User Guide – DigiCert ONE

CableLabs PKI Operations

Version: 1.0

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Password and Authenticator Set-up

When your user account is initially set-up, you will receive an email from no-reply@digicert.com and the Subject: **Welcome to DigiCert ONE**. If you did not receive an email (after checking SPAM and junk folders), please contact pkiops@cablelabs.com.

- Click on the **Set your password** link in the email.
- Enter your desired password and confirm it. This password requirements are:
    - Minimum of 12 characters
    - Maximum of 125 characters
    - At least one of the following
        - 1 lower case character
        - 1 upper case character
        - 1 symbol (@#$%^&*)
        - 1 number
- Click **Submit**.
- Enter your username and password to login.
- You will be prompted to connect your account with Google Authenticator. Follow the steps to connect with Authenticator app (this will be used in place of your administrative cert to login to the portal)

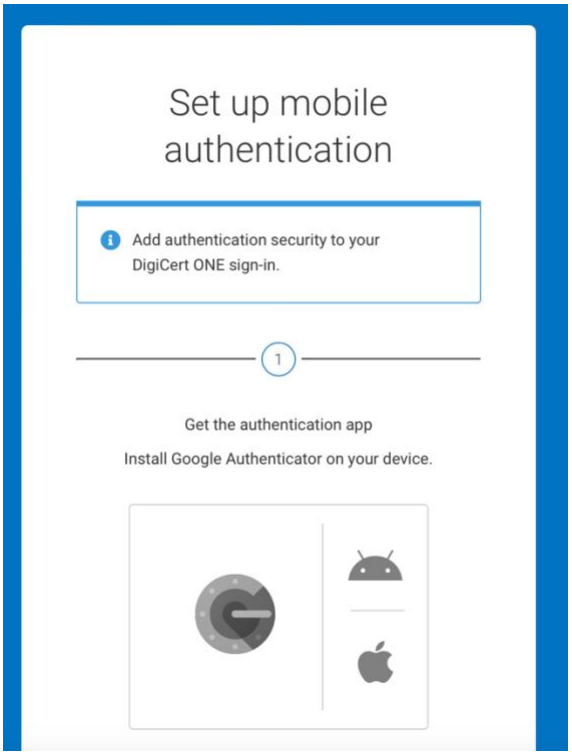


Figure 1 - Connect account with Authenticator App

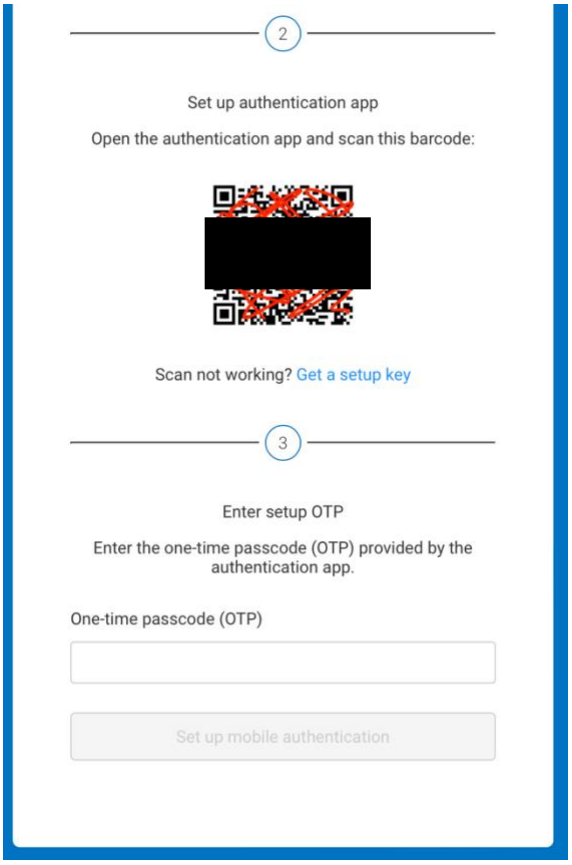


Figure 2 - Complete set-up of Authenticator App

- Once you've connected with the Authenticator app and entered the passcode from the app, you'll be prompted to accept the terms and conditions. Check the box and click **Accept**. You will be taken to your profile page.

