Configuring the MQTT Modules to re-use Ignition SSL Certificates

SSL/TLS Enable the Ignition Web Server

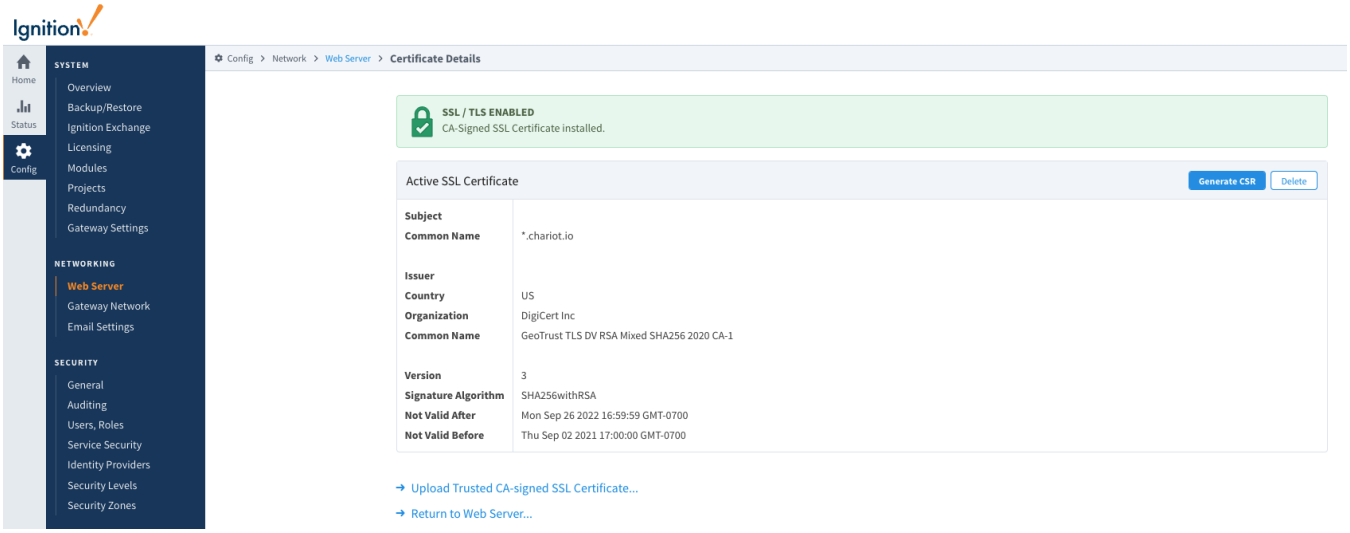
Ignition supports certificates from both your organization's internal CA, as well as commercial CAs (Verisign, GoDaddy, Comodo, etc.).

Review the following list for the required certificates:

- Private Key
- Certificate Signed By A Certificate Authority (CA)
- Any Intermediate CA Certificates (Provided by your CA)
- Root CA Certificate (Provided by your CA)

Follow the steps outlined in the Ignition Secure Communication (SSL / TLS) document using the Certification wizard to import the certificates needed to SSL enable the Ignition Web Server.

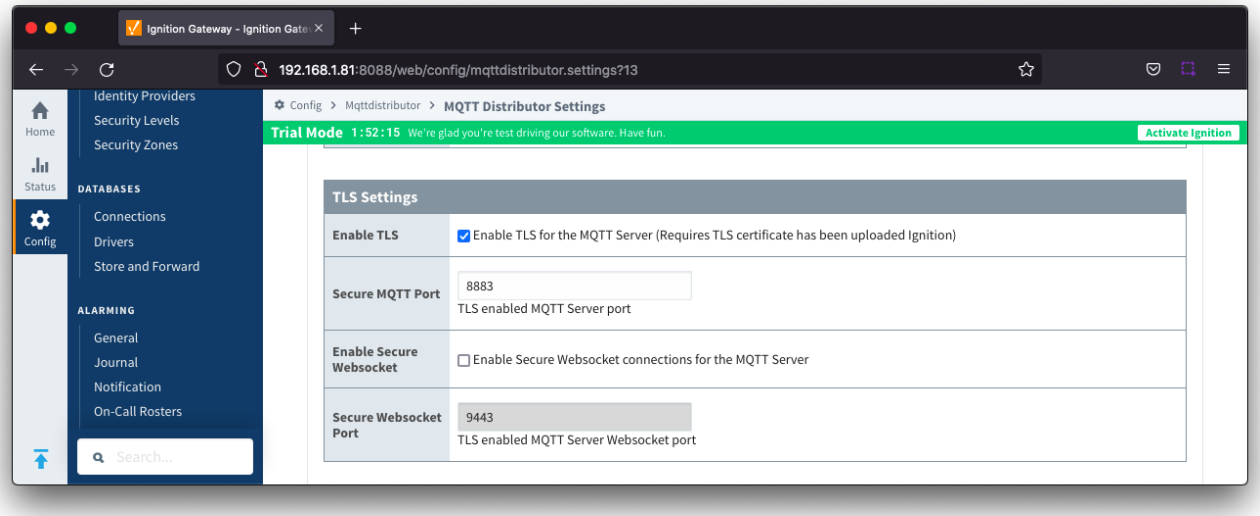
Once configured, you will be able to view the SLL/TLS Certificate details which should be displayed similar to the image below:



