Azure Functions in an enterprise environment

Barbara Forbes

Azure MVP, GitHub Star

Azure Technical Lead @ OGD

4bes.nl

@Ba4bes

PDC
PowerShell | DevOps | Cloud

Many thanks to our sponsors:

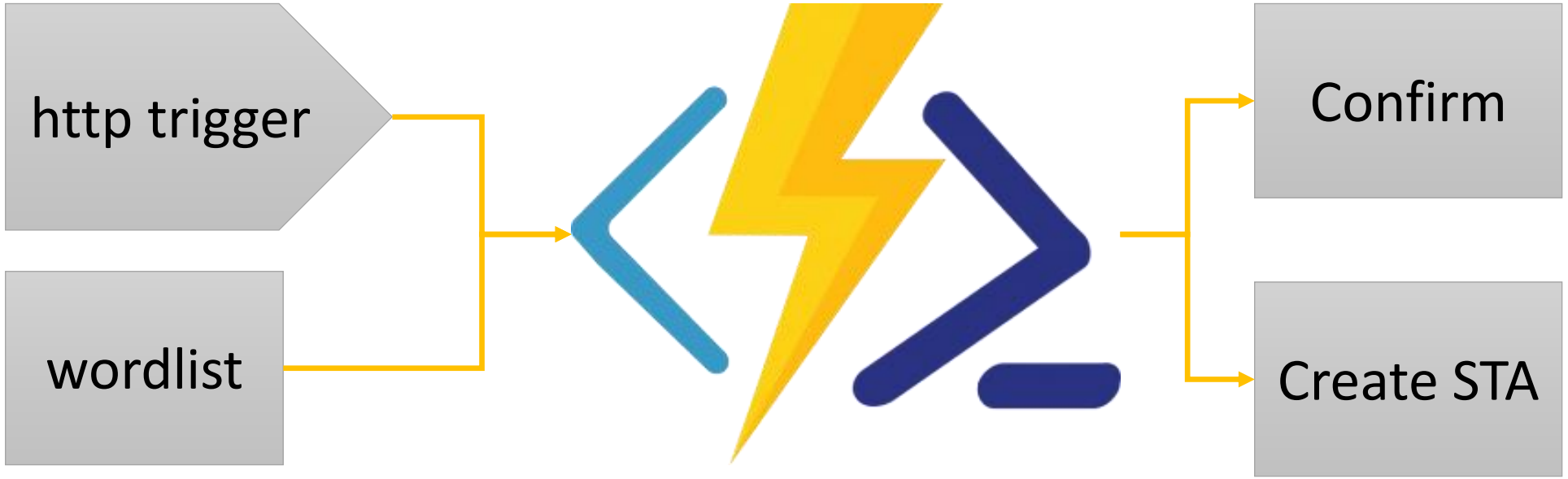
The difference between playing around and enterprise….

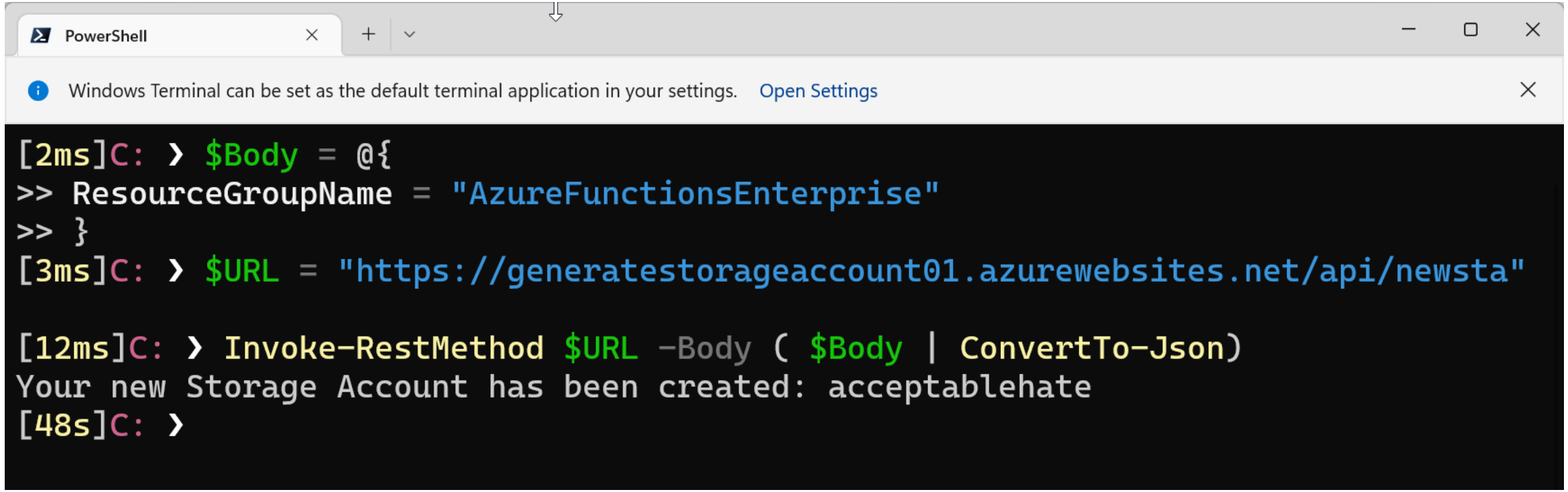
Scale

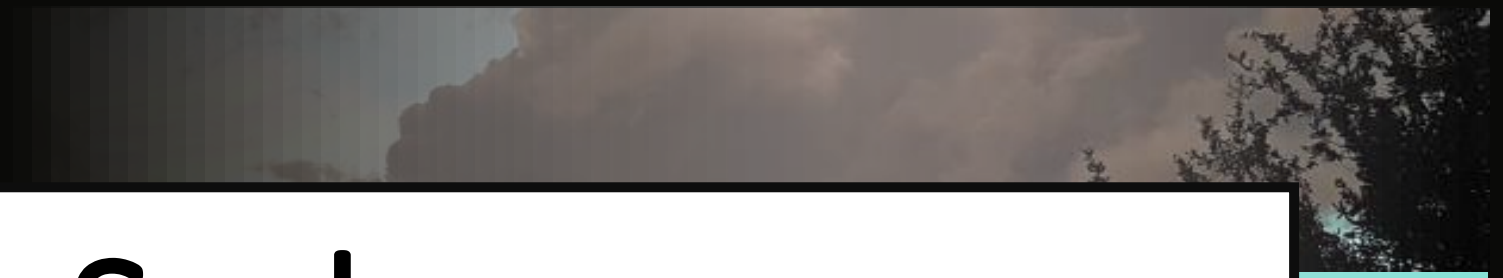
Security

Deployment

(and documentation)


http trigger
wordlist
Confirm
Create STA


PowerShell
Windows Terminal can be set as the default terminal application in your settings.
Open Settings
[2ms]C: ❯ $Body = @{
>> ResourceGroupName = "AzureFunctionsEnterprise"
>> }
[3ms]C: ❯ $URL = "https://generatestorageaccount01.azurewebsites.net/api/newsta"
[12ms]C: ❯ Invoke-RestMethod $URL -Body ($Body | ConvertTo-Json)
Your new Storage Account has been created: acceptablehate
[48s]C: ❯



