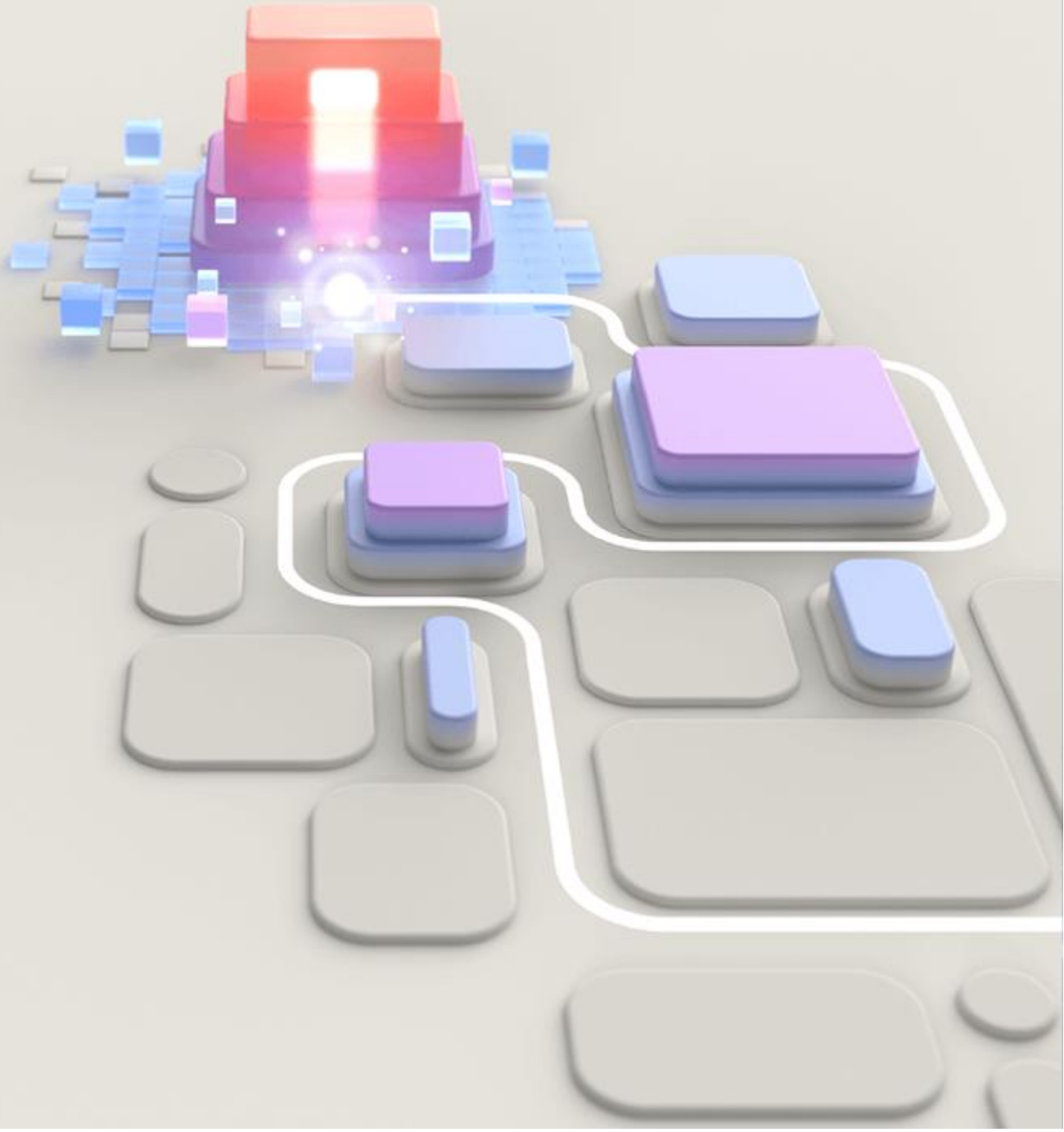
Microsoft

AZ-104

Administer Intersite Connectivity



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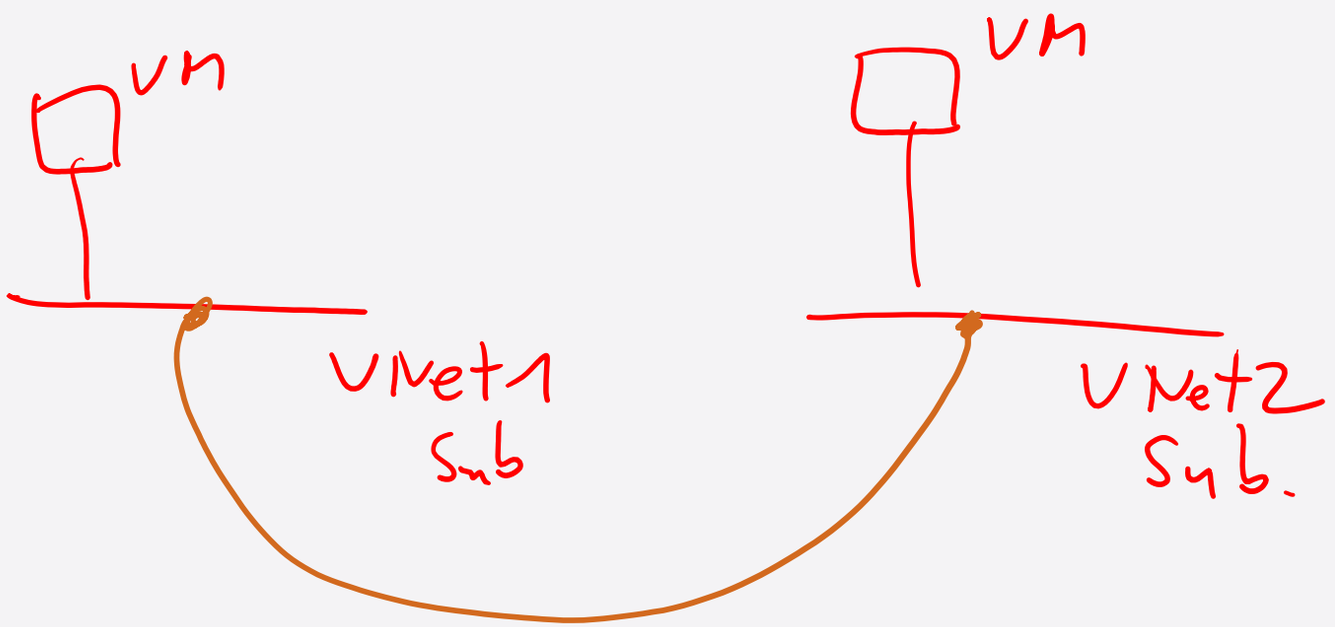
AZ-104 Agenda

01: Administer Identity
02: Administer Governance and Compliance
03: Administer Azure Resources
04: Administer Virtual Networking
05: Administer Intersite Connectivity
06: Administer Network Traffic Management
07: Administer Azure Storage
08: Administer Azure Virtual Machines
09: Administer PaaS Compute Options
10: Administer Data Protection
11: Administer Monitoring

Learning Objectives – Administer Intersite Connectivity

- Configure VNet Peering
- Manage and control traffic flow with routes
- Lab 05 – Implement Intersite Connectivity



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Configure VNet Peering

