**AP NOTE**
Ver.3

# iGS01/iGS01S/iGS02E/iGS03 Connect to AWS IoT

## Overview

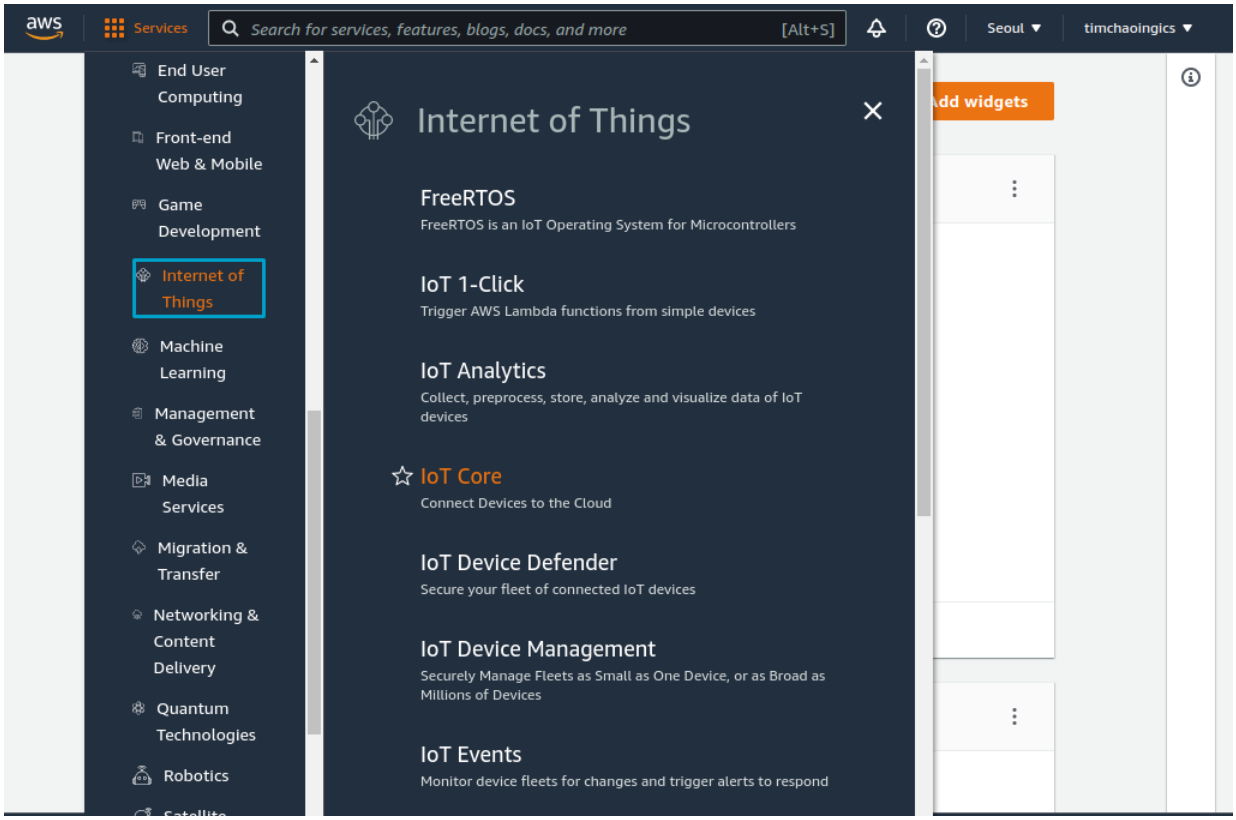
This document is the steps for configuring iGS01/iGS01S/iGS02E/iGS03 to connect to Amazon AWS IoT service. Below is an example by using iGS01.

