



Windows PowerShell Get-Help on Cmdlet 'New-AzPublicIpAddress'

PS:\>Get-HELP New-AzPublicIpAddress -Full

WARNING: The names of some imported commands from the module 'Microsoft.Azure.PowerShell.Cmdlets.Network' include unapproved verbs that might make them less discoverable.

To find the commands with unapproved verbs, run the Import-Module command again with the Verbose parameter. For a list of approved verbs, type Get-Verb.

NAME

New-AzPublicIpAddress

SYNOPSIS

Creates a public IP address.

SYNTAX

```
New-AzPublicIpAddress -AllocationMethod {Dynamic | Static} [-AsJob] [-DdosProtectionMode {VirtualNetworkInherited | Enabled | Disabled}] [-DdosProtectionPlanId <System.String>] [-DefaultProfile <Microsoft.Azure.Commands.Common.Authentication.Abstractions.Core.IAzureContextContainer>] [-DomainNameLabel <System.String>] [-DomainNameLabelScope {TenantReuse | SubscriptionReuse | ResourceGroupReuse | NoReuse}] [-EdgeZone <System.String>] [-Force] [-IdleTimeoutInMinutes <System.Int32>] [-IpAddress <System.String>] [-IpAddressVersion {IPv4 | IPv6}]
```

```
<Microsoft.Azure.Commands.Network.Models.PSPublicIpTag[]> -Location <System.String> [-Name
    <System.String>] [-PublicIpPrefix <Microsoft.Azure.Commands.Network.Models.PSPublicIpPrefix>]
-ResourceGroupName <System.String> [-ReverseFqdn <System.String>] [-Sku
    {Basic | Standard}] [-Tag <System.Collections.Hashtable>] [-Tier {Regional | Global}] [-Zone <System.String[]>] [-Confirm]
[-WhatIf] [<CommonParameters>]
```

DESCRIPTION

The New-AzPublicIpAddress cmdlet creates a public IP address.

PARAMETERS

-AllocationMethod <System.String>

Specifies the method with which to allocate the public IP address. The acceptable values for this parameter are: Static or Dynamic.

Required? true

Position? named

Default value None

Accept pipeline input? True (ByPropertyName)

Accept wildcard characters? false

-AsJob <System.Management.Automation.SwitchParameter>

Run cmdlet in the background

Required? false

Position? named

Default value False

Accept pipeline input? False

Accept wildcard characters? false

-DdosProtectionMode <System.String>

The DdosProtectionMode to use for Public IP address

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-DdosProtectionPlanId <System.String>

The DdosProtectionPlan id to attach to the Public IP address

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-DefaultProfile <Microsoft.Azure.Commands.Common.Authentication.Abstractions.Core.IAzureContextContainer>

The credentials, account, tenant, and subscription used for communication with azure.

Required? false
Position? named
Default value None
Accept pipeline input? False
Accept wildcard characters? false

-DomainNameLabel <System.String>

Specifies the relative DNS name for a public IP address.

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

<System.Nullable`1[Microsoft.Azure.Commands.Network.Models.PSDomainNameLabelScopeType]>

Specifies the HashedReusePolicy for DNS name for a public IP address.

Required? false

Position? named

Default value None

Accept pipeline input? True (ByPropertyName)

Accept wildcard characters? false

-EdgeZone <System.String>

The name of the extended location.

Required? false

Position? named

Default value None

Accept pipeline input? True (ByPropertyName)

Accept wildcard characters? false

-Force <System.Management.Automation.SwitchParameter>

Forces the command to run without asking for user confirmation.

Required? false

Position? named

Default value False

Accept pipeline input? False

Accept wildcard characters? false

-IdleTimeoutInMinutes <System.Int32>

Specifies the idle time-out, in minutes.

Required? false

Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-IpAddress <System.String>

Specifies the IP address when creating a BYOIP publicIpAddress.

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-IpAddressVersion <System.String>

Specifies the version of the IP address.

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-IpTag <Microsoft.Azure.Commands.Network.Models.PSPublicIpTag[]>

IpTag List.

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-Location <System.String>

Specifies the region in which to create a public IP address.

Required?	true
Position?	named
Default value	None
Accept pipeline input?	True (ByPropertyName)
Accept wildcard characters?	false

-Name <System.String>

Specifies the name of the public IP address that this cmdlet creates.

Required?	false
Position?	named
Default value	None
Accept pipeline input?	True (ByPropertyName)
Accept wildcard characters?	false

-PublicIpPrefix <Microsoft.Azure.Commands.Network.Models.PSPublicIpPrefix>

Specifies the PSPublicIpPrefix from which to allocate the public IP address.

Required?	false
Position?	named
Default value	None
Accept pipeline input?	True (ByPropertyName)
Accept wildcard characters?	false

-ResourceGroupName <System.String>

Specifies the name of the resource group in which to create a public IP address.

Required?	true
Position?	named
Default value	None
Accept pipeline input?	True (ByPropertyName)

Accept wildcard characters? false

-ReverseFqdn <System.String>

Specifies a reverse fully qualified domain name (FQDN).

Required? false

Position? named

Default value None

Accept pipeline input? True (ByPropertyName)

Accept wildcard characters? false

-Sku <System.String>

The public IP Sku name.

Required? false

Position? named

Default value None

Accept pipeline input? True (ByPropertyName)

Accept wildcard characters? false

-Tag <System.Collections.Hashtable>

Key-value pairs in the form of a hash table. For example: @{key0="value0";key1=\$null;key2="value2"}

Required? false

Position? named

Default value None

Accept pipeline input? True (ByPropertyName)

Accept wildcard characters? false

-Tier <System.String>

The public IP Sku Tier.

