

5. Perform all basic kind of operations of objects (copy | move | upload | download | delete) using gsutil sdk and python client library.

gsutil:

1. copy:
avinash@Quantiphi-929:~\$ **gsutil cp gs://av-a1-q5-src/img.png gs://av-a1-q5-dest/img-copy.png**
Copying gs://av-a1-q5-src/img.png [Content-Type=image/png]...
- [1 files][29.3 KiB/ 29.3 KiB]
Operation completed over 1 objects/29.3 KiB.
2. move:
avinash@Quantiphi-929:~\$ **gsutil mv -p gs://av-a1-q5-src/img.png gs://av-a1-q5-dest/img-mv.png**
Copying gs://av-a1-q5-src/img.png [Content-Type=image/png]...
Removing gs://av-a1-q5-src/img.png...

Operation completed over 1 objects/29.3 KiB.
3. upload:
avinash@Quantiphi-929:~\$ **gsutil cp ~/Pictures/gcp-1.png gs://av-a1-q5-src**
Copying file:///home/avinash/Pictures/gcp-1.png [Content-Type=image/png]...
/ [1 files][35.3 KiB/ 35.3 KiB]
Operation completed over 1 objects/35.3 KiB.
4. download:
avinash@Quantiphi-929:~\$ **gsutil cp gs://av-a1-q5-dest/img-copy.png Pictures/**
Copying gs://av-a1-q5-dest/img-copy.png...
- [1 files][29.3 KiB/ 29.3 KiB]
Operation completed over 1 objects/29.3 KiB.
5. delete:
avinash@Quantiphi-929:~\$ **gsutil rm gs://av-a1-q5-dest/img-copy.png**
Removing gs://av-a1-q5-dest/img-copy.png...
/ [1 objects]
Operation completed over 1 objects.

python lib:

```
from google.cloud import storage
```

```
gs = storage.Client()
src_bkt = gs.get_bucket("av-a1-q5-src")
dest_bkt = gs.get_bucket("av-a1-q5-dest")
```

```
#copy
src_blob = src_bkt.blob("gcp-1.png")
dest_blob = src_bkt.copy_blob(src_blob, dest_bkt, "gcp-1-copy.png")
```

```
print()
print('Blob {} in bucket {} copied to blob {} in bucket {}'.format(src_blob.name, src_bkt.name,
dest_blob.name, dest_bkt.name))
print()
```

```

#move

# ..copy to destination
dest_blob = src_bkt.copy_blob(src_blob, dest_bkt, "gcp-1-mv.png")
print("..copied")

# ..delete from source
src_blob.delete()
print("..deleted")

print('Blob {} in bucket {} moved to blob {} in bucket {}'.format(src_blob.name, src_bkt.name,
dest_blob.name, dest_bkt.name))
print()

#upload
blob = src_bkt.blob("img.png")
with open("/home/avinash/Pictures/img.png", "rb") as f:
    blob.upload_from_file(f)
print('File {} uploaded to {}'.format("img.png", src_bkt.name + "/img.png"))
print()

#download
blob = src_bkt.blob("img.png")
blob.download_to_filename("/home/avinash/Pictures/img-dl.png")

print('Blob {} downloaded to {}'.format("img.png", "/home/avinash/Pictures/img-dl.png"))
print()

#delete
blob = src_bkt.blob("img.png")
blob.delete()
print('Blob {} deleted.'.format("img.png"))

```

Output:

(gcp) avinash@Quantiphi-929:~/Documents/gcp_assessment_1\$ python3 q5.py

Blob gcp-1.png in bucket av-a1-q5-src copied to blob gcp-1-copy.png in bucket av-a1-q5-dest.

Blob gcp-1.png in bucket av-a1-q5-src moved to blob gcp-1-copy.png in bucket av-a1-q5-dest.

File img.png uploaded to av-a1-q5-src/img.png.

Blob img.png downloaded to /home/avinash/Pictures/img-dl.png.

Blob img.png deleted.