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Learning Objectives – Configure VNet Peering

- Determine VNet Peering Uses
- Determine Gateway Transit and Connectivity Needs
- Create VNet Peering
- Determine Service Chaining Uses
- Demonstration – VNet Peering
- Learning Recap

Implement and manage virtual networking (15–20%): Configure and manage virtual networks in Azure

- Create and configure virtual network peering

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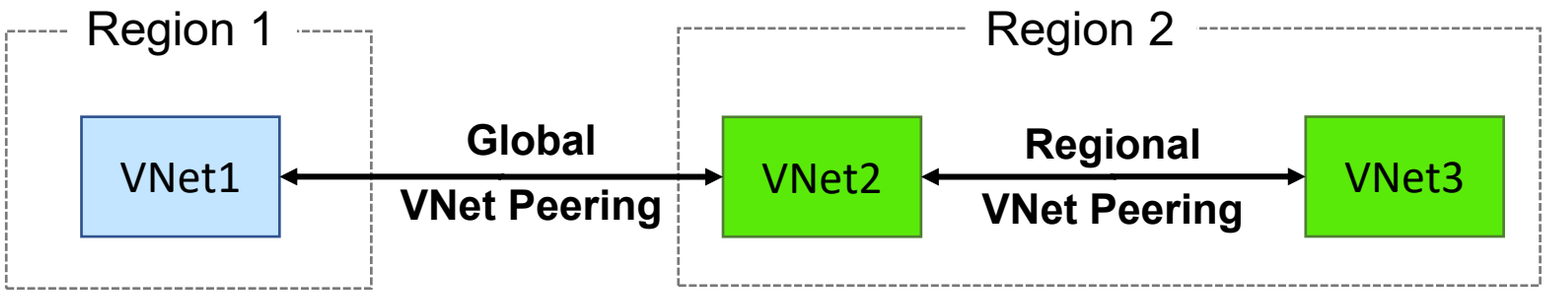
Determine VNet Peering Uses



- Two types of peering: Global and Regional
- Connects two Azure virtual networks – you can peer across subscriptions and tenants
- Peered networks use the Azure backbone for privacy and isolation
- Easy to setup, seamless data transfer, and great performance

