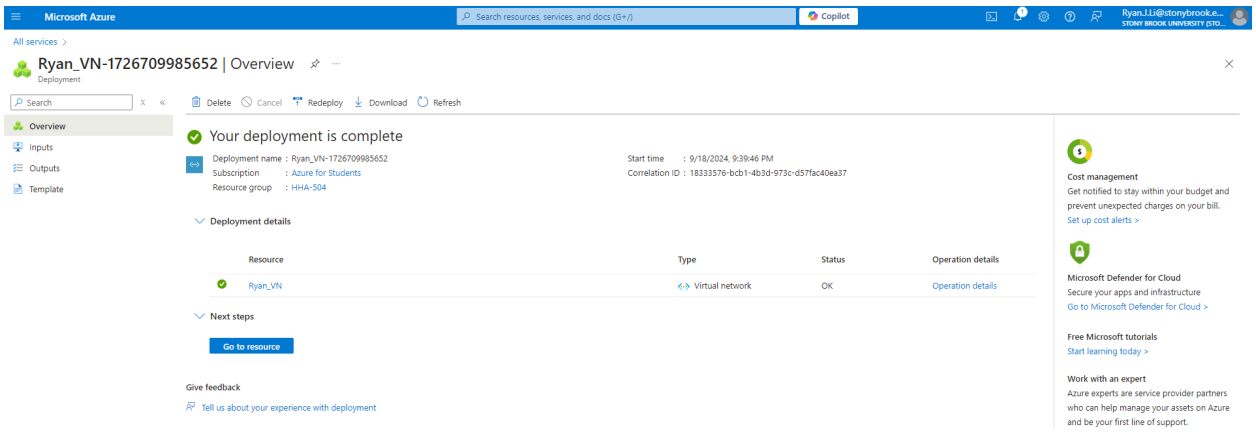
Ryan Li
HHA504_assignment_networking

Azure

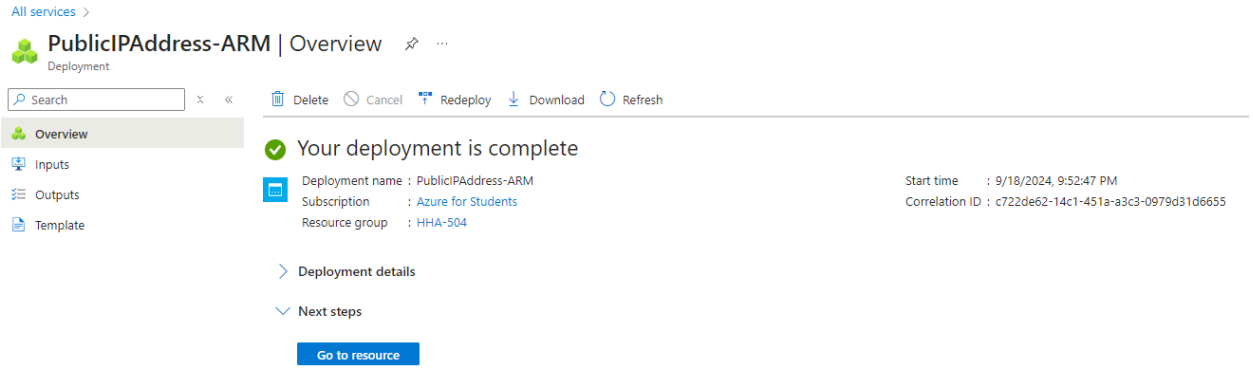
1. Create a Virtual Private Cloud (VPC)

- Go to virtual networks
- Click create to start setting up the VNET
- Choose student subscription
- Create a new resource group or click on existing one
- Enter name - ryan_VN
- Choose region
- Select IP address - 10.0.0.0/16
- Click create to deploy virtual network



