

## Pantheon Report

Generated at 2019-12-11 07:30:51 (UTC).  
Data path: GCE Sydney on `ens4 (local)` → GCE Iowa on `ens4 (remote)`.  
Repeated the test of 24 congestion control schemes 5 times.  
Each test lasted for 30 seconds running 1 flow.  
NTP offsets were measured against `time.google.com` and have been applied to correct the timestamps in logs.

System info:

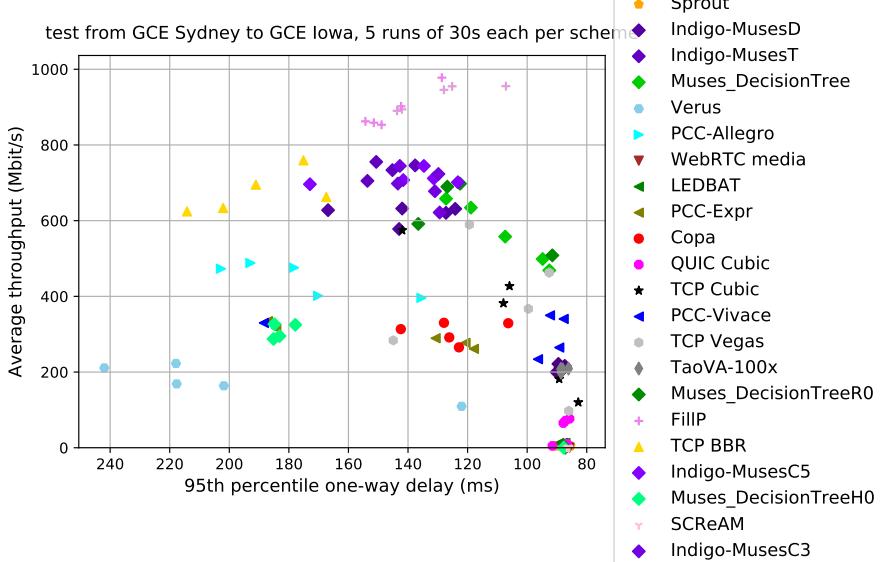
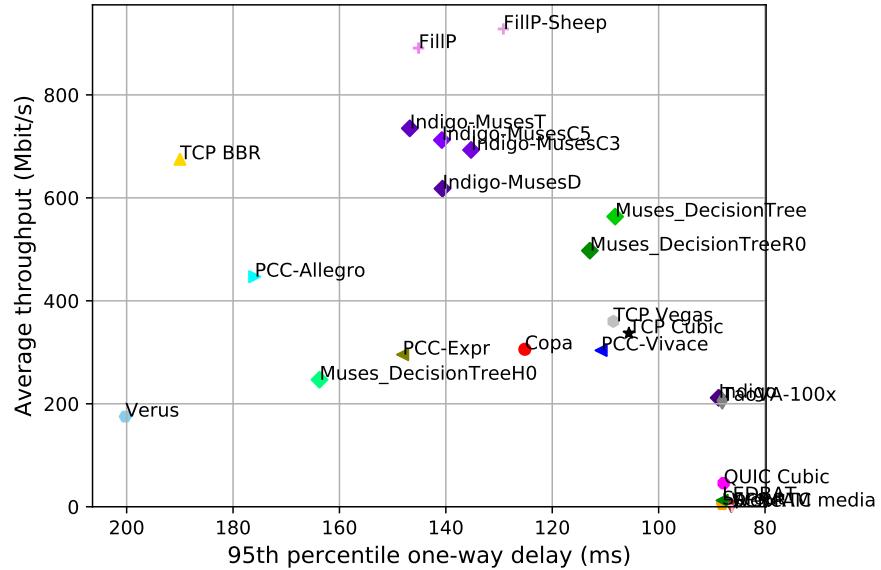
```
Linux 5.0.0-1025-gcp
net.core.default_qdisc = fq
net.core.rmem_default = 16777216
net.core.rmem_max = 536870912
net.core.wmem_default = 16777216
net.core.wmem_max = 536870912
net.ipv4.tcp_rmem = 4096 16777216 536870912
net.ipv4.tcp_wmem = 4096 16777216 536870912
```

Git summary:

```
branch: muses @ de42328552b3776a75a932a94dfaf722537b0ec
third_party/fillp @ d6da1459332fce56963885d7eba17e6a32d4519
third_party/fillp-sheep @ 0e5bb722943babcd2b090d2c64fc45e12e923f9
third_party/genericCC @ d0153f8e594aa89e93b032143cedbdf58e562f4
third_party/indigo @ 2601c92e4aa9d58d38dc4dfe0ecdbf90c077e64d
third_party/libutp @ b3465b942e2826f2b179eaab4a906ce6bb7cf3cf
third_party/muses @ 5ce721187ad823da20955337730c746486ca4966
third_party/muses_dtree @ 387225f7b5f61ddbe92d708a8869ffbb84eb3200
third_party/pantheon-tunnel @ f866d3f58d27af942717625ee3a354cc2e802bd
third_party/pcc @ 1afc958fa0d66d18b623c091a55fec872b4981e1
M receiver/src/buffer.h
M receiver/src/core.cpp
M sender/src/buffer.h
M sender/src/core.cpp
third_party/pcc-experimental @ cd43e34e3f5f5613e8acd08fab92c4eb24f974ab
third_party/proto-quic @ 77961f1a82733a86b42f1bc8143ebc978f3cff42
third_party/scream-reproduce @ f099118d1421aa3131bf11ff1964974e1da3bdb2
M src/ScreamClient
M src/ScreamServer
third_party/sprout @ 366e35c6178b01e31d4a46ad18c74f9415f19a26
M src/examples/cellsim.cc
M src/examples/sproutbt2.cc
M src/network/sproutconn.cc
third_party/verus @ d4b447ea74c6c60a261149af2629562939f9a494
M src/verus.hpp
M tools/plot.py
```

third\_party/vivace @ 2baf86211435ae071a32f96b7d8c504587f5d7f4  
third\_party/webrtc @ 3f0cc2a9061a41b6f9dde4735770d143a1fa2851

test from GCE Sydney to GCE Iowa, 5 runs of 30s each per scheme  
(mean of all runs by scheme)



