

NRENum.net Course - Section 3 - Record of Numbers

ENUM uses the record ‘Name Authority Pointer (NAPTR)’ of the DNS service. The records translate a valid E.164 number to a *Uniform Resource Identifier* (URI), which indicates the protocol and the domain to be used.

Register of ENUM Numbers

Step 1. Edit the file of the “/etc/db.X.X.nrenum.net” zone and add the records by using the records of type NAPTR:

For the SIP protocol

```
3.2.1.nrenum.net. IN NAPTR 100 10 "u" "E2U+sip" "!^.*$!sip:room@example.com!".
```

This record translates +123 in the URI sip: room@example.com

For the H.323 protocol.

```
3.2.1.nrenum.net. IN NAPTR 100 10 "u" "E2U+h323" "!^.*$!h323:room@example.com!".
```

This record translates +123 in the URIh323: room@example.com

You need to add a record for each terminal device to be added to the zone.

Step 2. Use SRV records to locate services, edit the file of the “/etc/db.example.com” zone and add the necessary records according to the protocol.

The SRV records contain the connection data (IP address and port) of a service.

For the SIP protocol

```
_sips._tcp.example.com. IN SRV 0 0 5061 voip.example.com.  
_sip._tcp.example.com. IN SRV 0 0 5060 voip.example.com.  
_sip._udp.example.com. IN SRV 1 0 5060 voip.example.com.
```

Where:

_sips indicates the SIP protocol that is SIP secure, and the associated port is 5061

_sip indicates the SIP protocol, and the associated port is 5060

_tcp indicates that it is used through the protocol of the TCP transport layer

_udp indicates that it is used through the protocol of UDP transport layer

voip.example.com is the subdomain associated with SIP server

For the H.323 protocol.

```
_h323cs._tcp.example.com. 172800 IN SRV 0 0 1720 gk.example.com  
_h323ls._udp.example.com. 172800 IN SRV 0 0 1719 gk.example.com
```

Where:

_h323cs indicates "call signaling" of the H.323 protocol, and the associated port is 1720

_h323ls indicates "location service" of the H.323 protocol, and the associated port is 1719

_tcp indicates that it is used through the protocol of the TCP transport layer

_udp indicates that it is used through the protocol of UDP transport layer

gk.example.com is the subdomain associated with the Gatekeeper server

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