Scale

Sku's

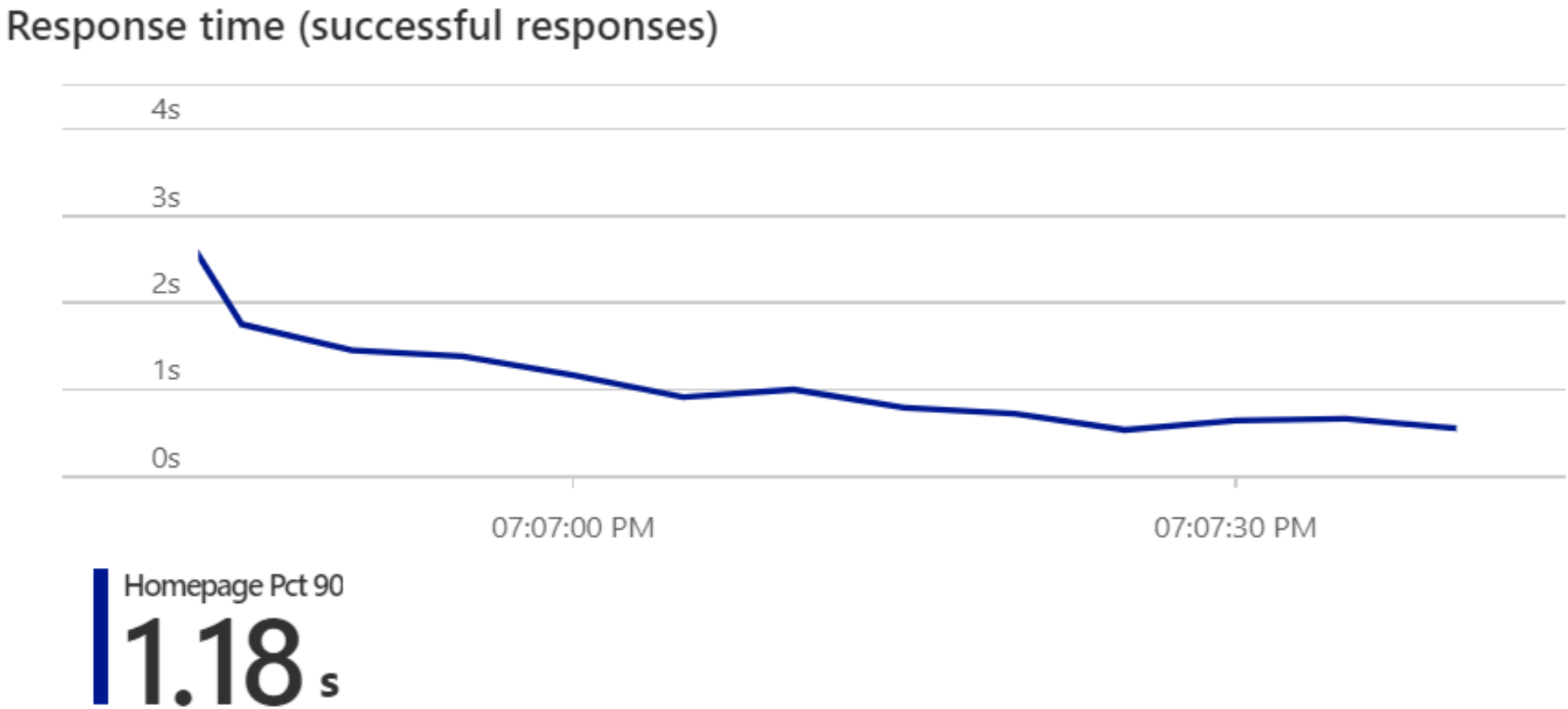
Consumption

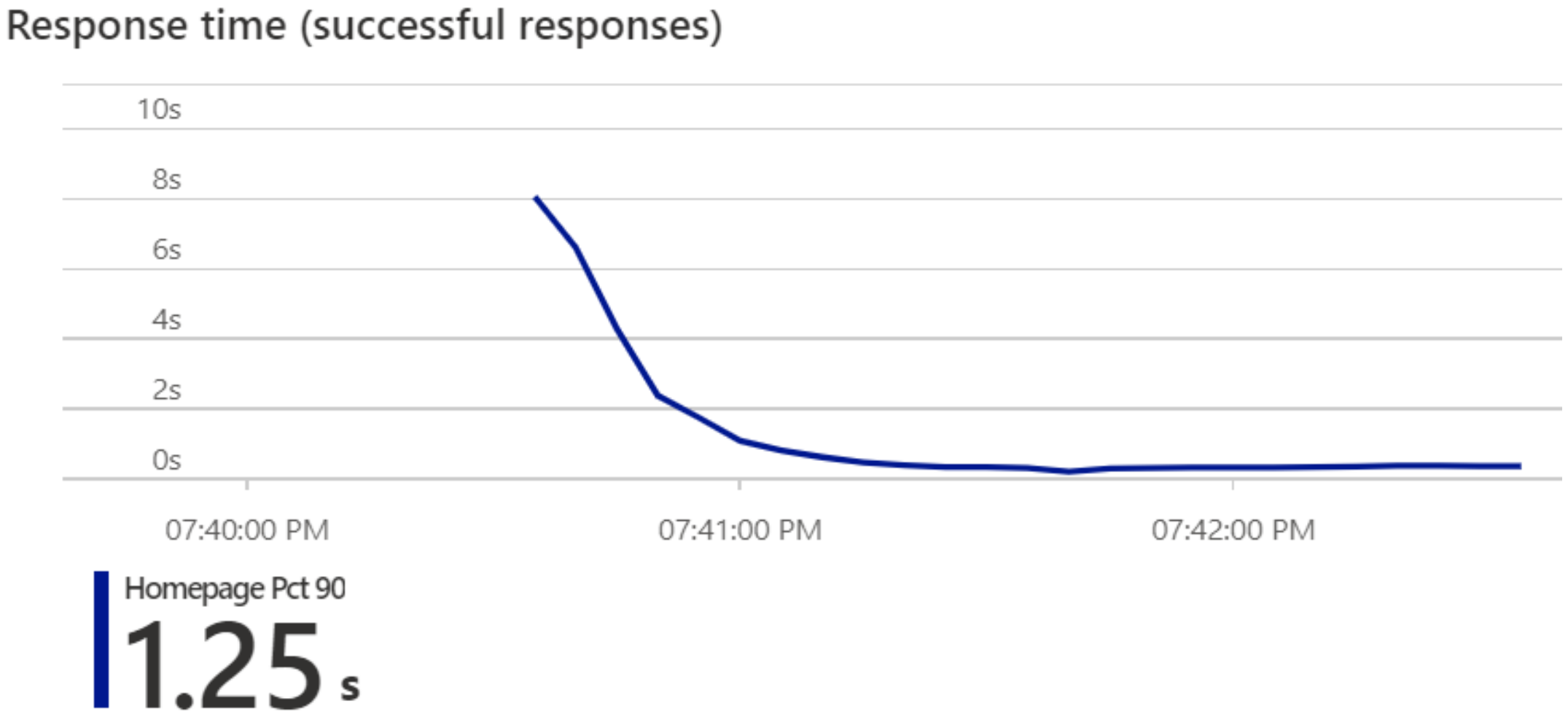
< >

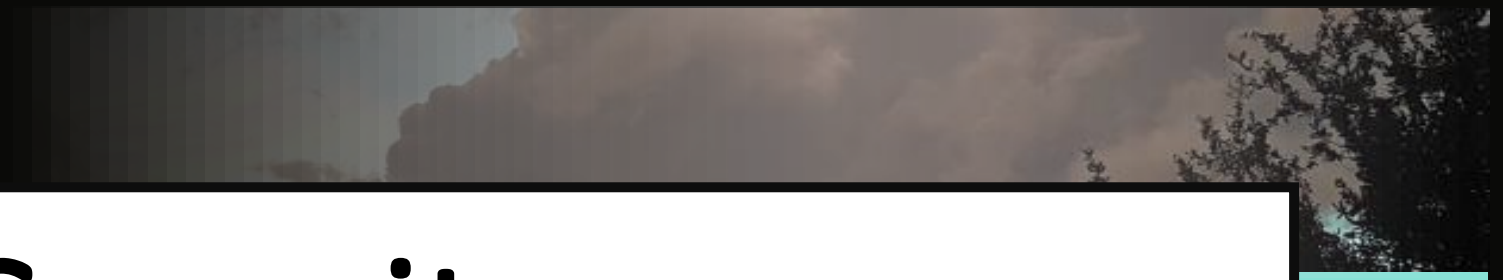
Premium

< >

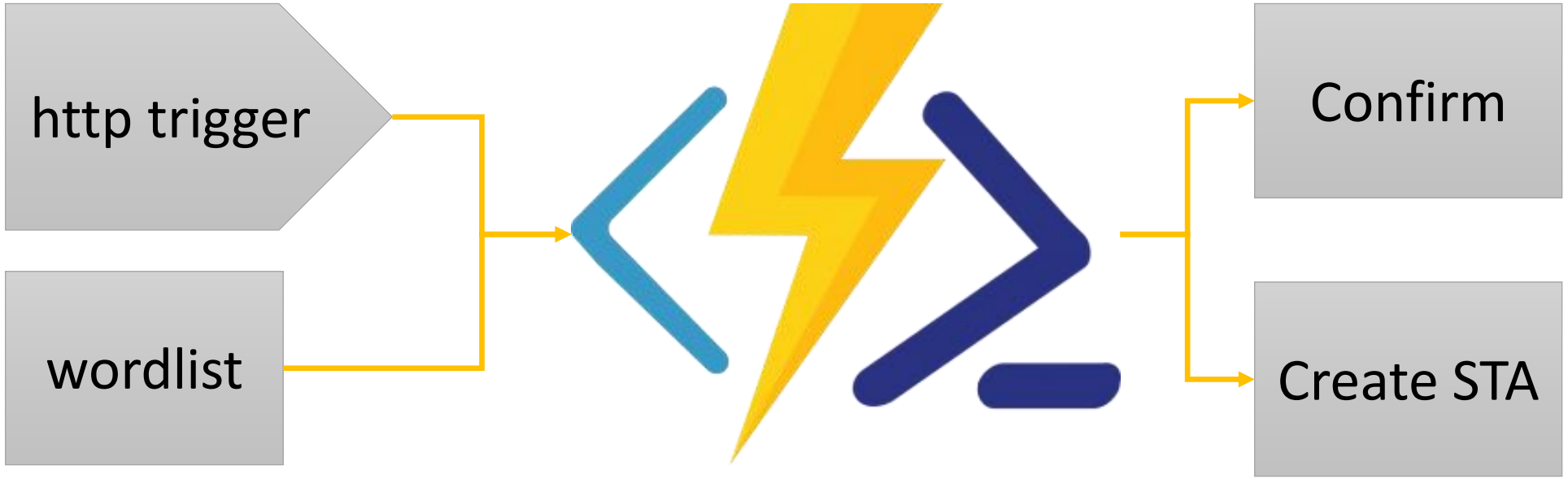
App Service


Response time (successful responses)
4s
3s
2s
1s
0s
07:07:00 PM
07:07:30 PM
Homepage Pct 90
1.18 s


Response time (successful responses)
10s
8s
6s
4s
2s
0s
07:40:00 PM
07:41:00 PM
07:42:00 PM
Homepage Pct 90
1.25 s



Security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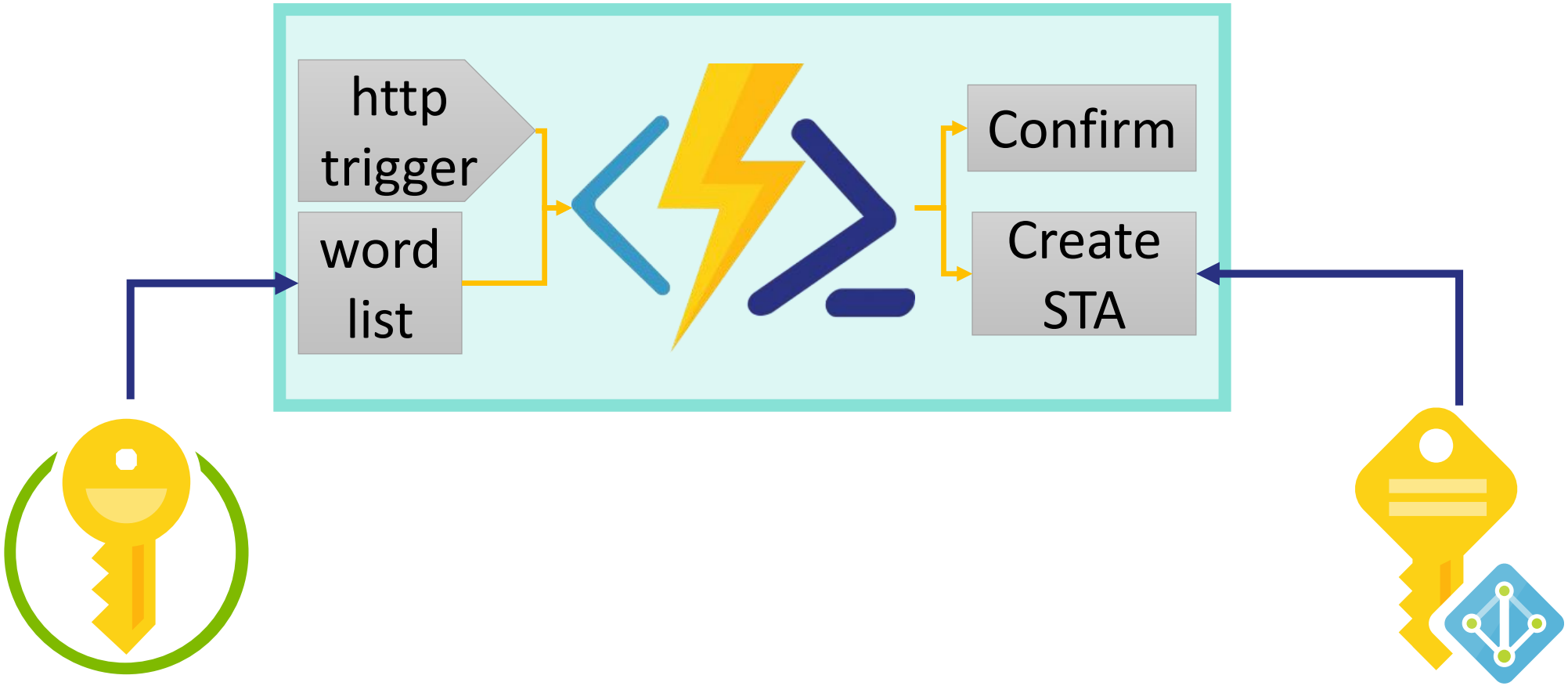
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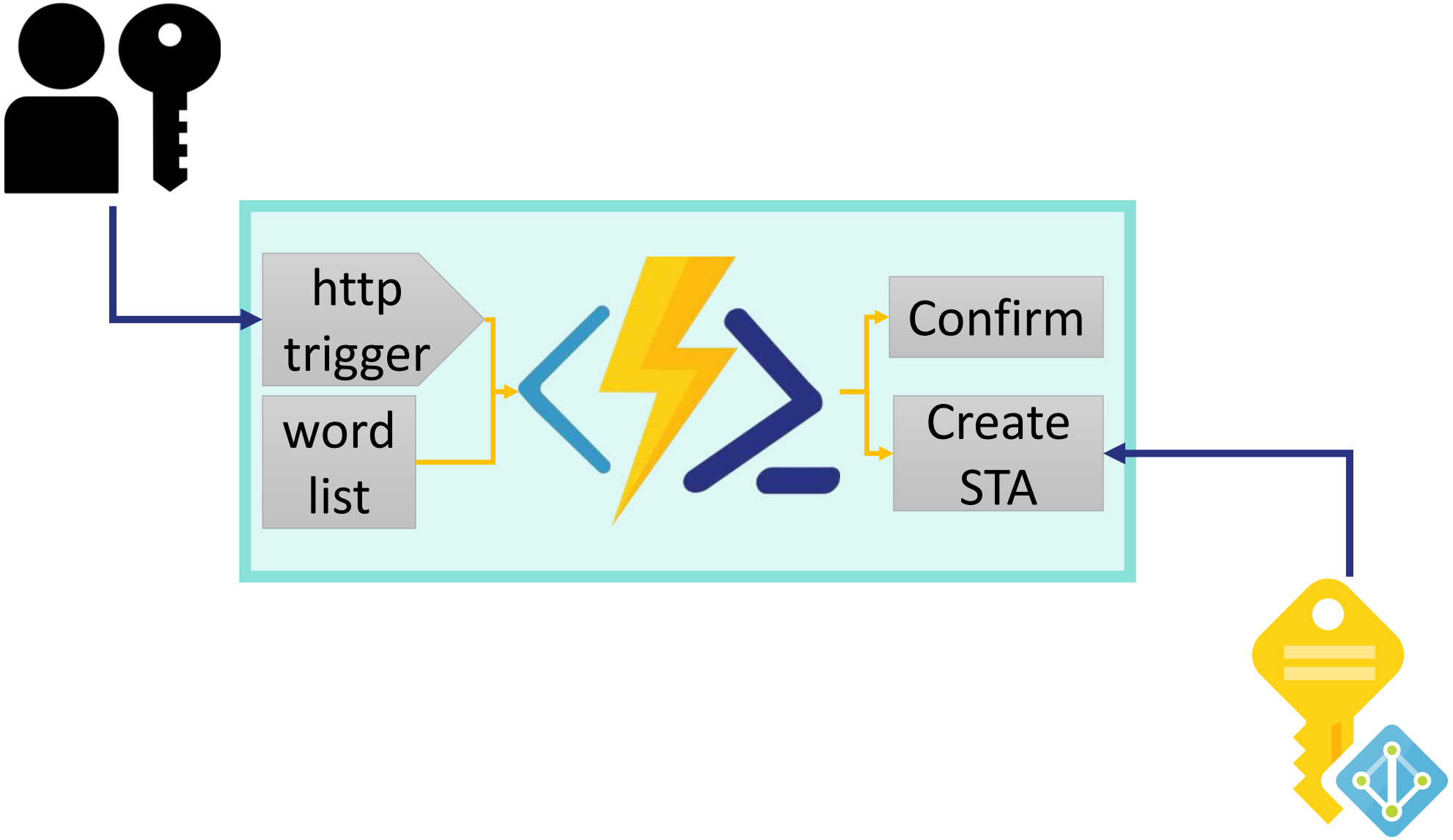
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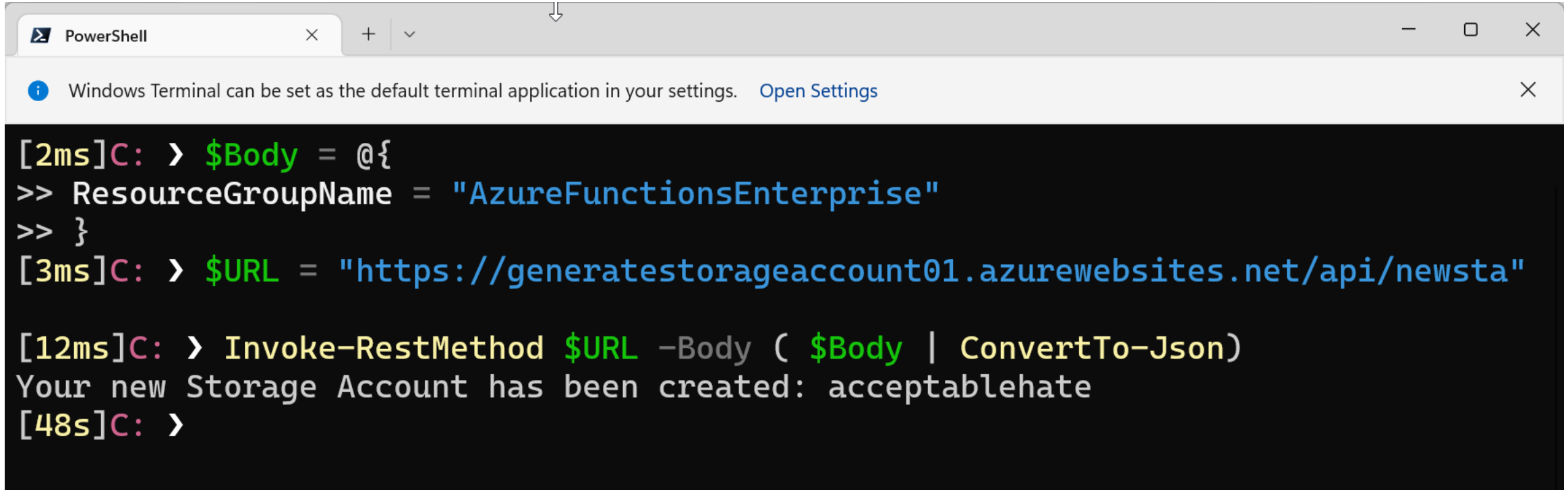
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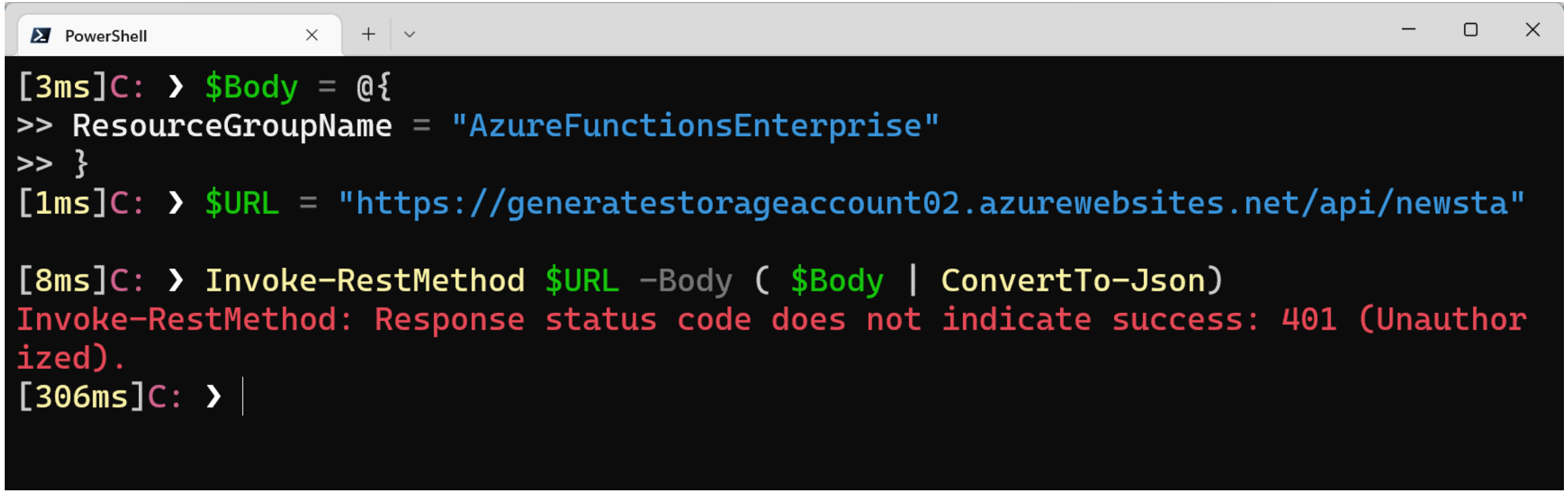
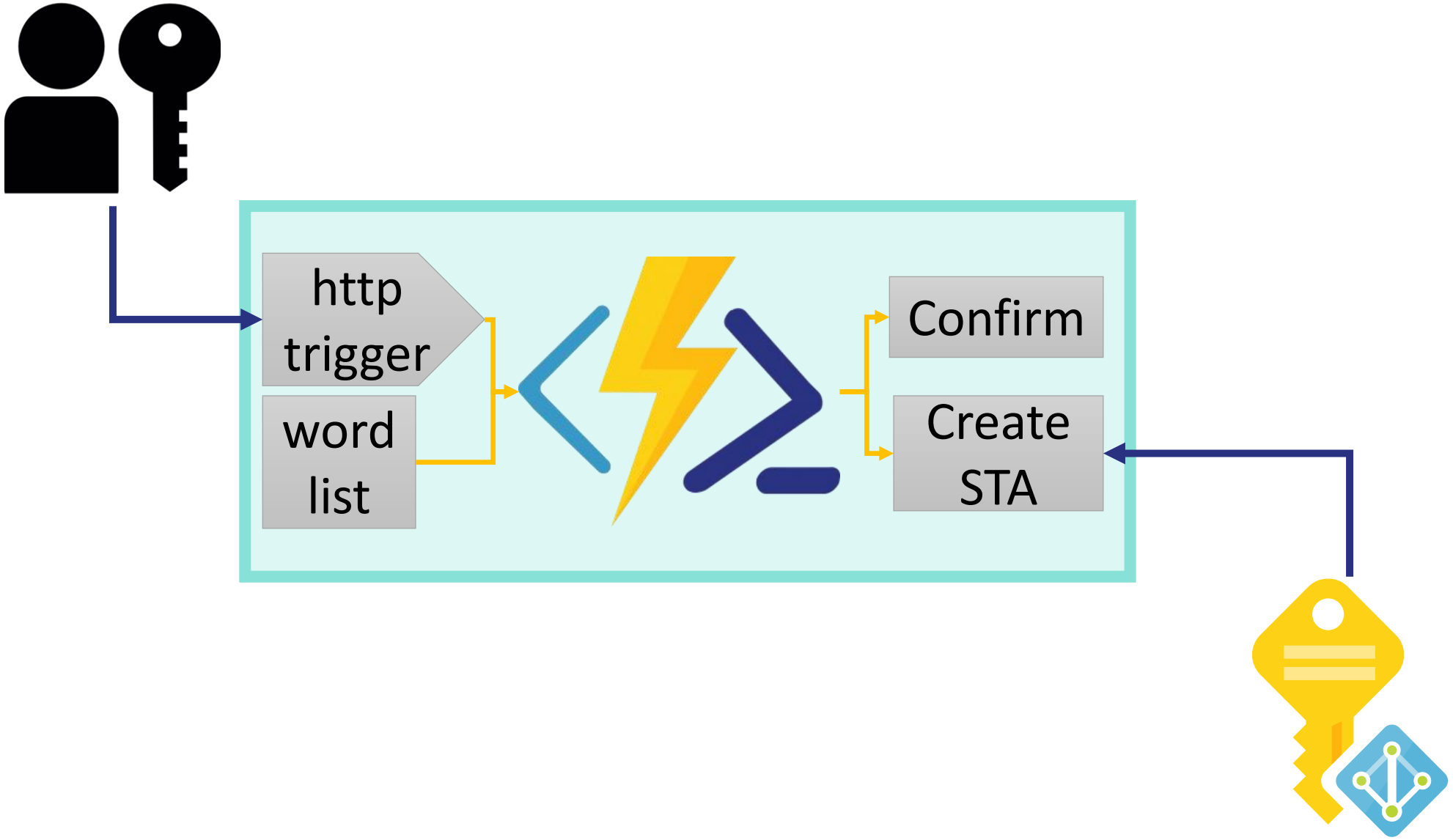