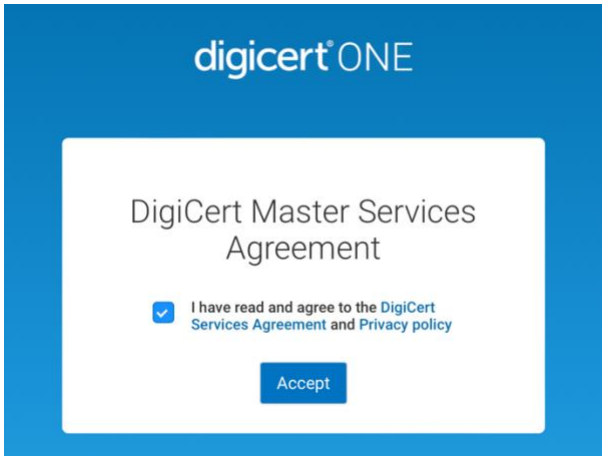


Figure 3 - Accept Terms and Conditions

Authentication Certificate Set-up

From the Profile page, you will be able to set up your Authentication Certificate, which will be used to encrypt the certificates for download and storage. If desired, you can use your existing Admin Certificate from the Magnum MPKI8 platform or create a new one.

To use the existing Admin Certificate

- Scroll down to the **Authentication Certificates**
- Click on **Upload client authentication certificate**

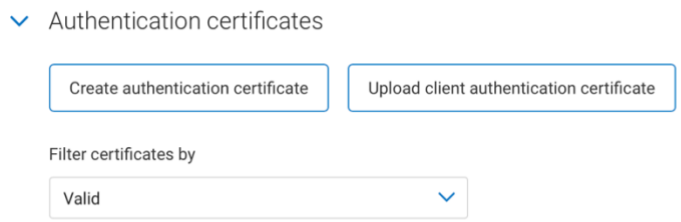


Figure 4 - Upload authentication certificate

- On the new page enter a nickname for the cert (e.g. John Doe Auth Cert 1)
- Drag the certificate file from your locale computer to the Upload area and click **Upload client authentication certificate**.
- The certificate will show up in your list

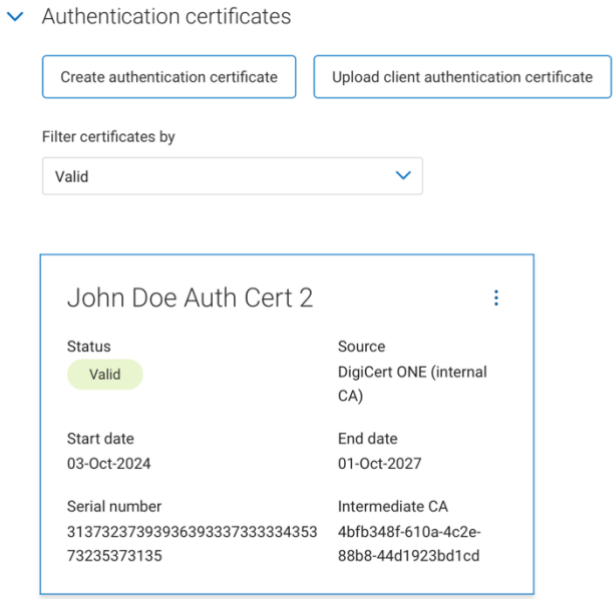


Figure 5 - List of Authentication Certificates

To create a new authentication certificate

- Scroll down to the **Authentication Certificates**
- Click on **Create authentication certificate**

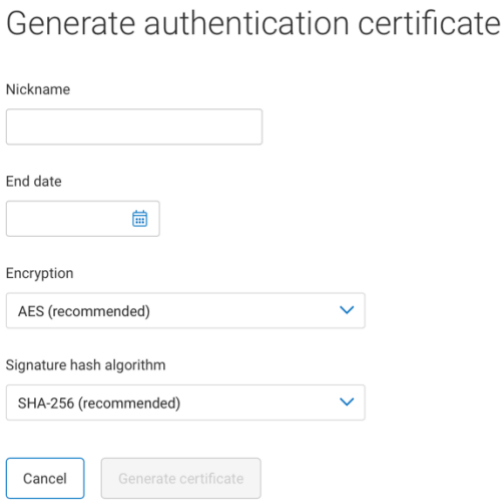


Figure 6 - Generate new authentication certificate

- On the new page enter a nickname for the cert (e.g. John Doe Auth Cert 1)
- Enter an end date for the certificate (e.g. 2-5 years out)
- Keep the recommended selections (AES, SHA-256)
- Click on Generate certificate
- In the new window, copy the password. You will need to use this password to open certificate your download.
- Install the certificate in your local key store using the password above.
- The certificate will show up in your list of available certificates to use:

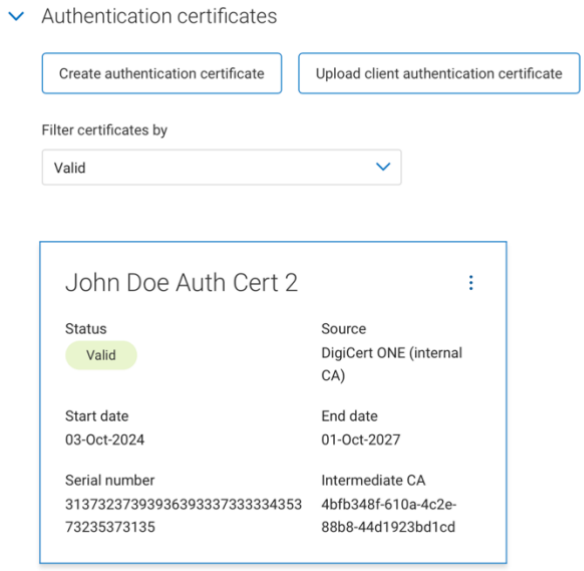


Figure 7 - List of Authentication Certificates

General Navigation

The key functionality of the portal can be found under the IoT Trust section of the site. To access the IoT Trust section, click on the squares menu in the top right of the web page.

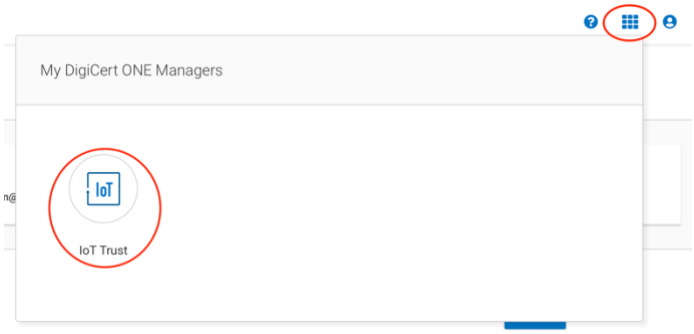


Figure 8 - Access IoT Trust Module

To access your user profile, click on the Person icon in the top right of the page and select **Admin Profile**.

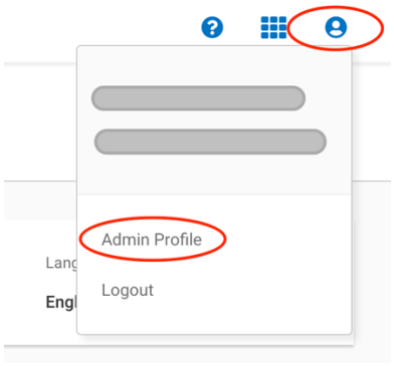


Figure 9 - Access user profile details

Check Balances

On the Dashboard page for IoT Trust Manager, you will see a listing of available Licenses at the top:

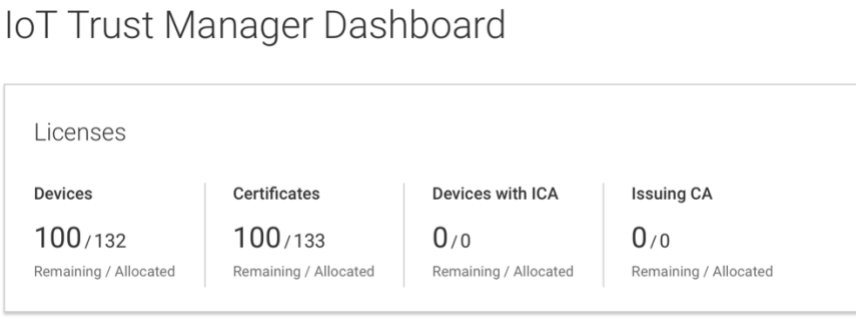


Figure 10 - License Overview

The **Devices** and **Certificates** numbers should be the same as certificates are connected to devices on a one-to-one basis.

