IP Address

Static public IP addresses are commonly used in the following scenarios:

- ✓ When you must update firewall rules to communicate with your Azure resources.
- ✓ DNS name resolution, where a change in IP address would require updating A records.
- ✓ Your Azure resources communicate with other apps or services that use an IP address-based security model.
- ✓ You use TLS/SSL certificates linked to an IP address.

You can associate a public IP address resource with:

- ✓ Virtual machine network interfaces
- ✓ Internet-facing load balancers
- ✓ Virtual Network gateways (VPN/ER)
- ✓ NAT gateways
- ✓ Application gateways
- ✓ Azure Firewall
- ✓ Bastion Host

Basic SKU addresses:

- ✓ For IPv4: Can be assigned using the dynamic or static allocation method. For IPv6: Can only be assigned using the dynamic allocation method.
- ✓ Have an adjustable inbound originated flow idle timeout of 4-30 minutes, with a default of 4 minutes, and fixed outbound originated flow idle timeout of 4 minutes.
- ✓ Are open by default. Network security groups are recommended but optional for restricting inbound or outbound traffic.
- ✓ Don't support Availability Zone scenarios.
- ✓ Don't support routing preference or cross-region load balancers functionality.

Standard SKU public IP addresses:

- ✓ Always use static allocation method.
- ✓ Have an adjustable inbound originated flow idle timeout of 4-30 minutes, with a default of 4 minutes, and fixed outbound originated flow idle timeout of 4 minutes.
- ✓ Designed to align with the "secure by default" model and be closed to inbound traffic when used as a frontend. NSG is required to allow traffic.
- ✓ Can be configured with zone-redundant (which is advertised from all three zones), zonal (which is guaranteed in a specific pre-selected availability zone), or "no-zone" (which isn't associated with a specific pre-selected availability zone) options.
- ✓ Zone redundant IPs can only be created in regions where three availability zone are live.
- ✓ Can be utilized with the routing preference to enable more granular control of how traffic is routed between Azure and the Internet.
- ✓ Can be used as anycast frontend IPs for cross-region load balancers (preview functionality).