Configure MQTT Distributor to use SSL/TLS

Once the Ignition Web Server has been SSL enabled, enable SSL/TLS for MQTT Distributor by selecting the "Enable TLS" configuration setting under TLS Setting section for MQTT Distributor.

Click Save to confirm the configuration update.

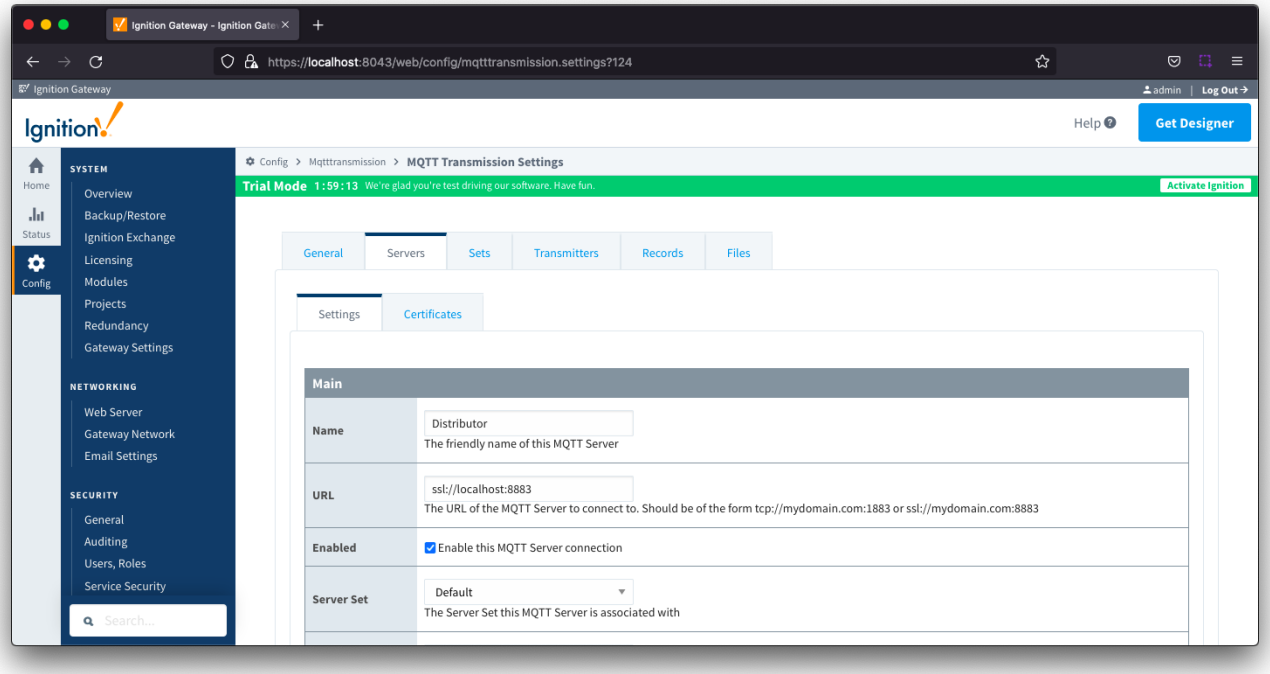


Configure MQTT Engine and MQTT Transmission to use SSL/TLS

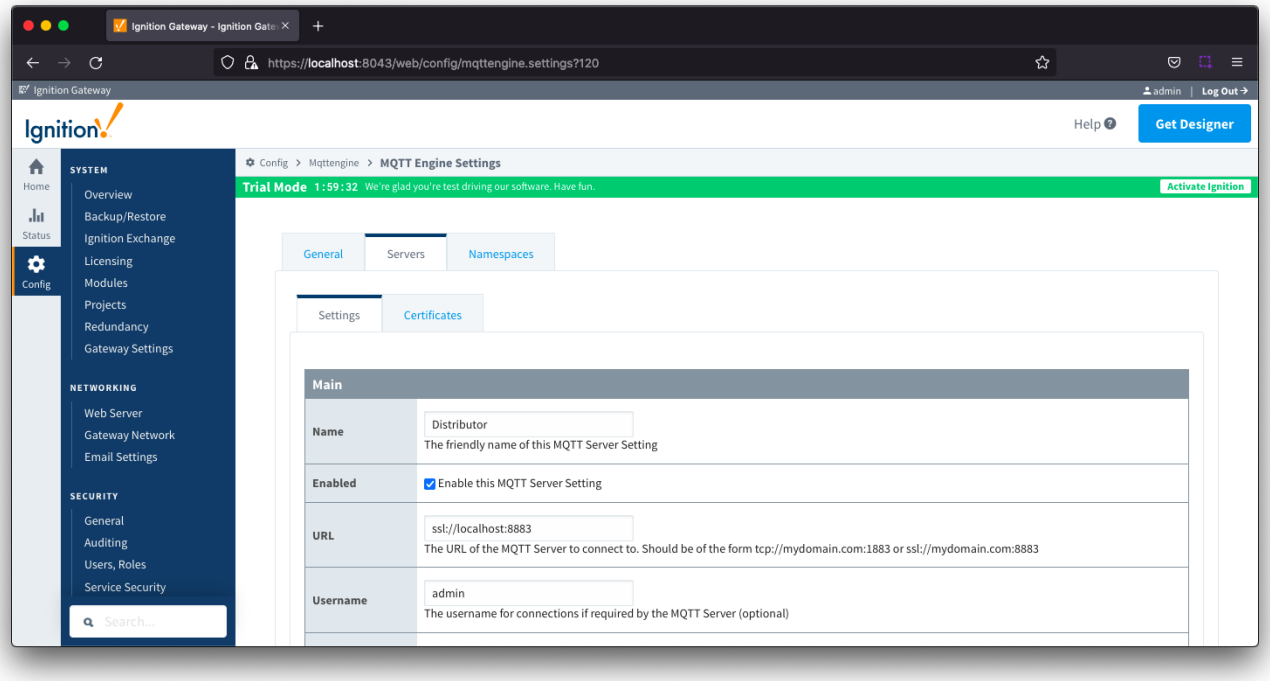
