OBJECT OPERATIONS

PUT OBJECT

Adds an object to a bucket. You must have write permissions on the bucket to perform this operation.

SYNTAX

```
PUT /{bucket}/{object} HTTP/1.1
```

REQUEST HEADERS

Name	Description	Valid Values	Required
content-md5	A base64 encoded MD-5 hash of the message.	A string. No defaults or constraints.	No
content-type	A standard MIME type.	Any MIME type. Default: `binary/octet-stream`	No
x-amz-meta-<...>	User metadata. Stored with the object.	A string up to 8kb. No defaults.	No
x-amz-acl	A canned ACL.	`private`, `public-read`, `public-read-write`, `authenticated-read`	No

COPY OBJECT

To copy an object, use PUT and specify a destination bucket and the object name.

SYNTAX

```
PUT /{dest-bucket}/{dest-object} HTTP/1.1
x-amz-copy-source: {source-bucket}/{source-object}
```

REQUEST HEADERS

Name	Description	Valid Values	Required
x-amz-copy-source	The source bucket name + object name.	{bucket}/{obj}	Yes
x-amz-acl	A canned ACL.	`private`, `public-read`, `public-read-write`, `authenticated-read`	No
x-amz-copy-if-modified-since	Copies only if modified since the timestamp.	Timestamp	No
x-amz-copy-if-unmodified-since	Copies only if unmodified since the timestamp.	Timestamp	No
x-amz-copy-if-match	Copies only if object ETag matches ETag.	Entity Tag	No
x-amz-copy-if-none-match	Copies only if object ETag doesn't match.	Entity Tag	No

RESPONSE ENTITIES

Name	Type	Description
CopyObjectResult	Container	A container for the response elements.
LastModified	Date	The last modified date of the source object.
Etag	String	The ETag of the new object.

REMOVE OBJECT

Removes an object. Requires WRITE permission set on the containing bucket.

SYNTAX

```
DELETE /{bucket}/{object} HTTP/1.1
```

GET OBJECT

Retrieves an object from a bucket within RADOS.

SYNTAX

```
GET /{bucket}/{object} HTTP/1.1
```

REQUEST HEADERS

Name	Description	Valid Values	Required
range	The range of the object to retrieve.	Range: bytes=beginbyte-endbyte	No
if-modified-since	Gets only if modified since the timestamp.	Timestamp	No
if-unmodified-since	Gets only if not modified since the timestamp.	Timestamp	No
if-match	Gets only if object ETag matches ETag.	Entity Tag	No
if-none-match	Gets only if object ETag matches ETag.	Entity Tag	No

RESPONSE HEADERS

Name	Description
Content-Range	Data range, will only be returned if the range header field was specified in the request

GET OBJECT INFO

Returns information about object. This request will return the same header information as with the Get Object request, but will include the metadata only, not the object data payload.

SYNTAX

```
HEAD /{bucket}/{object} HTTP/1.1
```

REQUEST HEADERS

Name	Description	Valid Values	Required
range	The range of the object to retrieve.	Range: bytes=beginbyte-endbyte	No
if-modified-since	Gets only if modified since the timestamp.	Timestamp	No
if-unmodified-since	Gets only if not modified since the timestamp.	Timestamp	No
if-match	Gets only if object ETag matches ETag.	Entity Tag	No
if-none-match	Gets only if object ETag matches ETag.	Entity Tag	No

GET OBJECT ACL

SYNTAX

```
GET /{bucket}/{object}?acl HTTP/1.1
```

RESPONSE ENTITIES

Name	Type	Description
AccessControlPolicy	Container	A container for the response.
AccessControlList	Container	A container for the ACL information.
Owner	Container	A container for the object owner's ID and DisplayName.
ID	String	The object owner's ID.
DisplayName	String	The object owner's display name.
Grant	Container	A container for Grantee and Permission.
Grantee	Container	A container for the DisplayName and ID of the user receiving a grant of permission.
Permission	String	The permission given to the Grantee object.

