

## How to Create a VPN Tunnel with the VPN GTI Editor

<https://campus.barracuda.com/doc/53248480/>

VPN services on the Control Center are organized in VPN groups. Create VPN tunnels via drag and drop between two VPN services. To configure an IPv6 VPN tunnel, both VPN services must support IPv6.

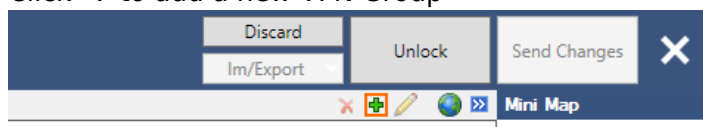
### Before You Begin

- To use the GTI Editor on the range or cluster level, enable **Own VPN GTI Editor** in the range or cluster **Property Settings**.
- Configure the GTI Settings for the VPN services on the managed F-Series Firewalls. For more information, see [How to Configure VPN GTI Settings for a VPN Service](#).
- To use Dyn Mesh go to the **VPN Settings** and verify that **Disable Dyn Mesh** is set to **no** for each VPN service.

### Step 1. Create a VPN Group

VPN Groups contain the default setting for all VPN tunnels in the group and the list of VPN services used to create the tunnels.

1. Go to **CONFIGURATION > Configuration Tree > Multi-Range > Global Settings > VPN GTI Editor**.
2. Click **Lock**.
3. Click **+** to add a new VPN Group



4. Enter the **Name**.
5. Click **OK**. The **Group** window opens.
6. Edit the default **TINA** settings.
7. Configure the following optional settings:
  - **Dynamic Mesh** – Set to **yes** to use allow the VPN services to create on-demand IPv4 VPN tunnels. For more information, see [How to Configure a Dynamic Mesh VPN with the GTI Editor](#).
  - **Dynamic Mesh Timeout** – Enter the number of seconds before a dynamic tunnel is shut down.
  - **TI Bandwidth Protection** – Set to use advanced Traffic Intelligence features such as Performance Based Transport Selection, or Adaptive Bandwidth Protection, For more information, see [Traffic Intelligence](#).

- **WANOpt Policy** – If you want to use WAN Optimization, select one of the policies from the drop-down list.
  - **Default IP Version** – Select the default IP version used when creating the VPN tunnels or adding transports. To use IPv6, both VPN services must support IPv6 VPN.
  - **Hide in Barracuda Earth** – Set to **yes** to not display these tunnels in Barracuda Earth. This also disables the tunnel icon on the Control Center status page.
  - **Meshed** – Set to **yes** to automatically create a static fully meshed VPN network.
  - **Hub for this Group** – If you already added VPN services to the Group, select the VPN hub.
  - **Service Placement** – Select **Classic circular** to automatically arrange all VPN services in a circular pattern. If one service is selected as the VPN hub, it is placed in the center of the circle. **User** allows the user to arrange the VPN services.
8. (optional) Click **Edit IPsec** and edit the default **IPsec** settings.
  9. Click **OK**.
  10. Click **Send Changes** and **Activate**.

The VPN group is now listed in the **Groups** tab.



Groups	Services	WanOpt	Root Certificates	Group	Services	Tunnels	Type	Transport	Encryption	Authentication	Accepted Identification	Hide in NG Earth
GTI VPN Group	6	6	User	UDP	AES	SHA	Public Key	No				

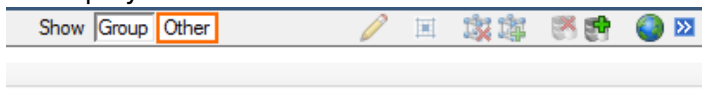
## Step 2. Add VPN Services to the VPN Group

Add the VPN services to the VPN group. If you are using the GTI editor on the range or cluster level, only add VPN services from the range or cluster you are in to the VPN group.

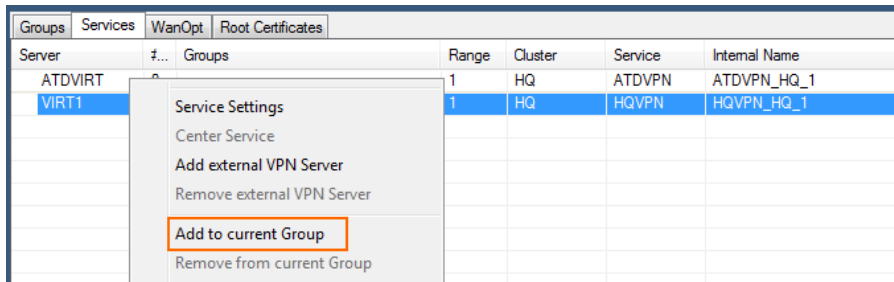
1. Go to **CONFIGURATION > Configuration Tree > Multi-Range > Global Settings > VPN GTI Editor**.
2. Click **Lock**.
3. In the **Group** tab click on the VPN group. The VPN group name is displayed in the top status bar of the GTI map.



