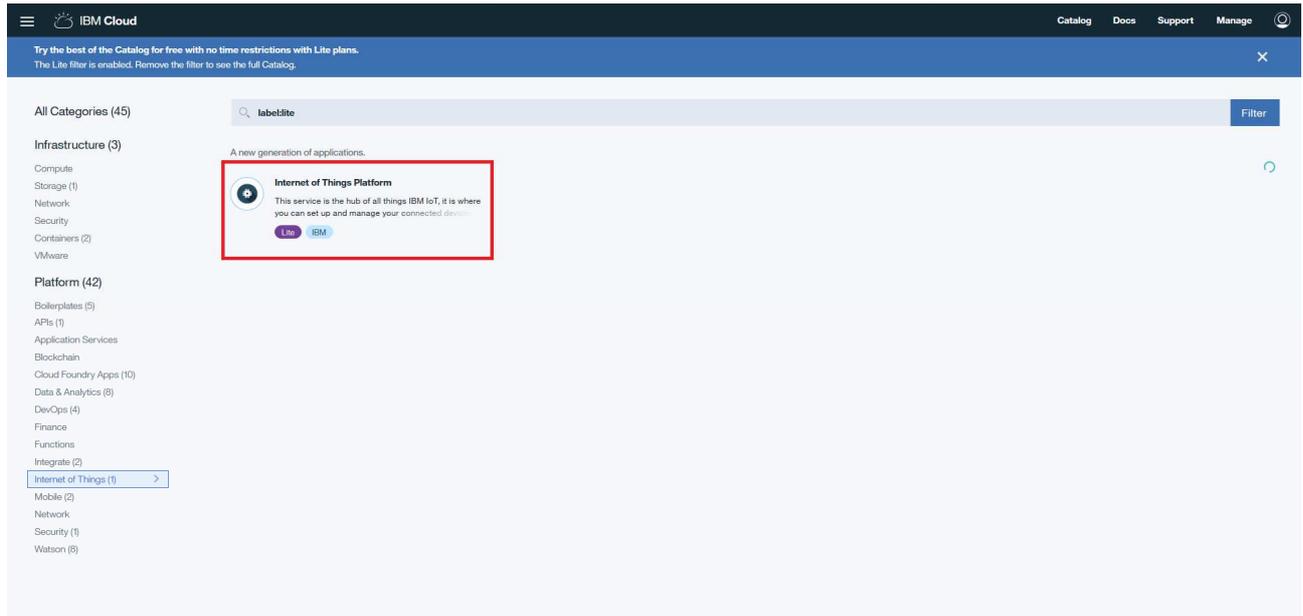
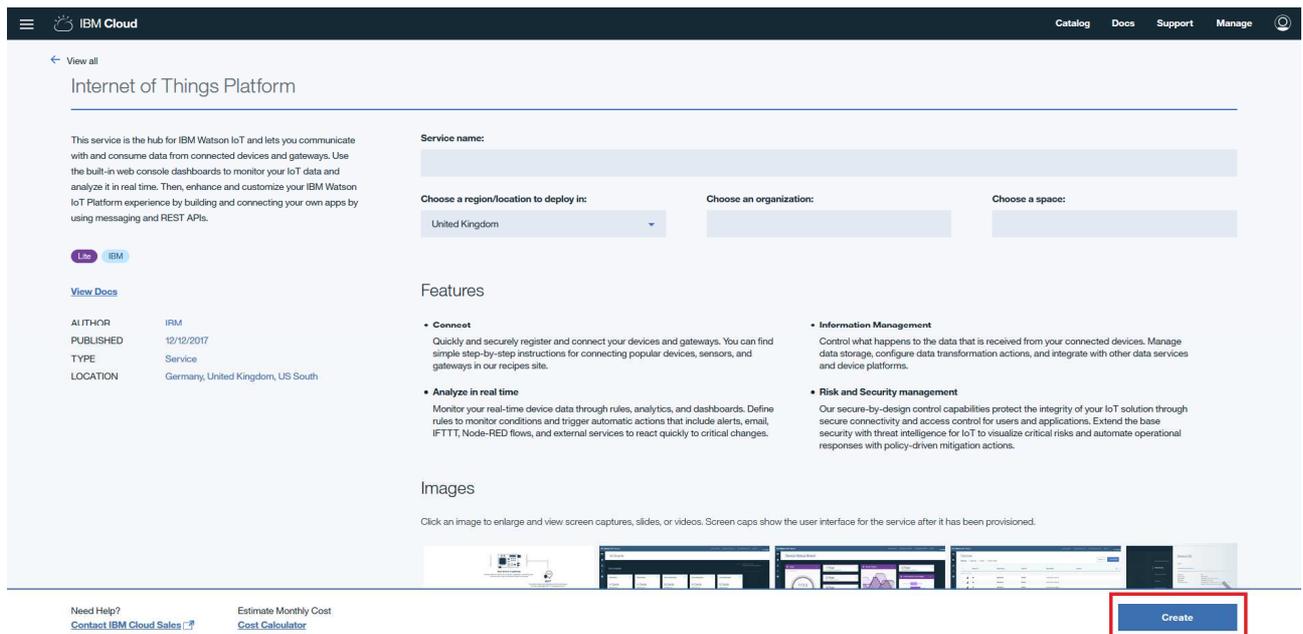