SET OBJECT ACL

SYNTAX

```
PUT /{bucket}/{object}?acl
```

REQUEST ENTITIES

Name	Type	Description
AccessControlPolicy	Container	A container for the response.
AccessControlList	Container	A container for the ACL information.
Owner	Container	A container for the object owner's ID and DisplayName.
ID	String	The object owner's ID.
DisplayName	String	The object owner's display name.
Grant	Container	A container for Grantee and Permission.
Grantee	Container	A container for the DisplayName and ID of the user receiving a grant of permission.
Permission	String	The permission given to the Grantee object.

INITIATE MULTI-PART UPLOAD

Initiate a multi-part upload process.

SYNTAX

```
POST /{bucket}/{object}?uploads
```

REQUEST HEADERS

Name	Description	Valid Values	Required
content-md5	A base64 encoded MD-5 hash of the message.	A string. No defaults or constraints.	No
content-type	A standard MIME type.	Any MIME type. Default: binary/octet-stream	No
x-amz-meta-	User metadata. Stored with the	A string up to 8kb. No defaults.	No

<...>	object.			
x-amz-acl	A canned ACL.	private, public-read, public-read-write, authenticated-read	No

RESPONSE ENTITIES

Name	Type	Description
InitiatedMultipartUploadsResult	Container	A container for the results.
Bucket	String	The bucket that will receive the object contents.
Key	String	The key specified by the key request parameter (if any).
UploadId	String	The ID specified by the upload-id request parameter identifying the multipart upload (if any).

MULTIPART UPLOAD PART

SYNTAX

```
PUT /{bucket}/{object}?partNumber=&uploadId= HTTP/1.1
```

HTTP RESPONSE

The following HTTP response may be returned:

HTTP Status	Status Code	Description
404	NoSuchUpload	Specified upload-id does not match any initiated upload on this object

LIST MULTIPART UPLOAD PARTS

SYNTAX

```
GET /{bucket}/{object}?uploadId=123 HTTP/1.1
```

RESPONSE ENTITIES

Name	Type	Description
InitiatedMultipartUploadsResult	Container	A container for the results.
Bucket	String	The bucket that will receive the object contents.
Key	String	The key specified by the key request parameter (if any).
UploadId	String	The ID specified by the upload-id request parameter identifying the multipart upload (if any).
Initiator	Container	Contains the ID and DisplayName of the user who initiated the upload.
ID	String	The initiator's ID.
DisplayName	String	The initiator's display name.
Owner	Container	A container for the ID and DisplayName of the user who owns the uploaded object.
StorageClass	String	The method used to store the resulting object. STANDARD or REDUCED_REDUNDANCY
PartNumberMarker	String	The part marker to use in a subsequent request if IsTruncated is true. Precedes the list.
NextPartNumberMarker	String	The next part marker to use in a subsequent request if IsTruncated is true. The end of the list.
MaxParts	Integer	The max parts allowed in the response as specified by the max-parts request parameter.
IsTruncated	Boolean	If true, only a subset of the object's upload contents were returned.

Part	Container	A container for Key, Part, InitiatorOwner, StorageClass, and Initiated elements.	
PartNumber	Integer	The identification number of the part.	
ETag	String	The part's entity tag.	
Size	Integer	The size of the uploaded part.	

COMPLETE MULTIPART UPLOAD

Assembles uploaded parts and creates a new object, thereby completing a multipart upload.

SYNTAX

```
POST /{bucket}/{object}?uploadId= HTTP/1.1
```

REQUEST ENTITIES

Name	Type	Description	Required
CompleteMultipartUpload	Container	A container consisting of one or more parts.	Yes
Part	Container	A container for the PartNumber and ETag.	Yes
PartNumber	Integer	The identifier of the part.	Yes
ETag	String	The part's entity tag.	Yes

RESPONSE ENTITIES

Name	Type	Description
CompleteMultipartUploadResult	Container	A container for the response.
Location	URI	The resource identifier (path) of the new object.
Bucket	String	The name of the bucket that contains the new object.
Key	String	The object's key.
ETag	String	The entity tag of the new object.

ABORT MULTIPART UPLOAD

SYNTAX

```
DELETE /{bucket}/{object}?uploadId= HTTP/1.1
```