



mpls\_over\_dmvpn3.pcapng

**NHRP Registration Request**

<b>ID</b> Request ID	0x00000-008 (8)
<b>Source NBMA Address</b>	10.2.4.2
<b>Source Protocol Address</b>	172.16.1-00.2
<b>Destination Protocol Address</b>	172.16.1-00.2

Frame 1 |  
2020-05-18T11:44:50.453888Z

**NHRP Registration Reply**

<b>ID</b> Request ID	0x00000-008 (8)
<b>Source NBMA Address</b>	10.2.4.2
<b>Source Protocol Address</b>	172.16.1-00.2
<b>Destination Protocol Address</b>	172.16.1-00.1
<b>Code</b>	Success (0)
<b>Code</b>	Success (0)
<b>Code</b>	Success (0)

Frame 2 |  
2020-05-18T11:44:50.454547Z

**NHRP Registration Request**

<b>ID</b> Request ID	0x00000-009 (9)
<b>Source NBMA Address</b>	10.2.4.2
<b>Source Protocol Address</b>	172.16.1-00.2
<b>Destination Protocol Address</b>	172.16.1-00.1

Frame 3 |  
2020-05-18T11:44:51.456786Z

**NHRP Registration Reply**

<b>ID</b> Request ID	0x00000-009 (9)
<b>Source NBMA Address</b>	10.2.4.2
<b>Source Protocol Address</b>	172.16.1-00.2
<b>Destination Protocol Address</b>	172.16.1-00.1
<b>Code</b>	Success (0)
<b>Code</b>	Success (0)
<b>Code</b>	Success (0)

Frame 4 |  
2020-05-18T11:44:51.459764Z

**NHRP Registration Request**

<b>ID</b> Request ID	0x00000-008 (8)
<b>Source NBMA Address</b>	10.3.4.3
<b>Source Protocol Address</b>	172.16.1-00.3
<b>Destination Protocol Address</b>	172.16.1-00.3

Frame 5 |  
2020-05-18T11:45:14.122252Z

**NHRP Registration Reply**

<b>ID</b> Request ID	0x00000-008 (8)
<b>Source NBMA Address</b>	10.3.4.3
<b>Source Protocol Address</b>	172.16.1-00.3
<b>Destination Protocol Address</b>	172.16.1-00.1

Frame 6 |  
2020-05-18T11:45:14.123215Z

**R2**

**R1**

**R3**

**CE-VPN1-R2**

**CE-VPN1-R3**

**CE-VPN2-R2**

**CE-VPN2-R3**

Code	Success (0)
Code	Success (0)
Code	Success (0)

**NHRP Registration Request**

Request ID	0x00000-009 (9)
Source NBMA Address	10.3.4.3
Source Protocol Address	172.16.1-00.3
Destination Protocol Address	172.16.1-00.1

**NHRP Registration Reply**

Request ID	0x00000-009 (9)
Source NBMA Address	10.3.4.3
Source Protocol Address	172.16.1-00.3
Destination Protocol Address	172.16.1-00.1
Code	Success (0)
Code	Success (0)
Code	Success (0)

Frame 7 | 2020-05-18T11:45:15.126446Z

Frame 8 | 2020-05-18T11:45:15.126824Z

**MPLS Label 26**

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) request

Frame 9 | 2020-05-18T11:45:40.742187Z

**MPLS Label 21**

EXP	0
Bottom	1
MPLS TTL	254
Inner	Echo (ping) request

Frame 10 | 2020-05-18T11:45:40.742269Z

**MPLS Label 18**

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) reply

Frame 11 | 2020-05-18T11:45:40.742506Z

**MPLS Label 21**

EXP	0
Bottom	1
MPLS TTL	254
Inner	Echo (ping) reply

Frame 12 | 2020-05-18T11:45:40.742572Z

**MPLS Label 21**

EXP	0
Bottom	0
MPLS TTL	255

Frame 13 | 2020-05-18T11:45:40.742766Z

**MPLS Label Generic Associated Channel Label**

EXP	0
Bottom	1
MPLS TTL	1

**MPLS Label 21**

EXP	0
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Frame 14 | 2020-05-18T11:45:40.74289Z