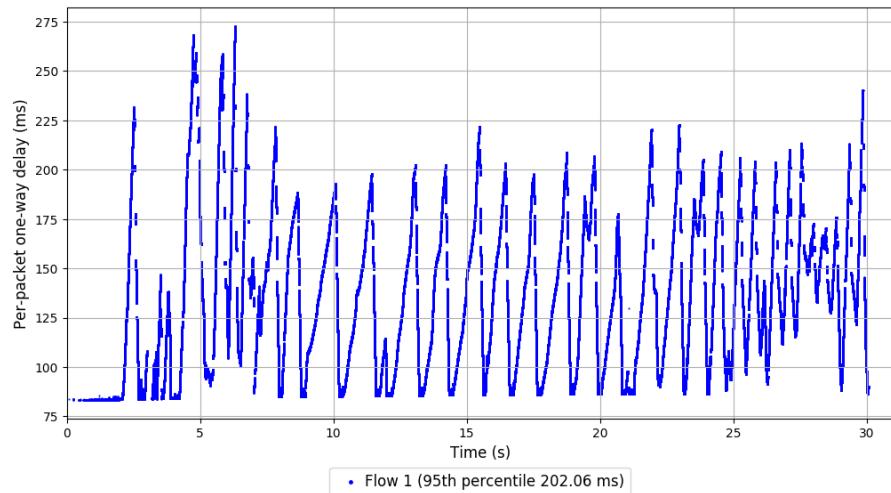
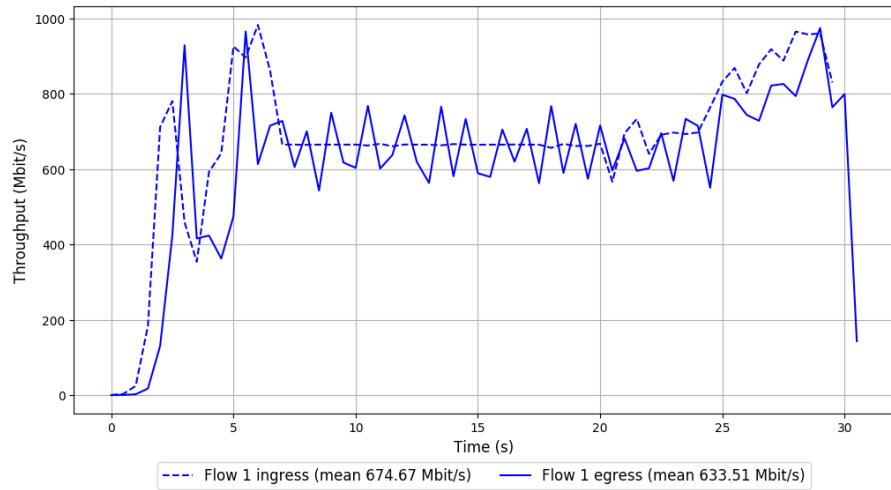
scheme	# runs	mean avg tput (Mbit/s) flow 1	mean 95th-%ile delay (ms) flow 1	mean loss rate (%) flow 1
TCP BBR	5	674.98	189.97	5.19
Copa	5	305.87	125.15	0.02
TCP Cubic	5	337.08	105.59	0.05
FillP	5	890.92	145.12	2.05
FillP-Sheep	5	928.06	129.19	0.67
Indigo	5	211.68	88.73	0.00
Indigo-MusesC3	5	693.05	135.26	0.10
Indigo-MusesC5	5	712.24	140.76	0.14
Indigo-MusesD	5	617.92	140.64	0.10
Indigo-MusesT	4	735.00	146.78	0.28
LEDBAT	5	12.36	88.07	0.00
Muses_DecisionTree	5	563.55	108.17	0.05
Muses_DecisionTreeH0	5	246.79	163.75	8.92
Muses_DecisionTreeR0	5	497.45	112.93	0.04
PCC-Allegro	5	446.86	175.92	1.40
PCC-Expr	5	295.59	148.12	0.85
QUIC Cubic	5	45.78	87.78	0.00
SCReAM	5	0.22	86.17	0.00
Sprout	5	4.28	88.06	0.00
TaoVA-100x	5	205.95	88.04	0.00
TCP Vegas	5	360.09	108.51	0.30
Verus	5	175.11	200.26	4.19
PCC-Vivace	5	303.72	110.82	0.00
WebRTC media	4	0.57	86.34	0.00

Run 1: Statistics of TCP BBR

```
Start at: 2019-12-11 02:40:13
End at: 2019-12-11 02:40:43
Local clock offset: 4.084 ms
Remote clock offset: 18.474 ms

# Below is generated by plot.py at 2019-12-11 05:55:36
# Datalink statistics
-- Total of 1 flow:
Average throughput: 633.51 Mbit/s
95th percentile per-packet one-way delay: 202.062 ms
Loss rate: 6.09%
-- Flow 1:
Average throughput: 633.51 Mbit/s
95th percentile per-packet one-way delay: 202.062 ms
Loss rate: 6.09%
```