PowerShell
[3ms]C: ❯ $Body = @{
>> ResourceGroupName = "AzureFunctionsEnterprise"
>> }
[1ms]C: ❯ $URL = "https://generatestorageaccount02.azurewebsites.net/api/newsta"
[8ms]C: ❯ Invoke-RestMethod $URL -Body ($Body | ConvertTo-Json)
Invoke-RestMethod: Response status code does not indicate success: 401 (Unauthorized).
[306ms]C: ❯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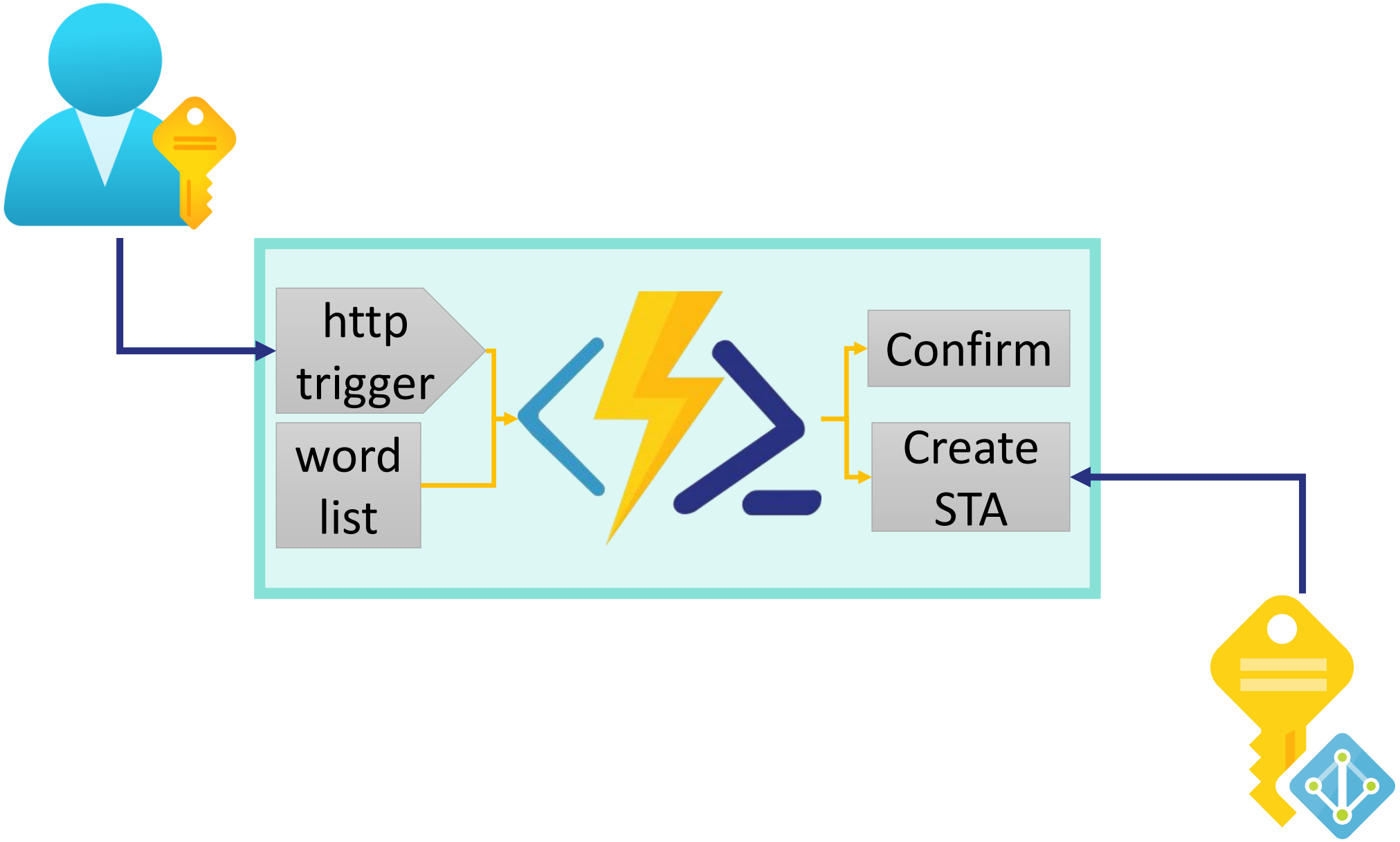
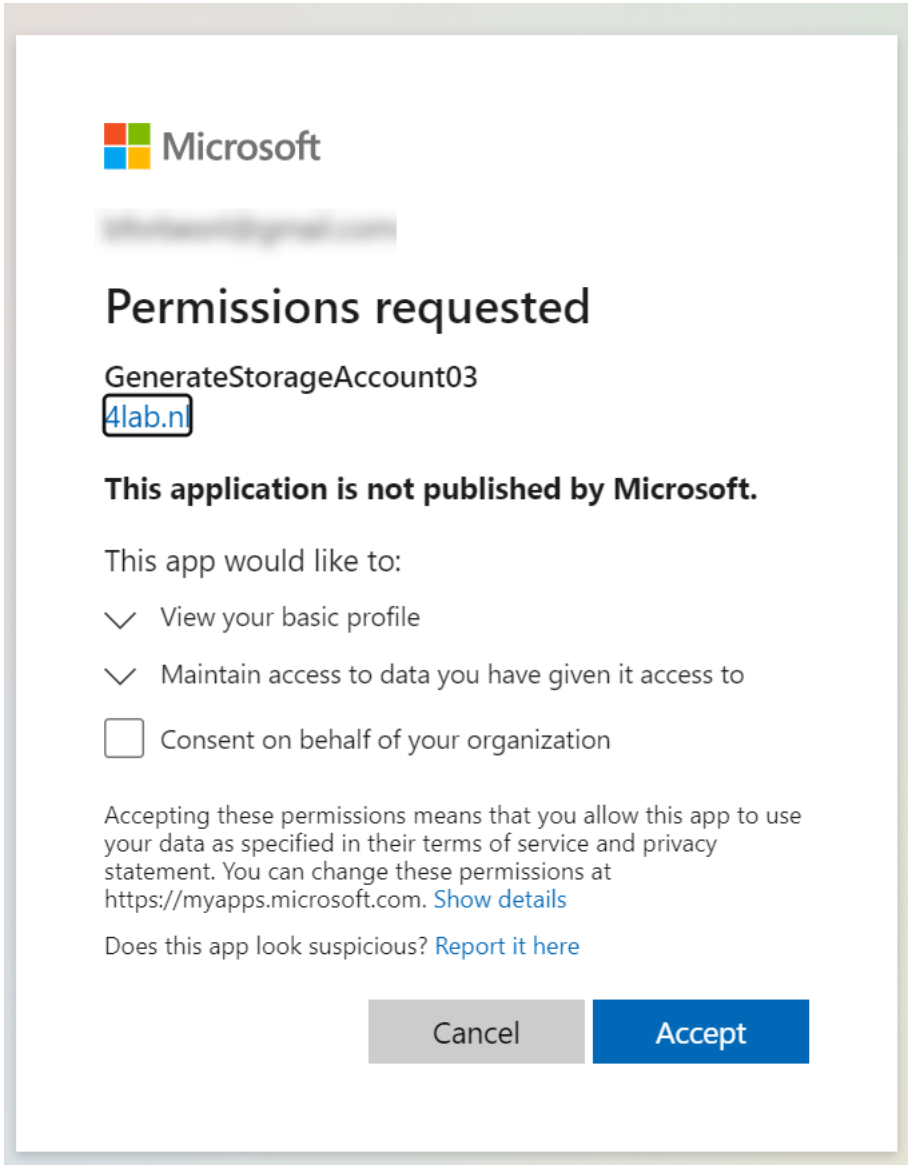
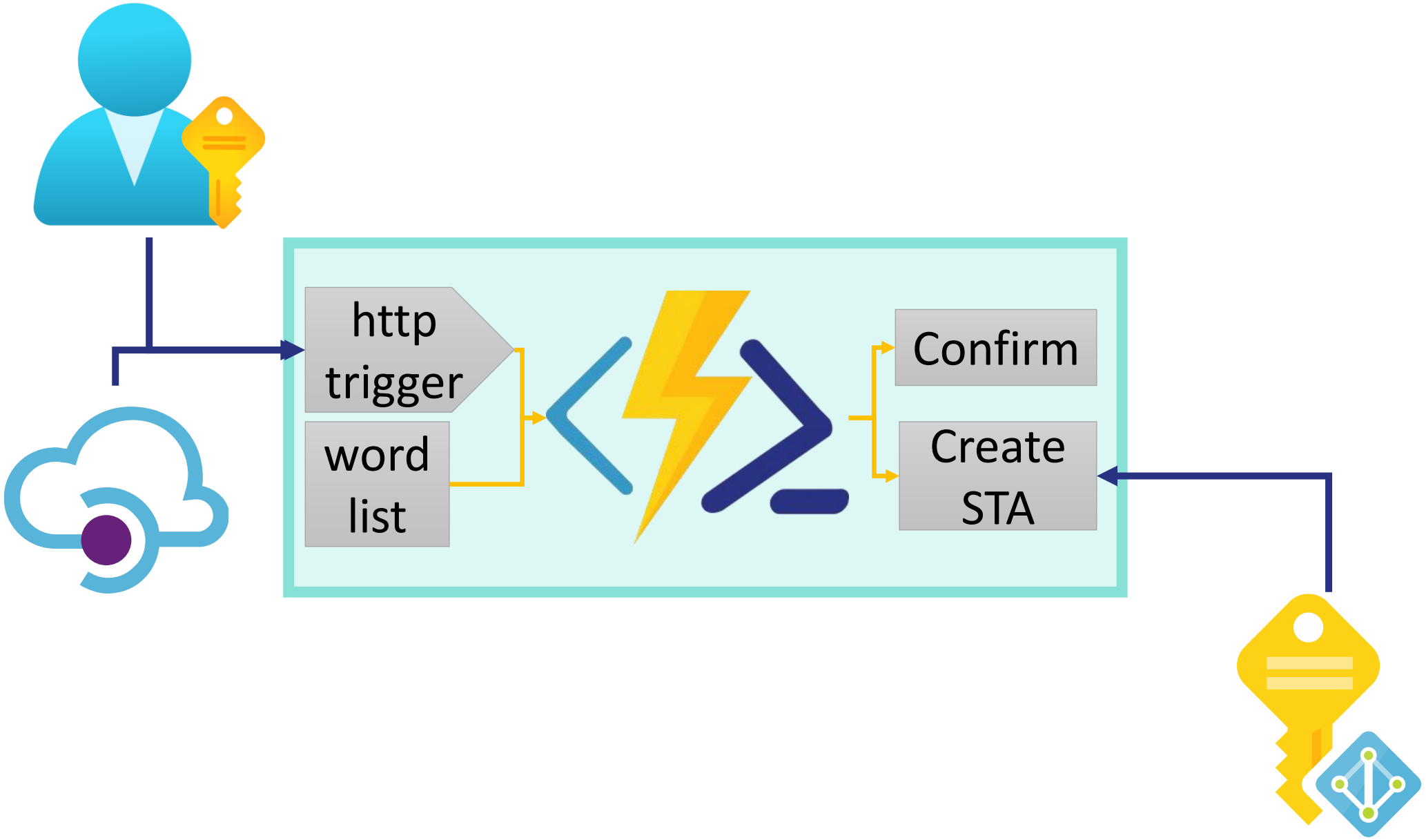