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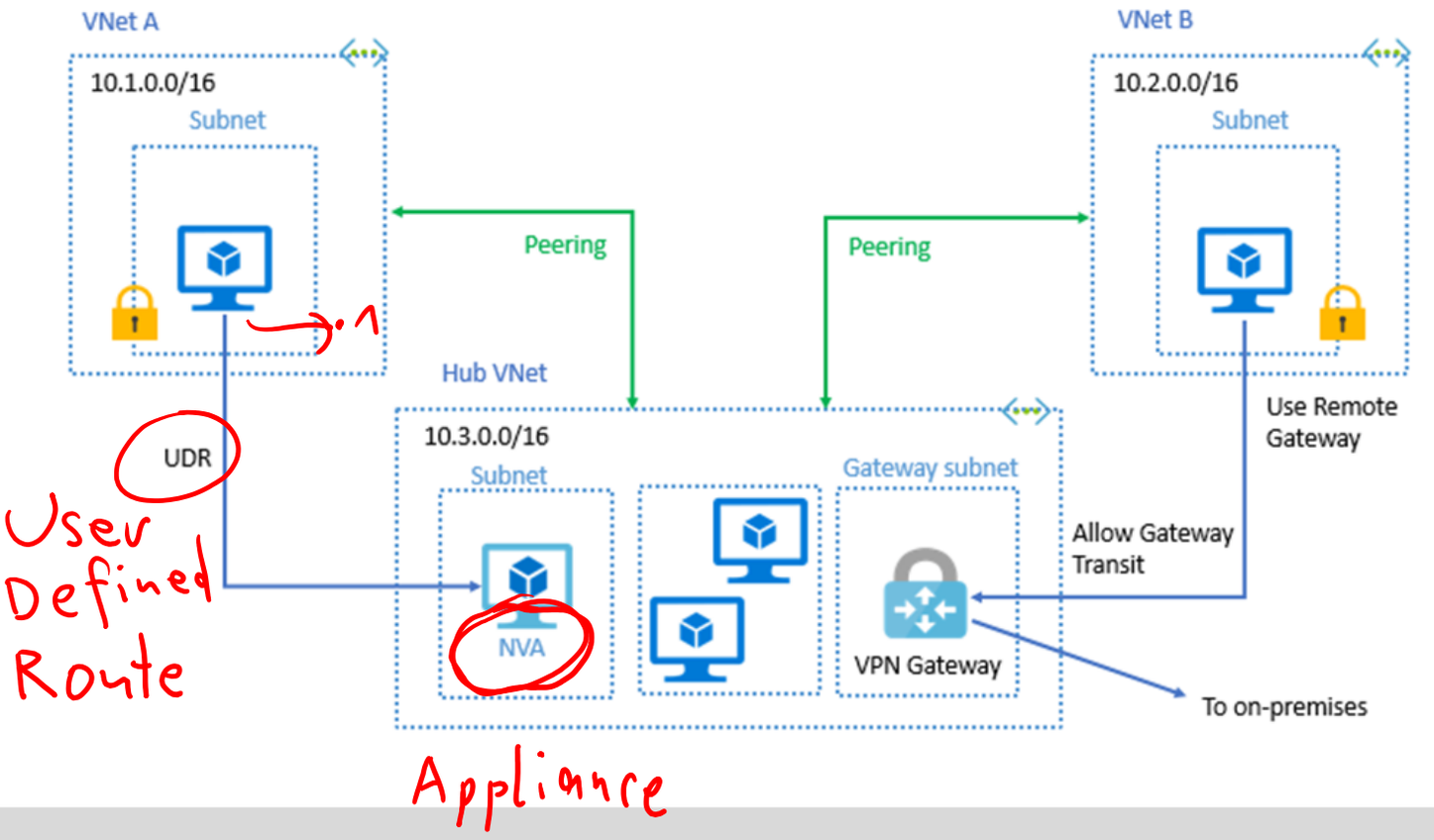
Determine Gateway Transit and Connectivity Needs

Gateway transit allows peered virtual networks to share the gateway and get access to resources