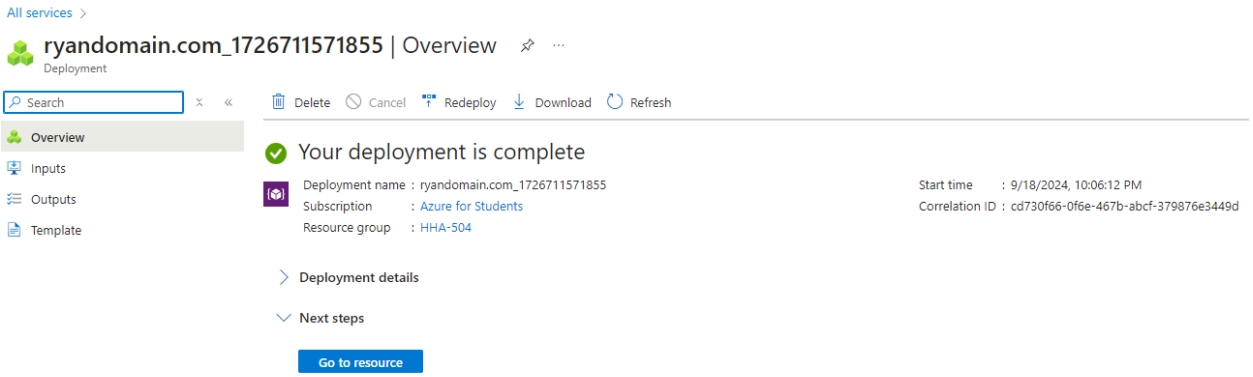
2. Assign a Dedicated IP

- Search for public IP addresses and click create
- Choose subscription
- Select resource group that contains the VM or create new one
- Enter name - ryan-static-ip
- Select region - needs to be the same region as VN
- Choose standard or basic - standard supports zone redundancy, basic used for production environments
- Click create to serserve the static IP address



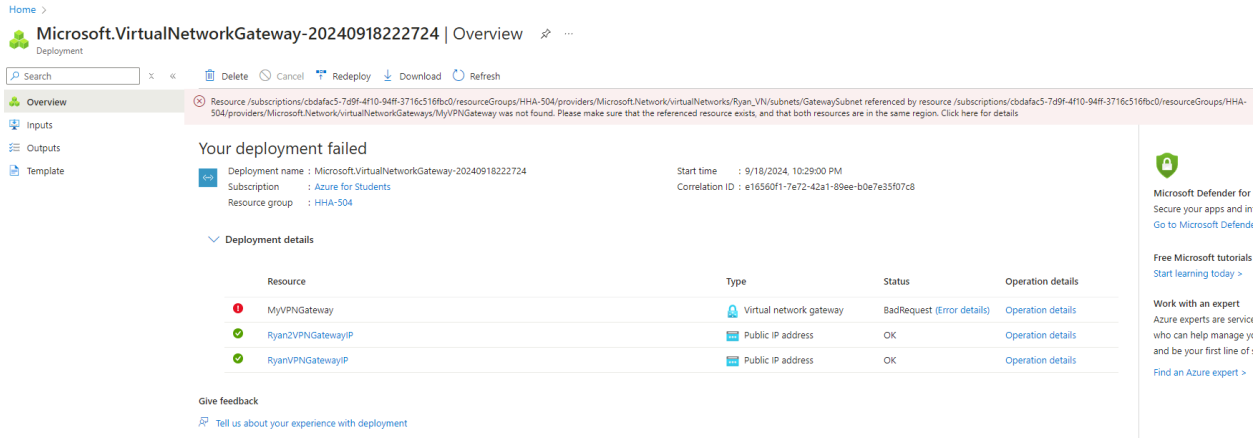
3. Map IP to a Domain

- Search for Azure DNS zones
- Select student subscription
- Choose resource group
- Enter domain name - ryandomain.com
- Choose location for the DNS zone
- Click create