## Run 1: Report of TCP BBR — Data Link

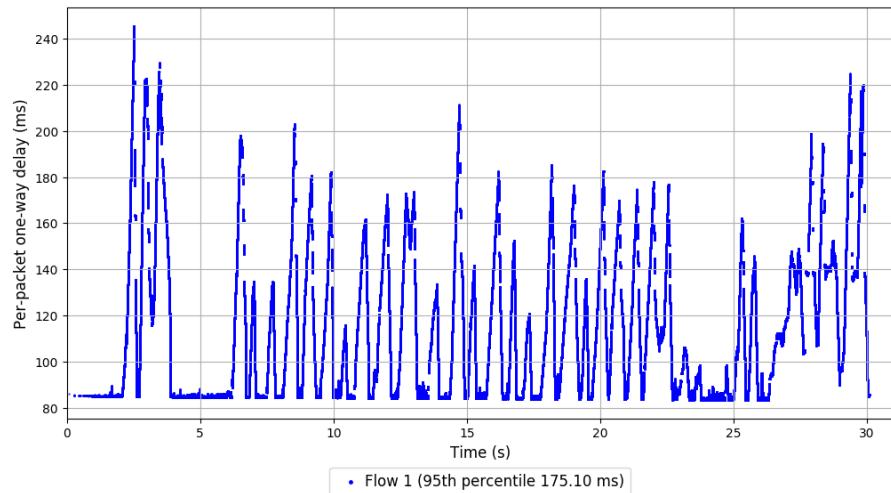
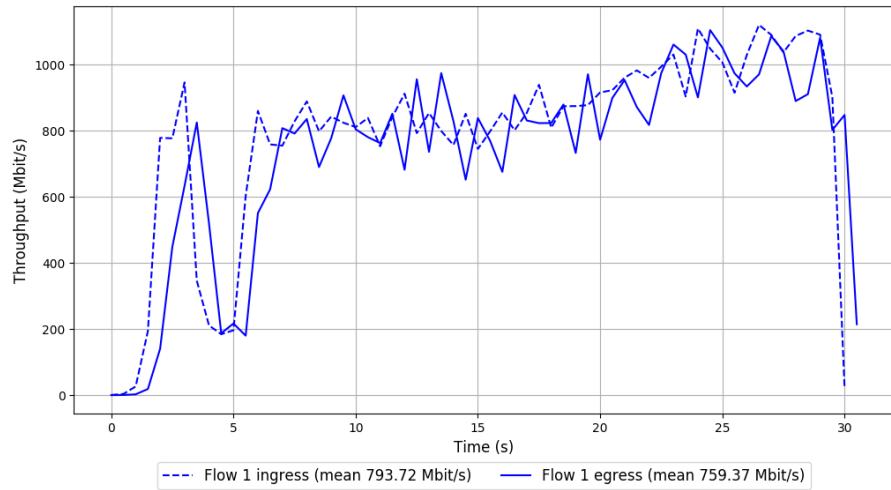


Run 2: Statistics of TCP BBR

```
Start at: 2019-12-11 03:15:05
End at: 2019-12-11 03:15:35
Local clock offset: 18.36 ms
Remote clock offset: 51.459 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 759.37 Mbit/s
95th percentile per-packet one-way delay: 175.104 ms
Loss rate: 4.33%
-- Flow 1:
Average throughput: 759.37 Mbit/s
95th percentile per-packet one-way delay: 175.104 ms
Loss rate: 4.33%
```

## Run 2: Report of TCP BBR — Data Link

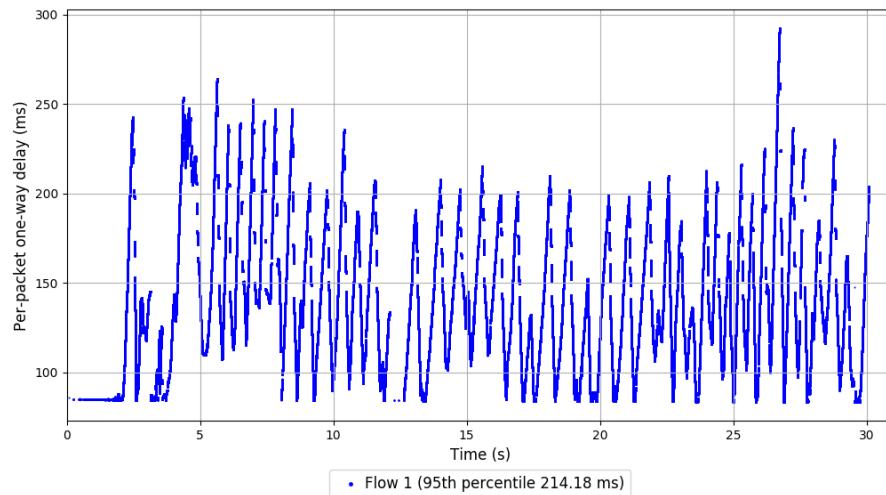
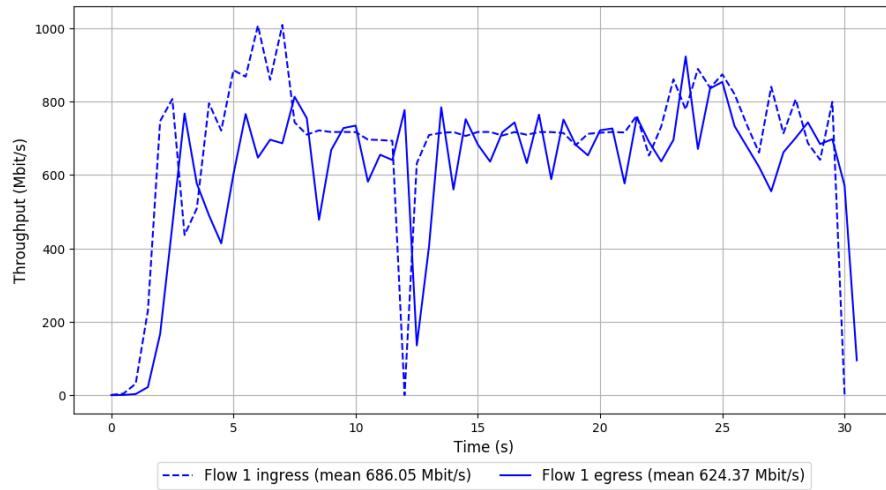


