**Additional Resources**

In the files you create in the modules/vpc directory, you will need to insert the following provided code.

In the main.tf file:

provider "aws" {

region = var.region

}

resource "aws\_vpc" "this" {

cidr\_block = "10.0.0.0/16"

}

resource "aws\_subnet" "this" {

vpc\_id = aws\_vpc.this.id

cidr\_block = "10.0.1.0/24"

}

data "aws\_ssm\_parameter" "this" {

name = "/aws/service/ami-amazon-linux-latest/amzn2-ami-hvm-x86\_64-gp2"

}

In the variables.tf file:

variable "region" {

type = string

default = "us-east-1"

}

In the outputs.tf file:

output "subnet\_id" {

value = aws\_subnet.this.id

}

output "ami\_id" {

value = data.aws\_ssm\_parameter.this.value

}

In the files you create in the terraform\_project directory, you will need to insert the following provided code.

In the main.tf file:

variable "main\_region" {

type = string

default = "us-east-1"

}

provider "aws" {

region = var.main\_region

}

module "vpc" {

source = "./modules/vpc"

region = var.main\_region

}

resource "aws\_instance" "my-instance" {

ami = module.vpc.ami\_id

subnet\_id = module.vpc.subnet\_id

instance\_type = "t2.micro"

}

In the outputs.tf file:

output "PrivateIP" {

description = "Private IP of EC2 instance"

value = aws\_instance.my-instance.private\_ip

}