*Note: The License values shown are cumulative across all account types in the DigiCert ONE system. E.g. If you purchased 100,000 D3.0 certificates, 100,000 D3.1 certificates and 25,000 PacketCable certificates, the license value will show as 225,000. These licenses can be used for **any** certificate type and will not be limited based on the purchase (e.g. in the example above, you can use the 25,000 PacketCable certs for D3.0 or D3.1 certs and vice versa.*

The **Allocated** number is an indication of **all** the certificates allocated over the entire history of the account. This number will continue grow over time from order to order.

The **Remaining** number is an indication of the certificates remaining in the account and available for issuance.

Note: On the DigiCert ONE platform, you can have a negative balance. CableLabs will perform monthly reporting and present an invoice for any negative balances. Extended

periods in negative balances may result in suspension of the account until the balance is positive.

Generating and Downloading New Certificates

- Login to your account and go to IoT Trust Manager (if not already there by default) using the squares menu in the top right of the web page.

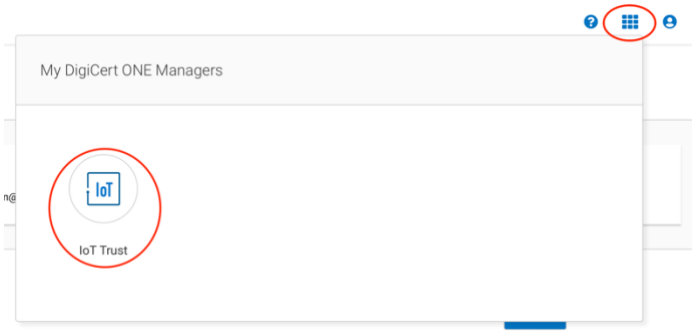


Figure 11 - Access IoT Trust Manager

- Click in **Certificates** in the left navigation bar
- To initiate a new batch, select **Start batch certificate request**

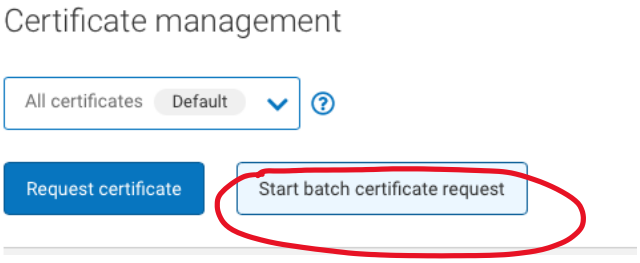


Figure 12 - Start new batch request

- Name the batch something unique that can be referenced later e.g. Cert Type - Date DOCSIS 3.1 – 2024-09-01 – Batch 1.
- Enter a description (optional)

- Select the certificate type under **Enrollment Profile** e.g. *Customer* – DOCSIS 3.1 –RSA 20248

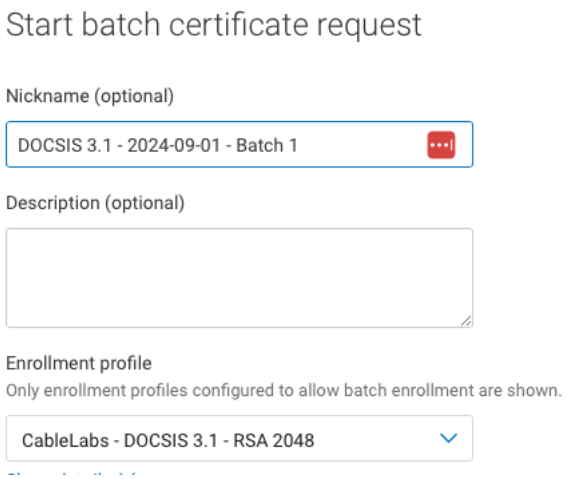


Figure 13 - Batch Reference Details

- Select the desired download format. **Note:** For customers wanting to retain the same download format as the MPKI8/Magnum platform, select **Binary .CER (SMPB)**. The format options include:
  - Base 64 .PEM (zipped) –
  - Base 64 .PEM (JSON) – Certificate is in a JSON format and can be downloaded and inserted into a database directly (still encrypted)
  - Binary .DER (zipped) -
  - Binary .CER (SMPB) – Proprietary format that includes zip file + text file within a zip file. This is the same format used in the MPKI8/Magnum platform (in combination with the MPKI8 PKI Client).

