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README for reproducibility submission

a) Source code information

Repository: <https://github.com/broyson/Locust-streaming>

Programming Language: Python

Additional Programming Language information: Python 3.8

Dockerfile: Contains the required information to build an Alpine image with the dependencies from the requirements.txt file.

b) Docker image

There is an already Docker built image that can be download from Docker-hub

Repository: **docker pull broyson/locust-streaming:latest**

c) Hardware info

The Source code of point (a) has been tested in MacOS Sierra and Ubuntu bionic 18.06.

However, option (b) contains Docker image that is ready to pull and use without installing other Python dependencies.

d) Experimentation by using method (b) **Docker image**

1. Pull docker image:

```
$ docker pull broyson/locust-streaming:latest
```

2. Replace the environment variables **ORIGIN_IP** and **MANIFEST_FILE** with the Manifest url points that you would like to stress test.

a. Local example

```
$ docker run \  
  -e "HOST_URL=http://{ORIGIN_IP}" \  
  -e "MANIFEST_FILE=tears-of-steel-avc1.ism/.mpd" \  
  -e "mode=vod" \  
  -e "play_mode=full_playback" \  
  -e "bitrate=lowest_bitrate" \  
  broyson/locust-streaming:latest \  
  -f /load_generator/locustfiles/vod_dash_hls_sequence.py \  
  --no-web -c 1 -r 1 --run-time 10s --only-summary
```

- b. External MPEG-DASH Manifest example

```
$ docker run \  
  -e "HOST_URL=https://demo.unified-streaming.com" \  
  -e "MANIFEST_FILE=/video/ateam/ateam.ism/ateam.mpd" \  
  -e "mode=vod" \  
  -e "play_mode=full_playback" \  
  -e "bitrate=lowest_bitrate" \  
  broyson/locust-streaming:latest \  
  -f /load_generator/locustfiles/vod_dash_hls_sequence.py \  
  --no-web -c 1 -r 1 --run-time 10s --only-summary
```