http trigger
word list
Confirm
Create STA

DEMO


Microsoft
Permissions requested
GenerateStorageAccount03
4lab.nl
This application is not published by Microsoft.
This app would like to:
View your basic profile
Maintain access to data you have given it access to
Consent on behalf of your organization
Accepting these permissions means that you allow this app to use your data as specified in their terms of service and privacy statement. You can change these permissions at https://myapps.microsoft.com. Show details
Does this app look suspicious? Report it here
Cancel
Accept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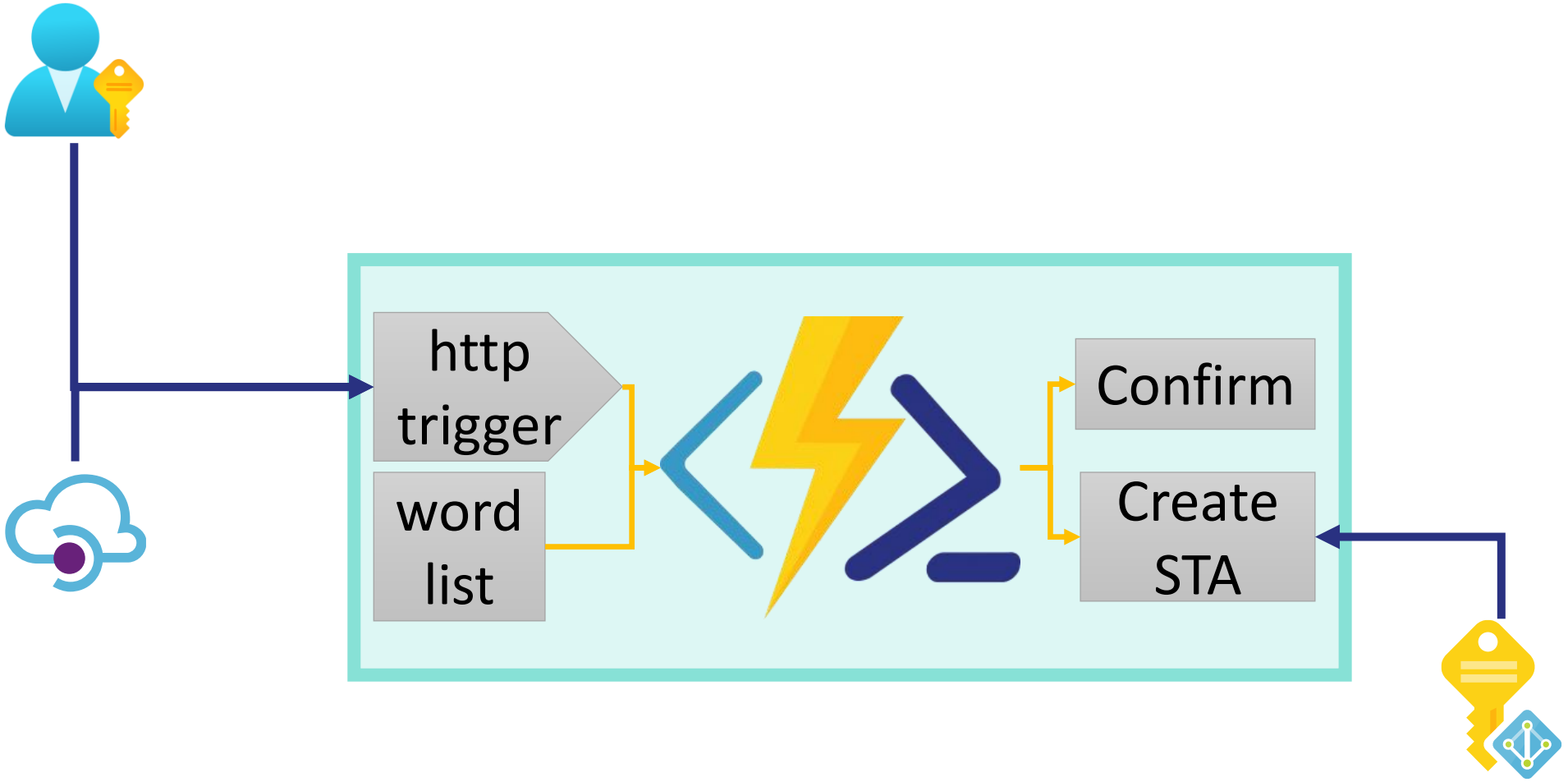
http
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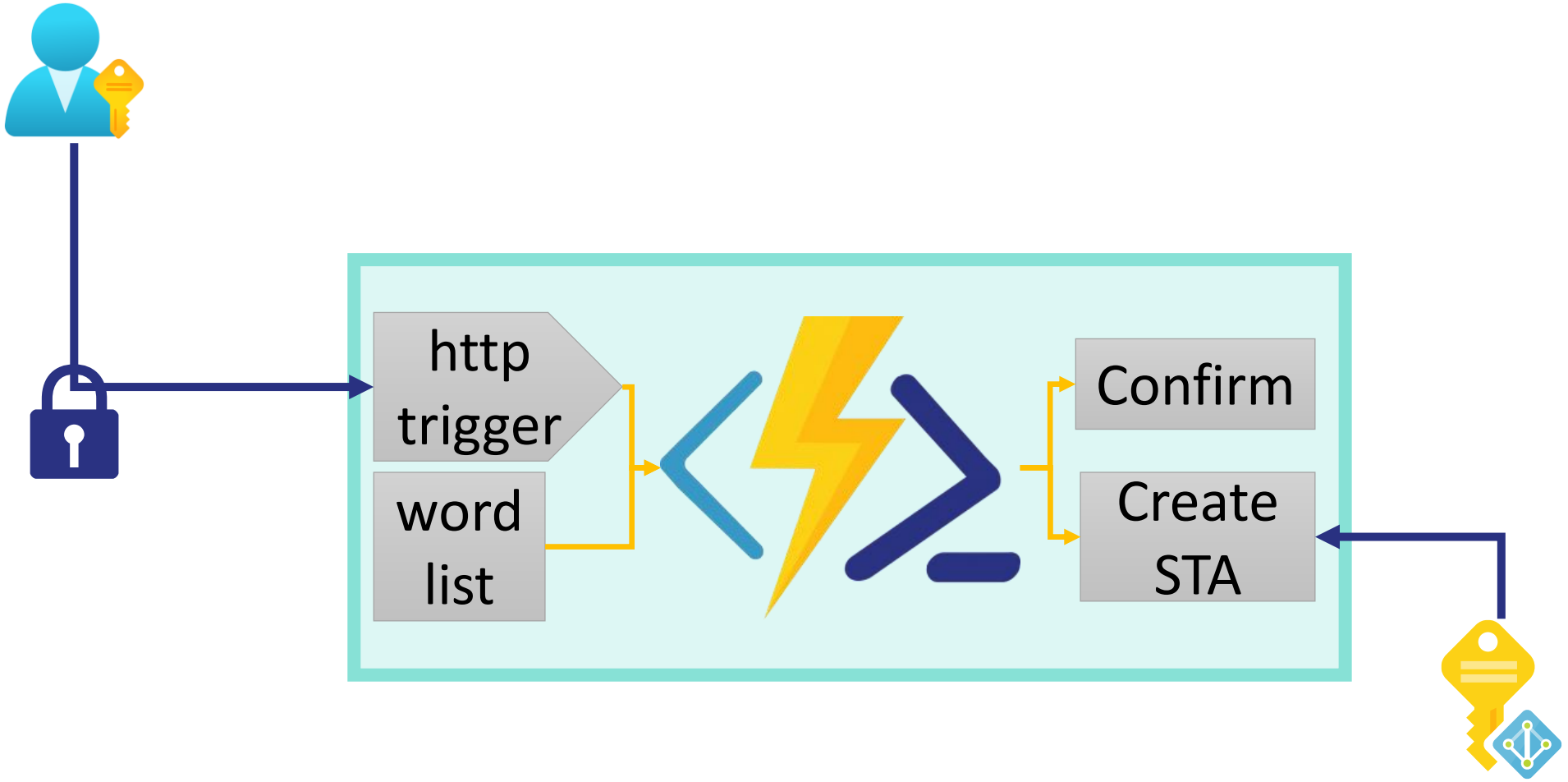
Not secure | generatestorageaccount02.azurewebsites.net/api