# IBM Watson IoT Guide

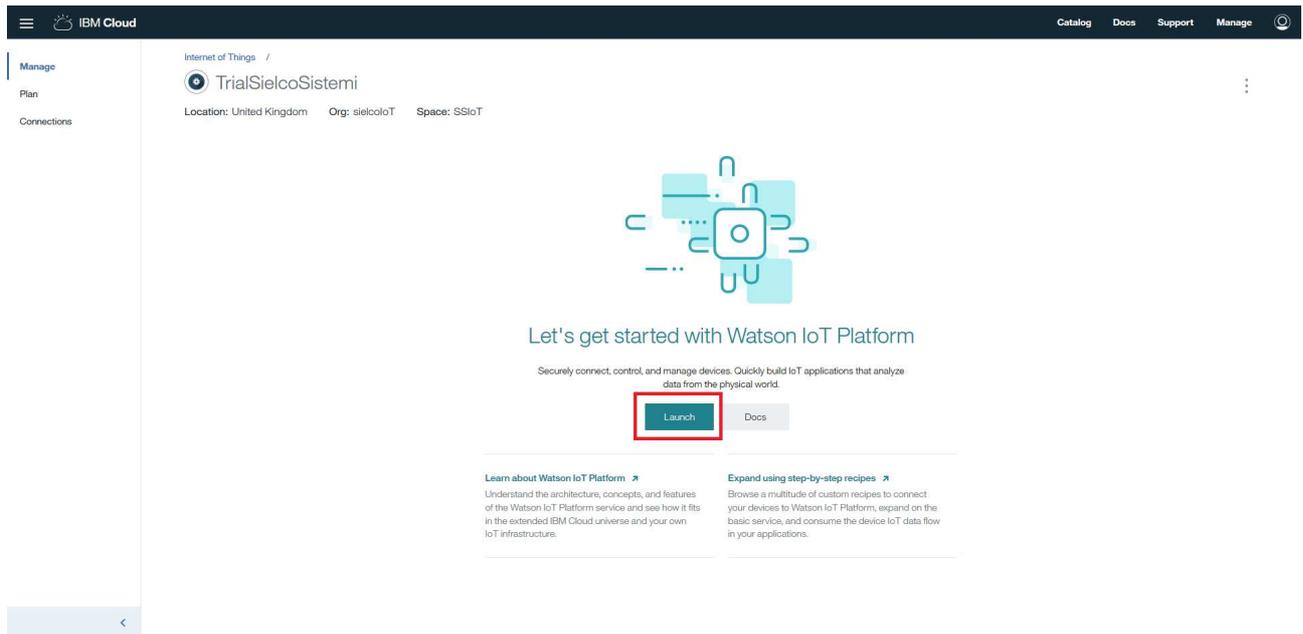
- 1) Register an account on IBM
  - A. Go to <https://www.ibm.com/internet-of-things/spotlight/watson-iot-platform/trial>
  - B. Click on 'Try Watson IoT Platform' button
  - C. Enter username and password
  - D. Wait for validation account email
- 2) Login to Bluemix (<http://www.bluemix.net/>)
- 3) Go to catalog using this link <https://console.ng.bluemix.net/catalog/>
- 4) From left menu, select 'Internet of Things' and then click on 'Internet of Things Platform'



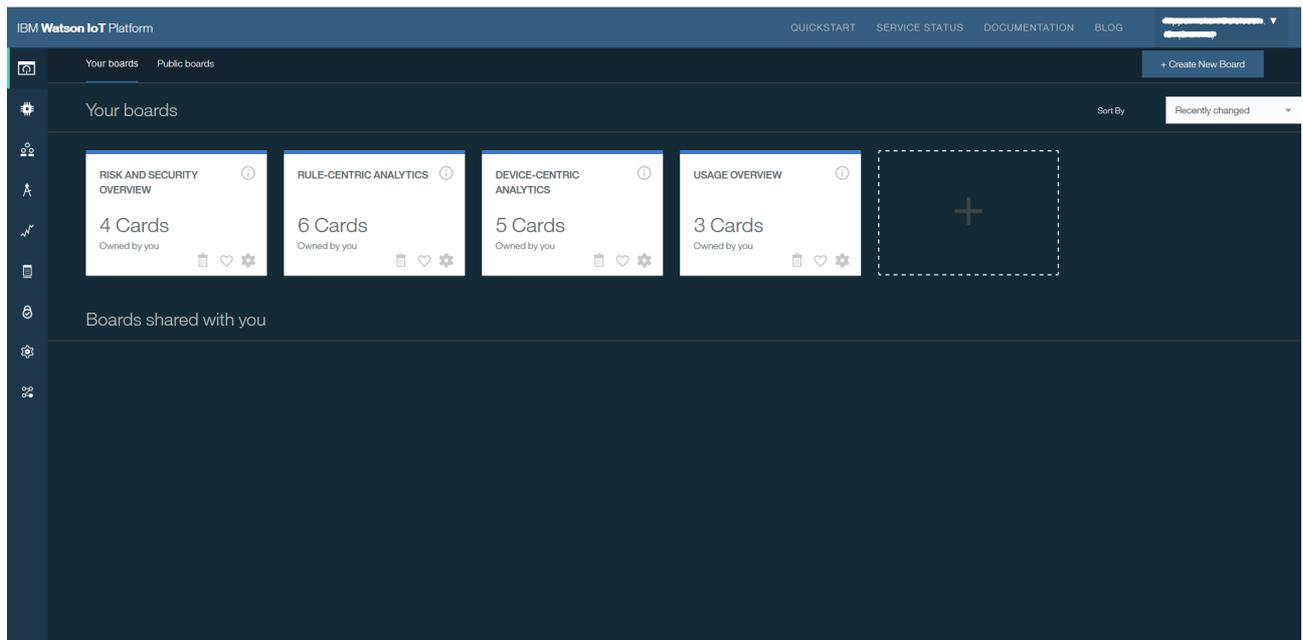
- 5) In the page that opens, fill the required fields and the click on  button