Once TLS has been enabled for MQTT Distributor, the only change required for MQTT Engine and MQTT Transmission to connect to Distributor over SSL /TLS is to update the MQTT Server URL.

Update each of the servers with the appropriate MQTT Server URL for your environment. For example, 'ssl://localhost:8883'

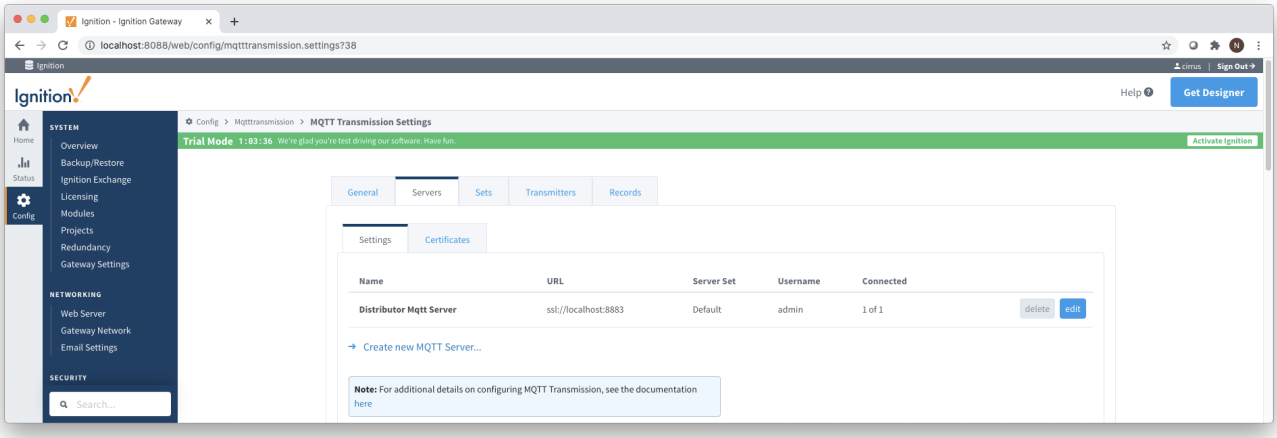
For MQTT Transmission, navigate to the Servers Settings Main section and update the URL as shown below:

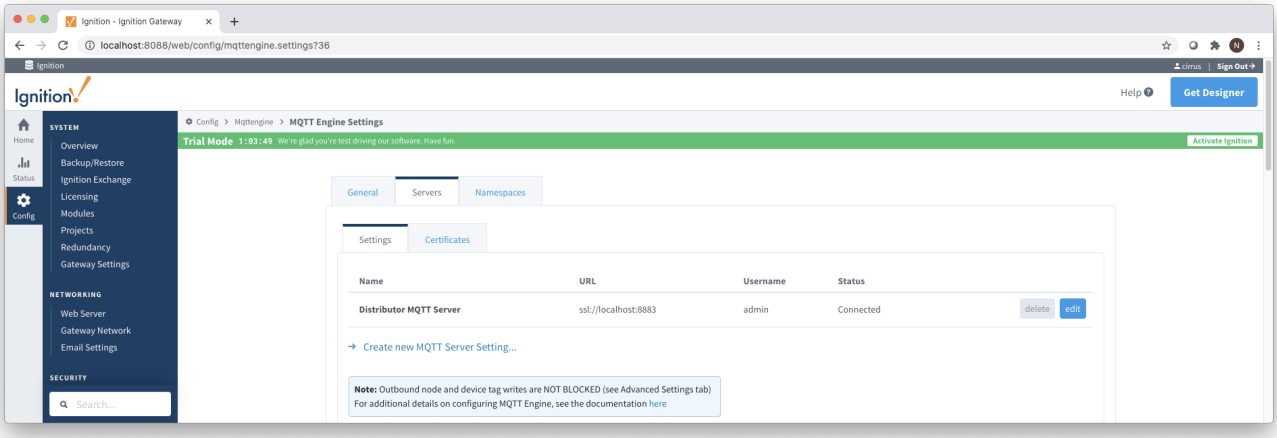


For MQTT Engine, navigate to the Servers Settings Main section and update the URL as shown below:



At this point MQTT Engine and MQTT Transmission should show they're connected to MQTT Distributor over SSL/TLS.


Ignition - Ignition Gateway
localhost:8088/web/config/mqtttransmission.settings?38
Ignition
cirrus | Sign Out
Ignition
Help
Get Designer
Home
Status
Config
SYSTEM
Overview
Backup/Restore
Ignition Exchange
Licensing
Modules
Projects
Redundancy
Gateway Settings
NETWORKING
Web Server
Gateway Network
Email Settings
SECURITY
Search...
Config > Mqtttransmission > MQTT Transmission Settings
Trial Mode 1:03:36 We're glad you're test driving our software. Have fun.
Activate Ignition
General
Servers
Sets
Transmitters
Records
Settings
Certificates
Name
URL
Server Set
Username
Connected
Distributor Mqtt Server
ssl://localhost:8883
Default
admin
1 of 1
delete
edit
Create new MQTT Server...
Note: For additional details on configuring MQTT Transmission, see the documentation here


Ignition - Ignition Gateway
localhost:8088/web/config/mqttengine.settings?36
Ignition
cirrus | Sign Out
Ignition
Help
Get Designer
Home
Status
Config
SYSTEM
Overview
Backup/Restore
Ignition Exchange
Licensing
Modules
Projects
Redundancy
Gateway Settings
NETWORKING
Web Server
Gateway Network
Email Settings
SECURITY
Search...
Config > Mqttengine > MQTT Engine Settings
Trial Mode 1:03:49 We're glad you're test driving our software. Have fun.
Activate Ignition
General
Servers
Namespaces
Settings
Certificates
Name
URL
Username
Status
Distributor MQTT Server
ssl://localhost:8883
admin
Connected
delete
edit
Create new MQTT Server Setting...
Note: Outbound node and device tag writes are NOT BLOCKED (see Advanced Settings tab)
For additional details on configuring MQTT Engine, see the documentation here