Your new Storage Account has been created: expensivecan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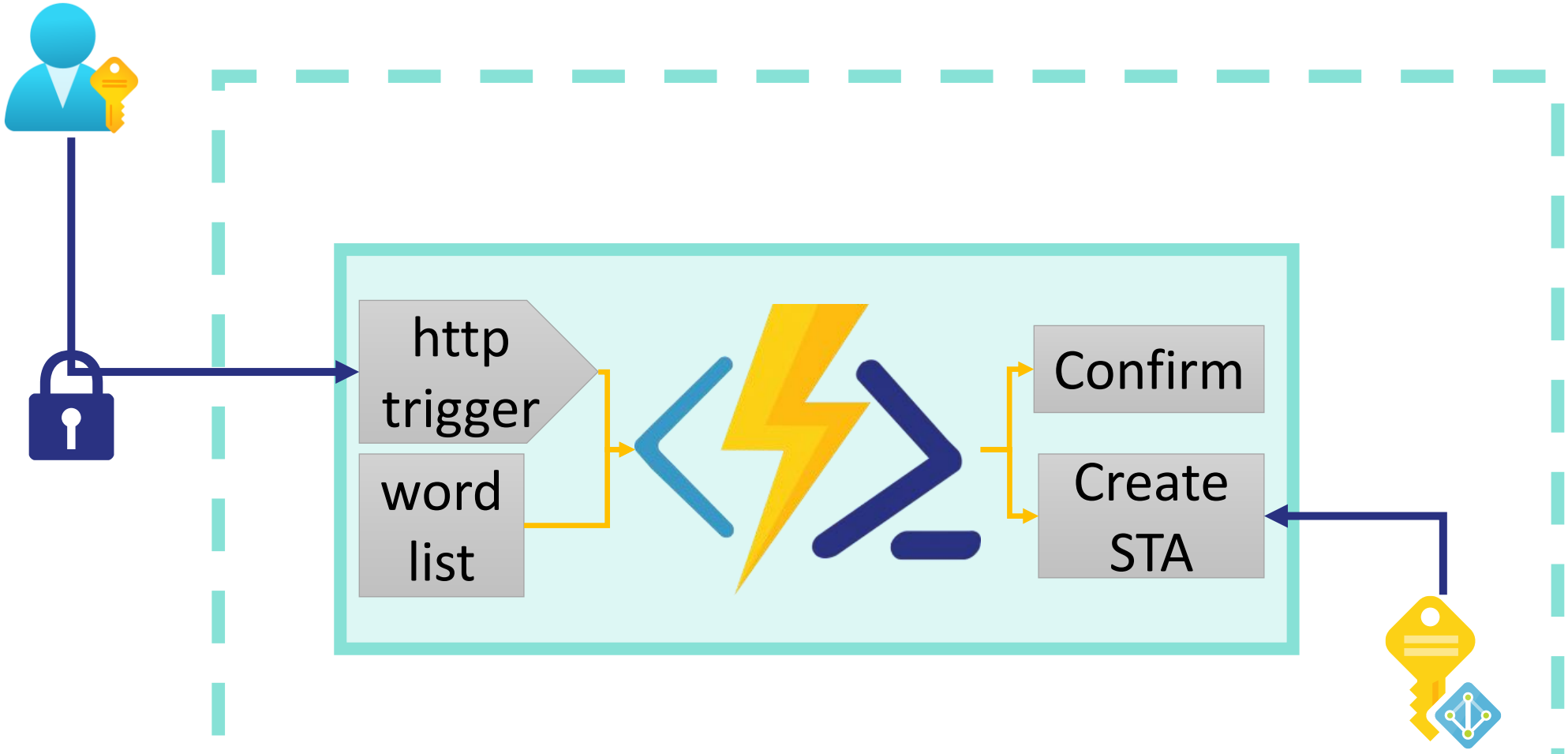
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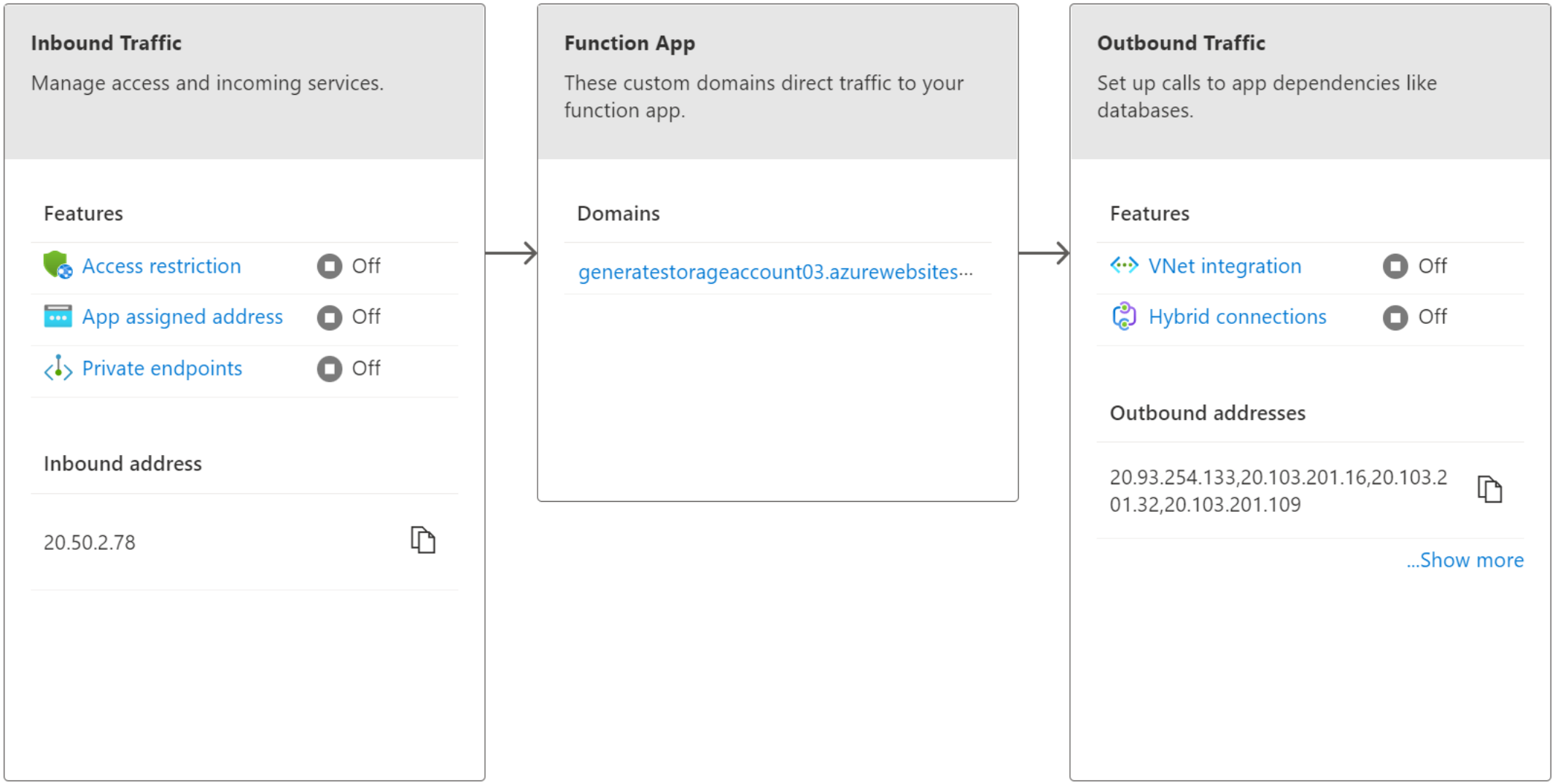
Inbound Traffic
Manage access and incoming services.
Features
Access restriction
Off
App assigned address
Off
Private endpoints
Off
Inbound address
20.50.2.78
Function App
These custom domains direct traffic to your function app.
Domains
generatestorageaccount03.azurewebsites···
Outbound Traffic
Set up calls to app dependencies like databases.
Features
VNet integration
Off
Hybrid connections
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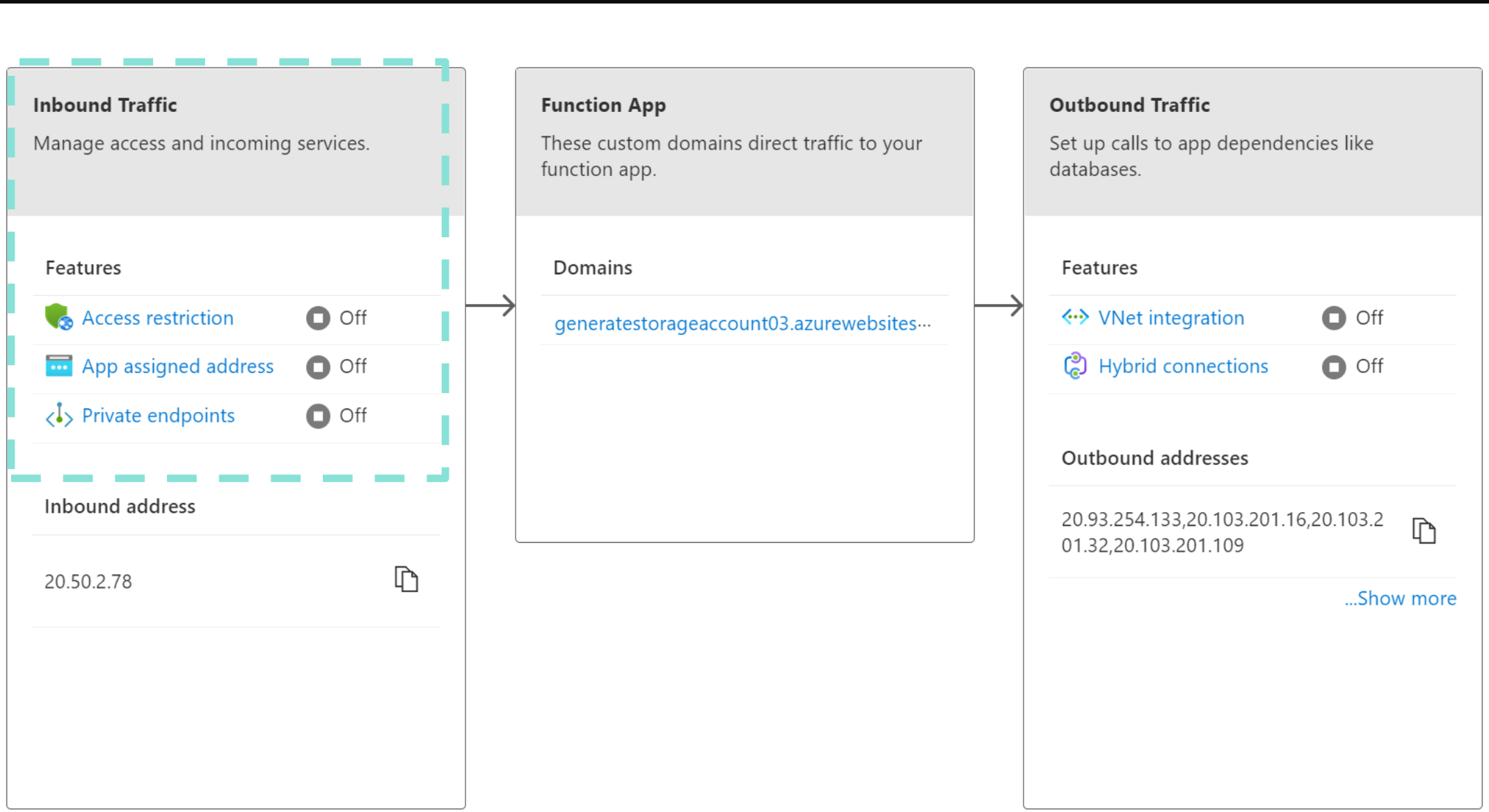
Outbound addresses
