Azure services

+

Create a resource

IoT Hub

IoT Hub 📌 ···
IFI TECHSOLUTIONS Pvt Ltd (ifi.tech)

+ Create   ⚙ Manage view ⌄   🔄 Refresh   ⬇ Expo

Filter for any field...   Subscription == **Data - Dee**

Showing 0 to 0 of 0 records.

Name ↑↓

IoT hub ···
Microsoft

Basics   Networking   Management   Tags   Review + create

Create an IoT hub to help you connect, monitor, and manage billions of your IoT assets.   Learn more

Project details

Choose the subscription you'll use to manage deployments and costs. Use resource groups like folders to help you organize and manage resources.

Subscription * ⓘ

Data - Deepak & Ashfaq	⌄

Resource group * ⓘ

(New) asaquickstart-resourcegroup	⌄

Create new

Instance details

IoT hub name * ⓘ

MyASAIoTHubx	✓

Region * ⓘ

East US	⌄

Review + create   < Previous   Next: Networking >

IoT hub
Microsoft

Scale tier and units

Pricing and scale tier * ⓘ

F1: Free tier ⌄

Learn how to choose the right IoT hub tier for your solution

Number of F1 IoT hub units ⓘ

○────────────────────── 1

Determines how your IoT hub can scale. You can change this later if your needs increase.

Defender for IoT   ⬤ Off

Turn on Defender for IoT and add an extra layer of threat protection to IoT Hub, IoT Edge, and your devices. Learn more

Pricing and scale tier ⓘ	F1	Device-to-cloud-messages ⓘ	Enabled
Messages per day ⓘ	8,000	Message routing ⓘ	Enabled
Cost per month	0.00 INR	Cloud-to-device commands ⓘ	Enabled

Review + create   **< Previous: Networking**   **Next: Tags >**

MyASAIoTHubx | IoT devices
IoT Hub

🔍 io ✕   «

📋 Activity log

Settings

🔑 Shared access policies

◔ Built-in endpoints

Explorers

📄 Query explorer

▣ IoT devices

Automatic Device Management

☁ IoT Edge

⚙ IoT device configuration

View, create, delete, and update devices in your IoT Hub.

Device name

enter device ID

Find devices

＋ Add Device   ↻ Refresh   🗑 Delete

Device ID	Status	Last Status Update	Authe

There are no IoT devices to display.

Create a device

ⓘ   Find Certified for Azure IoT devices in the Device Catalog

Device ID * ⓘ

> MyASAIoTDevice

Authentication type ⓘ

(**Symmetric key**   X.509 Self-Signed   X.509 CA Signed)

Auto-generate keys ⓘ

☑

Connect this device to an IoT hub ⓘ

(**Enable**   Disable)

Parent device ⓘ

No parent device
Set a parent device

Save

Device name

> *enter device ID*

Find devices

＋ Add Device   ⟳ Refresh   🗑 Delete

Device ID	Status	Last Status Update
MyASAIoTDevice	Enabled	--

MyASAIoTDevice 📌 ···

MyASAIoTHubx   ✕

🖫 Save   ✉ Message to Device   ✂ Direct Method   ╋ Add Module Identity   ☰ Device twin   🔍 Manage keys ⌄   ↻ Refresh

Device ID ⓘ	MyASAIoTDevice
Primary Key ⓘ	●●●●●●●●●●●●●●●●●●●●●●●
Secondary Key ⓘ	●●●●●●●●●●●●●●●●●●●●●●●
Primary Connection String ⓘ	●●
Secondary Connection String ⓘ	●●
Enable connection to IoT Hub ⓘ	⦿ Enable ○ Disable
Parent device ⓘ	No parent device

Module Identities   Configurations

Module ID	Connection State	Connection State Last Updated ...	Last Activity Time (UTC)

Create a storage account   ···

ⓘ Running final validation...

Basics   Advanced   Networking   Data protection   Tags   **Review + create**

Basics

Subscription	Data - Deepak & Ashfaq
Resource Group	asaquickstart-resourcegroup
Location	eastus
Storage account name	myasquickstartstorage
Deployment model	Resource manager
Performance	Standard
Replication	Read-access geo-redundant storage (RA-GRS)

Advanced

Create		< Previous	Next >	Download a template for automation

myasquickstartstorage_1630922446711 | Overview 📌 ⋯
Deployment

🔍 Search (Ctrl+/)   «

- 🔶 **Overview**
- 📥 Inputs
- ☲ Outputs
- 📄 Template

🗑 Delete   ⊘ Cancel   ⬆ Redeploy   ↻ Refresh

🚀 We'd love your feedback! →

✅ **Your deployment is complete**

📊 Deployment name: myasquickstartstorage_1630922446711   Start time: 9/6/2021
     Subscription: Data - Deepak & Ashfaq   Correlation ID: 64c5...
     Resource group: asaquickstart-resourcegroup

∨ **Deployment details** (Download)

∧ **Next steps**

[Go to resource]

▤ myasquickstartstorage | Containers 📌 ⋯
Storage account

🔍 Search (Ctrl+/)   «

- ▤ Overview
- 🗎 Activity log
- 🏷 Tags
- 🔧 Diagnose and solve problems
- 👥 Access Control (IAM)

＋ Container   🔒 Change access level   ↺ Re...

