

Event Messaging

Overview

Fedora generates event messages when a resource is **created, updated or deleted**. The messages are composed for headers and body. ActivityStreams JSON is now used for message bodies of transmitted events. The new ActivityStreams based [JSON-LD](#) uses proper actor values for emitted messages.

Message Headers

Header	Description	Values	Sample Value
org.fcrepo.jms.user	The Fedora user who made the change.		bypassAdmin
org.fcrepo.jms.eventID	A UUID associated with the event		urn:uuid:2096784f-8915-4f76-9114-10f516553554
org.fcrepo.jms.identifier	The identifier portion of the URI of the changed resource		/test1
org.fcrepo.jms.timestamp	Timestamp in epoch time (milliseconds since January 1st, 1970)		1524580811763
org.fcrepo.jms.baseURL	The base portion of the identifiers URI.		http://localhost:8080/rest
org.fcrepo.jms.resourceType	A comma separated list of URIs identifying the types that describe the resource that changed.		http://www.w3.org/ns/ldp#Container , http://fedora.info/definitions/v4/repository#Resource , http://fedora.info/definitions/v4/repository#Container , http://www.w3.org/ns/ldp#RDFSSource , http://www.w3.org/ns/ldp#BasicContainer
org.fcrepo.jms.eventType	A comma separated list of URIs identifying the event types that describe the resource that changed.	https://www.w3.org/ns/activitystreams#Create , https://www.w3.org/ns/activitystreams#Update , , https://www.w3.org/ns/activitystreams#Delete	https://www.w3.org/ns/activitystreams#Create , https://www.w3.org/ns/activitystreams#Update
org.fcrepo.jms.userAgent	The type of client user agent that was used to effect the change to the resource.		Mozilla/5.0 (Macintosh; Intel Mac OS X 10_13_4) AppleWebKit/537.36 (KHTML, like Gecko) Chrome/66.0.3359.117 Safari/537.36

Message Body

The format of the body is [JSON-LD](#).

Below is an example of a message emitted on resource creation.

```

{
  "id": "urn:uuid:2096784f-8915-4f76-9114-10f516553554",
  "type": ["Create", "Update"],
  "name": "create resource, update resource",
  "published": "2018-04-24T14:40:11.763Z",
  "actor": [{
    "type": ["Person"],
    "id": "info:fedora/local-user#bypassAdmin"
  }, {
    "type": ["Application"],
    "name": "Mozilla/5.0 (Macintosh; Intel Mac OS X 10_13_4) AppleWebKit/537.36 (KHTML, like Gecko) Chrome/66.0.3359.117 Safari/537.36"
  }],
  "object": {
    "type": ["http://www.w3.org/ns/ldp#Container", "http://fedora.info/definitions/v4/repository#Resource", "http://fedora.info/definitions/v4/repository#Container", "http://www.w3.org/ns/ldp#RDFSSource", "http://www.w3.org/ns/ldp#BasicContainer", "http://www.w3.org/ns/prov#Entity"],
    "id": "http://localhost:8080/rest/test1",
    "isPartOf": "http://localhost:8080/rest"
  },
  "@context": ["https://www.w3.org/ns/activitystreams", {
    "prov": "http://www.w3.org/ns/prov#",
    "dcterms": "http://purl.org/dc/terms/",
    "type": "@type",
    "id": "@id",
    "isPartOf": {
      "@id": "dcterms:isPartOf",
      "@type": "@id"
    }
  }]
}

```

Below is an example of a message emitted on resource update.

```

{
  "id": "urn:uuid:b511e8bc-add1-47ac-bb6c-20e068b424fc",
  "type": ["Update"],
  "name": "update resource",
  "published": "2018-04-24T17:58:49.495Z",
  "actor": [{
    "type": ["Person"],
    "id": "info:fedora/local-user#bypassAdmin"
  }, {
    "type": ["Application"],
    "name": "curl/7.54.0"
  }],
  "object": {
    "type": ["http://www.w3.org/ns/ldp#Container", "http://fedora.info/definitions/v4/repository#Resource", "http://fedora.info/definitions/v4/repository#Container", "http://www.w3.org/ns/ldp#RDFSSource", "http://www.w3.org/ns/ldp#BasicContainer", "http://www.w3.org/ns/prov#Entity"],
    "id": "http://localhost:8080/rest/8e5c/ce/65/8e5cce65-8272-4046-beb0-b7992bf07828",
    "isPartOf": "http://localhost:8080/rest"
  },
  "@context": ["https://www.w3.org/ns/activitystreams", {
    "prov": "http://www.w3.org/ns/prov#",
    "dcterms": "http://purl.org/dc/terms/",
    "type": "@type",
    "id": "@id",
    "isPartOf": {
      "@id": "dcterms:isPartOf",
      "@type": "@id"
    }
  }]
}

```

Below is an example of a message emitted on resource deletion.

```

{
  "id": "urn:uuid:31410238-7a73-4014-a457-1b6d7df5adac",
  "type": ["Delete"],
  "name": "delete resource",
  "published": "2018-04-24T17:51:15.968Z",
  "actor": [{
    "type": ["Person"],
    "id": "info:fedora/local-user#bypassAdmin"
  }, {
    "type": ["Application"],
    "name": "Mozilla/5.0 (Macintosh; Intel Mac OS X 10_13_4) AppleWebKit/537.36 (KHTML, like Gecko) Chrome/66.0.3359.117 Safari/537.36"
  }],
  "object": {
    "type": ["http://www.w3.org/ns/ldp#Container", "http://fedora.info/definitions/v4/repository#Resource", "http://fedora.info/definitions/v4/repository#Container", "http://www.w3.org/ns/ldp#RDFSSource", "http://www.w3.org/ns/ldp#BasicContainer", "http://www.w3.org/ns/prov#Entity"],
    "id": "http://localhost:8080/rest/test1",
    "isPartOf": "http://localhost:8080/rest"
  },
  "@context": ["https://www.w3.org/ns/activitystreams", {
    "prov": "http://www.w3.org/ns/prov#",
    "dcterms": "http://purl.org/dc/terms/",
    "type": "@type",
    "id": "@id",
    "isPartOf": {
      "@id": "dcterms:isPartOf",
      "@type": "@id"
    }
  }]
}

```

See :

[How to Inspect Event Messages Generated by Fedora](#)