Run 3: Statistics of TCP BBR

```
Start at: 2019-12-11 03:49:39
End at: 2019-12-11 03:50:09
Local clock offset: 24.403 ms
Remote clock offset: 23.114 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 624.37 Mbit/s
95th percentile per-packet one-way delay: 214.180 ms
Loss rate: 8.99%
-- Flow 1:
Average throughput: 624.37 Mbit/s
95th percentile per-packet one-way delay: 214.180 ms
Loss rate: 8.99%
```

### Run 3: Report of TCP BBR — Data Link

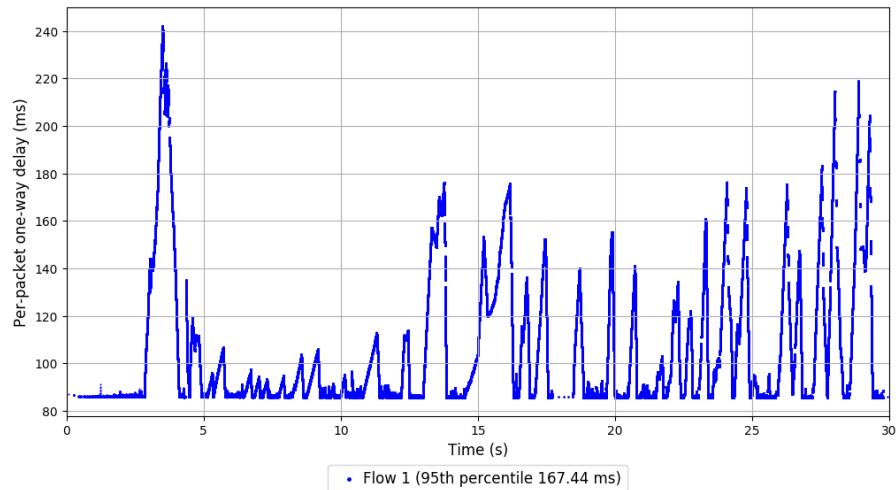
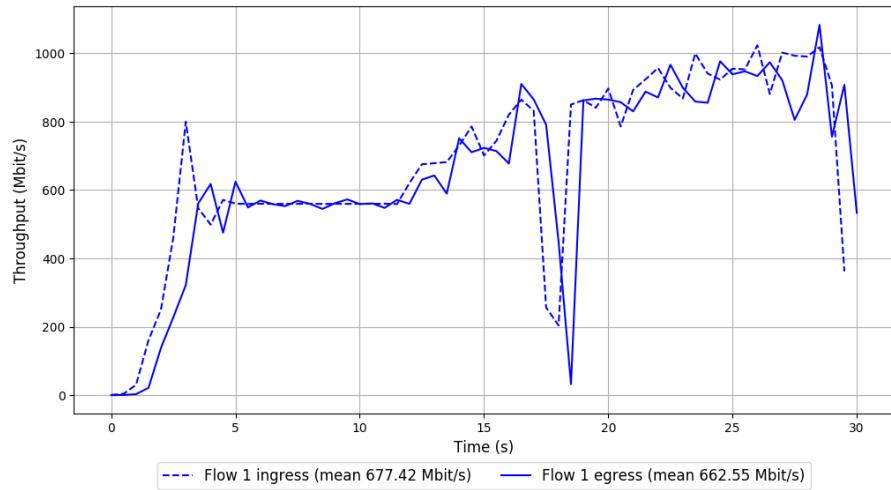


Run 4: Statistics of TCP BBR

```
Start at: 2019-12-11 04:24:59
End at: 2019-12-11 04:25:29
Local clock offset: 10.865 ms
Remote clock offset: 10.473 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 662.55 Mbit/s
95th percentile per-packet one-way delay: 167.436 ms
Loss rate: 2.20%
-- Flow 1:
Average throughput: 662.55 Mbit/s
95th percentile per-packet one-way delay: 167.436 ms
Loss rate: 2.20%
```

#### Run 4: Report of TCP BBR — Data Link

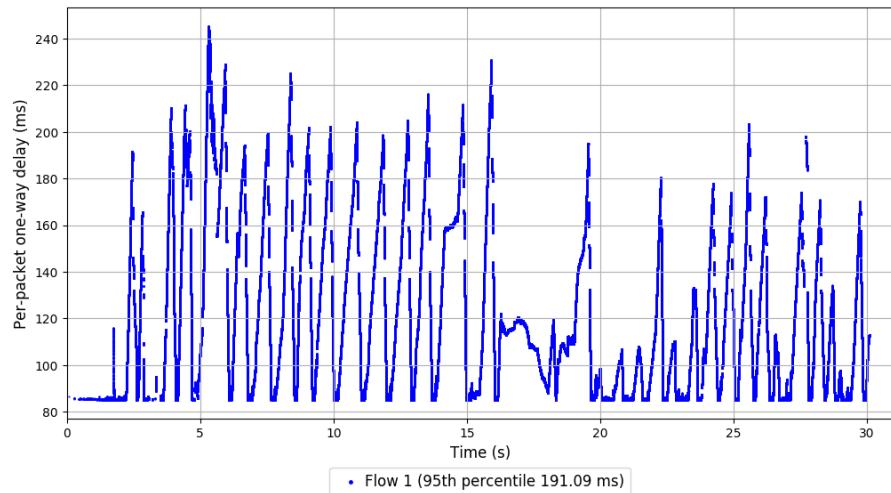
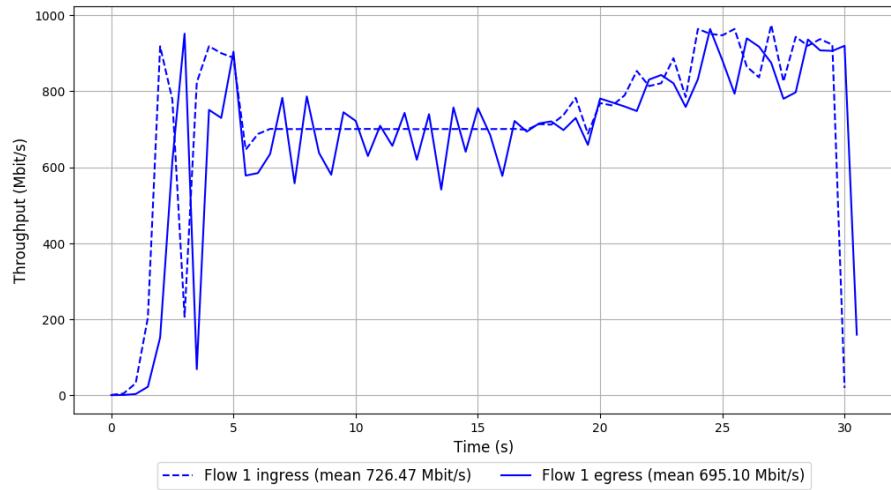