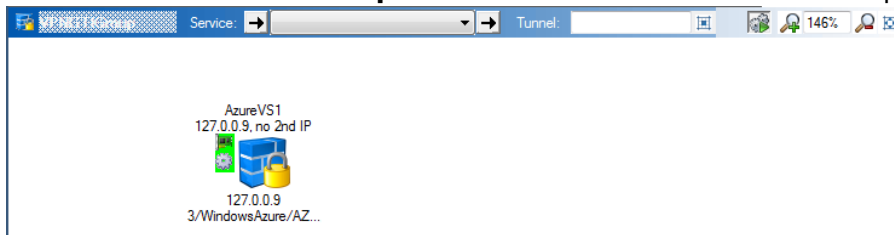
4. Click on the **Services** tab.
5. To display the available VPN services click **Other** on the top right.



6. For each VPN service you want to add to the VPN group:
  1. Right click on the VPN service



2. Click **Add to current Group**. The VPN service is added to the map area below.

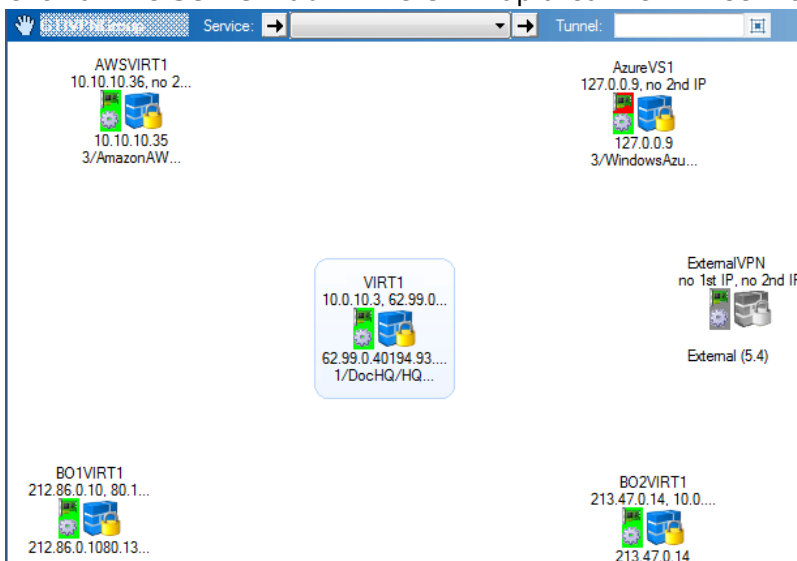


7. Click **Send Changes** and **Activate**.

### Step 3. Create a VPN Tunnel

Create VPN tunnels by drag and dropping connections from one VPN service to the other. Per default the VPN service you start with is the active unit, the destination the passive unit. This can be changed in the tunnel configuration settings.

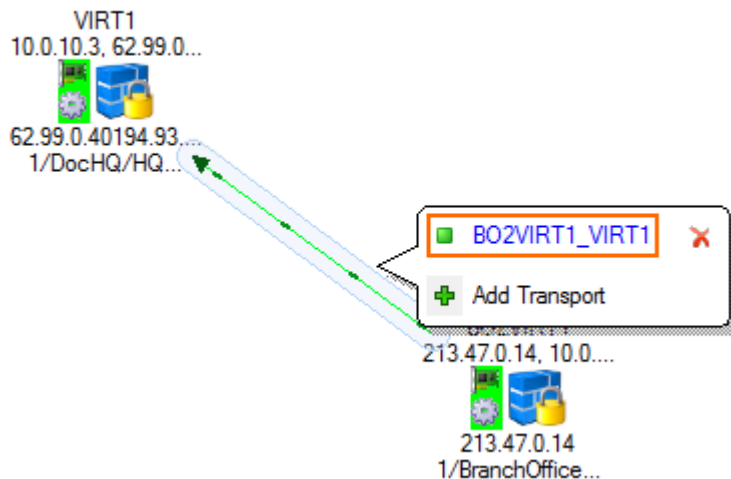
1. Go to **CONFIGURATION > Configuration Tree > Multi-Range > Global Settings > VPN GTI Editor**.
2. Click **Lock**.
3. In the **Group** tab click on the VPN group. The VPN group name is displayed in the top status bar of the GTI map.
4. Click on the **Server** tab. In the GTI map area the VPN services icons in the VPN are displayed.



5. Create a VPN tunnel by drag and drop from the active VPN service to the passive VPN service. A

line is displayed between the VPN services.

- Click on the connection between the two VPN services and click on the transport you want to edit. Per default TINA VPN tunnels are created with one transport.



- You can now modify the VPN tunnel as needed:
  - IP Version** – Select IPv4 or IPv6. To use IPv6, both VPN services must support it.
  - Direction** – You can create VPN tunnels using the following modes: **active-active, active-passive, on-demand**.
  - Transport Source IP/Interface** – If needed you can modify the transport source IP.
  - Transport Listening IP/Interface** – If needed you can modify the transport listening IP.
  - Local Network** – If needed modify the networks that are available through this VPN tunnel.
- Click **Send Changes** and **Activate**.

You can view the collective state of all GTI VPN tunnels on the **Status** page of the Control Center.

