提示：过程中可能有些许改动，命令不一定正确（可能对应的ip地址会有一些偏驳），需自行甄别

AR1:

sysname AR1

int g0/0/0

ip address 192.168.11.11 255.255.255.0

int g0/0/1

ip address 192.168.12.1 255.255.255.0

q

//

ospf 1 router-id 1.1.1.1

area 0.0.0.1

network 192.168.11.11 0.0.0.0

area 0.0.0.2

network 192.168.12.1 0.0.0.0

interface GigabitEthernet0/0/2

ip address 192.1.1.1 24

quit

ip route-static 192.168.5.0 24 192.1.1.2

ip route-static 192.168.6.0 24 192.1.1.2

acl 3000

rule 10 permit ip source 192.168.4.0 0.0.0.255 destination 192.168.5.0 0.0.0.255

quit

acl 3001

rule 10 permit ip source 192.168.2.0 0.0.0.255 destination 192.168.6.0 0.0.0.255

rule 20 permit ip source 192.168.3.0 0.0.0.255 destination 192.168.6.0 0.0.0.255

quit

ipsec proposal r1

esp authentication-algorithm sha2-256

esp encryption-algorithm aes-128

quit

ipsec policy r1 10 manual

security acl 3000

proposal r1

tunnel remote 192.1.2.1

tunnel local 192.1.1.1

sa spi outbound esp 10000

sa spi inbound esp 20000

sa string-key outbound esp cipher 12345678

sa string-key inbound esp cipher 12345678

quit

ipsec policy r1 20 manual

security acl 3001

proposal r1

tunnel remote 192.1.3.1

tunnel local 192.1.1.1

sa spi outbound esp 10000

sa spi inbound esp 30000

sa string-key outbound esp cipher 12345678

sa string-key inbound esp cipher 12345678

quit

interface GigabitEthernet0/0/2

ipsec policy r1

quit

rip 1

network 192.1.1.0

quit

LSW1:

sysname LSW1

vlan batch 10 11 13 21

stp disable

interface Vlanif10

ip address 192.168.1.254 255.255.255.0

interface Vlanif11

ip address 192.168.11.1 255.255.255.0

interface Vlanif13

ip address 192.168.13.1 255.255.255.0

interface Vlanif21

ip address 192.168.21.1 255.255.255.0

interface GigabitEthernet0/0/1

port link-type access

port default vlan 10

interface GigabitEthernet0/0/2

port link-type access

port default vlan 21

interface GigabitEthernet0/0/3

port link-type access

port default vlan 13

interface GigabitEthernet0/0/4

port link-type access

port default vlan 11

q

ospf 1 router-id 1.1.1.1

area 0.0.0.0

network 192.168.13.1 0.0.0.0

network 192.168.21.1 0.0.0.0

network 192.168.1.0 0.0.0.255

area 0.0.0.1

network 192.168.11.1 0.0.0.0

LSW2:

sysname LSW2

vlan batch 12 21 23 40

stp disable

interface Vlanif12

ip address 192.168.12.2 255.255.255.0

interface Vlanif21

ip address 192.168.21.2 255.255.255.0

interface Vlanif23

ip address 192.168.23.2 255.255.255.0

interface Vlanif40

ip address 192.168.4.254 255.255.255.0

q

interface g0/0/1

port link-type access

port default vlan 40

interface GigabitEthernet0/0/2

port link-type access

port default vlan 21

interface GigabitEthernet0/0/3

port link-type access

port default vlan 23

interface GigabitEthernet0/0/4

port link-type access

port default vlan 12

q

ospf 1 router-id 2.2.2.2

area 0

network 192.168.4.0 0.0.0.255

network 192.168.21.2 0.0.0.0

network 192.168.23.2 0.0.0.0

area 2

network 192.168.12.2 0.0.0.0

LSW3:

sysname LSW3

vlan batch 13 20 23 30

stp disable

interface Vlanif13

ip address 192.168.13.3 255.255.255.0

interface Vlanif20

ip address 192.168.2.254 255.255.255.0

interface Vlanif23

ip address 192.168.23.3 255.255.255.0

interface Vlanif30

ip address 192.168.3.254 255.255.255.0

q

interface GigabitEthernet0/0/1

port link-type access

port default vlan 20

interface GigabitEthernet0/0/2

port link-type access

port default vlan 30

interface GigabitEthernet0/0/3

port link-type access

port default vlan 13

interface GigabitEthernet0/0/4

port link-type access

port default vlan 23

q

ospf 1 router-id 3.3.3.3

area 0

network 192.168.2.0 0.0.0.255

network 192.168.3.0 0.0.0.255

network 192.168.13.3 0.0.0.0

network 192.168.23.3 0.0.0.0

LSW4:

sysname LSW4

vlan 10

interface Ethernet0/0/1

port link-type access

port default vlan 10

interface Ethernet0/0/2

port link-type access

port default vlan 10

interface Ethernet0/0/3

port link-type access

port default vlan 10

LSW5:

sysname LSW5

vlan batch 20

interface Ethernet0/0/1

port link-type access

port default vlan 20

interface Ethernet0/0/2

port link-type access

port default vlan 20

interface Ethernet0/0/3

port link-type access

port default vlan 20

LSW6:

sysname LSW6

vlan batch 30

interface Ethernet0/0/1

port link-type access

port default vlan 30

interface Ethernet0/0/2

port link-type access

port default vlan 30

interface Ethernet0/0/3

port link-type access

port default vlan 30

LSW7:

sysname LSW7

vlan batch 40

interface Ethernet0/0/1

port link-type access

port default vlan 40

interface Ethernet0/0/2

port link-type access

port default vlan 40

interface Ethernet0/0/3

port link-type access

port default vlan 40

查看LSW1的路由表：

display ip routing-table

查看LSW2的路由表：

display ip routing-table

AR2

system-view

undo info-center enable

interface GigabitEthernet0/0/0

ip address 192.1.1.2 24

quit

interface GigabitEthernet0/0/1

ip address 192.1.4.1 24

quit

interface GigabitEthernet0/0/2

ip address 192.1.5.1 24

quit

rip 4

network 192.1.1.0

network 192.1.4.0

network 192.1.5.0

quit

quit

AR3

system-view

undo info-center enable

interface GigabitEthernet0/0/2

ip address 192.1.2.2 24

quit

interface GigabitEthernet0/0/0

ip address 192.1.4.2 24

quit

interface GigabitEthernet0/0/1

ip address 192.1.6.1 24

quit

rip 5

network 192.1.2.0

network 192.1.4.0

network 192.1.6.0

quit

quit

AR4:

system-view

undo info-center enable

interface GigabitEthernet0/0/2

ip address 192.1.3.2 24

quit

interface GigabitEthernet0/0/0

ip address 192.1.5.2 24

quit

interface GigabitEthernet0/0/1

ip address 192.1.6.2 24

quit

rip 6

network 192.1.3.0

network 192.1.5.0

network 192.1.6.0

quit

quit

AR5:

system-view

undo info-center enable

//分校园没有ospf，所以要配置对应网关

interface GigabitEthernet0/0/1

ip address 192.168.5.254 24

quit

interface GigabitEthernet0/0/0

ip address 192.1.2.1 24

quit

ip route-static 192.168.4.0 24 192.1.2.2

ip route-static 192.168.6.0 24 192.1.2.2

acl 3000

rule 10 permit ip source 192.168.5.0 0.0.0.255 destination 192.168.4.0 0.0.0.255

quit

acl 3001

rule 10 permit ip source 192.168.5.0 0.0.0.255 destination 192.168.6.0 0.0.0.255

quit

ipsec proposal r2

esp authentication-algorithm sha2-256

esp encryption-algorithm aes-128

quit

ipsec policy r2 10 manual

security acl 3000

proposal r2

tunnel remote 192.1.1.1

tunnel local 192.1.2.1

sa spi outbound esp 20000

sa spi inbound esp 10000

sa string-key outbound esp cipher 12345678

sa string-key inbound esp cipher 12345678

quit

ipsec policy r2 20 manual

security acl 3001

proposal r2

tunnel remote 192.1.3.1

tunnel local 192.1.2.1

sa spi outbound esp 20000

sa spi inbound esp 30000

sa string-key outbound esp cipher 12345678

sa string-key inbound esp cipher 12345678

quit

interface GigabitEthernet0/0/0

ipsec policy r2

quit

rip 2

network 192.1.2.0

quit

AR6:

system-view

undo info-center enable

interface GigabitEthernet0/0/1

ip address 192.168.6.254 24

quit

interface GigabitEthernet0/0/0

ip address 192.1.3.1 24

quit

ip route-static 192.168.2.0 24 192.1.3.2

ip route-static 192.168.3.0 24 192.1.3.2

ip route-static 192.168.5.0 24 192.1.3.2

acl 3000

rule 10 permit ip source 192.168.6.0 0.0.0.255 destination 192.168.2.0 0.0.0.255

rule 20 permit ip source 192.168.6.0 0.0.0.255 destination 192.168.3.0 0.0.0.255

quit

acl 3001

rule 10 permit ip source 192.168.6.0 0.0.0.255 destination 192.168.5.0 0.0.0.255

quit

ipsec proposal r3

esp authentication-algorithm sha2-256

esp encryption-algorithm aes-128

quit

ipsec policy r3 10 manual

security acl 3000

proposal r3

tunnel remote 192.1.1.1

tunnel local 192.1.3.1

sa spi outbound esp 30000

sa spi inbound esp 10000

sa string-key outbound esp cipher 12345678

sa string-key inbound esp cipher 12345678

quit

ipsec policy r3 20 manual

security acl 3001

proposal r3

tunnel remote 192.1.2.1

tunnel local 192.1.3.1

sa spi outbound esp 30000

sa spi inbound esp 20000

sa string-key outbound esp cipher 12345678

sa string-key inbound esp cipher 12345678

quit

interface GigabitEthernet0/0/0

ipsec policy r3

quit

rip 3

network 192.1.3.0

quit