Run 5: Statistics of TCP BBR

```
Start at: 2019-12-11 04:59:51
End at: 2019-12-11 05:00:21
Local clock offset: 4.898 ms
Remote clock offset: 3.539 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 695.10 Mbit/s
95th percentile per-packet one-way delay: 191.092 ms
Loss rate: 4.32%
-- Flow 1:
Average throughput: 695.10 Mbit/s
95th percentile per-packet one-way delay: 191.092 ms
Loss rate: 4.32%
```

### Run 5: Report of TCP BBR — Data Link

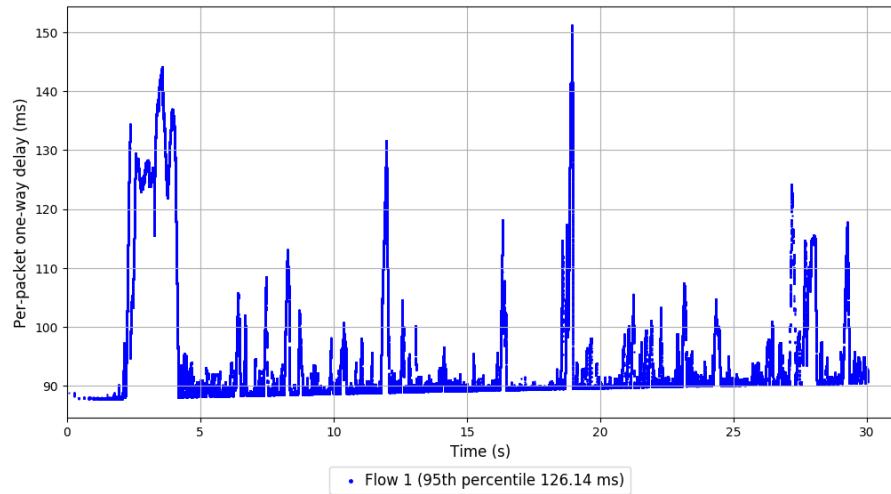
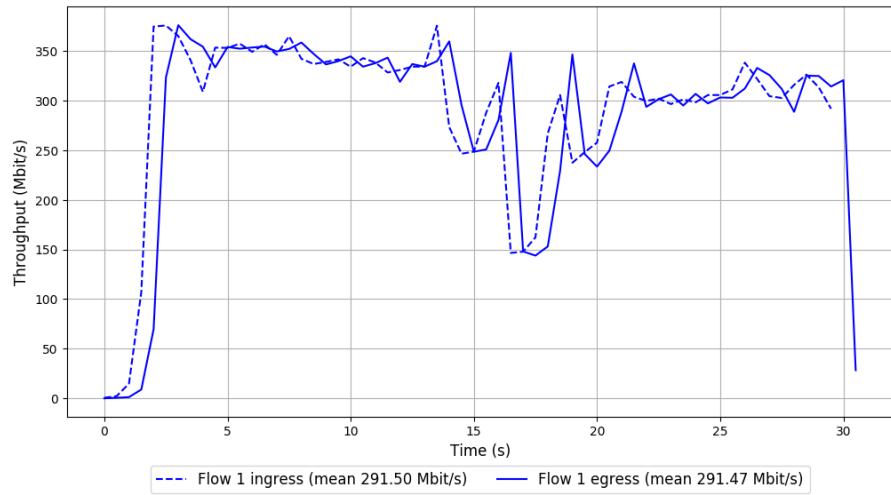


Run 1: Statistics of Copa

```
Start at: 2019-12-11 02:51:14
End at: 2019-12-11 02:51:44
Local clock offset: 8.237 ms
Remote clock offset: 24.089 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 291.47 Mbit/s
95th percentile per-packet one-way delay: 126.145 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 291.47 Mbit/s
95th percentile per-packet one-way delay: 126.145 ms
Loss rate: 0.00%
```