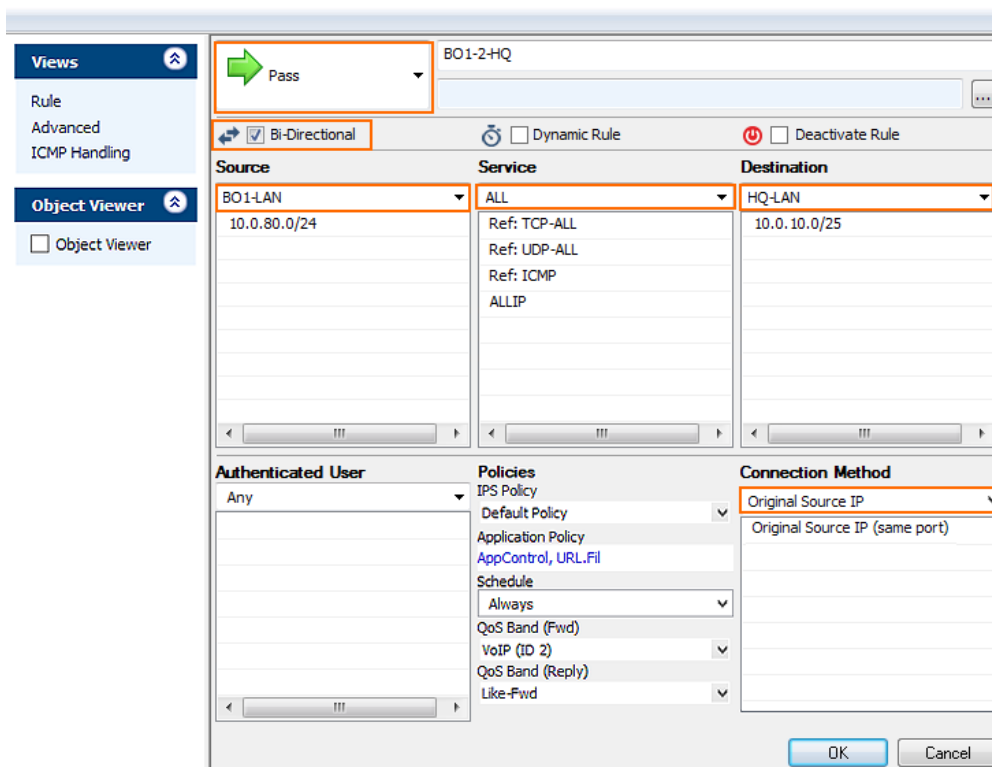
1/DocHQ				6.0															
HQ-NG1	Headquarters Box 1	10.0.10.88	6.0.0	Austria	VF25	VIRT1													
2/DOC-BO1				5.4															
BO-NG1	Branch Office Box 1	10.0.11.92	5.4.4	Italy	VF25	BO1VIRT1													
3/AmazonAWS				6.0															
AWSNG1		10.0.10.91	6.0.0	Ireland	VF25	AWSVIRT1													

## Step 4. Create Access Rules to Allow VPN Traffic

You must create access rules on both firewalls involved in the VPN tunnel to allow traffic in and out of the VPN tunnel.

Example Access Rule for a VPN tunnel from Branch Office 1 (BO1) to the Headquarters (HQ). The access rules need to be added to the BO1 and HQ forwarding firewall:

- **Action** - Select **PASS**.
- **Bi-Directional** - Select the check box.
- **Source** - Select the network object for the **BO1 LAN**.
- **Service** - Select **ALL**.
- **Destination** - Select the network object for the **HQ LAN**.
- **Connection Method** - Select **Original Source IP**.



The screenshot shows the configuration for an Access Rule named "BO1-2-HQ". The rule is set to "Pass" action and is "Bi-Directional". The Source is "BO1-LAN" (10.0.80.0/24), the Service is "ALL", and the Destination is "HQ-LAN" (10.0.10.0/25). The Connection Method is "Original Source IP". Other settings include "Authenticated User" as "Any", "Policies" as "Default Policy", "Application Policy" as "AppControl, URL.Fil", "Schedule" as "Always", and "QoS Band (Fwd)", "VoIP (ID 2)", "QoS Band (Reply)", and "Like-Fwd" as "Always".

## Next Steps

- You can use the GTI editor to configure a Dynamic Mesh. For more information, see [How to Configure a Dynamic Mesh VPN with the GTI Editor](#).
- You can use the GTI editor to configure additional transports using Traffic Intelligence. For more information, see [How to Configure Traffic Intelligence Using the VPN GTI Editor](#).
- You can use the GTI editor to configure Traffic Shaping for the VPN tunnels. For more information, see [Traffic Shaping](#).

## Figures

1. gti\_groups01.png
2. gti\_groups02.png
3. gti\_add\_VPN01.png
4. gti\_add\_VPN01a.png
5. gti\_add\_VPN01b.png
6. gti\_add\_VPN02.png
7. gti\_map\_01.png
8. gti\_map\_02.png
9. gti\_map\_03.png
10. gti\_fw\_rule01.png

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