Required? false

Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-Zone <System.String[]>

A list of availability zones denoting the IP allocated for the resource needs to come from.

Required? false
Position? named
Default value None
Accept pipeline input? True (ByPropertyName)
Accept wildcard characters? false

-Confirm <System.Management.Automation.SwitchParameter>

Prompts you for confirmation before running the cmdlet.

Required? false
Position? named
Default value False
Accept pipeline input? False
Accept wildcard characters? false

-WhatIf <System.Management.Automation.SwitchParameter>

Shows what would happen if the cmdlet runs. The cmdlet is not run.

Required? false
Position? named
Default value False
Accept pipeline input? False
Accept wildcard characters? false

<CommonParameters>

This cmdlet supports the common parameters: Verbose, Debug, ErrorAction, ErrorVariable, WarningAction, WarningVariable, OutBuffer, PipelineVariable, and OutVariable. For more information, see [about_CommonParameters \(https://go.microsoft.com/fwlink/?LinkID=113216\)](https://go.microsoft.com/fwlink/?LinkID=113216).

INPUTS

System.String

Microsoft.Azure.Commands.Network.Models.PSPublicIpTag[]

Microsoft.Azure.Commands.Network.Models.PSPublicIpPrefix

System.Int32

System.String[]

System.Collections.Hashtable

OUTPUTS

Microsoft.Azure.Commands.Network.Models.PSPublicIpAddress

NOTES

----- Example 1: Create a new public IP address -----

```
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-DomainNameLabel $dnsPrefix -Location $location
```

This command creates a new public IP address resource. A DNS record is created for \$dnsPrefix.\$location.cloudapp.azure.com pointing to the public IP address of this

resource. A public IP address is immediately allocated to this resource as the -AllocationMethod is specified as 'Static'. If it is specified as 'Dynamic', a public

IP address gets allocated only when you start (or create) the associated resource (like a VM or load balancer).

-- Example 2: Create a public IP address with a reverse FQDN --

```
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-DomainNameLabel $dnsPrefix -Location $location -ReverseFqdn  
$customFqdn
```

This command creates a new public IP address resource. With the -ReverseFqdn parameter, Azure creates a DNS PTR record (reverse-lookup) for the public IP address

allocated to this resource, pointing to the \$customFqdn specified in the command. As a pre-requisite, the \$customFqdn (say webapp.contoso.com) should have a DNS CNAME

record (forward-lookup) pointing to \$dnsPrefix.\$location.cloudapp.azure.com.

----- Example 3: Create a new public IP address with IpTag -----

```
$ipTag = New-AzPublicIpTag -IpTagType "FirstPartyUsage" -Tag "/Sql"  
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-DomainNameLabel $dnsPrefix -Location $location -IpTag $ipTag
```

This command creates a new public IP address resource. A DNS record is created for \$dnsPrefix.\$location.cloudapp.azure.com pointing to the public IP address of this resource. A public IP address is immediately allocated to this resource as the -AllocationMethod is specified as 'Static'. If it is specified as 'Dynamic', a public IP address gets allocated only when you start (or create) the associated resource (like a VM or load balancer). An Iptag is used to specify the Tags associated with resource. Iptag can be specified using New-AzPublicIpTag and passed as input through -IpTags.

--- Example 4: Create a new public IP address from a Prefix ---

```
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-DomainNameLabel $dnsPrefix -Location $location  
-PublicIpPrefix $publicIpPrefix -Sku Standard
```

This command creates a new public IP address resource. A DNS record is created for \$dnsPrefix.\$location.cloudapp.azure.com pointing to the public IP address of this resource. A public IP address is immediately allocated to this resource from the publicIpPrefix specified. This option is only supported for the 'Standard' Sku and 'Static' AllocationMethod.

Example 5: Create a specific public IP address from a BYOIP Prefix

```
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-Location $location -IpAddress 0.0.0.0 -PublicIpPrefix  
$publicIpPrefix -Sku Standard
```

This command creates a new public IP address resource with specific IP. NRP would check if the given IP is inside the PublicIpPrefix and if the given PublicIpPrefix is BYOIP PublicIpPrefix. the given public IP address is immediately allocated to this resource from the publicIpPrefix specified. This option is only supported for the 'Standard' Sku and 'Static' AllocationMethod and BYOIP PublicIpPrefix.

----- Example 6: Create a new global public IP address -----

```
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-DomainNameLabel $domainNameLabel -Location $location -Sku  
Standard -Tier Global
```

This command creates a new global public IP address resource. A DNS record is created for \$dnsPrefix.\$location.cloudapp.azure.com pointing to the public IP address of

this resource. A global public IP address is immediately allocated to this resource. This option is only supported for the 'Standard' Sku and 'Static'

AllocationMethod.

Example 7: Create a public IP address with a DomainNameLabelScope

```
$publicIp = New-AzPublicIpAddress -Name $publicIpName -ResourceGroupName $rgName -AllocationMethod Static  
-DomainNameLabel $dnsPrefix -DomainNameLabelScope  
$hashedReusePolicy -Location $location
```

This command creates a new public IP address resource. With the -DomainNameLabelScope parameter, Azure creates a DNS record with a hashed value in FQDN for the public

IP address allocated to this resource with the policy suggested by \$hashedReusePolicy.

RELATED LINKS

Online Version: <https://learn.microsoft.com/powershell/module/az.network/new-azpublicipaddress>

Get-AzPublicIpAddress

Remove-AzPublicIpAddress

Set-AzPublicIpAddress