Figure 14 - Download options

- Select the appropriate authentication certificate to encrypt the certificate package that was set-up under you profile (see above) or upload a local certificate or PGP key.
  Note: If you have an existing authentication certificate for MPKI8/Magnum platform and you want to use the MPKI8 PKI Client app to decrypt the certificate package after download, ensure you are using the same authentication certificate as the PKI Client app.

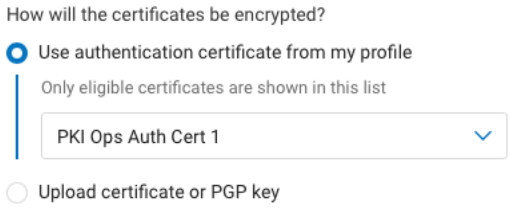


Figure 15 - Select encryption certificate

- Select how you want to assign value for the certificates CN (common name) value. This will almost always be **Generate requests for MAC addresses**.
- Enter the starting MAC address, the number of certificates to generate (max ??) and the increment value.

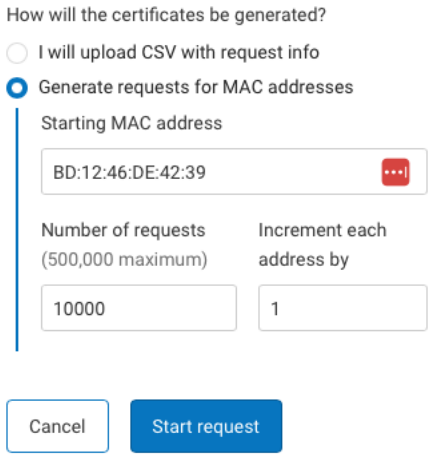


Figure 16 - Select starting MAC, quantity and increment values

- Click **Start Request**. You will return to the main Certificate management screen, where the status on the batch request will display.

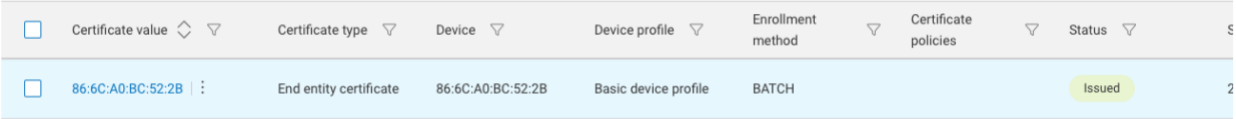


Figure 17 - Certificate Manager screen

Once the certificates have been generated, you can download the certificates

- Click on **Batch Jobs** under **Certificates** on the left navigation.

- Click on the batch job you would like to download

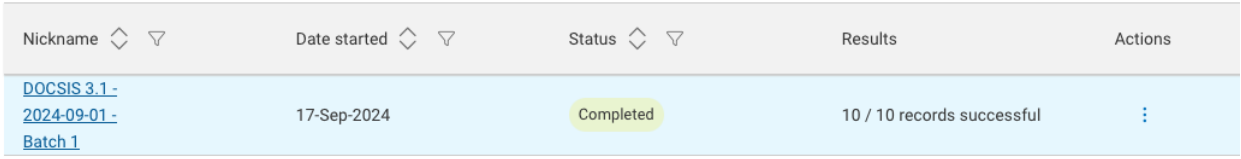


Figure 18 - Certificate Batch status

- Click on the download icon (downward blue arrow) to start the download. The file will be saved to your local machine in the default location for file downloads.