No VPN gateway is required in the peered spoke virtual network

Default VNet peering provides full connectivity



IP address spaces of connected networks can't overlap

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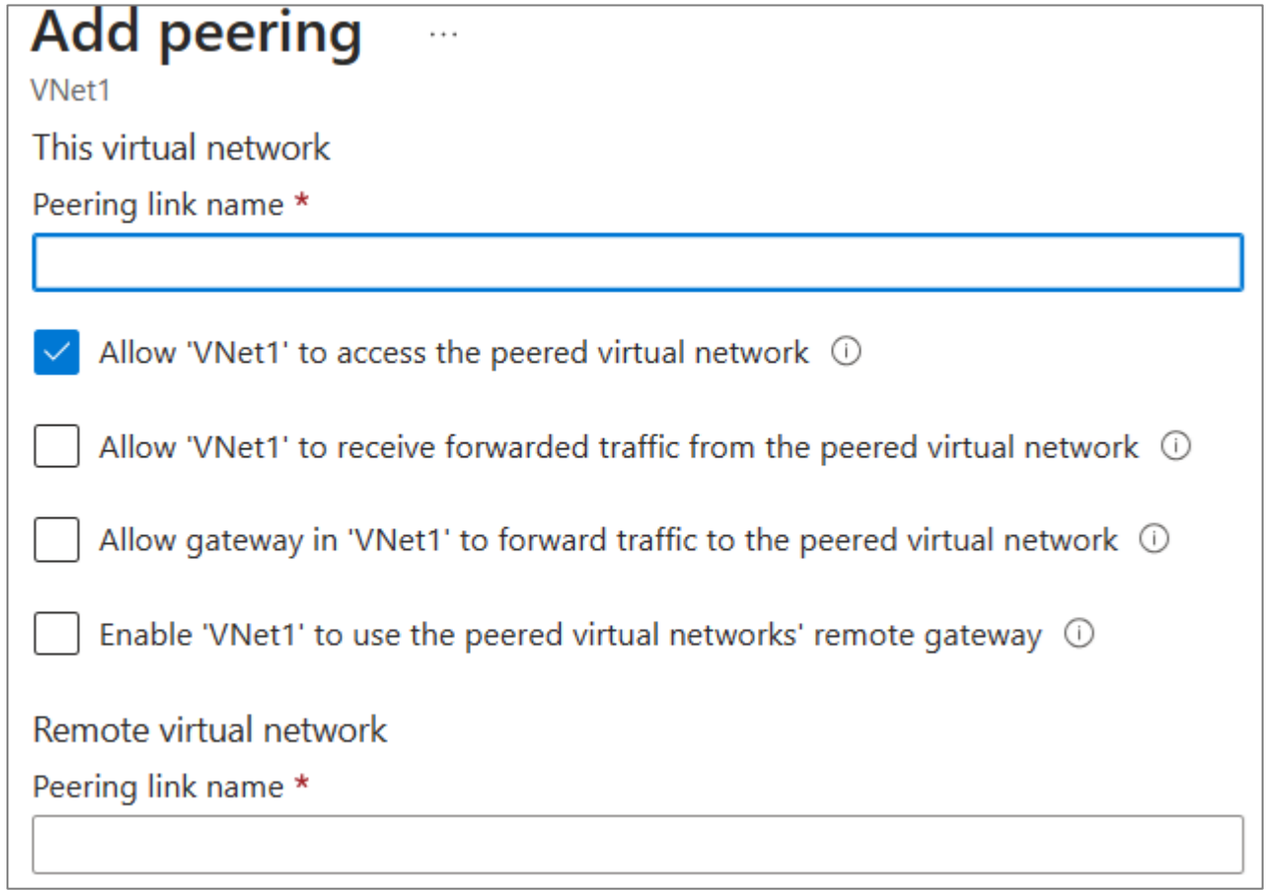
Create VNet Peering

Allow virtual network access settings

Configure forwarded traffic settings

Status should show “connected”



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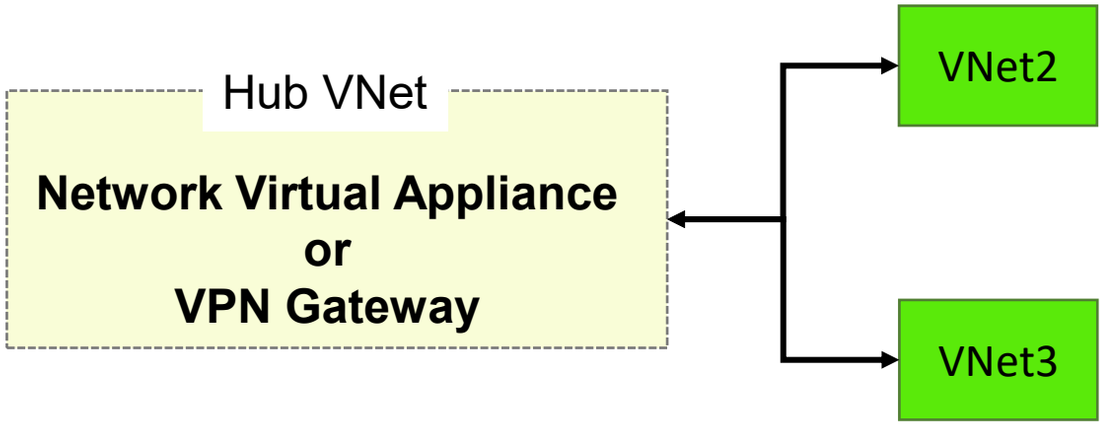
Determine Service Chaining Uses

Leverage user-defined routes and service chaining to implement custom routing

Implement a VNet hub with a network virtual appliance or a VPN gateway

Service chaining enables you to direct traffic from one virtual network to a virtual appliance, or virtual network gateway, in a peered virtual network, through user-defined routes



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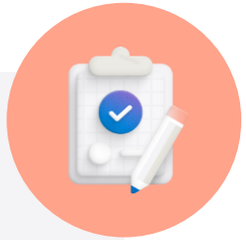
Learning Recap – Configure VNet Peering



Reference modules

- Configure Azure Virtual Network peering

Check your knowledge questions and additional study

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Manage and control traffic flow with routes

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Configure Network Routing and Endpoints Introduction

- Review System Routes
- Identify User-Defined Routes
- Demonstration – Custom Routing tables
- Determine Service Endpoint Uses
- Identify Private Link Uses
- Learning Recap

Implement and manage virtual networking (15–20%): Configure and manage virtual networks in Azure

- Configure user-defined network routes

Implement and manage virtual networking (15–20%): Configure secure access to virtual networks

- Configure service endpoints for Azure platform as a service (PaaS)
- Configure private endpoints for Azure PaaS