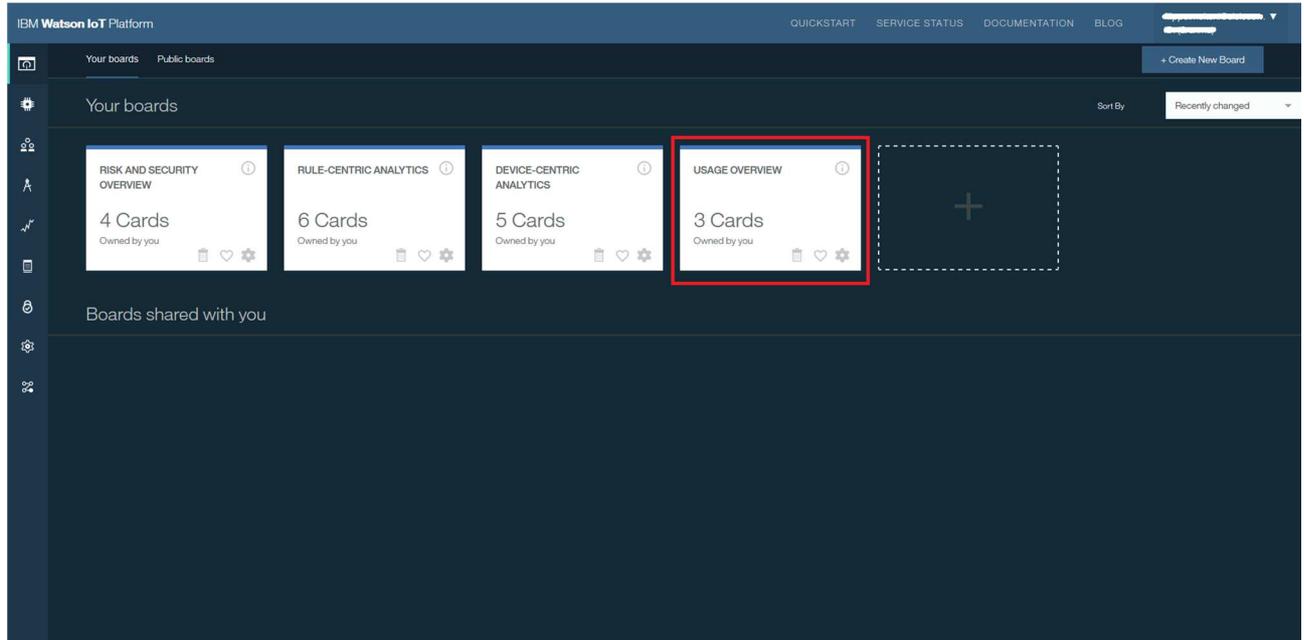
6) At the end of creation process, the following page opens



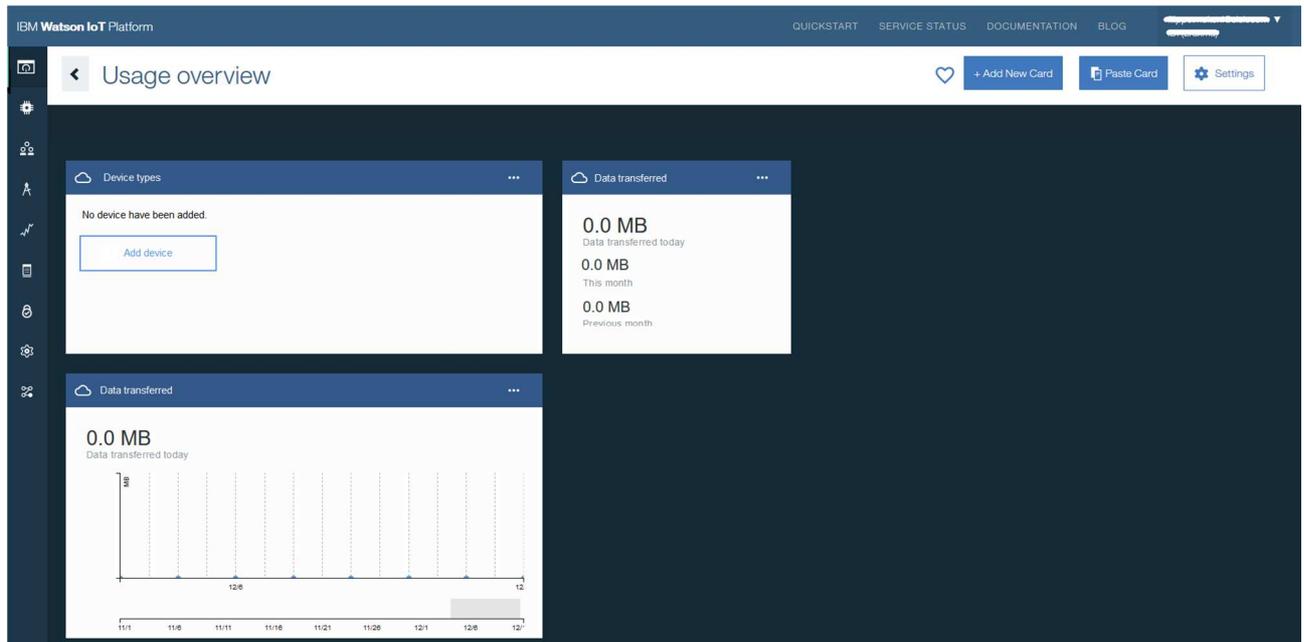
Click on  and you will be redirected to the page shown below



7) Click on 'Device-centric analytics'