Search containers by prefix

Name

☐ $logs

☐ container1

Stream Analytics job ⚲ ⋯
Microsoft

Stream Analytics job ♡ Add to Favor
Microsoft

★ 4.0 (185 Azure ratings)

Create

Overview   Plans   Usage Information + Support   Reviews
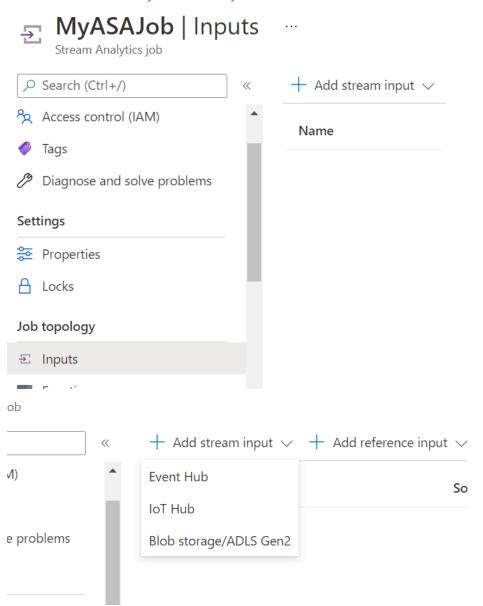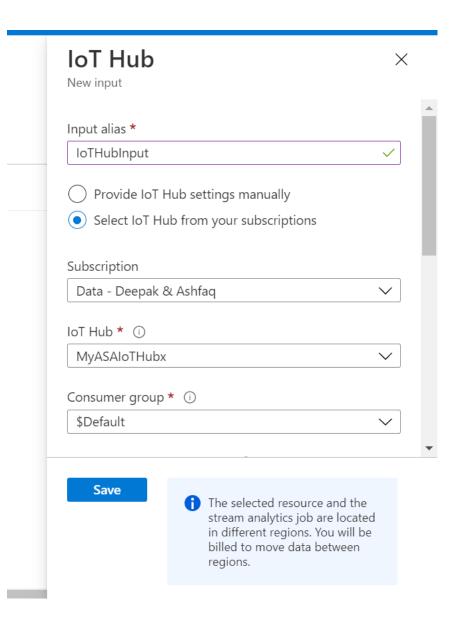
Home > Create a resource > Stream Analytics job >

New Stream Analytics job ⋯

ⓘ This will create a new Stream Analytics job. You will be charged according to Azure Stream Analytics

Data - Deepak & Ashfaq ▾

Resource group *
asaquickstart-resourcegroup ▾
Create new

Location *
East US 2 ▾

Hosting environment ⓘ
[**Cloud** | Edge]

Streaming units (1 to 192) ⓘ
○━━━━━━━━━━━━━━━━━ 1

☐ Secure all private data assets needed by this job in my

Create

MyASAJob | Inputs ...
Stream Analytics job

Search (Ctrl+/)   «

Access control (IAM)

Tags

Diagnose and solve problems

Settings

Properties

Locks

Job topology

Inputs

ob

M)   «   + Add stream input ∨   + Add reference input ∨

e problems   So

Event Hub

IoT Hub

Blob storage/ADLS Gen2

+ Add stream input ∨

Name

IoT Hub

New input

Input alias *

> IoTHubInput ✓

○ Provide IoT Hub settings manually

● Select IoT Hub from your subscriptions

Subscription

> Data - Deepak & Ashfaq ⌄

IoT Hub * ⓘ

> MyASAIoTHubx ⌄

Consumer group * ⓘ

> $Default ⌄

Save

ⓘ The selected resource and the stream analytics job are located in different regions. You will be billed to move data between regions.

MyASAJob | Outputs ...
Stream Analytics job

Search (Ctrl+/)   «

+ Add ∨

Settings

Name

⚙ Properties

🔒 Locks

Job topology

⊡ Inputs

{fx} Functions

<> Query

⇥ Outputs

MyASAJob | Outputs ...
Stream Analytics job

Search (Ctrl+/)   «

+ Add ∨

Settings

Event Hub

⚙ Properties

SQL Database

🔒 Locks

Blob storage/ADLS Gen2

Blob storage/ADLS Gen2

New output

Output alias *

BlobOutput ✓

○ Provide Blob storage/ADLS Gen2 settings manually
● Select Blob storage/ADLS Gen2 from your subscriptions

Subscription

Data - Deepak & Ashfaq ▼

Storage account *

myasquickstartstorage ▼

Container *

○ Create new   ● Use existing

container1 ▼

Save

ℹ The selected resource and the stream analytics job are located in different regions. You will be billed to move data between regions.