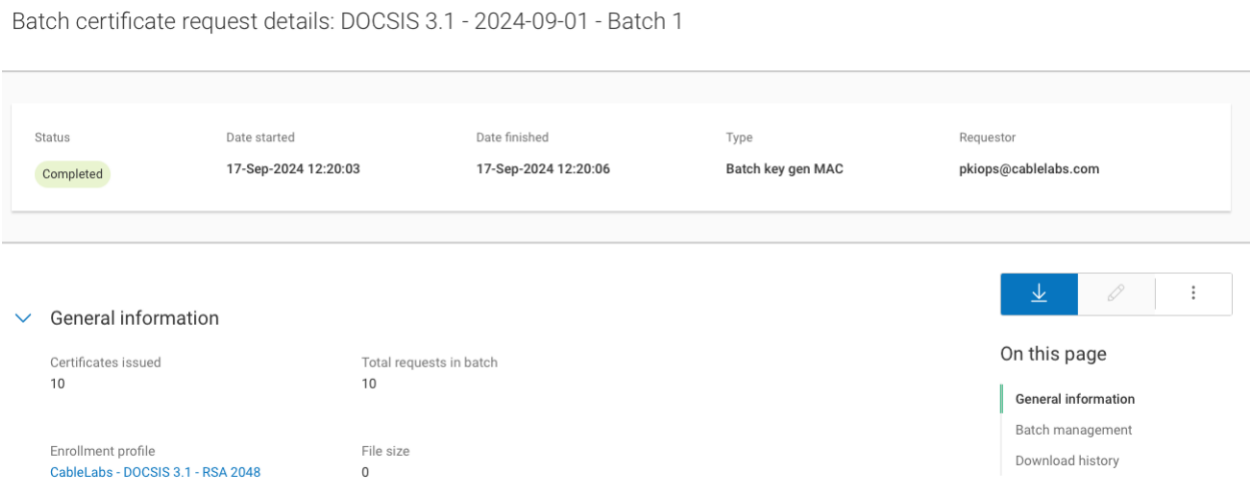


Figure 19 - Batch details screen

- Open the batch file using your preferred method depending on the download options selected.

Downloading Root and Intermediate Certificates

The Root and Intermediate (Issuing) CAs are the same as the current Magnum/MPKI8 platform. If you have already downloaded these certificates, you do not need to re-download them.

If you need to download either certificate from the platform, perform the following steps:

- Login to your account and go to IoT Trust Manager (if not already there by default) using the squares menu in the top right of the web page.

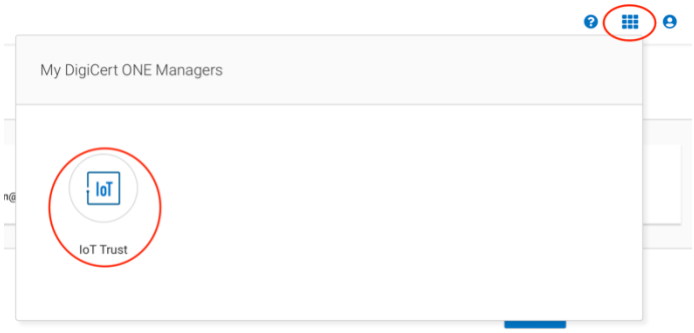


Figure 20 - Access IoT Trust Manager

- Click in **Certificates** in the left navigation bar
- Click on a link for the **Certificate Value**

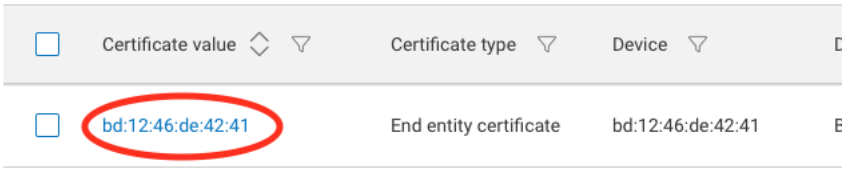
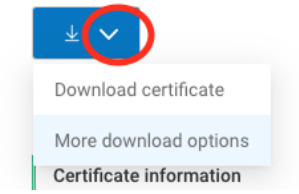


Figure 21 - Click to get details on certificate

- On the certificate details page, click on the downward carat (∨) and select **More download options**.



- On the download options page, you can select to download either the Intermediate certificate or Root certificate. You also have additional options to

download the device certificate as well as a bundle of the certs in different options under the **File Type** selection.