20.93.254.133,20.103.201.16,20.103.201.32,20.103.201.109
...Show more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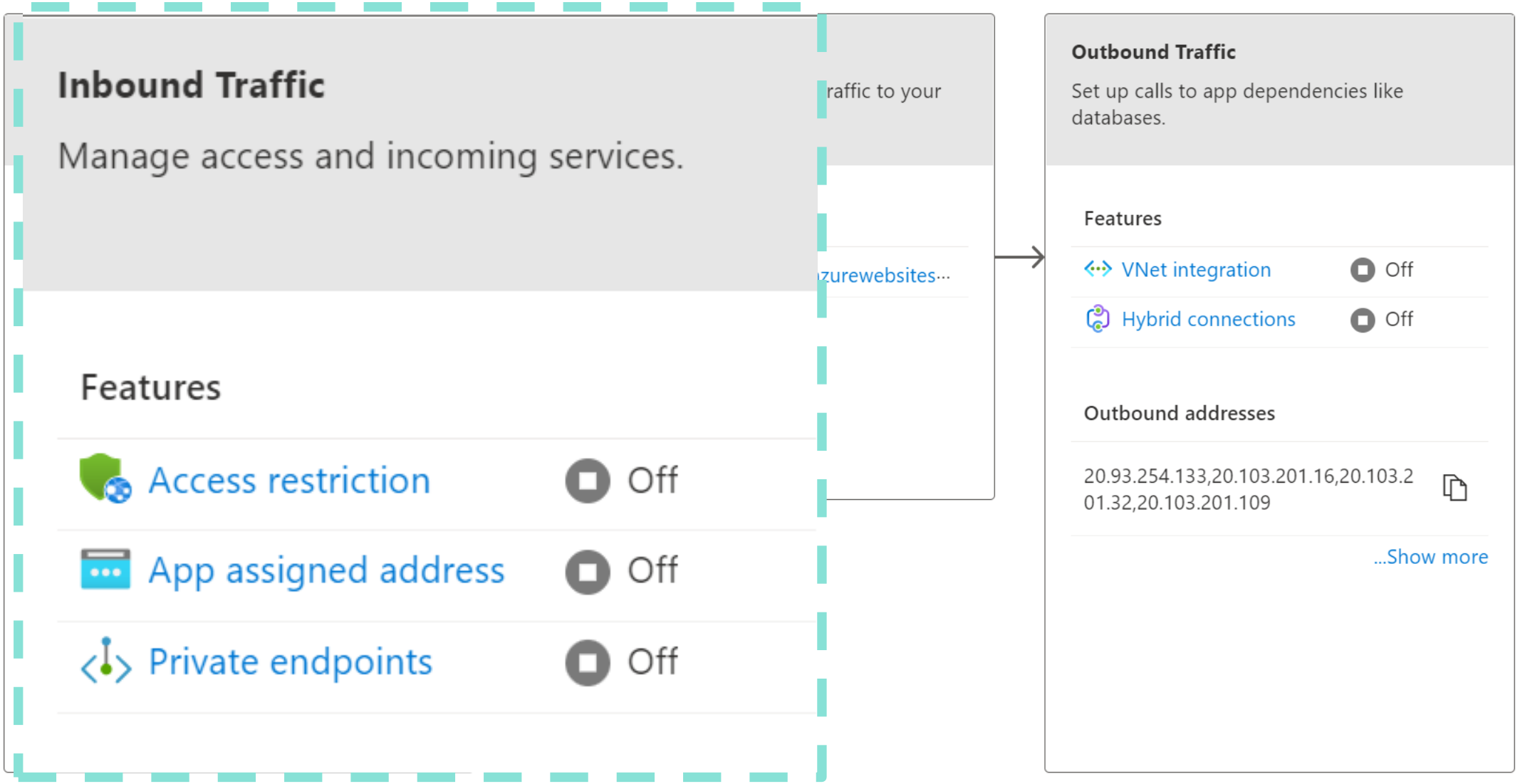
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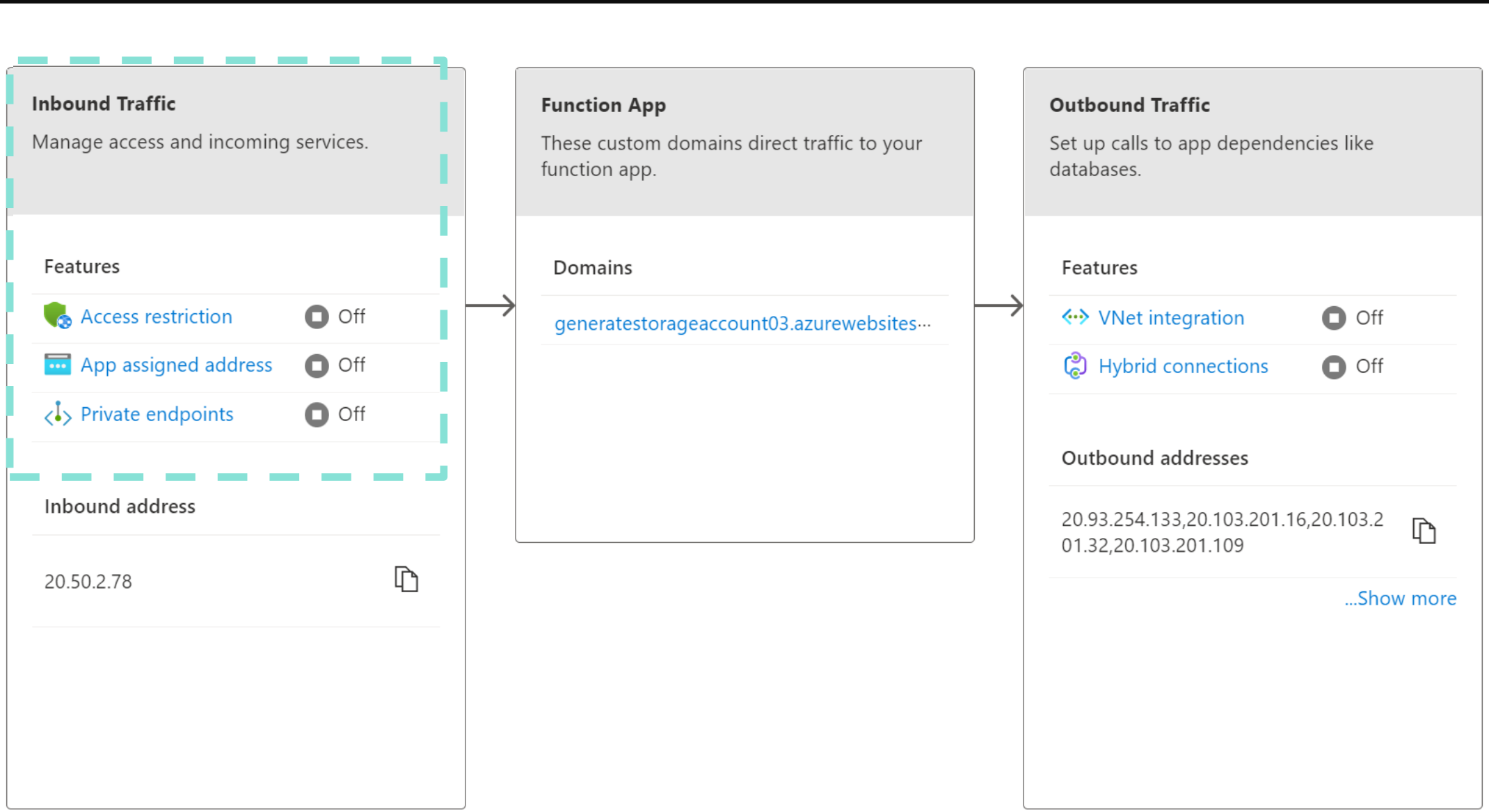
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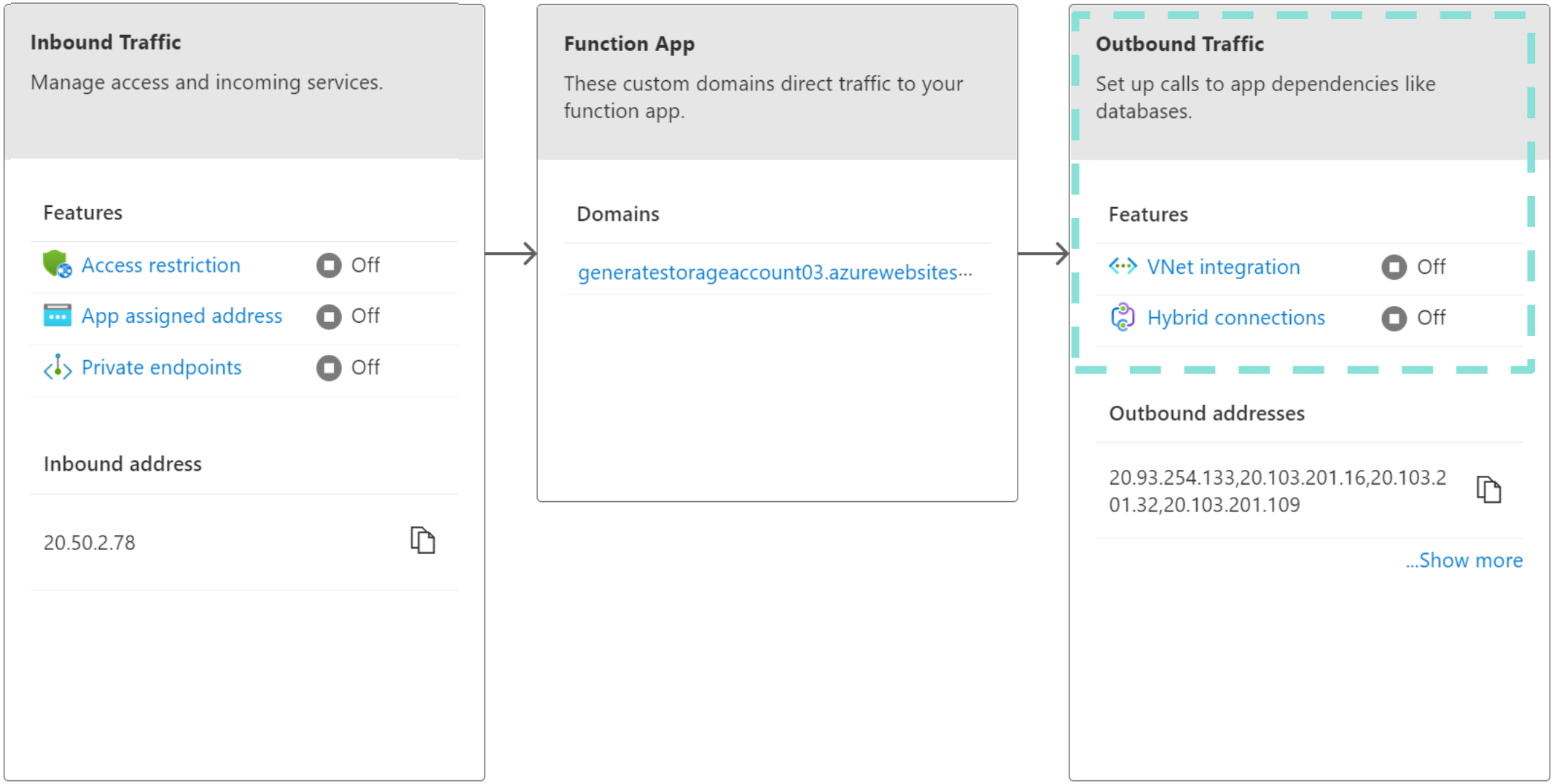
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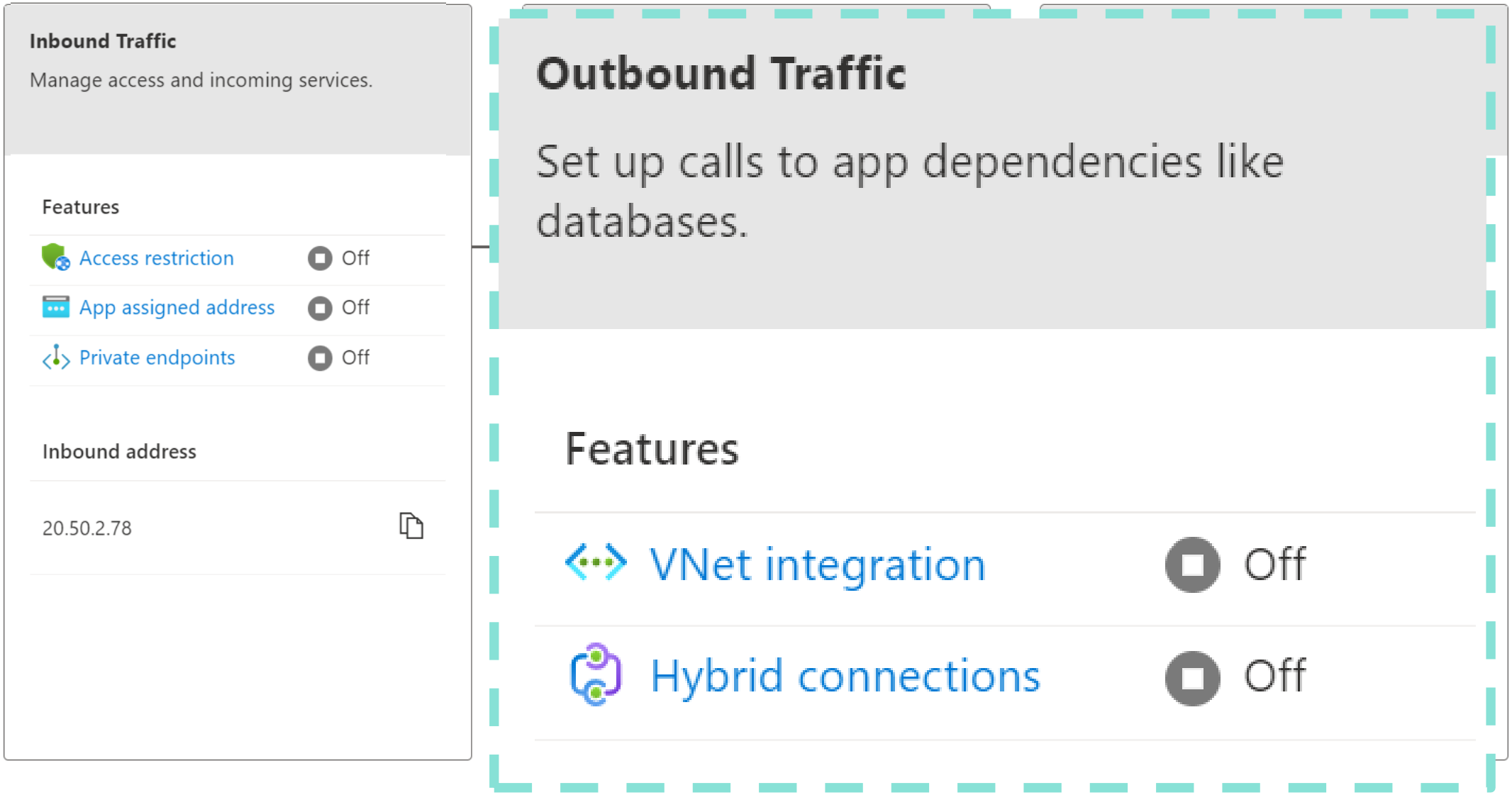
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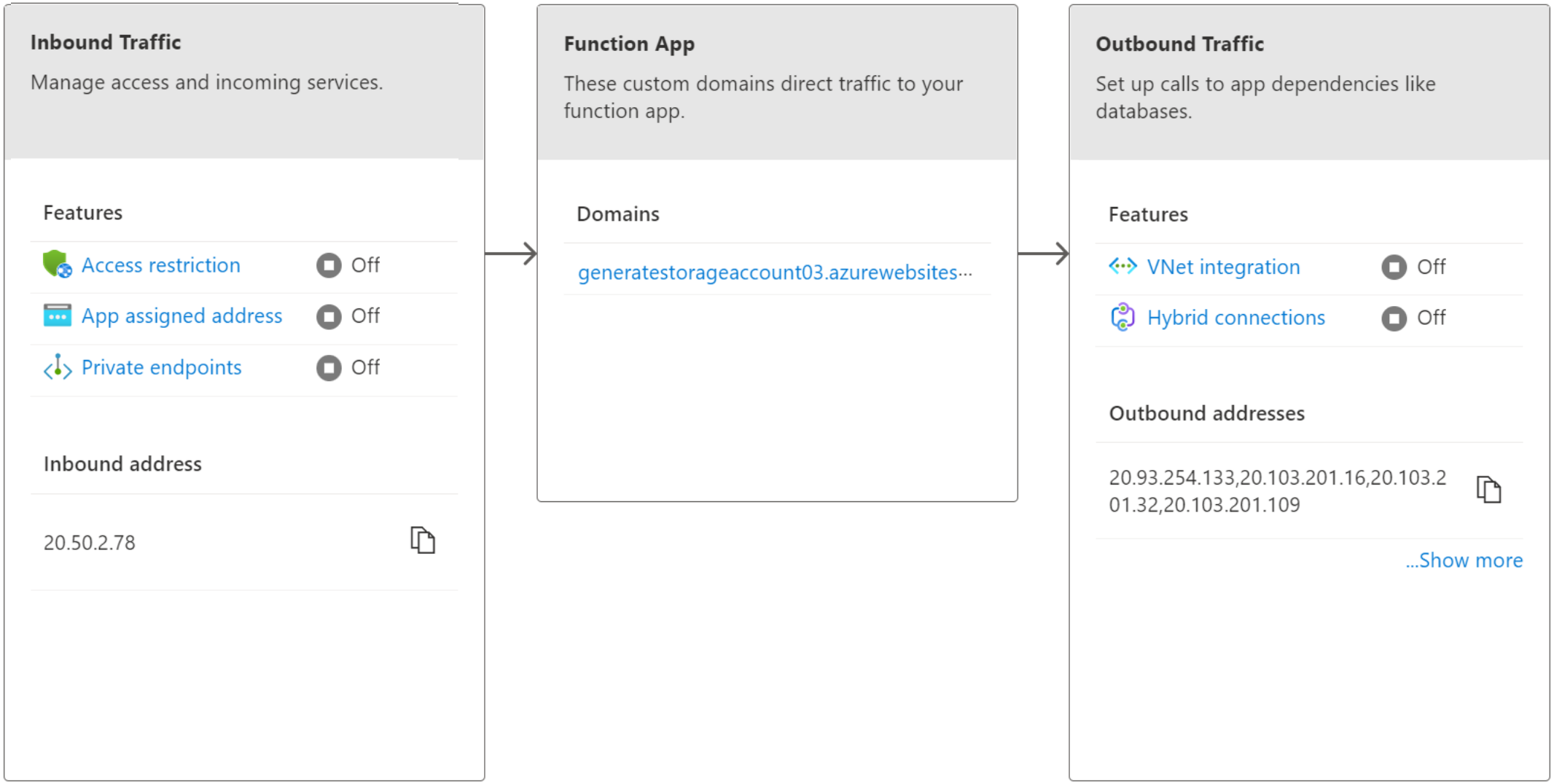
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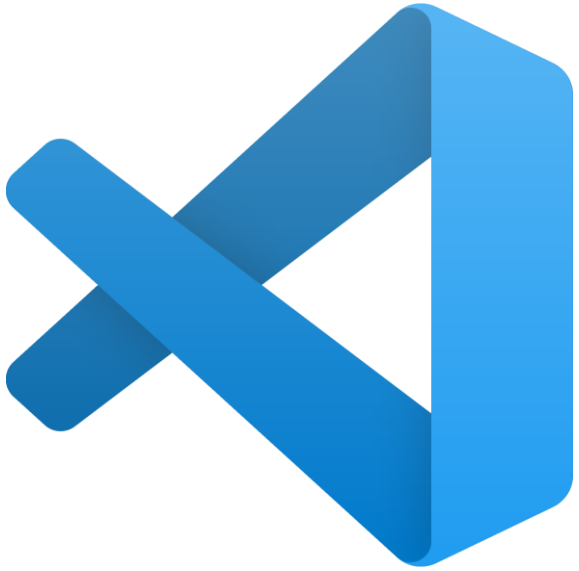
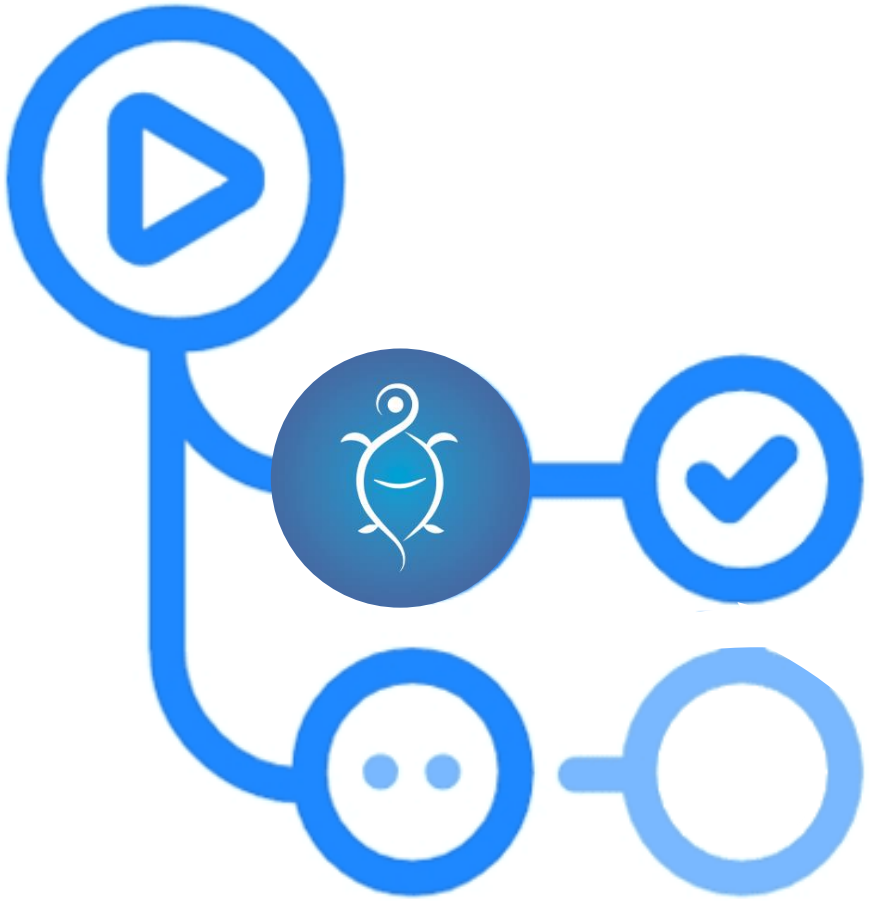
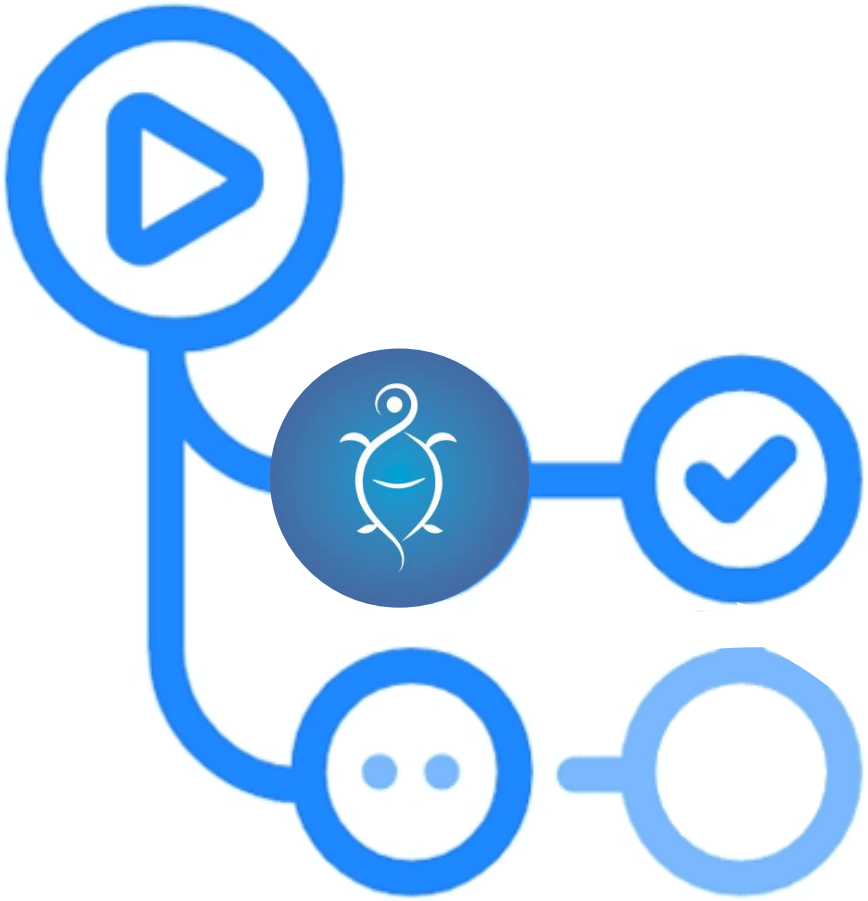
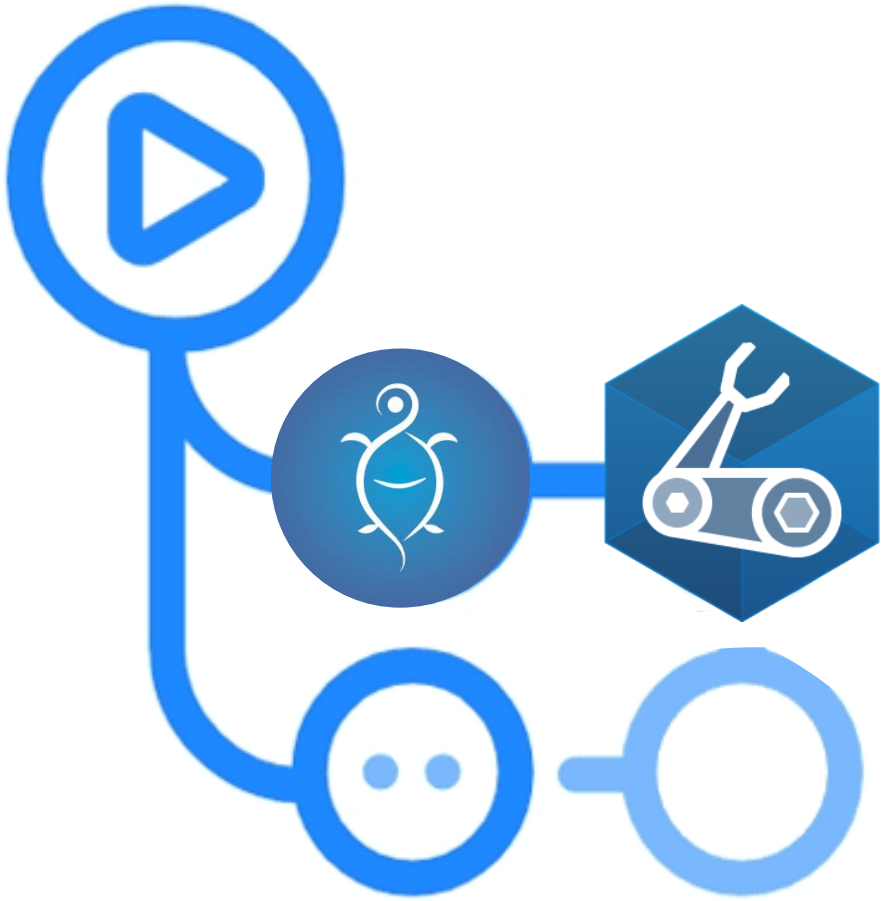
Deployment