## Procedure

1. AWS-IoT Configuration

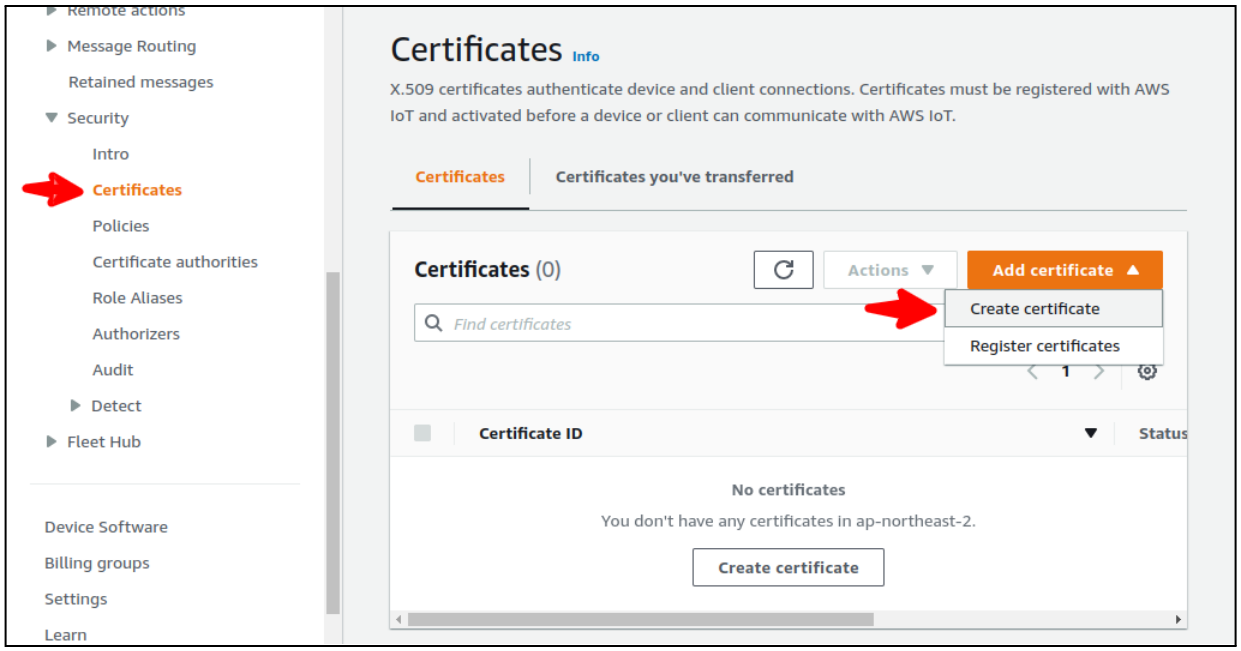
### 1.1. Login AWS IoT console

Search IoT Core service.