Run 1: Report of Copa — Data Link

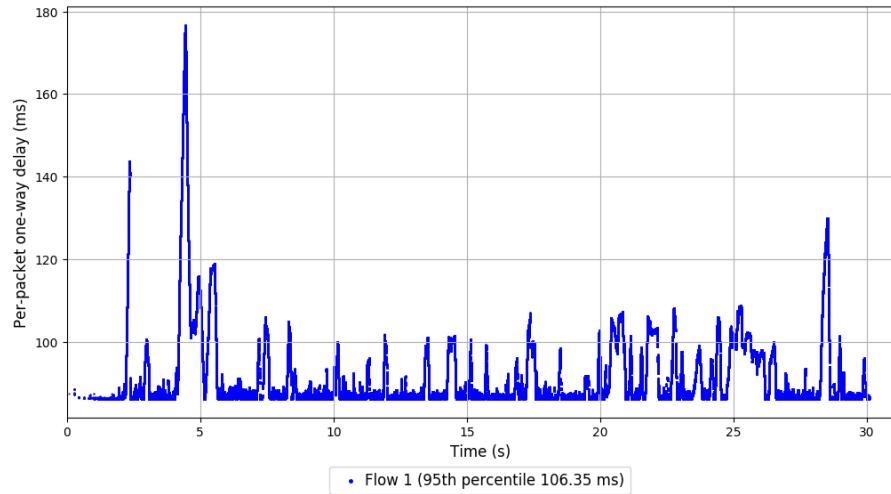
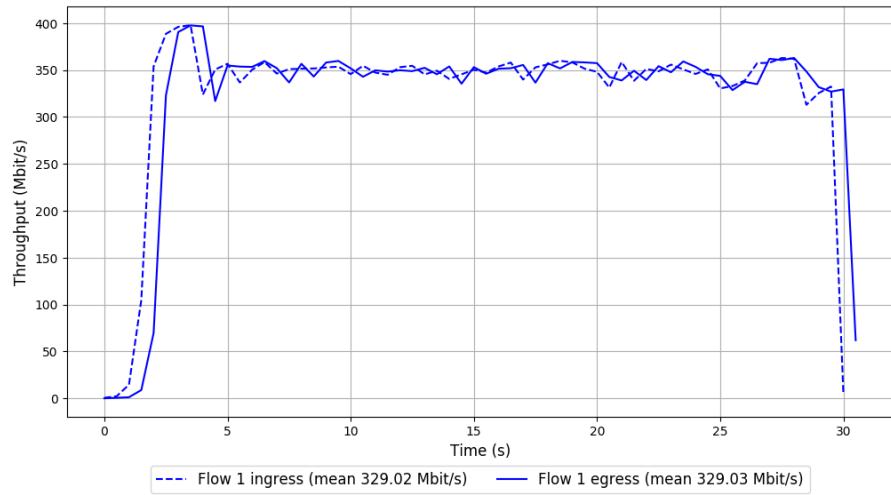


Run 2: Statistics of Copa

```
Start at: 2019-12-11 03:26:42
End at: 2019-12-11 03:27:12
Local clock offset: 17.324 ms
Remote clock offset: 20.698 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 329.03 Mbit/s
95th percentile per-packet one-way delay: 106.352 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 329.03 Mbit/s
95th percentile per-packet one-way delay: 106.352 ms
Loss rate: 0.00%
```

## Run 2: Report of Copa — Data Link

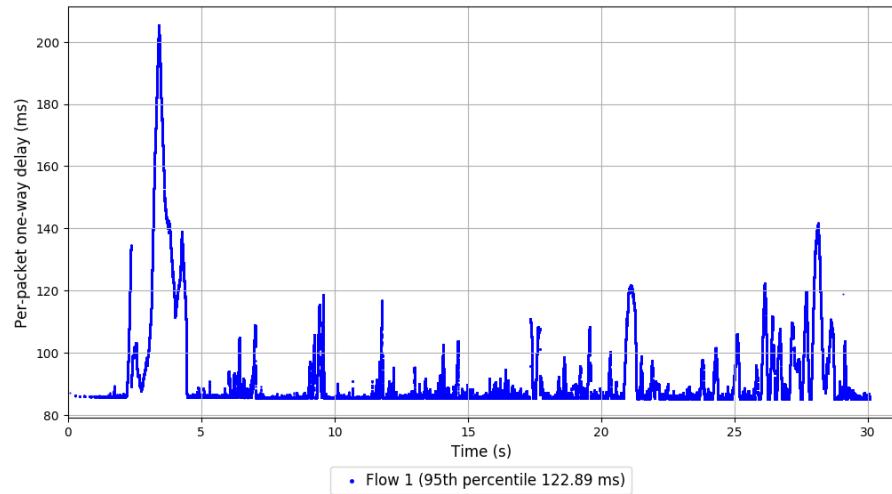
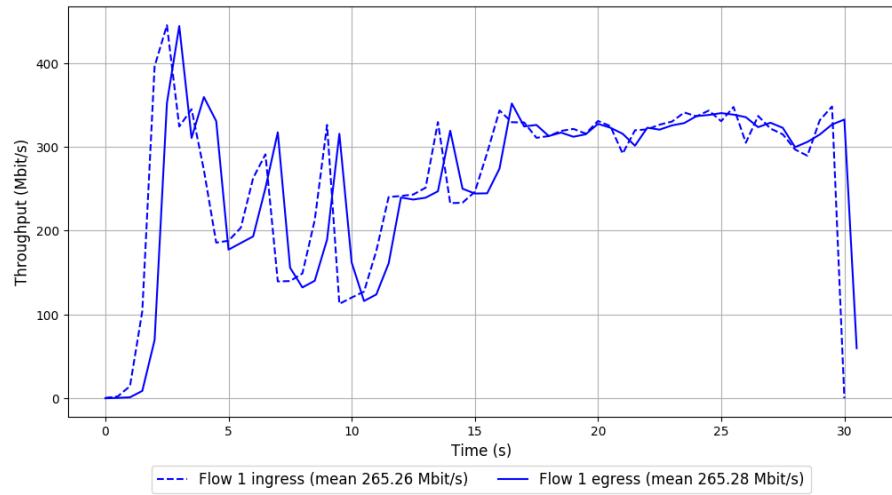


Run 3: Statistics of Copa

```
Start at: 2019-12-11 04:01:09
End at: 2019-12-11 04:01:39
Local clock offset: 12.565 ms
Remote clock offset: 33.626 ms

# Below is generated by plot.py at 2019-12-11 05:57:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 265.28 Mbit/s
95th percentile per-packet one-way delay: 122.894 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 265.28 Mbit/s
95th percentile per-packet one-way delay: 122.894 ms
Loss rate: 0.00%
```

