###### RADIUS over TLS configuration

***Objective:***

Objective is to successfully authenticate to a Ciena device using RADSEC.

***Procedure:***

* Download the CA and Device Certificates:

pkix-ca install ca-cert-name RADSECCA remote-file-uri sftp://1.1.1.1/home/tls/certs/RadSecClntCA.pem login-id tls password tls pkix-certificates install cert-name RADSECCLIENT cert-only **false** remote- file-uri sftp://1.1.1.1/home/tls/certs/RadSecClntCert.p12 cert- passphrase ciena123 login-id tls password tls

* Then create TLS Profile configuration (can also follow TLS profile step in the document):

hello-params TLS\_PROFILE1 cipher-suites cipher-suite rsa-with-aes-256- cbc-sha

hello-params TLS\_PROFILE1 elliptic-curves elliptic-curve ciena-tls- types:secp256r1

hello-params TLS\_PROFILE1 session-resumption-timeout 3600 hello-params TLS\_PROFILE1 tls-versions tls-version tls-1.2

pkix peer-auth-profiles peer-auth-profile PAPROFILE1 check-cert- expiry **true**

tls-service-profiles TLS\_SRVR\_PROFILE1 tls-profile-name TLS\_PROFILE1 tls-service-profiles TLS\_SRVR\_PROFILE1 tls-peer-auth-profile-name PAPROFILE1

tls-service-profiles TLS\_SRVR\_PROFILE1 tls-certificate-name RADSECCLIENT

* Then Create AAA configuration:

system aaa accounting config accounting-method RADSERVER

system aaa accounting events event AAA\_ACCOUNTING\_EVENT\_LOGIN config event-type AAA\_ACCOUNTING\_EVENT\_LOGIN

system aaa accounting events event AAA\_ACCOUNTING\_EVENT\_LOGIN config record START\_STOP

system aaa server-groups server-group RADSERVER config name RADSERVER system aaa server-groups server-group RADSERVER config type RADSEC system aaa server-groups server-group RADSERVER servers

server 1.1.1.1 config address 1.1.1.1

system aaa server-groups server-group RADSERVER servers server 1.1.1.1 config admin-state enabled

system aaa server-groups server-group RADSERVER servers

server 1.1.1.1 radsec config tls-service-profile TLS\_SRVR\_PROFILE1 system aaa server-groups server-group RADSERVER servers

server 1.1.1.1 config name radsecserver

* Last step is to configure Authentication parameters:

system aaa authentication config authentication-method RADSERVER no system aaa authentication config authentication-method AUTH\_LOC system aaa authentication config authentication-method AUTH\_LOC

NOTE: for server configuration you can refer to the following confluence page. <https://confluence.ciena.com/pages/viewpage.action?pageId=603288778>

Test Case Results:

Passed: Yes No Verified by Date/Time Comments