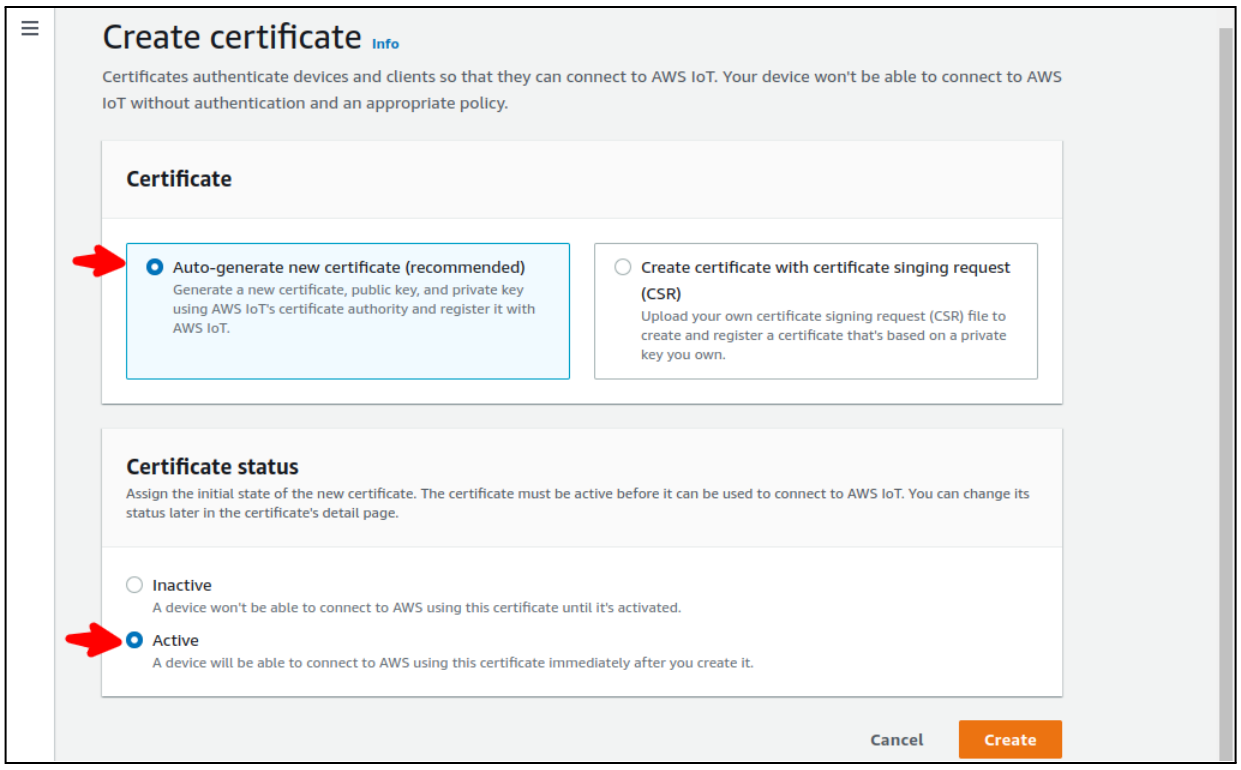


## 1.2. Create certificate

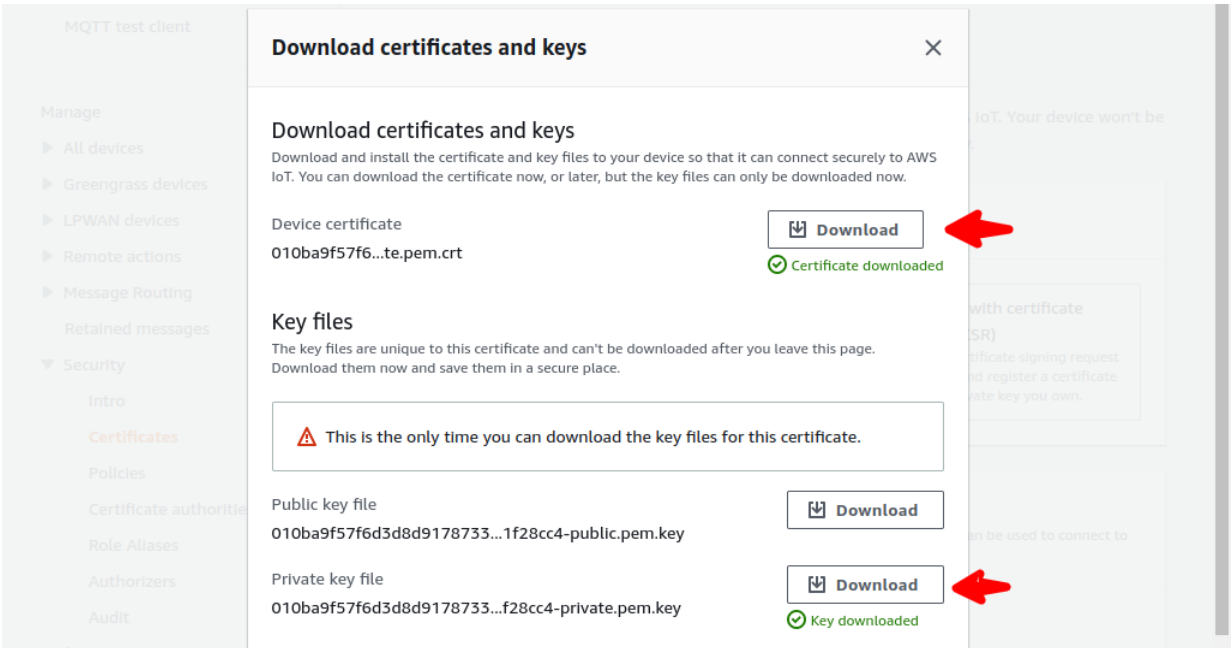
We need to create a certificate for the iGS device to publish messages.
Choose Security -> Certificate, click Create Certificate.




Use Auto-generate, and remember to activate the certificate after creating it.