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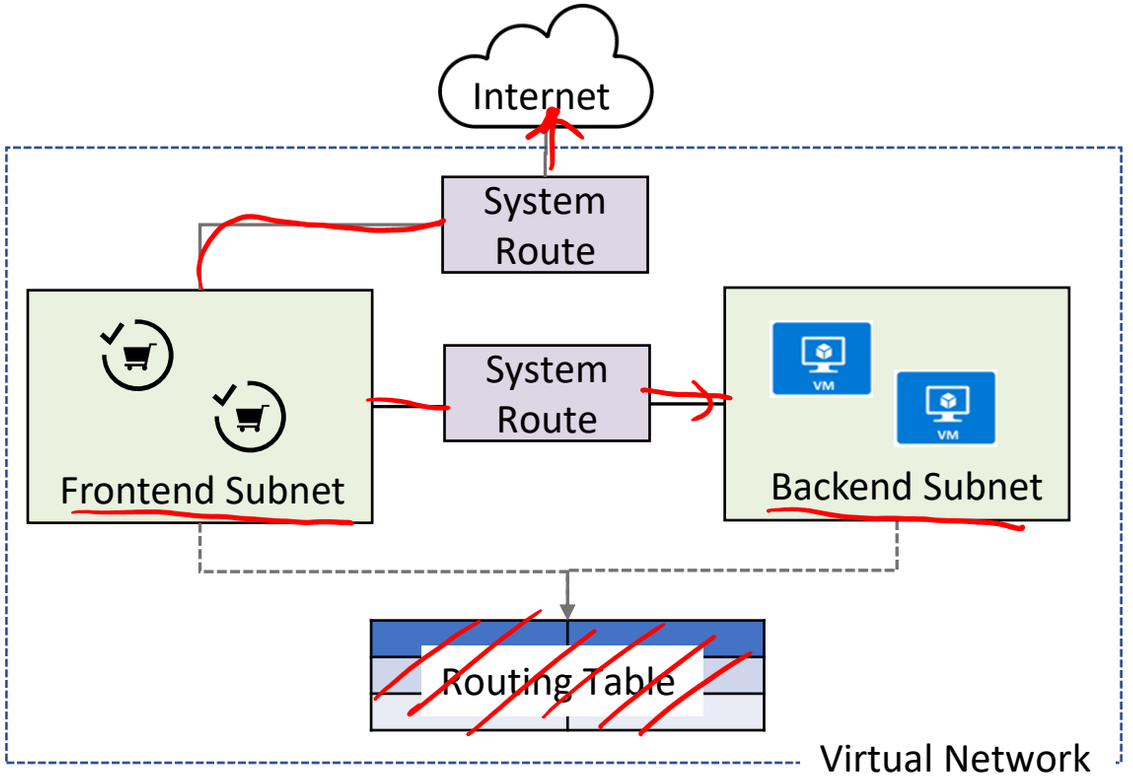
Review System Routes

Directs network traffic between virtual machines, on-premises networks, and the internet

- Traffic between VMs in the same subnet
- Between VMs in different subnets in the same virtual network
- Data flow from VMs to the internet
- Communication between VMs using a VNet-to-VNet VPN
- Site-to-Site and ExpressRoute communication through the VPN gateway



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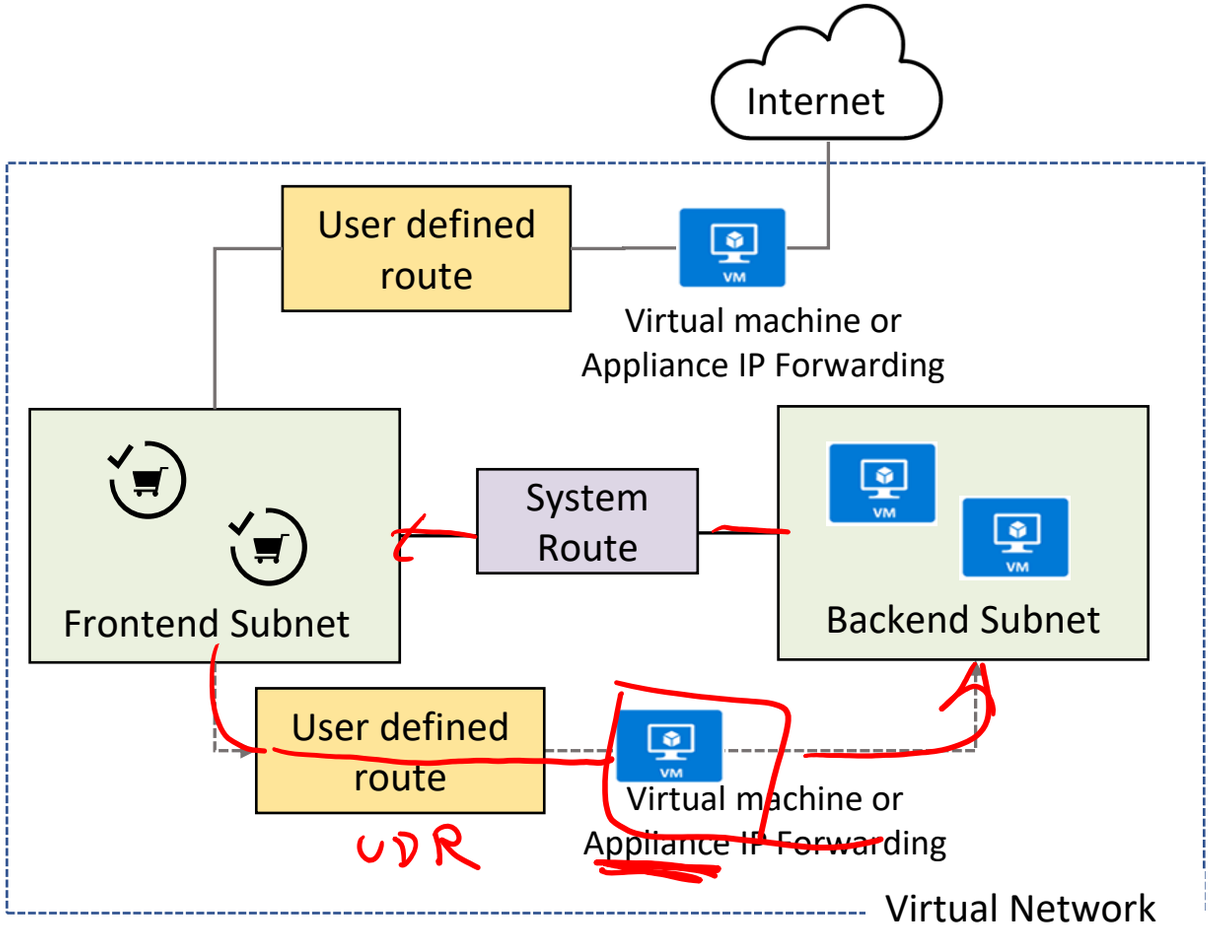
Identify User-Defined Routes