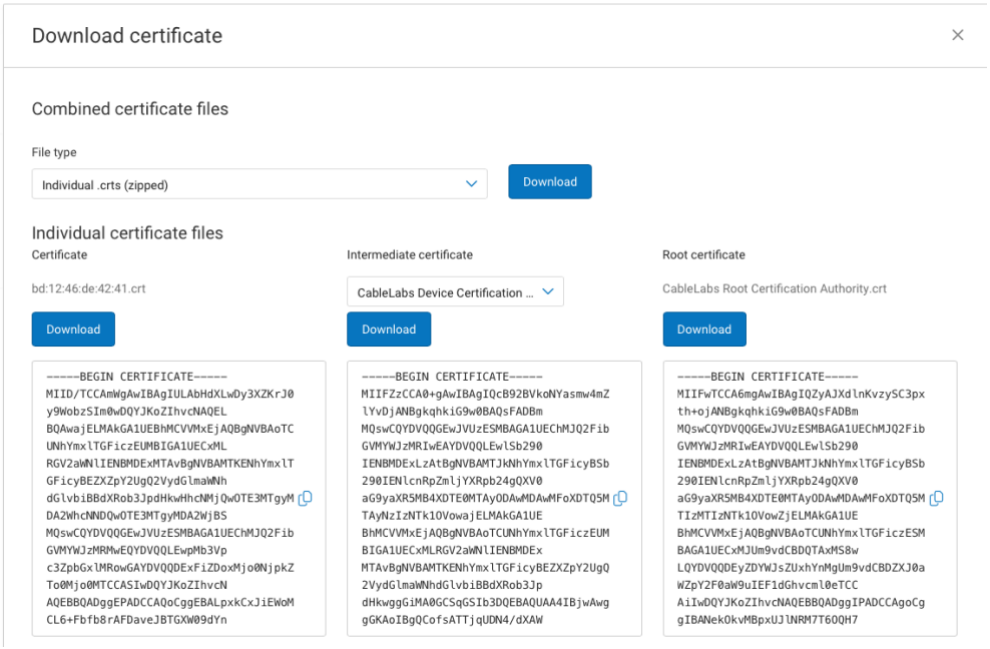


Figure 22 - Certificate Download Options

- Once downloaded, click the **X** in the top right of the window to close the download options screen.

Revoking Certificates

Certificates may be revoked if the certificate has been compromised or the certificate was generated in error (e.g. wrong MAC addresses).

Note: Once certificates have been issued, they are considered valid and used. Revoked certificates cannot be added back to your balance of available certificates.

To revoke a certificate (or multiple certificates), perform the following steps:

- Login to your account and go to IoT Trust Manager (if not already there by default) using the squares menu in the top right of the web page.

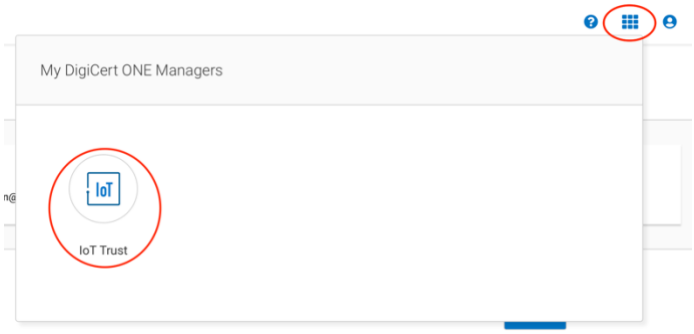


Figure 23 - Access IoT Trust Manager

- Click in **Certificates** in the left navigation bar
- Find the certificate you need to revoke and click on the three dots next to the **Certificate value** (MAC address).

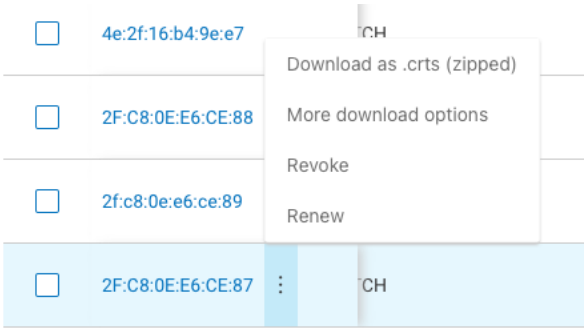


Figure 24 - Individual Certificate Options

- Select **Revoke** from the list of options.
- In the new window, select a reason for the revocation and add a description. Click **Revoke certificate** to complete the process.
- You will receive a confirmation that the certificate has been revoked and the status in the certificate list will show **Revoked**.

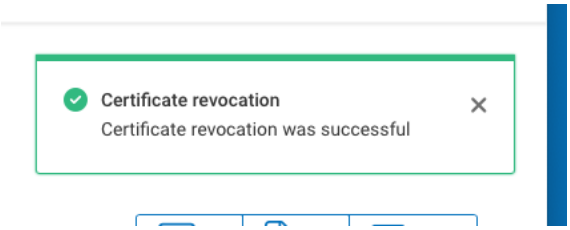


Figure 25 - Cert revocation confirmation message