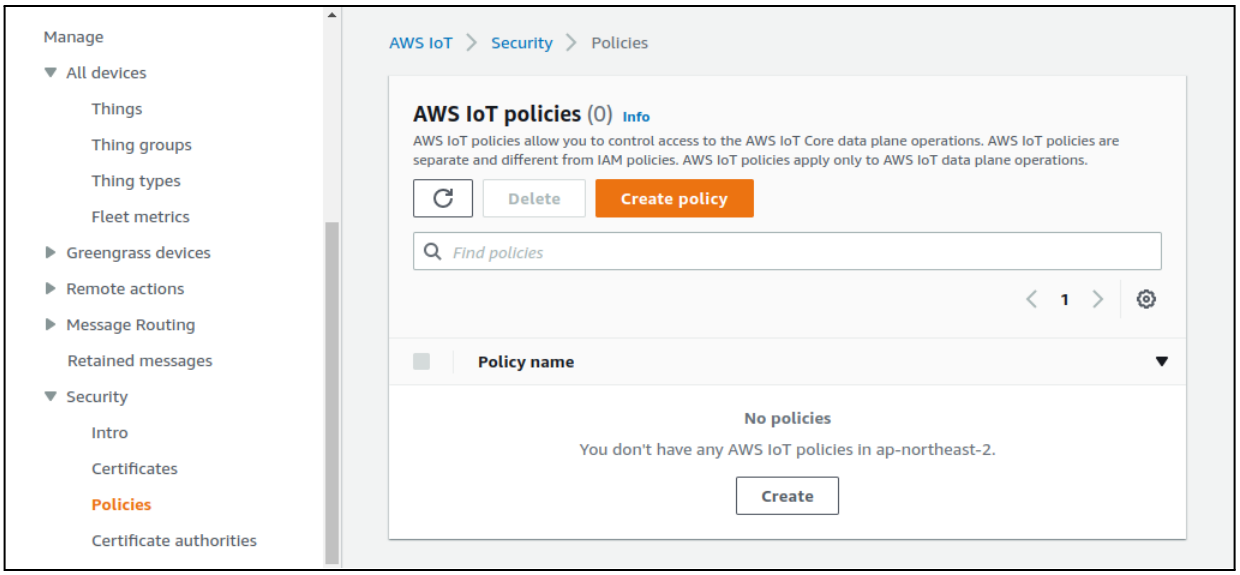
Download the certificate and private key for iGS device configuration. You can ignore the request to download root CA, the iGS device already built-in the AWS-IoT root CA for you.