Deployment

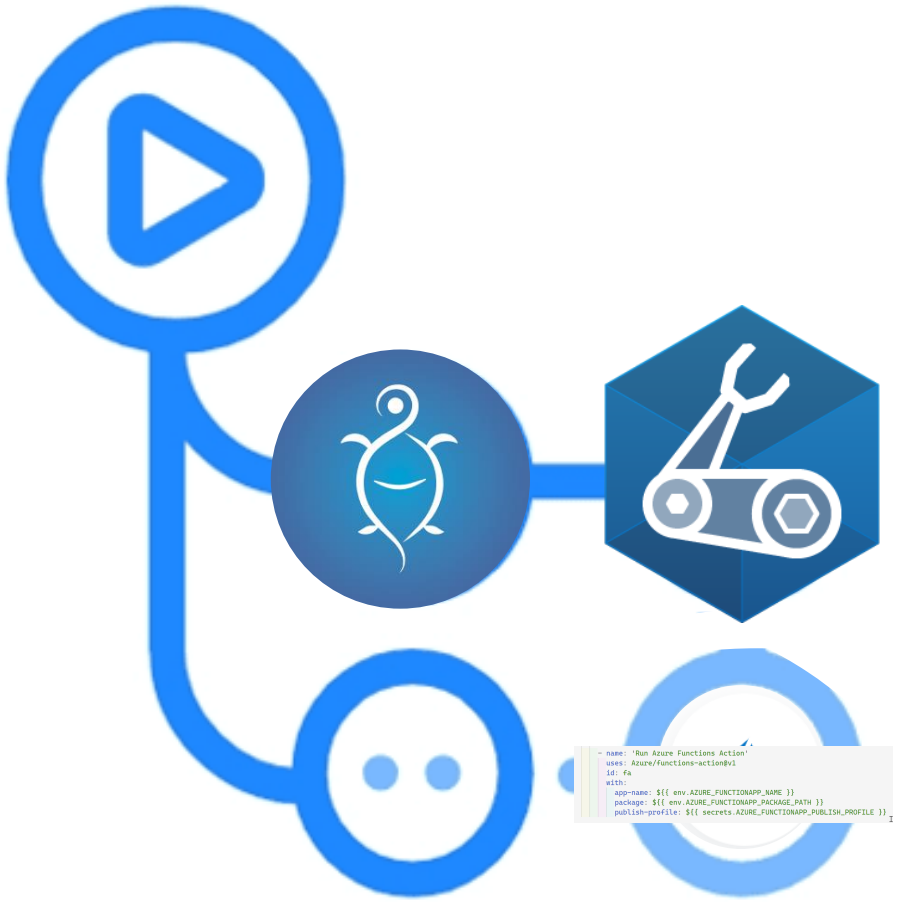








```yaml
- name: 'Run Azure Functions Action'
  uses: Azure/functions-action@v1
  id: fa
  with:
    app-name: ${{ env.AZURE_FUNCTIONAPP_NAME }}
    package: ${{ env.AZURE_FUNCTIONAPP_PACKAGE_PATH }}
    publish-profile: ${{ secrets.AZURE_FUNCTIONAPP_PUBLISH_PROFILE }}
```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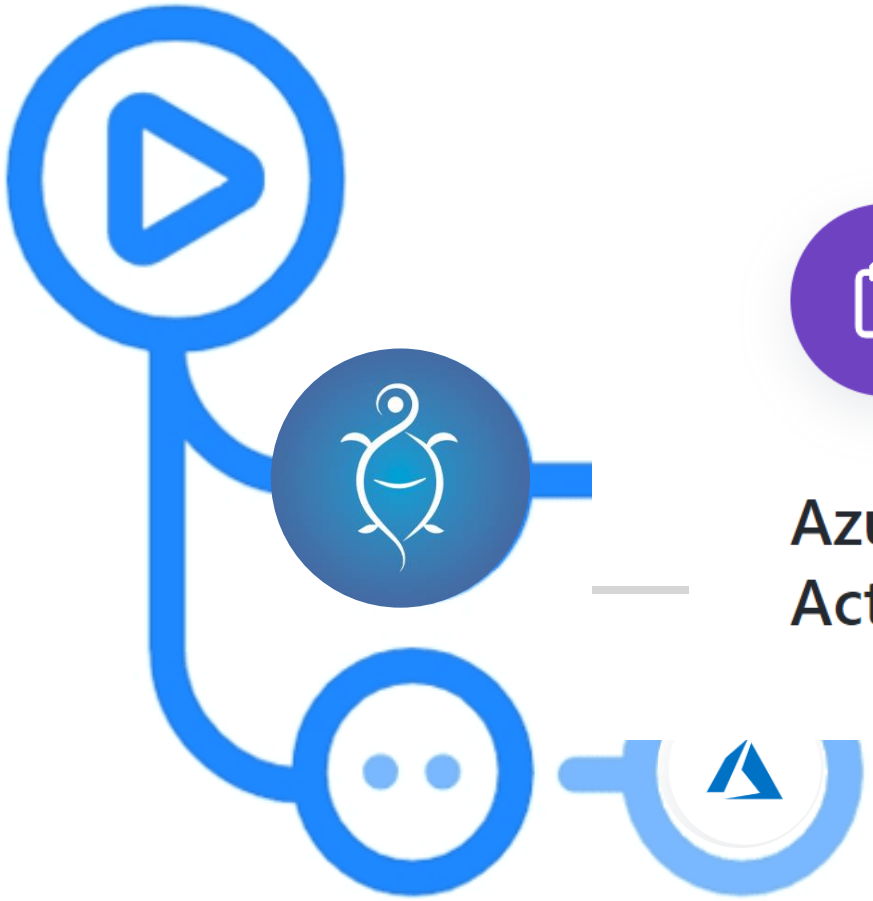
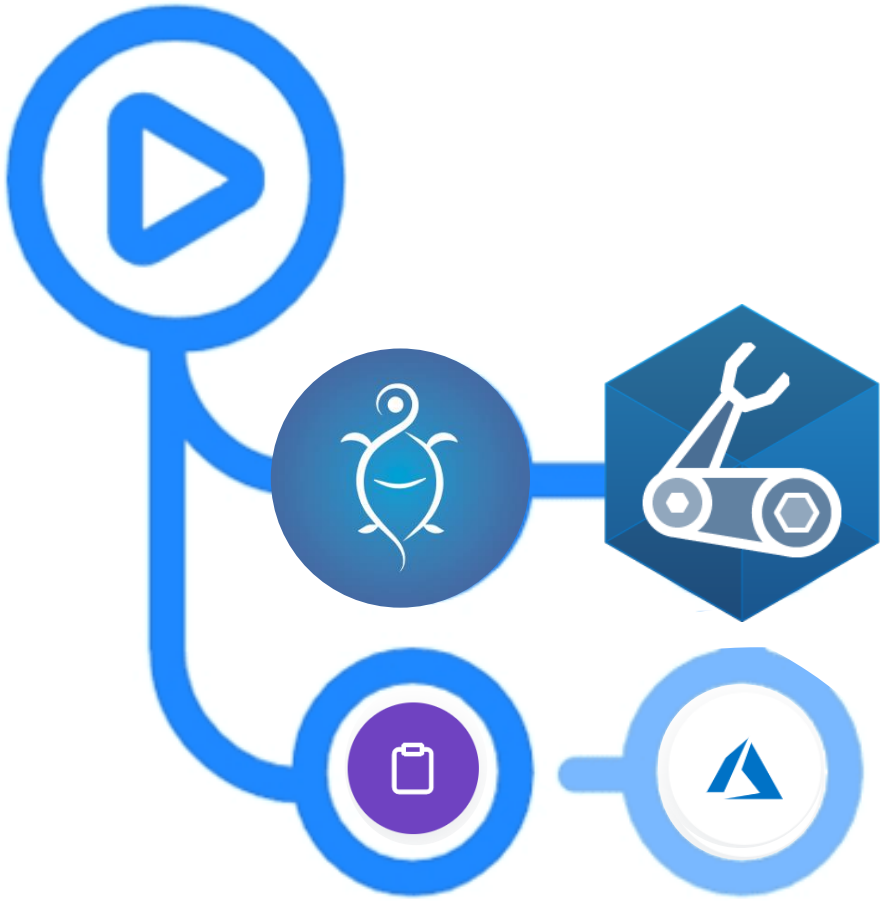