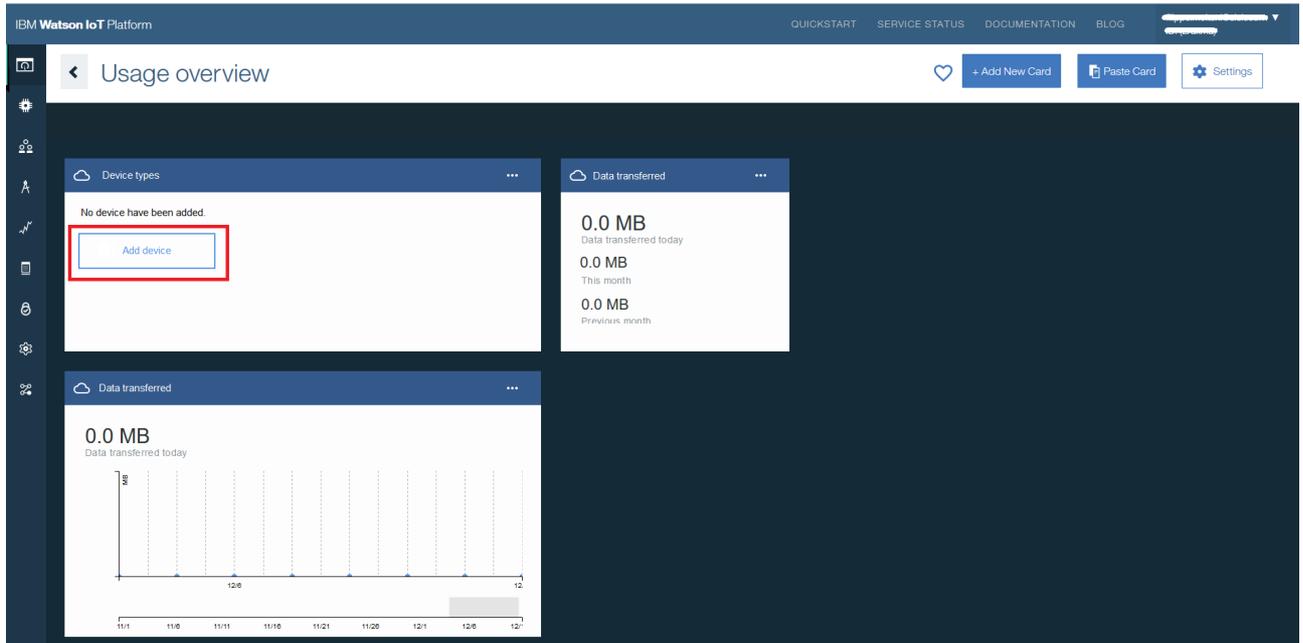


and the following page is shown

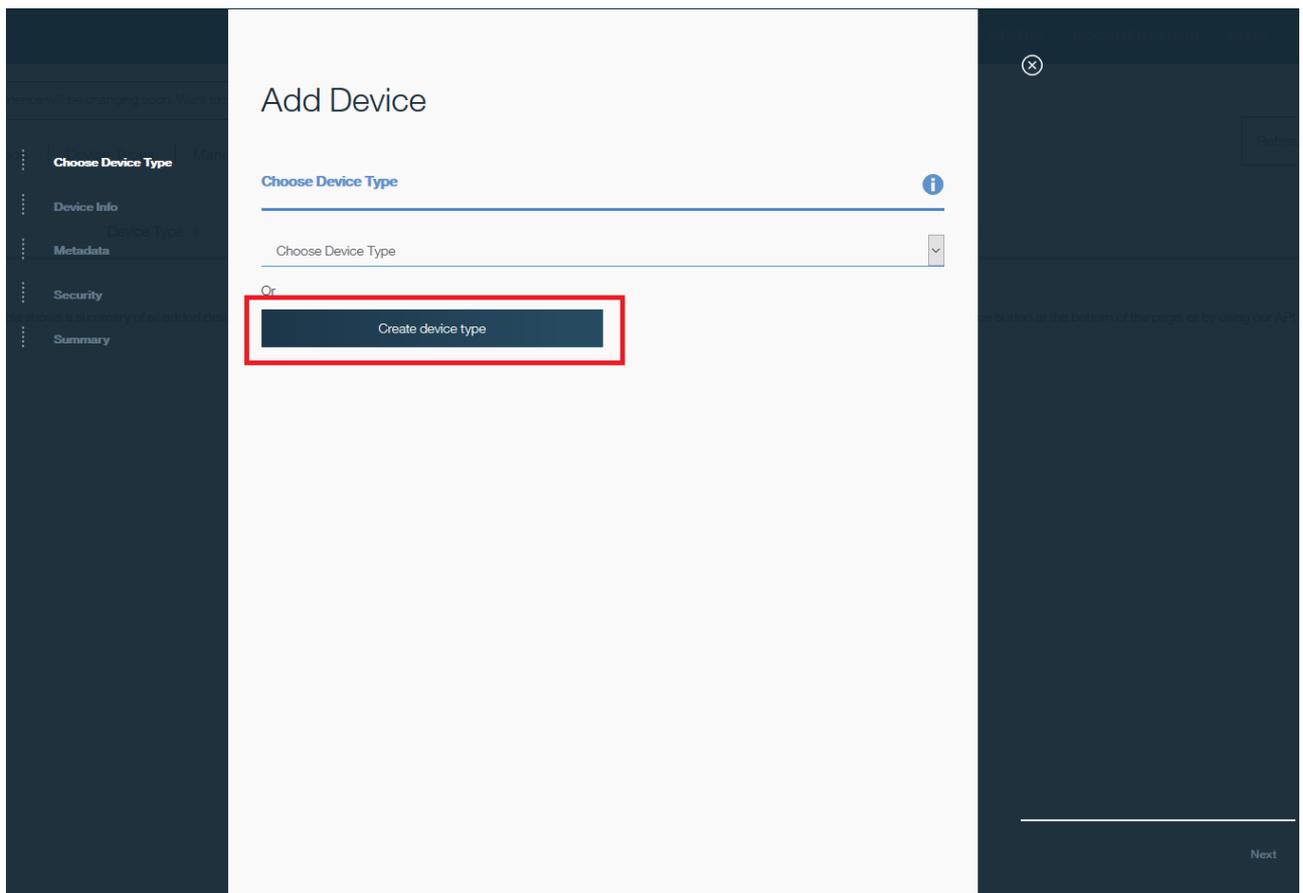


8) Now, we can create the 'Device Type'