A route table contains a set of rules, called routes, that specifies how packets should be routed in a virtual network

User-defined routes are custom routes that control network traffic by defining routes that specify the next hop of the traffic flow

The next hop can be a virtual network gateway, virtual network, internet, or virtual appliance



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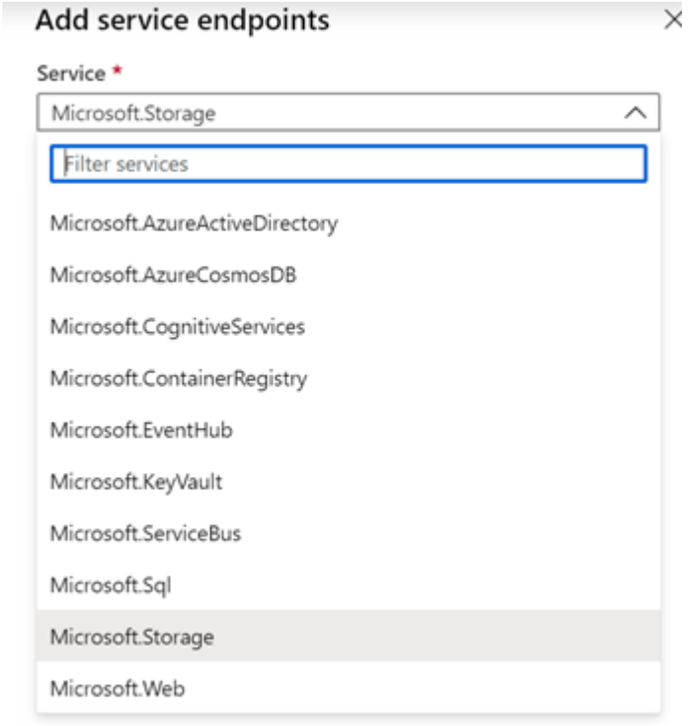
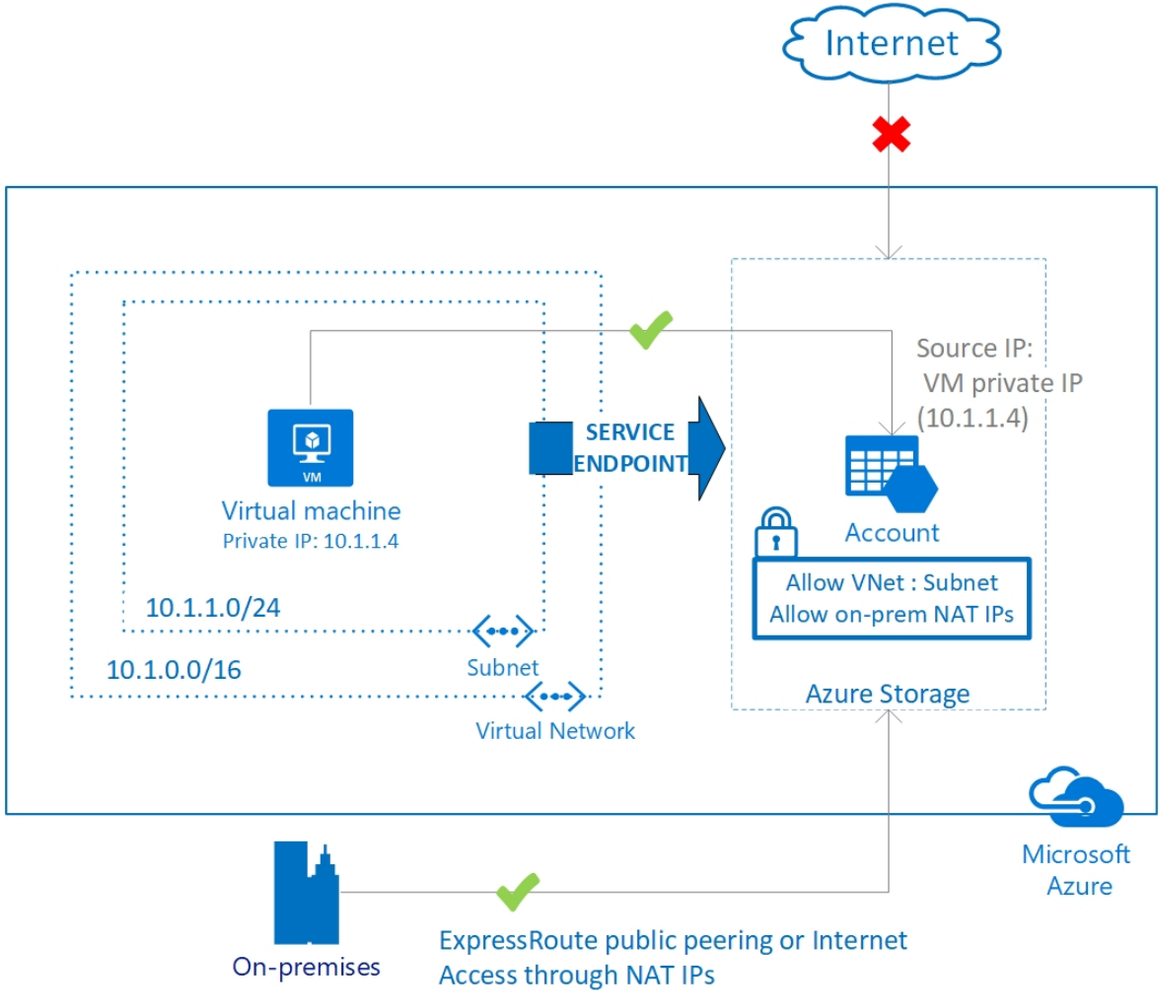
Determine Service Endpoint Uses

