

Infrastructure as Code (IaC) AWS Private VPC Setup

This repository contains Terraform code to create a private Virtual Private Cloud (VPC) in AWS. The setup includes subnets, route tables, security groups, and other necessary components to establish a secure and isolated network environment.

Below is the Terraform visualization of the infrastructure that's created:

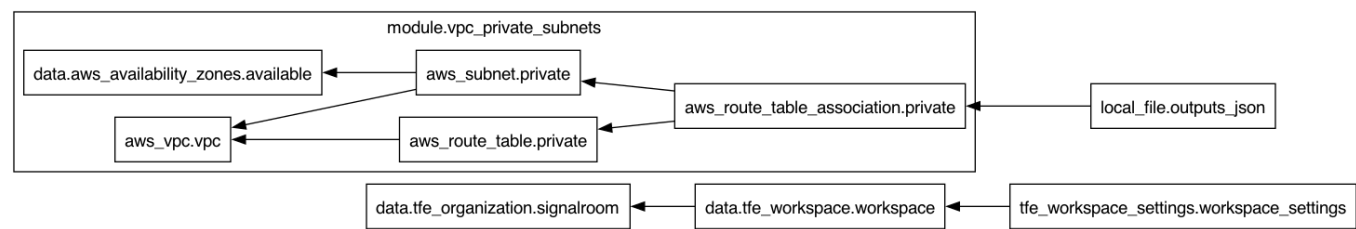


Table of Contents

- [1.0 deploy.sh script arguments](#)
 - [1.1 subnet_prefix argument:](#)
- [2.0 Resources](#)

1.0 deploy.sh script arguments

1.1 subnet_prefix argument:

VPC Prefix	subnet_prefix	newbits	Resulting Subnets	IPs per Subnet
/16	/20	4	16 subnets	4,096
/16	/24	8	256 subnets	256
/16	/28	12	4,096 subnets	16
/20	/24	4	16 subnets	256
/20	/28	8	256 subnets	16
/24	/28	4	16 subnets	16

What you need to know:

- The **newbits** determines how many additional bits to add to the network prefix for subnettings.
- The **VPC Prefix** is the number after the slash in your VPC's CIDR block. It indicates **how many bits define the network portion** of the IP address range.
- The **subnet_prefix** is the target prefix length you want for your subnetsafter subdividing your VPC CIDR block.

2.0 Resources

- [CIDR to IPv4 Conversion](#)

