Technical Note: DNS resolution not working when DNS Server configured to 'Same as Interface IP'

135 Les Carr Wed, Aug 9, 2017 Fortigate UTM 7168

Technical Note: DNS resolution not working when DNS Server configured to 'Same as Interface IP'

//

Products

Products FortiGate v5.2 FortiGate v5.4 FortiGate v5.6

Technical Note: DNS resolution not working when DNS Server configured to 'Same as Interface IP'

//

This article provides a solution to DNS resolution not working when DNS Server is configured to "Same as Interface IP".

a root	•	Edit Interface				
2 Dashboard	>	Interface Name	LAN			
X Security Fabric	>	Alias				
E FortiView	>	Туре	Hardw	are Switch		
+ Network	~	Virtual Domain	root			
Interfaces	☆	Interface Members	🔳 lar	n1 🗙 🔚 lan3 🗙	🖹 lan4 🗙	
DNS Servers				+		_
Packet Capture		Role ()	LAN			•
SD-WAN	_	Address				
SD-WAN Status Check		Addressing mode	M	anual DHCP	DDDoE	
SD-WAN Rules		IP/Network Mask	_	0.66.66.254/255.		
Static Routes	_	IPv6 Addressing mod		anual DHCP	200.200.0	
Policy Routes		IPv6 Address/Prefix				
RIP		IP VO AUGI ESS/PTEIIX	/1	•		
OSPF		Administrative Acces	\$\$			
BGP		IPv4		✓ HTTPS		PING
Multicast				SSH FortiTeleme	SNMP	FTM
Modem	_	IPv6 Administrative	Access	HTTPS		PING
System	>			SSH SSH	SNMP	FTM
Policy & Objects	>	OHCP Server				
Security Profiles	>					
I VPN	>	Address Range	_			
User & Device	>	+ Create New	🖋 Edi	it 📋 Delete		
WiFi & Switch Controller	>	Starting IP	10.1	End IP		
III Log	>	10.66.66.100		6.66.253		1
Report	>		255.255			
C Monitor	>	Default Gateway Same as Interface IP Specify DNS Server Same as System DNS Same as Interface IP Specify				
		DNS Server	Same as	System DNS	ame as Interfac	e IP Specify

Technical Note: DNS resolution not working when DNS Server configured to 'Same as Interface IP'

DNS resolution can be seen to fail.

```
C:\WINDOWS\system32>nslookup
DNS request timed out.
   timeout was 2 seconds.
Default Server: UnKnown
Address: 10.66.66.254
> msn.com
Server: UnKnown
Address: 10.66.66.254
DNS request timed out.
    timeout was 2 seconds.
DNS request timed out.
   timeout was 2 seconds.
DNS request timed out.
   timeout was 2 seconds.
DNS request timed out.
    timeout was 2 seconds.
*** Request to UnKnown timed-out
```

Solution

Enable the DNS Database Feature.

a root	-	Feature Visibility					
	-	reactive visionity					
Dashboard	>	Basic Features		Security Features		Additional Features	
X Security Fabric	>	ousier catares		Secondy restores		Abortonia i cotor ca	
M FortiView	>	Advanced Routing	۵	Feature Set: Custom 💌		Advanced Endpoint Control	
+ Network	>	Switch Controller	0	AntiVirus	٥	C Allow Unnamed Policies	0
O System	~	C VPN	0	Application Control	٥	ONS Database	0
Replacement Messages		WiFi Controller	0	C DNS Filter	0	Domain & IP Reputation	0
Reputation				C Endpoint Control	0		_
Advanced				C Endpoint Control		DoS Policy	٥
Feature Visibility	~			 Intrusion Prevention 		C Email Collection	0
reature visibility	ы						

Technical Note: DNS resolution not working when DNS Server configured to 'Same as Interface IP'

//

Configure a DNS Server for the interface that DNS requests will be sent to.

Set the mode to "Forward to System DNS".

🖨 root	٠	New DNS Service	e		
2 Dashboard	>				
Security Fabric	>	Interface	⊐⊄ LAN		•
FortiView		Mode	Recursive	Non-Recursive	Forward to System DNS
	1	DNS Filter			
+ Network	~				
Interfaces					
DNS Servers	☆				
Packet Capture					

Technical Note: DNS resolution not working when DNS Server configured to 'Same as Interface IP'

//

DNS resolution can now be seen to be successful.

```
C:\WINDOWS\system32>nslookup
Default Server: UnKnown
Address: 10.66.66.254
```

≻ msn.com Server: UnKnown Address: 10.66.66.254

Non-authoritative answer: Name: msn.com Address: 13.82.28.61

Online URL: <u>https://kb2.ic.uk/article.php?id=135</u>