Endpoints limit network access to specific services

Adding service endpoints can take up to 15 minutes to complete





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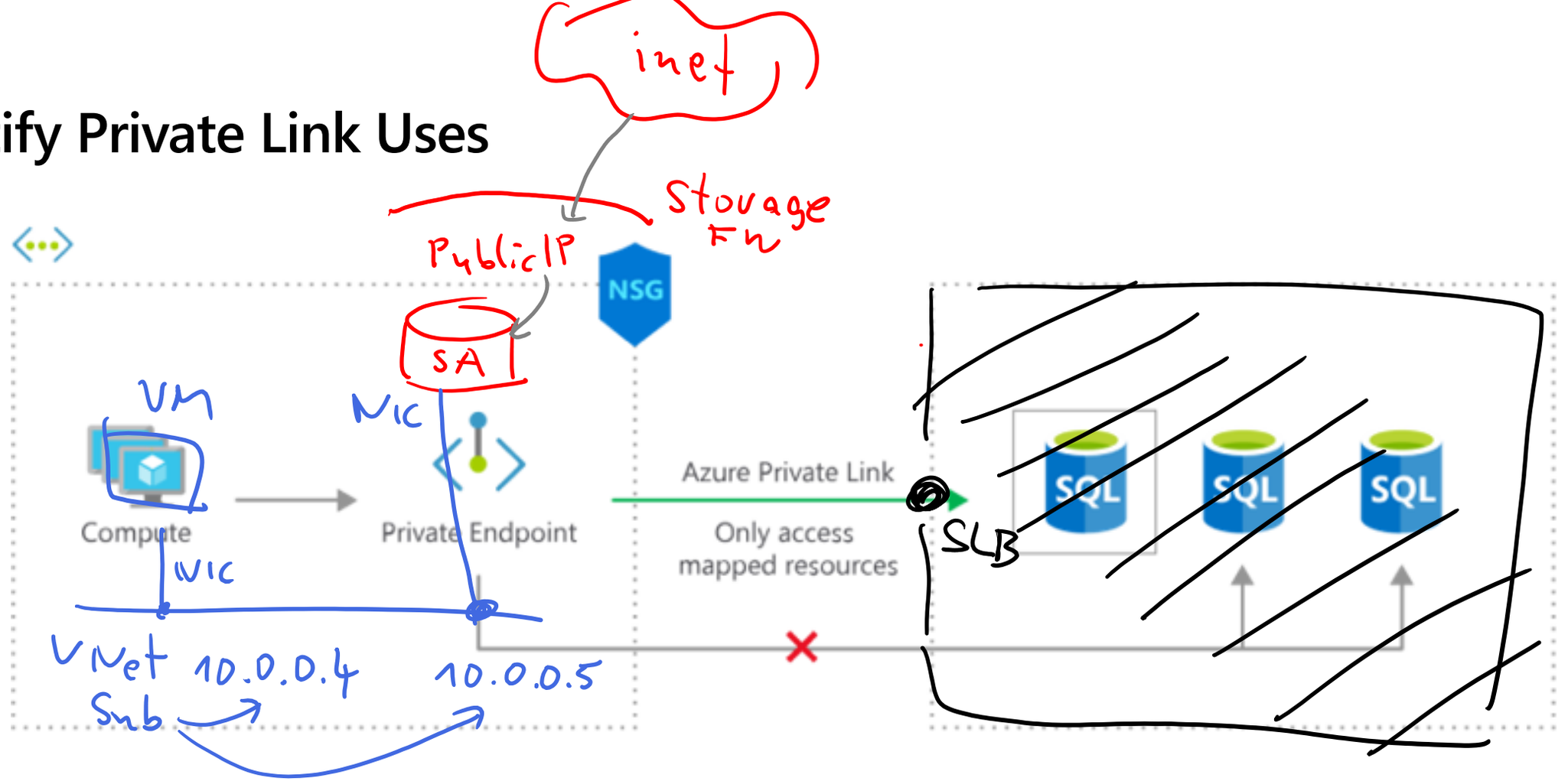
Identify Private Link Uses