15:42
06-09-2021
ENG

MyASAJob | Outputs
Stream Analytics job

🔍 Search (Ctrl+/)   «   + Add ∨

Name	Sink
BlobOutput	Blob storage

- ⚙ Overview
- 📋 Activity log
- 🔑 Access control (IAM)
- 🏷 Tags
- 🩺 Diagnose and solve problems

Settings

- ⚙ Properties
- 🔒 Locks

Job topology

- ⤢ Inputs
- 📊 Functions
- <> Query
- 🗂 Outputs

Output details

BlobOutput

🧪 Test   🗑 Delete

Managed Identity ▼

Managed Identity authentication will be enabled for this Stream Analytics job if it is not enabled. The Storage Blob Data Contributor role will be granted to the Managed Identity for this Stream Analytics job when you click Save. If grant fails follow the manual grant steps here.

Path pattern ⓘ

https://myasquickstartstorage.blob.core.windows.net/contain...

Date format

YYYY/MM/DD ▼

Time format

HH ▼

Save

ℹ If the chosen resource and the stream analytics job are located in different regions, you will be billed to move data between regions.

MyASAJob | Query

Stream Analytics job

Search (Ctrl+/)

Tags

Diagnose and solve problems

Settings

Properties

Locks

Job topology

Inputs

Functions

Query

Outputs

Configure

Query language docs ∨ | Open in Visual Studio ∨ | UserVoice

∨ Inputs (2)
- IoTHubInput
- yourinputalias

∨ Outputs (2)
- BlobOutput
- youroutputalias

▷ Test query | Save query | ✕ Discard changes

```
1   SELECT
2       *
3   INTO
4       [YourOutputAlias]
5   FROM
6       [YourInputAlias]
```

Input preview   Test results

Query language docs ∨   Open in Visual Studio ∨   UserVoice

ⓘ Query can't be edited while a job is running. You can stop the job to edit the query.

∨ Inputs (1)
- </> IoTHubInput

∨ Outputs (1)
- </> BlobOutput

▷ Test query | Save query | ✕ Discard changes

```
1   SELECT *
2   INTO BlobOutput
3   FROM IoTHubInput
4   HAVING Temperature > 27
```

Raspberry Pi Azure IoT Online Simulator   Help   English ▾

```
7    const Protocol = require('azure-iot-device-mqtt').Mqtt;
8    const BME280 = require('bme280-sensor');
9
10   const BME280_OPTION = {
11       i2cBusNo: 1, // defaults to 1
12       i2cAddress: BME280.BME280_DEFAULT_I2C_ADDRESS() // defaults to 0x77
13   };
14
15   const connectionString = 'HostName=MyASAIoTHubx.azure-devices.net;DeviceId=MyASAIoTl
16   const LEDPin = 4;
17
18   var sendingMessage = false;
19   var messageId = 0;
20   var client, sensor;
21   var blinkLEDTimeout = null;
22
23   function getMessage(cb) {
24       messageId++;
25       sensor.readSensorData()
26
```

Stop   Reset

> Message sent to Azure IoT Hub
>
> Sending message: {"messageId":7,"deviceId":"Raspberry Pi Web Client","temperature":28.47304
>
> Message sent to Azure IoT Hub
>
> Sending message: {"messageId":8,"deviceId":"Raspberry Pi Web Client","temperature":23.01371
>
> Message sent to Azure IoT Hub
>

fritzing

Type here to search   16:02 06-09-2021

MyASAJob
Stream Analytics job

Search (Ctrl+/) «

▷ Start ☐ Stop 🗑 Delete

🌀 Overview

Activity log

ℹ Created

Notifications ✕

More events in the activity log → 　　　　Dismiss all ∨

ℹ **Streaming job started successfully.** ✕

Started Streaming job 'MyASAJob' successfully.

a few seconds ago

\

✕

Query language docs ∨　↗ Open in Visual Studio ∨　☺ UserVoice

Query can't be edited while a job is running. You can stop the job to edit the query.

puts (1)　　　　　　　　　　　　▷ Test query 💾 Save query ✕ Discard changes
🔗 IoTHubInput

```
1   SELECT *
2   INTO BlobOutput
3   FROM IoTHubInput
4   HAVING Temperature > 27
```

utputs (1)
🖼 BlobOutput

Input preview　Test results

Showing 22 rows from 'BlobOutput'.　　　　　　　　　　　Download results

messageId	deviceId	temperature	humidity	EventProces
47	"Raspberry Pi Web Cli...	27.231709350040234	74.01208753976684	"2021-09-
46	"Raspberry Pi Web Cli...	27.617377270647758	79.22367962574569	"2021-09-
44	"Raspberry Pi Web Cli...	29.381468307859073	68.22706511702643	"2021-09-
43	"Raspberry Pi Web Cli...	31.758982856807464	79.05999522705565	"2021-09-