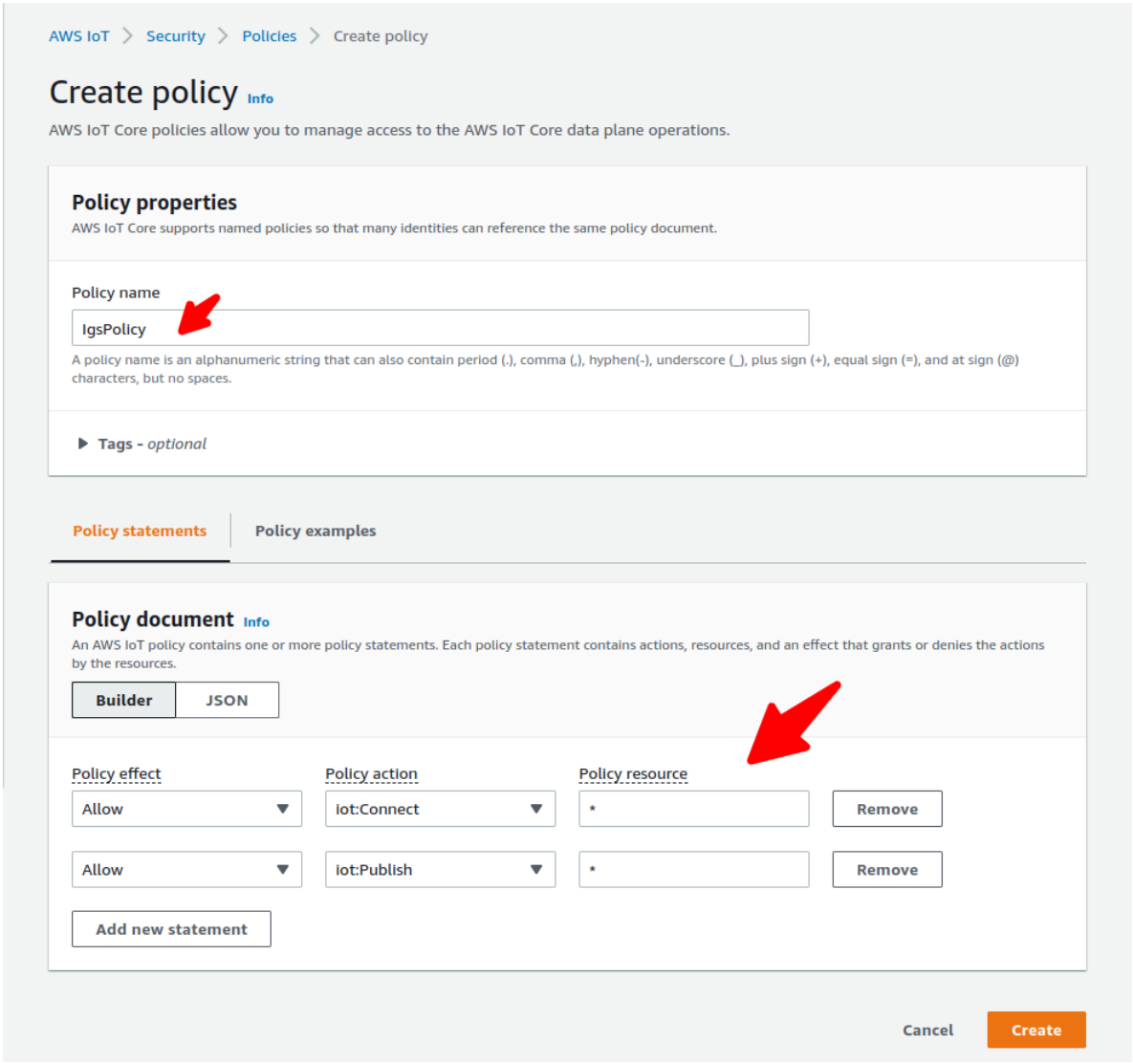

## 1.3. Create Policy

We need to create a policy for the certificate, it tells the AWS what we can do using this certificate.

Choose **Security** -> **Policies**, click **Create Policy**.