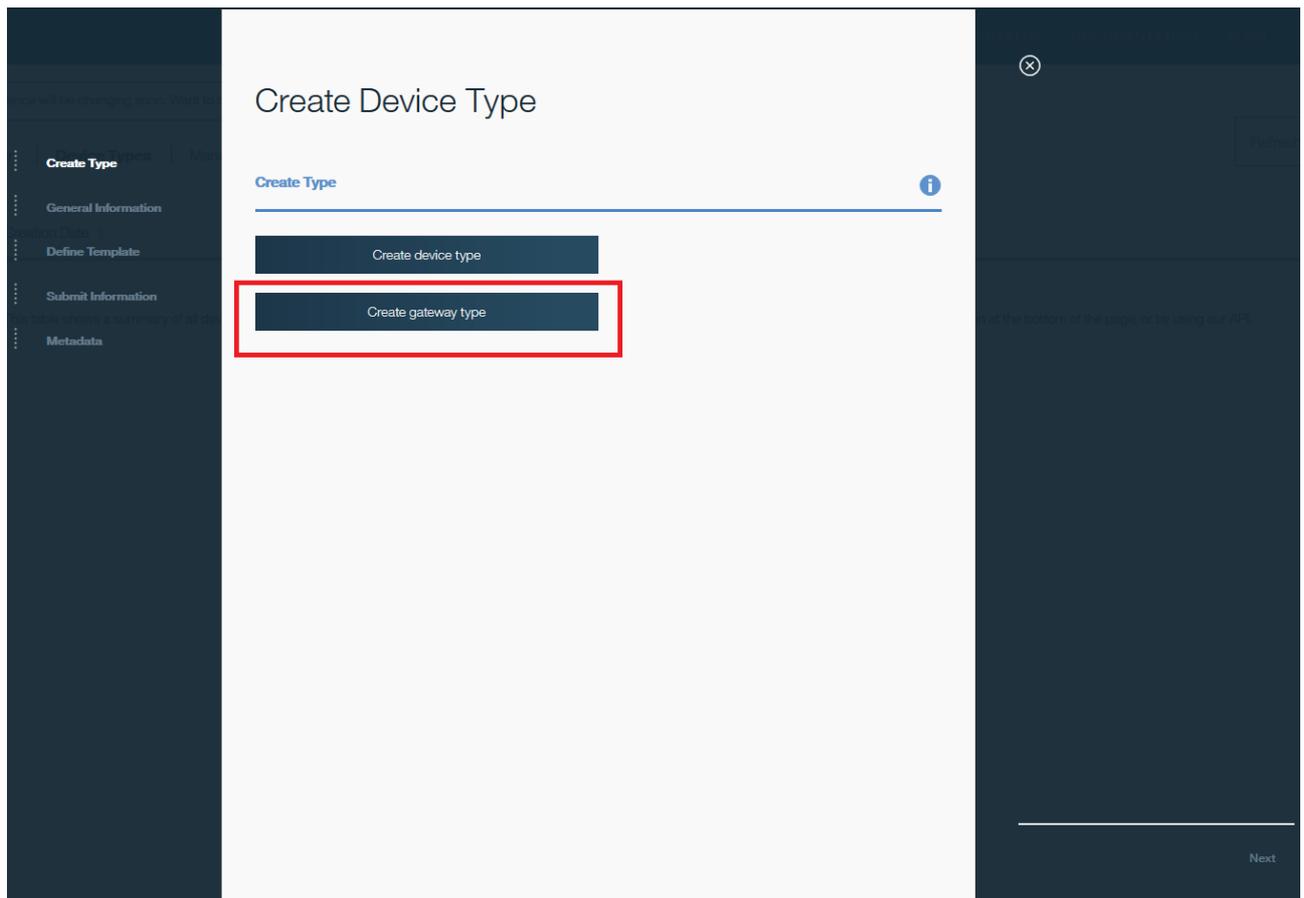
A. Click on 'Add device' button inside 'Device types' tab



B. Click on 'Create device type' button



C. Click on 'Create gateway type'



D. Fill the requested field 'Name' and 'Description'. Then click on 'Next'.

## Create Gateway Type

**General Information** ⓘ

**Name** SS10680

The device type name is used to identify the device type uniquely, using a restricted set of characters to make it suitable for API use.

**Description** Gateway SS10680 - Guanzate

The device type description can be used for a more descriptive way of identifying the device type.

Back Next

- E. Now, we have to defined the device model. These attributes are optional. You can modify them whenever you want. For this example, select 'Manufacturer', 'Firmware Version', 'Hardware Version' and then click on 'Next'

The screenshot displays the 'Create Gateway Type' interface. On the left, a dark sidebar contains a vertical list of steps: 'Create Type' (checked), 'General Information' (checked), 'Define Template' (active), 'Submit Information', and 'Metadata'. The main content area is titled 'Create Gateway Type' and 'Define Template'. Below the title, an information icon is present. A paragraph explains that the following options are optional attributes for the device type. The options are arranged in two columns:

<input type="checkbox"/> <b>Serial Number</b> ...	<input type="checkbox"/> <b>Description</b> ...
<input checked="" type="checkbox"/> <b>Manufacturer</b> ...	<input checked="" type="checkbox"/> <b>Firmware Version</b> ...
<input type="checkbox"/> <b>Model</b> ...	<input checked="" type="checkbox"/> <b>Hardware Version</b> ...
<input type="checkbox"/> <b>Class</b> ...	<input type="checkbox"/> <b>Descriptive Location</b> ...

