ServiceDiscoveryM3 REST-JSON-TLS

**Abstract**

This document defines interface design of the ServiceDiscoveryM3 Service based on REST.

1. Overview

This document describes the ServiceDiscovery service of G3.2 within the REST interface.

This interface uses HTTP or HTTPS, therefore the related CP is valid.

1. Interfaces

As per the SD of this Service, there are three methods implemented (and two supporting ones). Table 1 describe these.

Table 1 Function description

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Function | URL subpath | Method | Input | Output |
| Publish | “/register” | POST | ServiceRegistryEntry | 200 OK,  CONTENT\_RESET,  INTERNAL\_SERVER\_ERROR |
| Unpublish | “/remove” | PUT | ServiceRegistryEntry | 200 OK,  REMOVED,  INTERNAL\_SERVER\_ERROR |
| Query | “/query” | PUT | ServiceQueryForm | ServiceQueryResult  OK,  NO\_CONTENT,  INTERNAL\_SERVER\_ERROR |

1. Information Model

As per discussed in the SD document, there are two possible request payloads and one response payload. Here, examples are given for these messages for this interface implementation (REST-JSON-TLS).

# ServiceRegistryEntry

{

"providedService": {

"serviceDefinition": "IndoorTemperature",

"interfaces": [

"json"

],

"serviceMetadata": {

"unit": "celsius",

"security": "token"

}

},

"provider": {

"systemName": "SecureTemperatureSensor",

"address": "127.0.0.1",

"port": 8455,

"authenticationInfo": "MIIBIjANBgkqhkiG9w0BAQEFAAOCAQ8AMIIBCgKCAQEAyzDRU+P6h8Jwp9eiGYqqlgoAmPLo6M/PTZX+pkKr2MIg7VLdnjUeXzKFljwJKjYGG3nus53F4RFnymT7VoIQT+SmkuLy90Ir6O3XRWiD74XlOIkthT8/fq5FP9sJIusaRc9jkx3Y8jC3yCz1BPJDa+0A+heWarN+K7W7985aBFiJ1ycsB7yJFYAt7wVRc2fkgGpmp4l34Ta4J7QVwzYBOx5w5hIE29EzXOhl0GB6c/licclhisOnN31OWizoWJWAdexmjR9ugHgFSv4eUbjQ3/Qc0tM3ljmbnMMmj54fKZHtpesLXrCi44aQ88e7UOd/xplAbntEPvz168oie4IzFQIDAQAB"

},

"port": 8455,

"serviceURI": "temperature",

"version": 1,

"ttl": 0,

"udp": false

}

# ServiceQueryForm

{

"service": {

"serviceDefinition": "IndoorTemperature",

"interfaces": [

"json"

],

"serviceMetadata": {

"unit": "celsius",

"security": "token"

}

},

"pingProviders": false,

"metadataSearch": true,

"version": 1

}

# ServiceQueryResult

{

"serviceQueryData": [

{

"providedService": {

"serviceDefinition": "IndoorTemperature",

"interfaces": [

"json"

],

"serviceMetadata": {

"unit": "celsius",

"security": "token"

}

},

"provider": {

"systemName": "SecureTemperatureSensor",

"address": "127.0.0.1",

"port": 8455,

"authenticationInfo": "MIIBIjANBgkqhkiG9w0BAQEFAAOCAQ8AMIIBCgKCAQEAyzDRU+P6h8Jwp9eiGYqqlgoAmPLo6M/PTZX+pkKr2MIg7VLdnjUeXzKFljwJKjYGG3nus53F4RFnymT7VoIQT+SmkuLy90Ir6O3XRWiD74XlOIkthT8/fq5FP9sJIusaRc9jkx3Y8jC3yCz1BPJDa+0A+heWarN+K7W7985aBFiJ1ycsB7yJFYAt7wVRc2fkgGpmp4l34Ta4J7QVwzYBOx5w5hIE29EzXOhl0GB6c/licclhisOnN31OWizoWJWAdexmjR9ugHgFSv4eUbjQ3/Qc0tM3ljmbnMMmj54fKZHtpesLXrCi44aQ88e7UOd/xplAbntEPvz168oie4IzFQIDAQAB"

},

"port": 8455,

"serviceURI": "temperature",

"version": 1,

"UDP": false,

"ttl": 0,

"metadata": "unit=celsius,security=token",

"endOfValidity": "Feb 15, 2018 10:09:25 AM"

}

]

}

1. Revision history

# Amendments

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| No. | Date | Version | Subject of Amendments | Author |
| 1 | 2017-09-29 | M2 | Initial | Csaba Hegedűs |
| 2 | 2018-02-15 | M3 | Updated document to M3 | Csaba Hegedűs |

# Quality Assurance

|  |  |  |  |
| --- | --- | --- | --- |
| No. | Date | Version | Approved by |
| 1 |  |  |  |
| 2 |  |  |  |