Alibaba Cloud
NAT Gateway

FAQ

Issue: 20190625

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Generic conventions

Table -1: Style conventions

Style	Description	Example
⛔	This warning information indicates a situation that will cause major system changes, faults, physical injuries, and other adverse results.	⛔ Danger: Resetting will result in the loss of user configuration data.
⚠️	This warning information indicates a situation that may cause major system changes, faults, physical injuries, and other adverse results.	⚠️ Warning: Restarting will cause business interruption. About 10 minutes are required to restore business.
📋	This indicates warning information, supplementary instructions, and other content that the user must understand.	ⓘ Notice: Take the necessary precautions to save exported data containing sensitive information.
	This indicates supplemental instructions, best practices, tips, and other content that is good to know for the user.	📋 Note: You can use Ctrl + A to select all files.
>	Multi-level menu cascade.	Settings > Network > Set network type
Bold	It is used for buttons, menus, page names, and other UI elements.	Click **OK**.
`Courier font`	It is used for commands.	Run the `cd  / d  C :/ windows` command to enter the Windows system folder.
Italics	It is used for parameters and variables.	`bae  log  list --` `instanceid` *Instance_ID*
[] or [a|b]	It indicates that it is a optional value, and only one item can be selected.	`ipconfig` *[-all|-t]*

Style	Description	Example
{} or {a|b}	**It indicates that it is a required value, and only one item can be selected.**	`swich` *{stand | slave}*

Contents

1 NAT Gateway FAQ

- *Can I configure both DNAT and SNAT rules for a public IP address?*
- *How many NAT Gateways can I create?*
- *How many DNAT entries can I add to a NAT Gateway?*
- *How many SNAT entries can I add to an SNAT Gateway?*
- *How many public IP addresses can be associated with an SNAT entry?*
- *Can I view the traffic of each VSwitch in the console of the corresponding NAT Gateway?*
- *If an ECS instance is allocated with a public IP address and configured with an SNAT entry, what can I do if I want the ECS instance to access the Internet through the public IP address in the SNAT entry?*
- *If an ECS instance is allocated with a public IP address and configured with an SNAT entry, what can I do if I want the ECS instance to access the Internet through the public IP address in the SNAT entry?*
- *If an ECS instance is configured with both DNAT IP mapping and an SNAT entry, what can I do if I want the ECS instance to access the Internet through the public IP address in the SNAT entry?*

Can I configure both DNAT and SNAT rules for a public IP address?

No, a public IP address can only be configured with either DNAT rules or SNAT rules. You must configure a DNAT rule and a SNAT rule for different public IP addresses.

How many NAT Gateways can I create?

There is no limit on the number of NAT Gateways that an Alibaba Cloud account can create.

How many DNAT entries can I add to a NAT Gateway?

You can add up to 100 DNAT entries to a NAT Gateway.

You can find the quota name `natgw_quot  a_dnat_ent  ry_num` on the Quota Management page and apply for increasing the quota.

How many SNAT entries can I add to an SNAT Gateway?

You can add up to 40 SNAT entries to a NAT Gateway.

You can find the quota name `natgw_quot  a_snat_ent  ry_num` on the Quota Management page and apply for increasing the quota.

How many public IP addresses can be associated with an SNAT entry?

You can associate a maximum of 256 public IP addresses to a single SNAT entry.

Can I view the traffic of each VSwitch in the console of the corresponding NAT Gateway?

No.

But you can associate EIPs with VSwitches and then view the traffic of the VSwitches in the EIP console.

If an ECS instance is allocated with a public IP address and configured with an SNAT entry, what can I do if I want the ECS instance to access the Internet through the public IP address in the SNAT entry?

You can create an ENI and attach the ENI to the ECS instance, convert the public IP address allocated to the ECS instance to an EIP, and associate the EIP with an ENI, so that the ECS instance accesses the Internet through the public IP address in the SNAT entry and traffic from the Internet accesses the ECS instance through the ENI. For more information, see *Attach an ENI to an ECS that is allocated with an public IP address*.

If an ECS instance is allocated with a public IP address and configured with an SNAT entry, what can I do if I want the ECS instance to access the Internet through the public IP address in the SNAT entry?

You can create an ENI and attach the ENI to the ECS instance, disassociate the EIP from the ECS instance, and associate the EIP to the ENI, so that the ECS instance accesses the Internet through the public IP address in the SNAT entry, and traffic from the Internet accesses the ECS instance through the ENI. For more information, see *Attach an ENI to an ECS instance associated with an EIP*.