At the bottom right, there are 'Back' and 'Next' buttons. The 'Next' button is highlighted with a red border.

F. Fill the requested fields and then click on 'Next'

# Create Gateway Type

**Submit Information**

You must now set values for the attributes you have selected for this device type. The values of these attributes will act as a template for new devices that are assigned this device type. You can override these values when adding individual devices.

<b>Manufacturer</b>	<input type="text" value="Sielco Sistemi"/>
<b>Firmware Version</b>	<input type="text" value="1.0.0"/>
<b>Hardware Version</b>	<input type="text" value="rev-1"/>

[Back](#) [Next](#)

- G. In the following page, we can not define metadata, so we can go on with 'Device type' creation by clicking on 'Create'

The screenshot shows a web interface for creating a gateway type. On the left is a dark sidebar with a progress indicator: 'Create Type' (checked), 'General Information' (checked), 'Define Template' (checked), 'Submit Information' (checked), and 'Metadata' (current step, indicated by a dotted line). The main content area is titled 'Create Gateway Type' and has a sub-section 'Metadata (optional)' with an information icon. Below this, a message states: 'Metadata must be added as JSON; plain text cannot be used.' A large, empty text area for input is provided. At the bottom right, there are two buttons: 'Back' and 'Create'. The 'Create' button is highlighted with a red rectangular box.

H. At the end of the 'Device type' creation process, you will be redirected at the initial page 'Add device' where you can see the new 'Device type' just add. Select it, and then click on 'Next'

**Add Device**

**Choose Device Type** ⓘ

SS10680 ▼

Or

Create device type

Next

I. Enter 'Device ID' field and click on 'Next'

## Add Device

### Device Info

Device ID is the only required information, however other fields are populated according to the attributes set in the selected device type. These values can be overridden, and attributes not set in the device type can be added.

<b>Device ID</b>	gateway
<b>Manufacturer</b>	Sielco Sistemi
<b>Firmware Version</b>	1.0.0
<b>Hardware Version</b>	rev-1

+ Additional fields

Back **Next**

J. Skip data entry for 'Metadata' field and click on 'Next'

The screenshot shows a web interface for adding a device. On the left is a dark sidebar with a navigation menu containing: 'Choose Device Type' (checked), 'Device Info' (checked), 'Metadata' (selected), 'Security', and 'Summary'. The main content area is titled 'Add Device' and features a section for 'Metadata (optional)' with an information icon. Below this, a text input field is empty, with a note stating 'Metadata must be added as JSON; plain text cannot be used.' At the bottom right, there are 'Back' and 'Next' buttons, with the 'Next' button highlighted by a red square.

- K. Now, you must select the type of the authentication token that you want to use. You can choose to use an auto-generated authentication token or a self-provided authentication token. In both cases, you have to make a note of the authentication token because it is not recoverable. For this example, we use an auto-generated authentication token, so just click on 'Next' to proceed.

**Add Device**

**Security**

You have two options:

**Auto-generated authentication token**

Allow the service to generate an authentication token for you. The token will be 18 characters long and will contain a mix of alphanumeric characters and symbols. The token will be returned to you at the end of the registration process.

**Self-provided authentication token**

Provide your own authentication token for this device. The token must be between 8 and 36 characters long, and should contain a mix of lower and upper case letters, numbers, and symbols (hyphen, underscore, exclamation-point, ampersand, at sign, question mark, period, right and left parentheses are permitted). The token should be free of repetition, dictionary words, user names, and other predefined sequences.

**Provide a token (optional)**

Authentication tokens are encrypted before we store them.

**We are not able to recover lost authentication tokens. Ensure you make a note of the authentication token after clicking Add.**

Back **Next**

- L. In the 'Summary' page, you can control all the device information, and then click on 'Add' to add the device