4. Explore VPN and Tunnels (Optional)

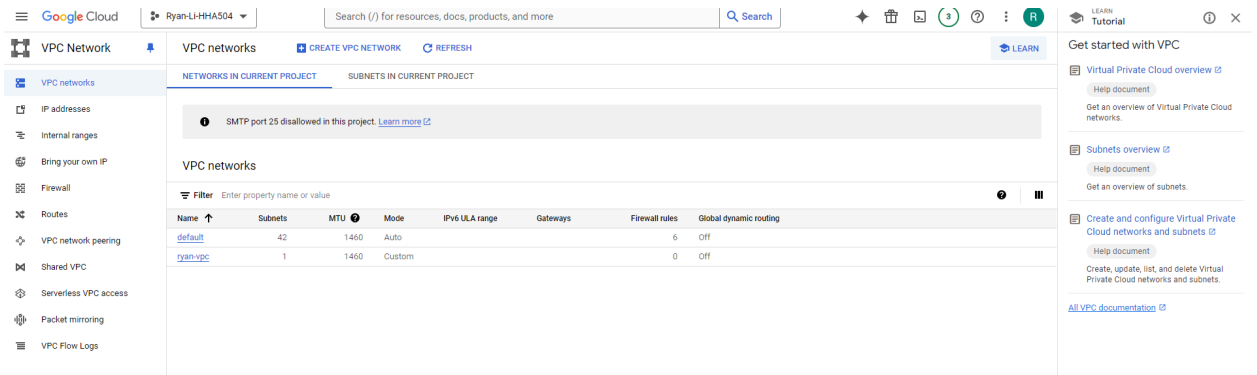
1. Create virtual network and gateway subnet
2. Create a VPN gateway and select the VN that was just created. Create a new public IP address for the gateway
3. Select create to deploy VPN gateway
4. Ran into deployment failed error



GCP

1. Create a Virtual Private Cloud (VPC)

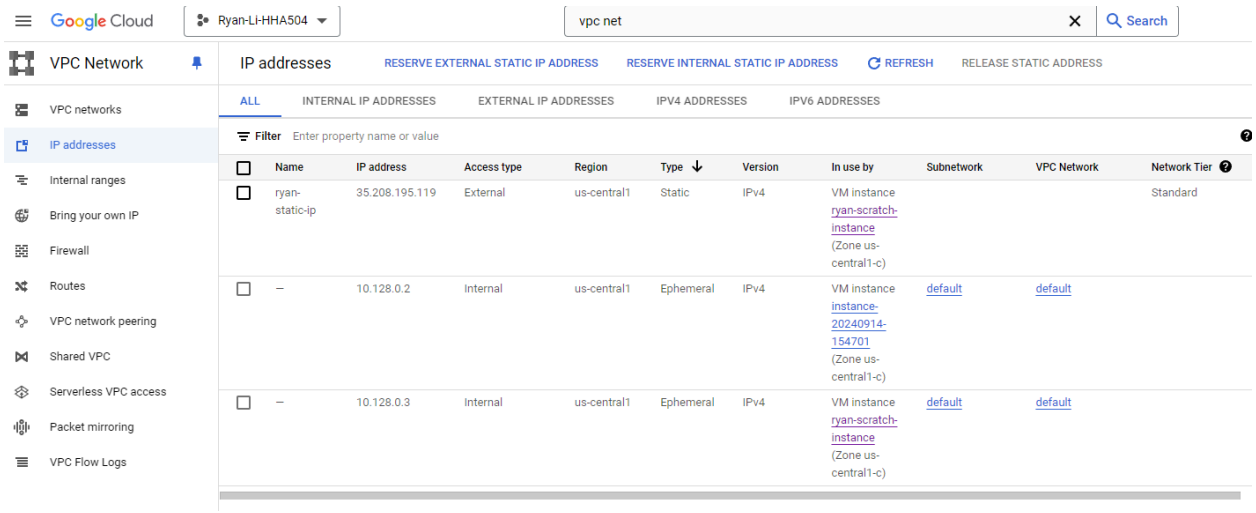
- Search VPC networks
- Create VPC network
- Name VPC - ryan-VPC
- Select custom subnet mode
- Add a subnet: 10.0.0.0/24
- Select create to deploy the VPC



2. Assign a Dedicated IP

- Search for external IP address
- Click reserve static address on external IP addresses page
- Name IP address - ryan-static-ip
- Assign to a region
- Select standard network tier

- Reserve the IP
- Assign ip to compute engine - select the served static ip
- Save the configuration to assign the static IP to the instance



3. Map IP to a Domain

- Search for Cloud DNS
- Click create zone on top
- Enter name for DNS zone - ryan-dns-zone
- Enter domain name - ryandomain.com
- DNSSEC off
- Click create