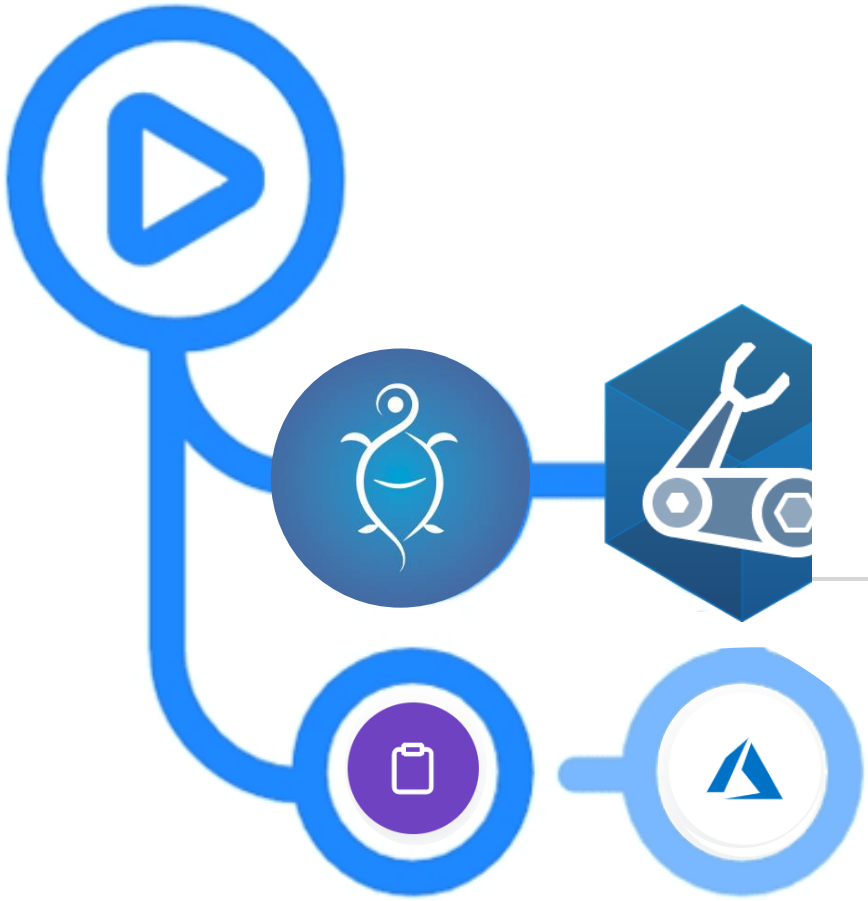
GitHub Action

Azure App Service Publish Profile

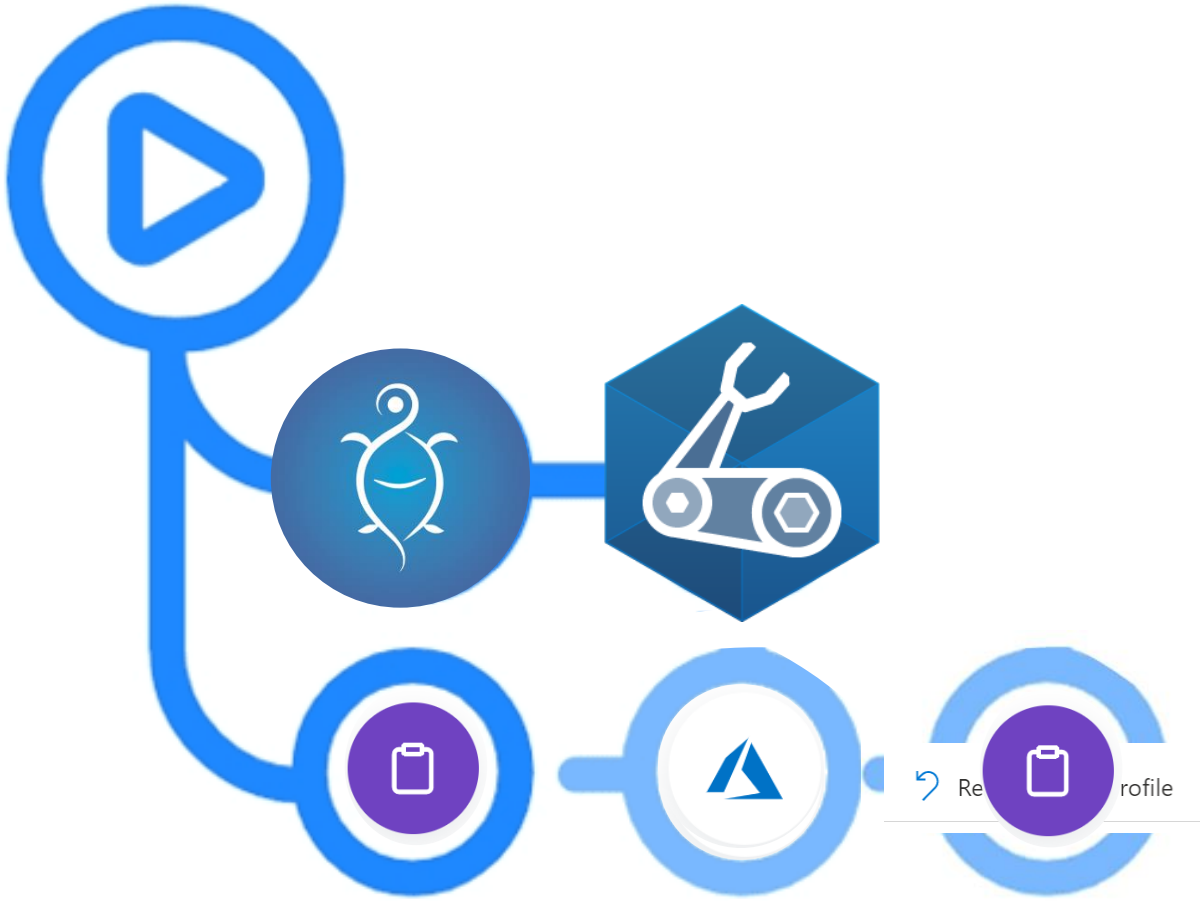
v1.3.0 Latest version

Azure Web/Functions App Publish Profile Actions





Reset publish profile


Re
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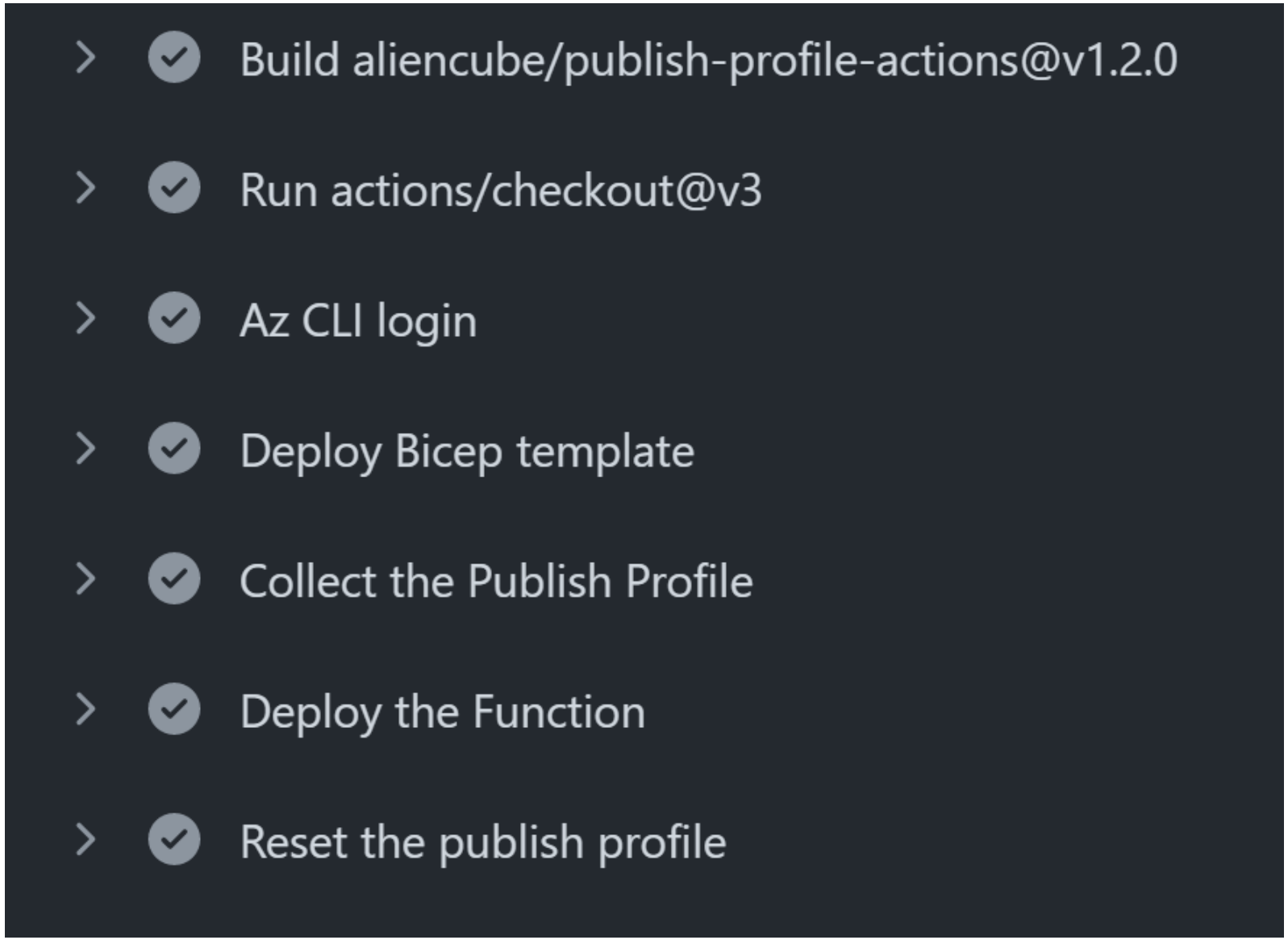
Build aliencube/publish-profile-actions@v1.2.0
Run actions/checkout@v3
Az CLI login
Deploy Bicep template
Collect the Publish Profile
Deploy the Function
Reset the publish profile

Other Sessions

Tuesday

2:00 pm → 45 min

Push-OutputBinding 'Anything' – Custom Bindings for Azure Functions

Emanuel Palm

Wednesday

10:00 am → 45 min

PowerShell Azure Functions: The Missing Manual

Justin Grote

Azure Functions in an enterprise environment

https://github.com/Ba4bes/AzFunctionsEnterprise

Barbara Forbes

Azure MVP, GitHub Star

Azure Technical Lead @ OGD

4bes.nl

@Ba4bes