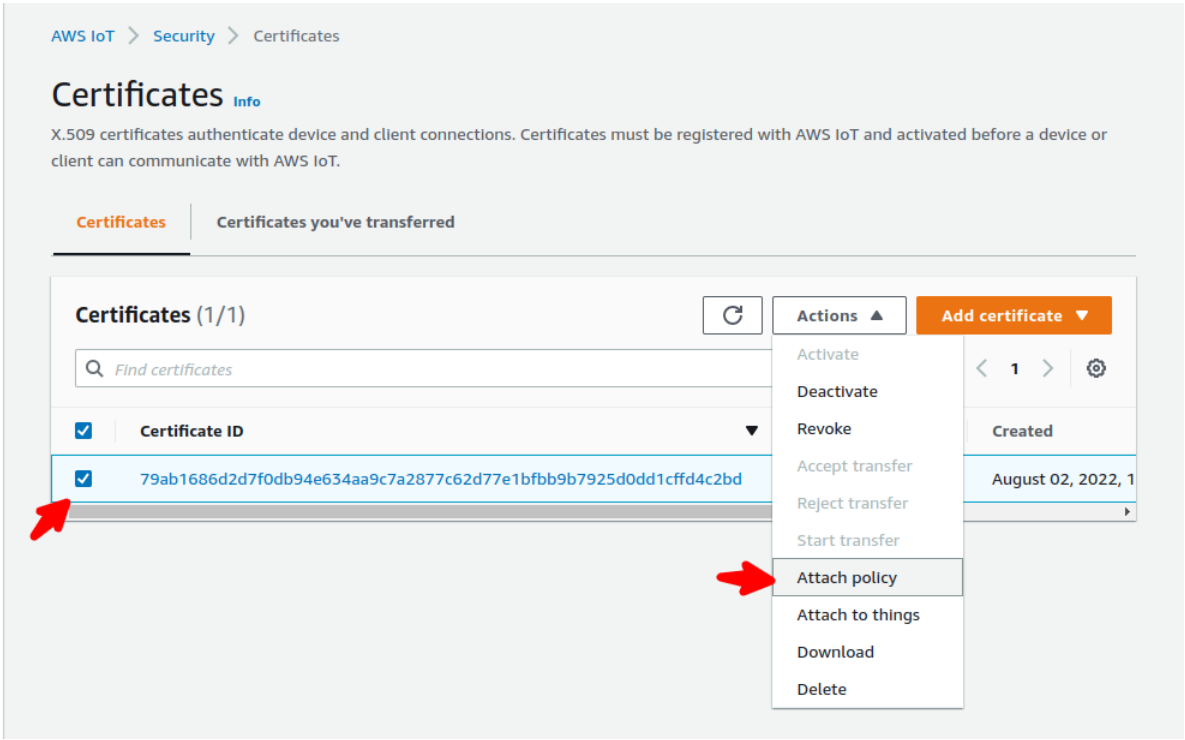


For the iGS device, it requires **iot:Connect** and **iot:Publish** permission. For testing purpose, set target resource as *.

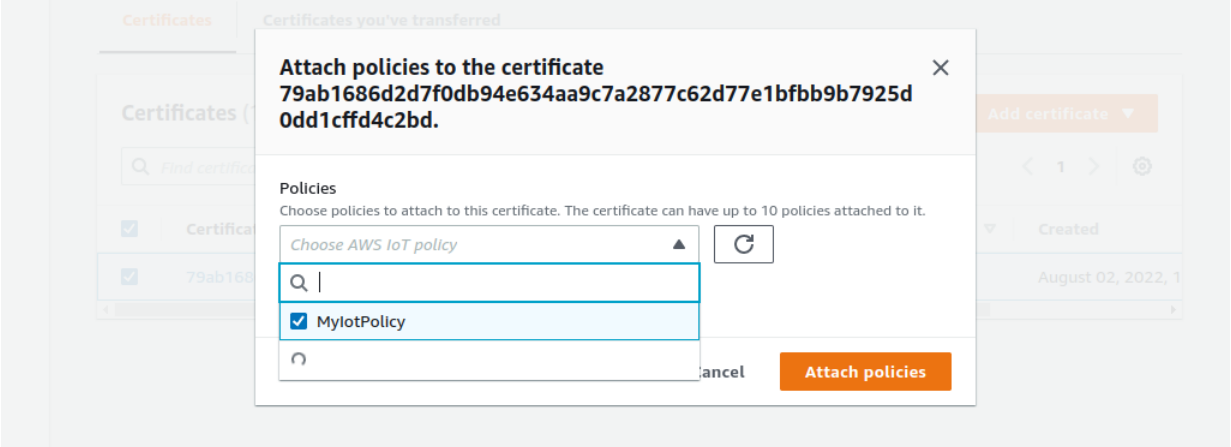



## 1.4. Attach policy to certificate

Choose **Secure** -> **Certificate**, click on the certificate we just created. Click **Actions** on the top-right corner, and select **Attach policy** on the popup menu.