### Run 3: Report of Copa — Data Link

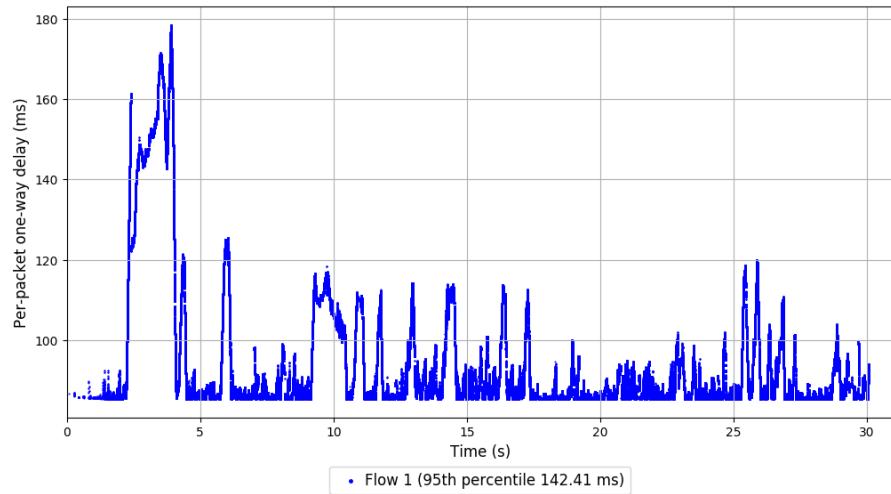
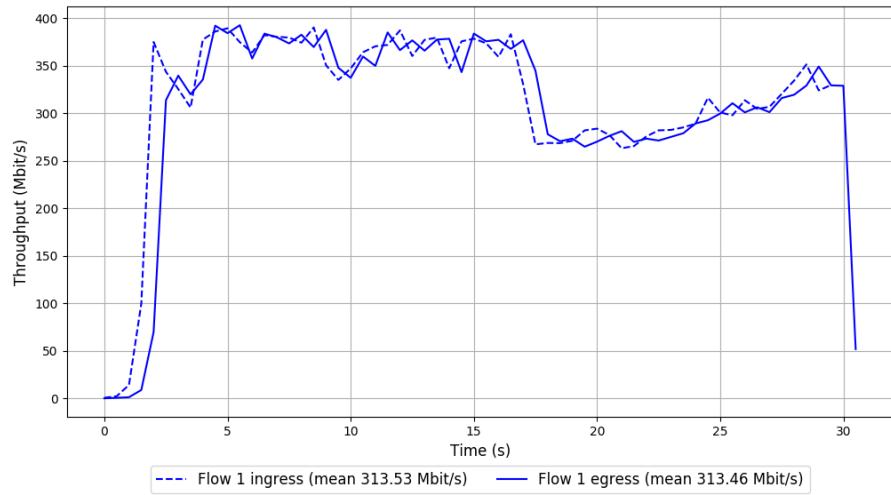


Run 4: Statistics of Copa

```
Start at: 2019-12-11 04:36:21
End at: 2019-12-11 04:36:51
Local clock offset: 6.32 ms
Remote clock offset: 9.689 ms

# Below is generated by plot.py at 2019-12-11 06:02:09
# Datalink statistics
-- Total of 1 flow:
Average throughput: 313.46 Mbit/s
95th percentile per-packet one-way delay: 142.415 ms
Loss rate: 0.02%
-- Flow 1:
Average throughput: 313.46 Mbit/s
95th percentile per-packet one-way delay: 142.415 ms
Loss rate: 0.02%
```

### Run 4: Report of Copa — Data Link

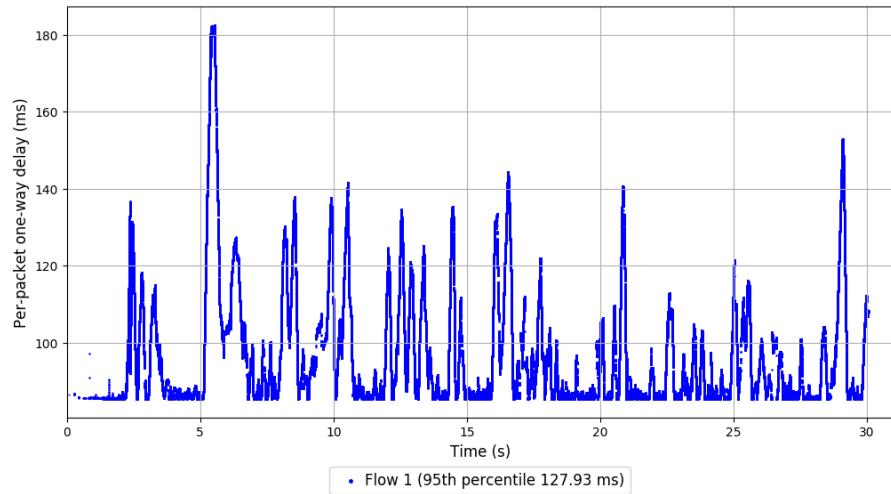
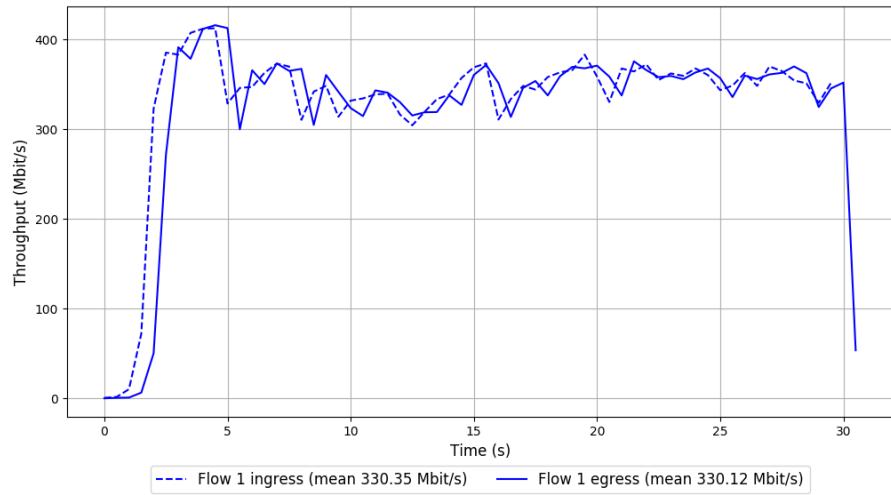