Bottom	0
MPLS TTL	255

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 26

EXP	0
Bottom	0
MPLS TTL	255

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 21

EXP	0
Bottom	0
MPLS TTL	254

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 18

EXP	0
Bottom	0
MPLS TTL	255

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

NHRP Resolution Reply

ID	Request ID	0x00000003 (3)
🌐	Source Protocol Address	172.16.100.2
🎯	Destination Protocol Address	192.168.1.3
📄	Code	Success (0)
🏠	Client NBMA Address	10.3.4.3
🌐	Client Protocol Address	172.16.100.3
📄	Code	Success (0)
🏠	Client NBMA Address	10.3.4.3
🌐	Client Protocol Address	172.16.100.3

MPLS Label 21

EXP	0
Bottom	0
MPLS TTL	254

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

NHRP Resolution Reply

ID	Request ID	0x00000005 (5)
🌐	Source Protocol Address	172.16.100.3
🎯	Destination Protocol Address	192.168.1.2

Frame 15 |  
2020-05-18T11:45:40.752383Z

Frame 16 |  
2020-05-18T11:45:40.752454Z

Frame 17 |  
2020-05-18T11:45:40.752803Z

Frame 18 |  
2020-05-18T11:45:40.753241Z

Frame 19 |  
2020-05-18T11:45:40.753324Z

Frame 20 |  
2020-05-18T11:45:40.763344Z



Code	Success (0)
Client NBMA Address	10.2.4.2
Client Protocol Address	172.16.100.2
Code	Success (0)
Client NBMA Address	10.2.4.2
Client Protocol Address	172.16.100.2