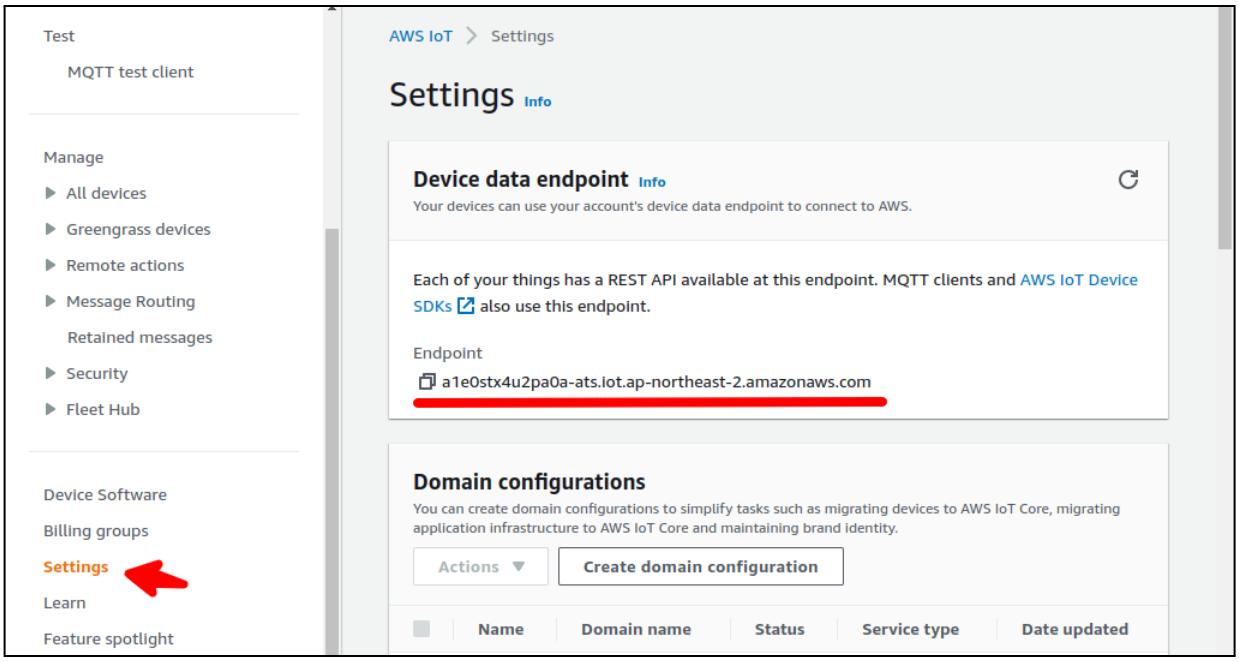

Attach the policy we created in the previous step. Done.




## 1.5. Get the MQTT endpoint of your account

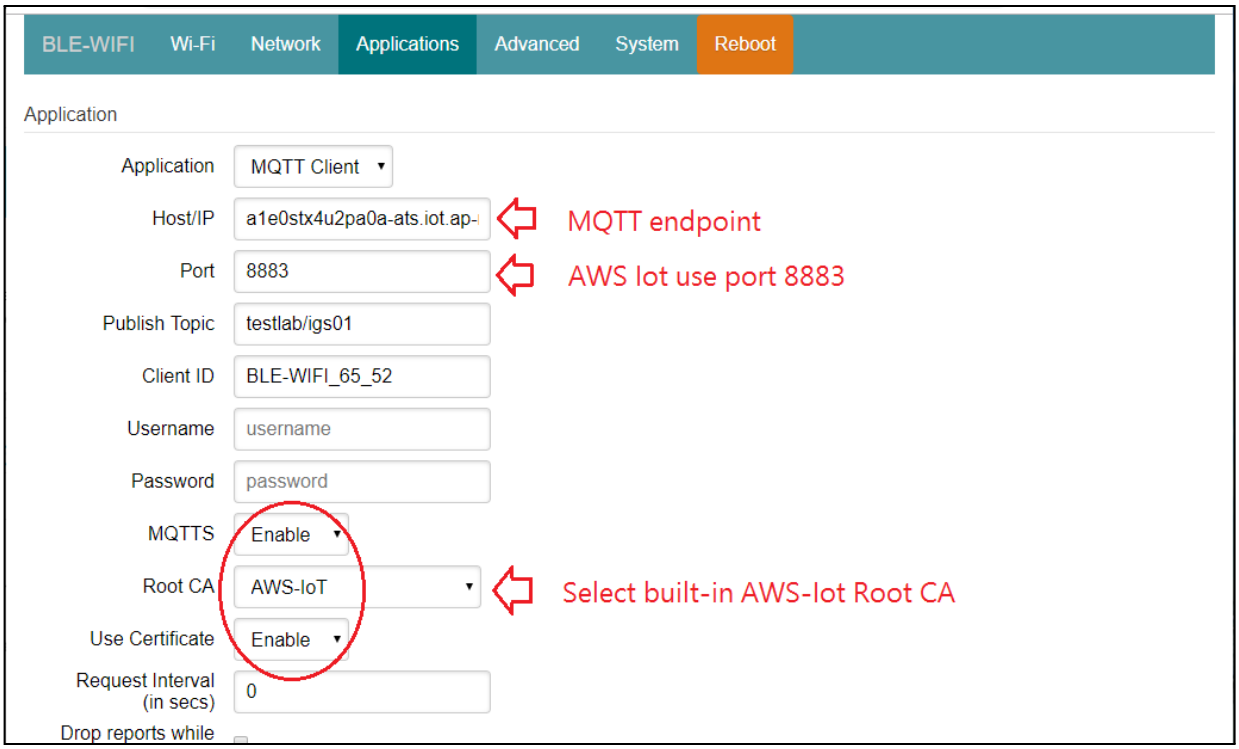
Choose Settings in the navigation pane.