If an ECS instance is configured with both DNAT IP mapping and an SNAT entry, what can I do if I want the ECS instance to access the Internet through the public IP address in the SNAT entry?

You can create an ENI and attach the ENI to the ECS instance, remove the DNAT entry in the NAT Gateway, create a new DNAT entry, and map a public IP address in the NAT Gateway to the ENI, so that the ECS instance accesses the Internet through the public IP address in the SNAT entry and traffic from the Internet accesses the ECS instance through the ENI. For more information, see *Attach an ENI to an ECS instance configured with DNAT IP mapping*.

2 EIP limits FAQ

- *Why am I unable to associate an EIP with a NAT Gateway in the NAT Gateway console?*

- *Does EIP support creating an SNAT IP address pool?*

- *How many EIPs can I associate with a NAT Gateway?*

- *Why am I unable to reach peak bandwidth after I associate an EIP with a NAT Gateway?*

Why am I unable to associate an EIP with a NAT Gateway in the NAT Gateway console?

You may be unable to associate an EIP with a NAT Gateway because of the purchase date of a NAT Gateway bandwidth package under your Alibaba Cloud account. If your account has a NAT Gateway bandwidth package that was purchased on or before January 28, 2018, you must use this bandwidth package to provide public IP addresses. If you want to use an EIP even though the NAT Gateway bandwidth package under your account is valid, you must open a ticket to request this service.

Does EIP support creating an SNAT IP address pool?

Yes. Currently, you can only create an SNAT IP address pool by calling API actions. For more information, see *Create an SNAT IP address pool*.

How many EIPs can I associate with a NAT Gateway?

You can associate up to 20 EIPs with a NAT Gateway. If you want to increase the quota, open a ticket.

You can associate up to 10 EIPs billed based on traffic with a NAT Gateway, and the peak bandwidth of each EIP billed based on traffic cannot be larger than 200 Mbps.

Why am I unable to reach peak bandwidth after I associate an EIP with a NAT Gateway?

The number of EIPs associated with a NAT Gateway limits the Max Connections of the NAT Gateway. The Max Connections of a NAT Gateway associated with only one EIP is 55,000. If the bandwidth at which the ECS instances access the same public IP address and port is greater than 2 Gbit/s, packets may be discarded due to limited ports. To resolve this issue, we recommend that you associate four to eight EIPs with the NAT Gateway and create a SNAT pool.

3 NAT bandwidth package FAQ

- *Why cannot I buy a NAT bandwidth package in the NAT Gateway console?*
- *How many NAT bandwidth packages can be associated with a NAT Gateway?*
- *What is the difference between a NAT bandwidth package and an Internet Shared Bandwidth?*
- *What is the difference between public IP addresses in a NAT bandwidth package and EIPs?*
- *Can I create an SNAT IP address pool for a NAT bandwidth package?*
- *Does the peak bandwidth value in a NAT bandwidth package apply to both inbound and outbound traffic?*

Why cannot I buy a NAT bandwidth package in the NAT Gateway console?

If your account did not include a NAT bandwidth package before January 26, 2018, you can only associate EIPs with a NAT Gateway. For more information, see *Associate and disassociate EIPs*.

How many NAT bandwidth packages can be associated with a NAT Gateway?

By default, you can associate 4 NAT bandwidth packages with a NAT Gateway.

You can find the quota name *natgw_quot a_bandwidt h_packages _num* on the Quota Management page and apply for increasing the quota.

What is the difference between a NAT bandwidth package and an Internet Shared Bandwidth?

NAT bandwidth packages can be associated only with a NAT Gateway,

whereas Internet Shared Bandwidth can be associated with several cloud resources, including, for example, ECS and SLB instances.

What is the difference between public IP addresses in a NAT bandwidth package and EIPs?

Public IP addresses cannot be disassociated from a NAT bandwidth package after they are associated with the package.

In contrast, EIPs can be associated with, and disassociated from, NAT bandwidth packages at any time.

Can I create an SNAT IP address pool for a NAT bandwidth package?

Yes, you can create an SNAT IP address pool by calling the relevant API actions. For more information, see *Create an SNAT IP address pool*.

Does the peak bandwidth value in a NAT bandwidth package apply to both inbound and outbound traffic?

The peak bandwidth value of a NAT bandwidth package applies only to the outbound traffic. However, inbound traffic is also indirectly affected by this limit.