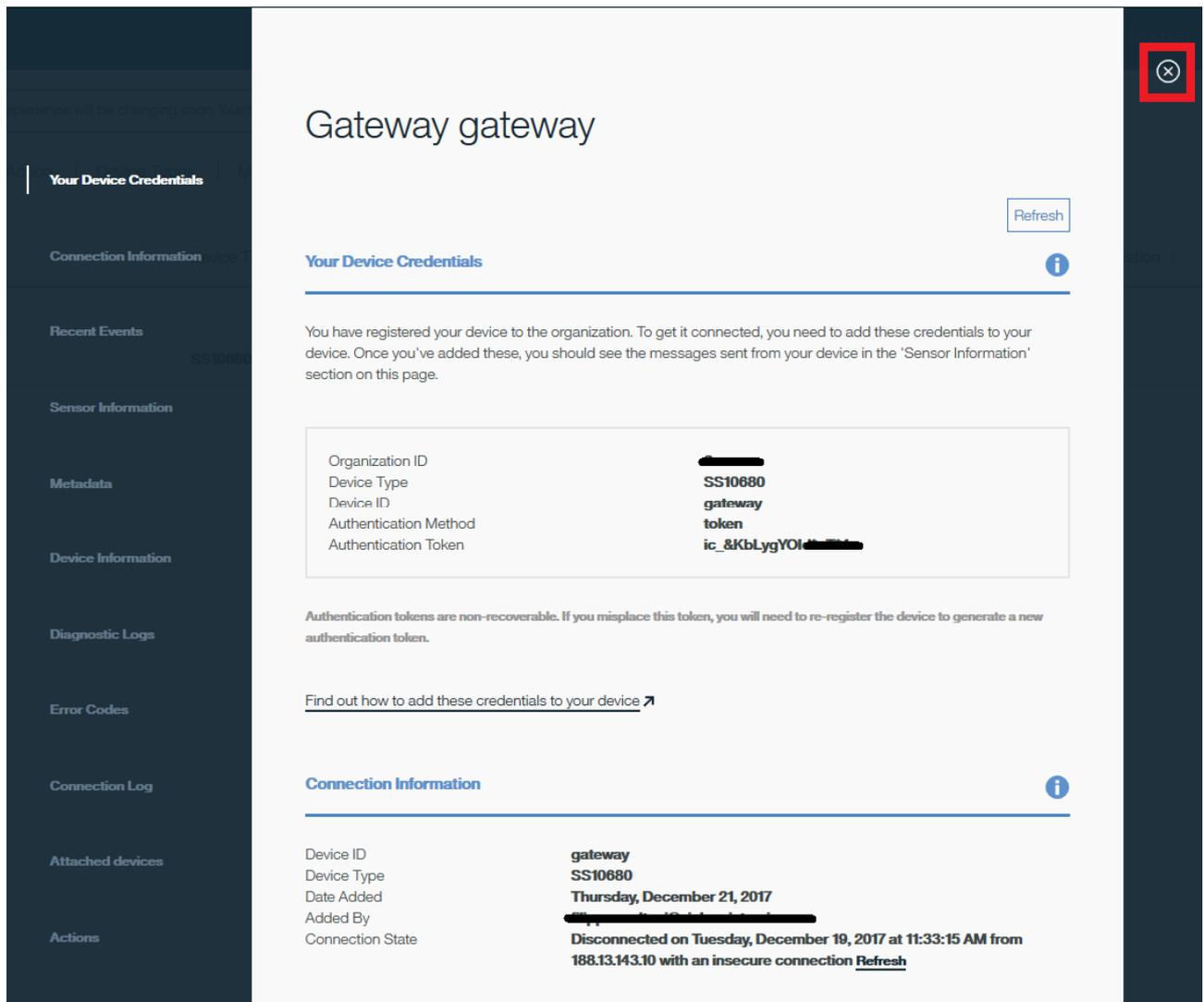
The screenshot displays the 'Add Device' interface. On the left, a dark sidebar contains a navigation menu with the following items: 'Choose Device Type' (checked), 'Device Info' (checked), 'Metadata' (checked), 'Security' (checked), and 'Summary' (highlighted with a white dot). The main content area is titled 'Add Device' and features a 'Summary' section. Below the title, a message reads: 'Please check that all submitted information for this device is correct before adding this device.' The device information is presented in a table-like format:

Device Type	<b>SS10680</b>
Device ID	<b>gateway</b>
Serial Number	-
Manufacturer	Sielco Sistemi
Model	-
Class	-
Description	-
Firmware Version	1.0.0
Hardware Version	rev-1
Descriptive Location	-
Authentication Token	<b>To be generated</b>
Metadata	

At the bottom right of the page, there are two buttons: 'Back' and 'Add'. The 'Add' button is highlighted with a red rectangular border.

M. At the end of the device adding process, a summary page is shown to you. In this page you can find the authentication token for the device, that you have to take note.

Now, click on  .



**Gateway gateway**

Refresh

### Your Device Credentials

You have registered your device to the organization. To get it connected, you need to add these credentials to your device. Once you've added these, you should see the messages sent from your device in the 'Sensor Information' section on this page.

Organization ID	[REDACTED]
Device Type	SS10680
Device ID	gateway
Authentication Method	token
Authentication Token	ic_&KbLygYOI [REDACTED]

Authentication tokens are non-recoverable. If you misplace this token, you will need to re-register the device to generate a new authentication token.

[Find out how to add these credentials to your device](#)

### Connection Information

Device ID	gateway
Device Type	SS10680
Date Added	Thursday, December 21, 2017
Added By	[REDACTED]
Connection State	Disconnected on Tuesday, December 19, 2017 at 11:33:15 AM from 188.13.143.10 with an insecure connection <a href="#">Refresh</a>

- 9) From left menu, enter in 'Security' page
  - A. For 'Security Level' field, select 'TLS Optional'
  - B. Click on 'Refresh compliance'
  - C. Save

IBM Watson IoT Platform

QUICKSTART SERVICE STATUS DOCUMENTATION BLOG

← Back Cancel Save

### Connection Security

Use the Connection Security policy to set the default security level that is applied to all devices. You can then add custom rules for specific devices. When the default rule and custom rules are defined, you can view the compliance levels for your organization.

1 Device in organization  
Refresh compliance  
Updated December 21, 2017 11:58 AM

#### Default Rule

Define the default connection security level to use for all device types that do not have custom rules defined. You can view the number of devices that are affected and then predicted level of compliance.

Note: The device number and predicted compliance values are estimates based on a report that runs at varying intervals.

Scope	Security Level	Predicted Compliance	# of Devices
Default	TLS Optional	Refresh compliance	1 device

#### Custom Rules

You can define custom connection rules for specific device types. Custom rules overwrite the default rule for the specified device types. The predicted compliance value is updated to reflect the default settings and the custom settings.

Add Custom Rule

Now, from left menu, enter in 'Devices' page and control if the device is connected.