MPLS Label 21

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) request

Frame 21 |  
2020-05-18T11:45:46.602229Z

MPLS Label 21

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) reply

Frame 22 |  
2020-05-18T11:45:46.602676Z

MPLS Label 23

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) request

Frame 23 |  
2020-05-18T11:45:54.411114Z

MPLS Label 22

EXP	0
Bottom	1
MPLS TTL	254
Inner	Echo (ping) request

Frame 24 |  
2020-05-18T11:45:54.411194Z

MPLS Label 22

EXP	0
Bottom	0
MPLS TTL	255

Frame 25 |  
2020-05-18T11:45:54.411357Z

MPLS Label Generic  
Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 24

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) reply

Frame 26 |  
2020-05-18T11:45:54.41167Z

MPLS Label 22

EXP	0
Bottom	1
MPLS TTL	254
Inner	Echo (ping) reply

Frame 27 |  
2020-05-18T11:45:54.411701Z

MPLS Label 22

EXP	0
Bottom	0
MPLS TTL	255

Frame 28 |  
2020-05-18T11:45:54.411776Z

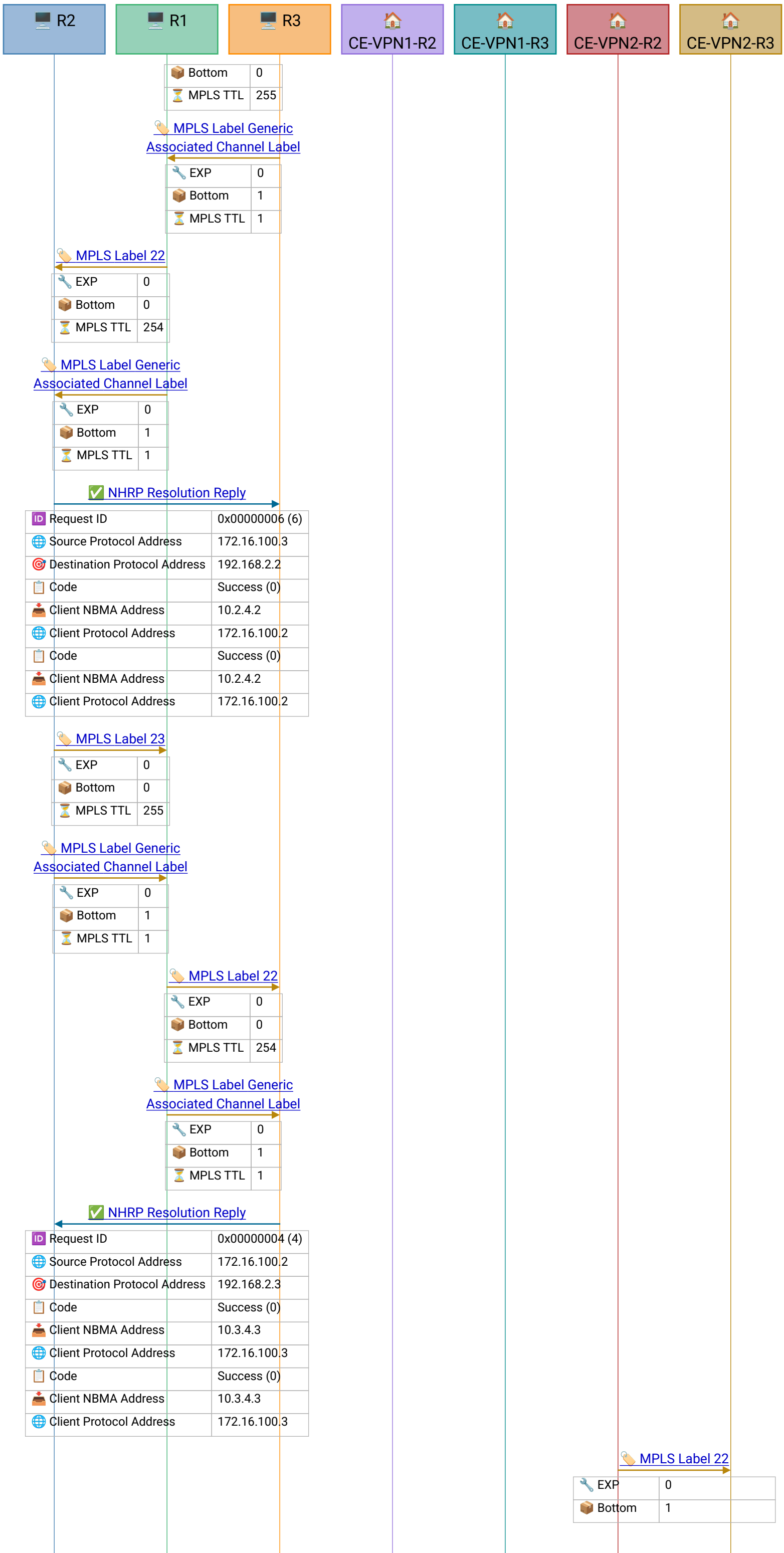
MPLS Label Generic  
Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 24

EXP	0
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Frame 29 |  
2020-05-18T11:45:54.426842Z



Bottom	0
MPLS TTL	255

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 22

EXP	0
Bottom	0
MPLS TTL	254

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

NHRP Resolution Reply

ID	Request ID	0x00000006 (6)
Source Protocol Address	172.16.100.3	
Destination Protocol Address	192.168.2.2	
Code	Success (0)	
Client NBMA Address	10.2.4.2	
Client Protocol Address	172.16.100.2	
Code	Success (0)	
Client NBMA Address	10.2.4.2	
Client Protocol Address	172.16.100.2	

MPLS Label 23

EXP	0
Bottom	0
MPLS TTL	255

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

MPLS Label 22

EXP	0
Bottom	0
MPLS TTL	254

MPLS Label Generic Associated Channel Label

EXP	0
Bottom	1
MPLS TTL	1

NHRP Resolution Reply

ID	Request ID	0x00000004 (4)
Source Protocol Address	172.16.100.2	
Destination Protocol Address	192.168.2.3	
Code	Success (0)	
Client NBMA Address	10.3.4.3	
Client Protocol Address	172.16.100.3	
Code	Success (0)	
Client NBMA Address	10.3.4.3	
Client Protocol Address	172.16.100.3	

MPLS Label 22

EXP	0
Bottom	1

Frame 30 | 2020-05-18T11:45:54.426929Z

Frame 31 | 2020-05-18T11:45:54.427356Z

Frame 32 | 2020-05-18T11:45:54.427369Z

Frame 33 | 2020-05-18T11:45:54.427475Z

Frame 34 | 2020-05-18T11:45:54.428073Z

Frame 35 | 2020-05-18T11:46:00.294632Z



MPLS TTL	255
Inner	Echo (ping) request

[MPLS Label 22](#)

EXP	0
Bottom	1
MPLS TTL	255
Inner	Echo (ping) reply

Frame 36 |  
2020-05-18T11:46:00.295285Z