Copy the endpoint string, we will use it to set up the iGS device.




## 2. Setting AWS IoT on iGS01

### 2.1. Settings on Applications Page




### 2.2. Upload Private Key & Certificate downloaded from AWS IoT in step 1.2

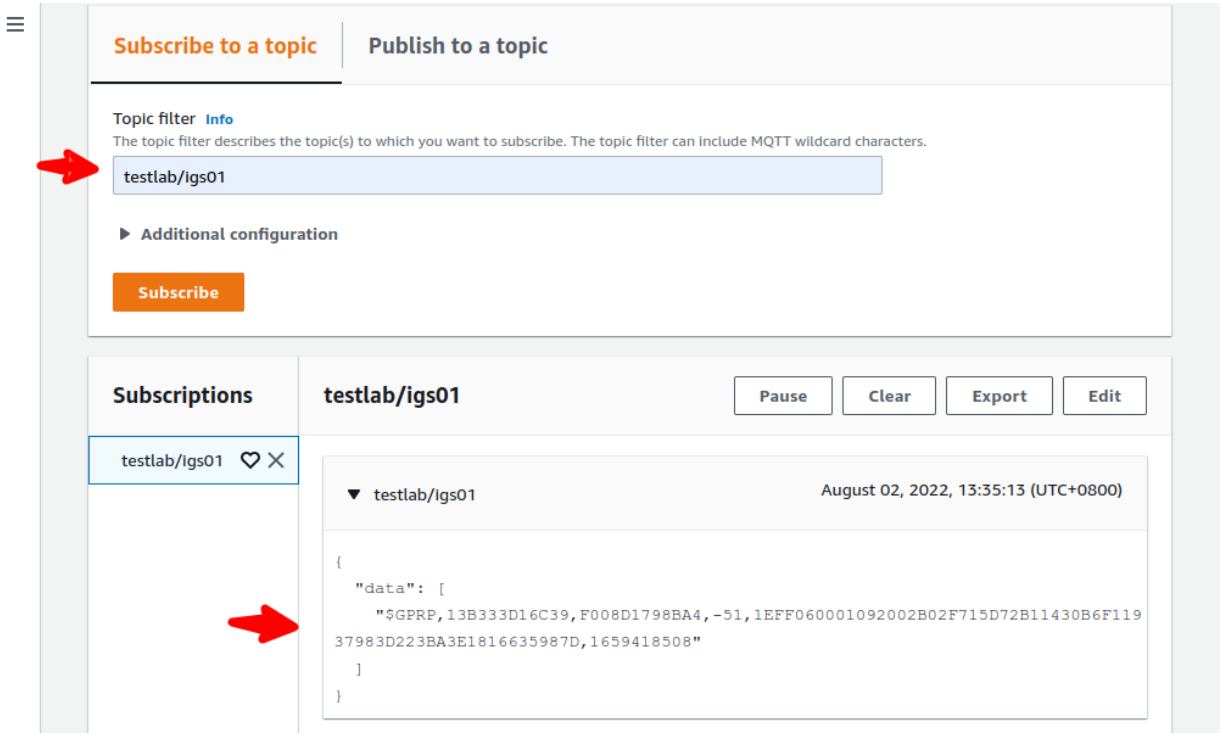

2.3. Reboot and done

3. Check messages with MQTT Client

3.1. AWS console has a built-in client for testing. Choose **Test** -> **MQTT test client**

3.2. Enter the topic we set in step 2.2

3.3. Click **Subscribe**, you should see the messages published from the iGS device.,



## Revision History

| DATE | REVISION | CHANGES |
|---|---|---|
| Feb 11, 2019 | 1 | Initial release |
| Oct 4, 2019 | 2 | New AWS-IoT console & description |
| Aug 2, 2022 | 3 | New AWS-Iot console screenshot & description |