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QUICKSTART SERVICE STATUS DOCUMENTATION BLOG

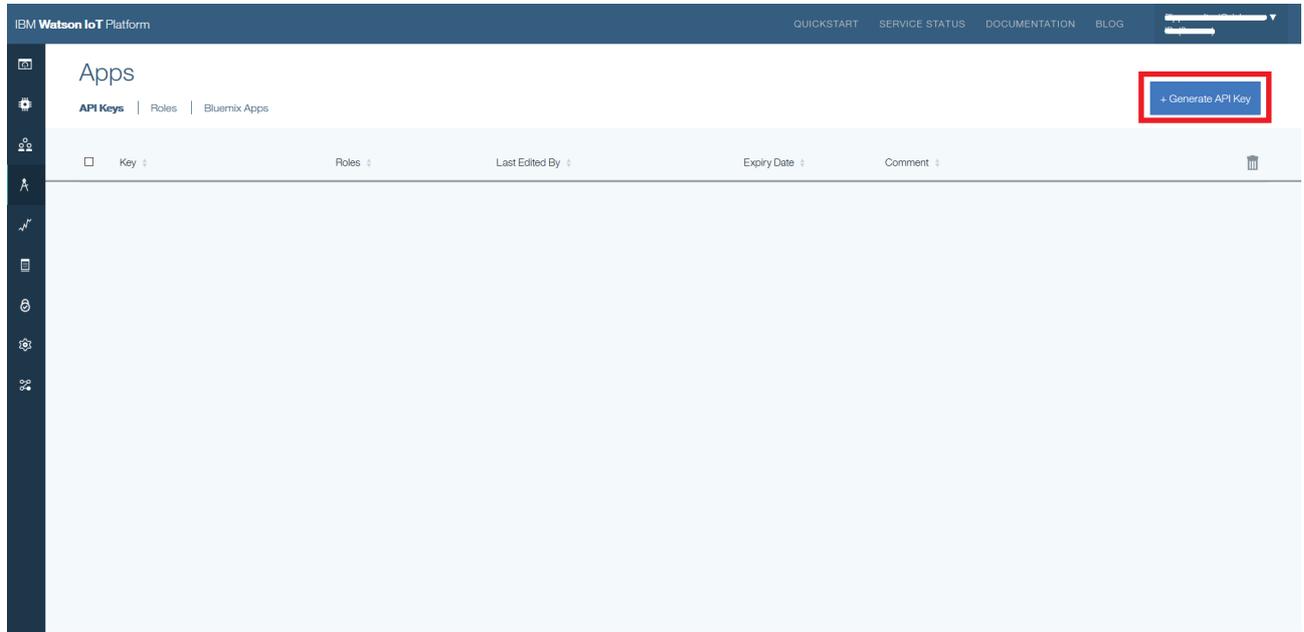
Browse Diagnose Action Device Types Manage Schemas + Add Device

### Browse Devices

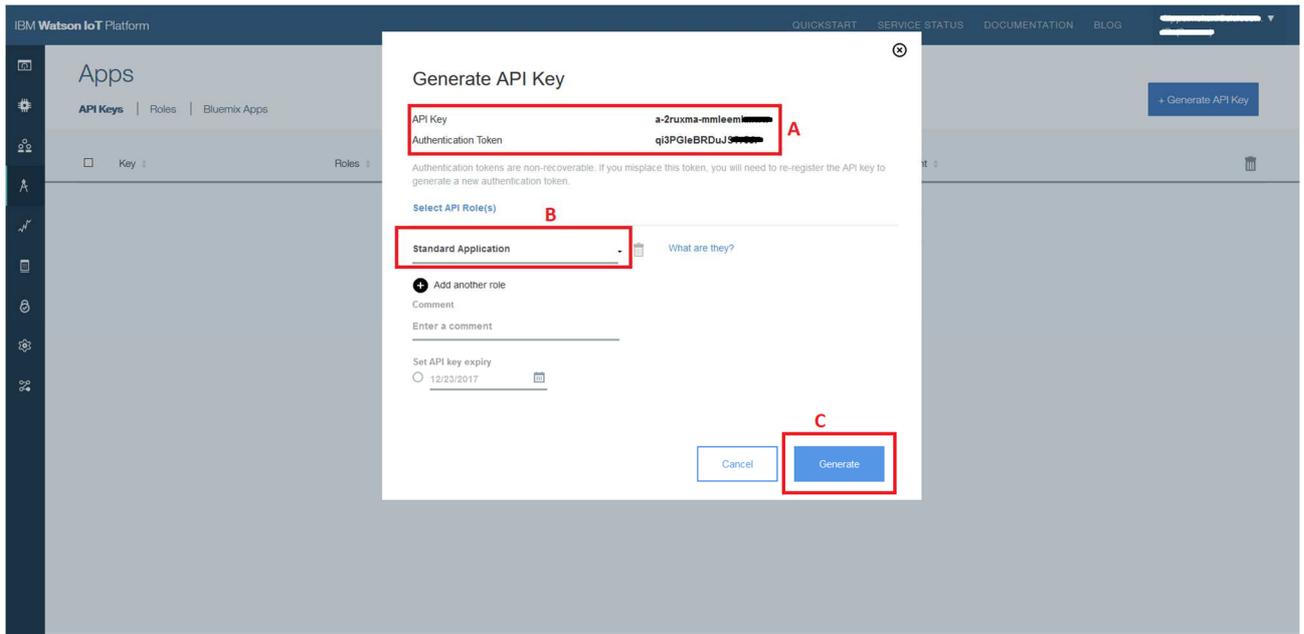
This table shows a summary of all devices that have been added. It can be filtered, organized, and searched on using different criteria. To get started, you can add devices by using the Add Device button, or by using API.

Device ID	Device Type	Class ID	Date Added	Descriptive Location
gateway	SS10680	Gateway	Dec 21, 2017 11:51 AM	

- 10) From left menu, enter in 'App' page and then click 'Generate API Key' button.



- 11) In the tab that opens:
- A. Take note of 'API Key' and 'Authentication Token'
  - B. Select 'Standard application' for 'Select API role'
  - C. Click on 'Generate' button



At this point, Watson IoT Platform configuration is finished.

Now, we recommend to start the configuration of gateway SS10680.