Private connectivity to services on Azure. Traffic remains on the Microsoft network, with no public internet access

Integration with on-premises and peered networks

In the event of a security incident within your network, only the mapped resource would be accessible

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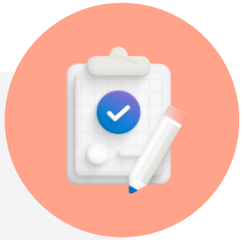
Learning Recap – Manage and control traffic flow with routes



Check your knowledge questions and additional study

Reference modules

- Manage and control traffic flow in your Azure deployment with routes
- Introduction to Azure Private Link

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Lab - Implement Intersite Connectivity

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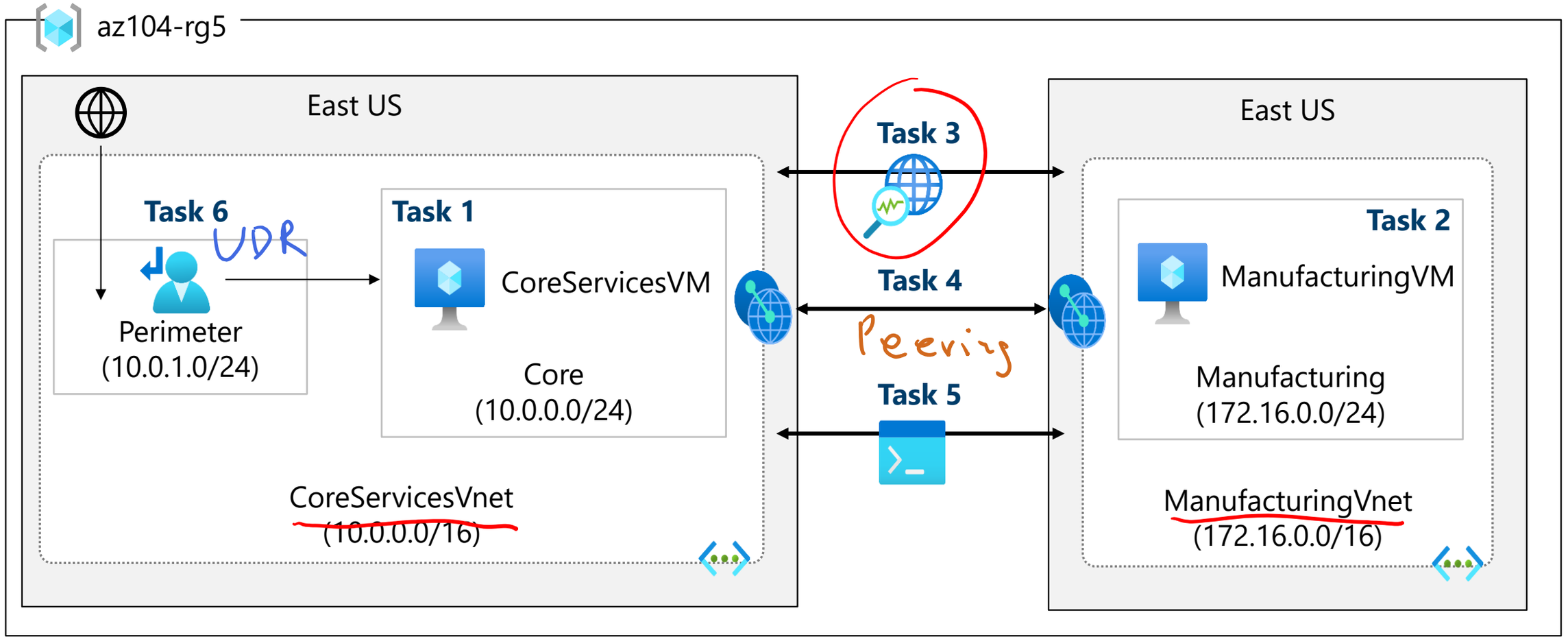
Lab 05 – Architecture diagram



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End of presentation

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