Run 5: Statistics of Copa

```
Start at: 2019-12-11 05:11:21
End at: 2019-12-11 05:11:51
Local clock offset: 2.25 ms
Remote clock offset: 4.075 ms

# Below is generated by plot.py at 2019-12-11 06:02:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 330.12 Mbit/s
95th percentile per-packet one-way delay: 127.932 ms
Loss rate: 0.06%
-- Flow 1:
Average throughput: 330.12 Mbit/s
95th percentile per-packet one-way delay: 127.932 ms
Loss rate: 0.06%
```

### Run 5: Report of Copa — Data Link

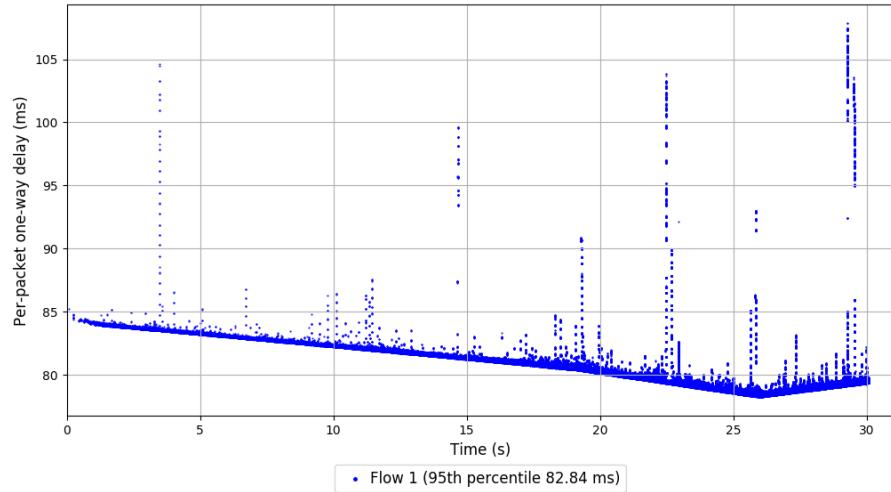
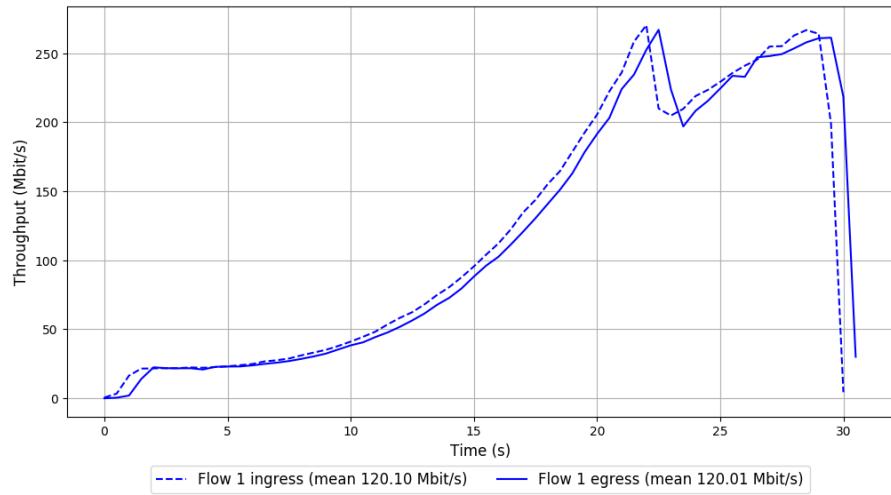


```
Run 1: Statistics of TCP Cubic
```

```
Start at: 2019-12-11 02:41:49
End at: 2019-12-11 02:42:20
Local clock offset: 4.071 ms
Remote clock offset: 24.746 ms

# Below is generated by plot.py at 2019-12-11 06:02:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 120.01 Mbit/s
95th percentile per-packet one-way delay: 82.837 ms
Loss rate: 0.09%
-- Flow 1:
Average throughput: 120.01 Mbit/s
95th percentile per-packet one-way delay: 82.837 ms
Loss rate: 0.09%
```

### Run 1: Report of TCP Cubic — Data Link

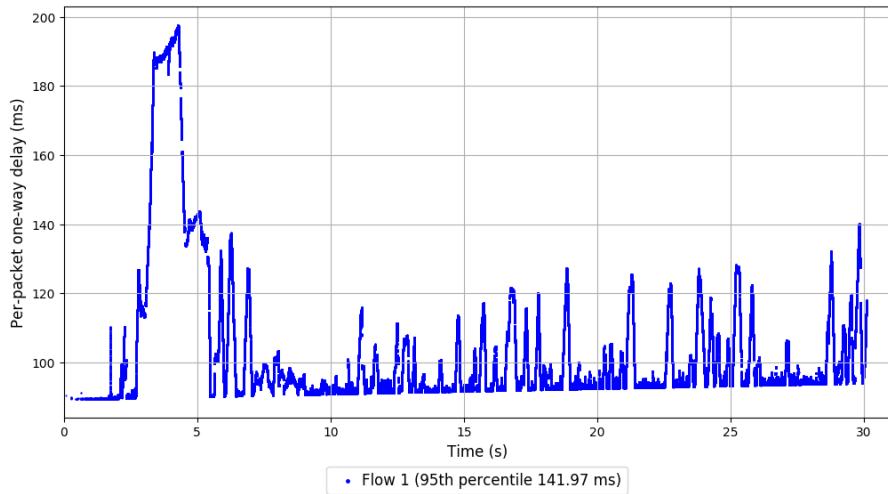
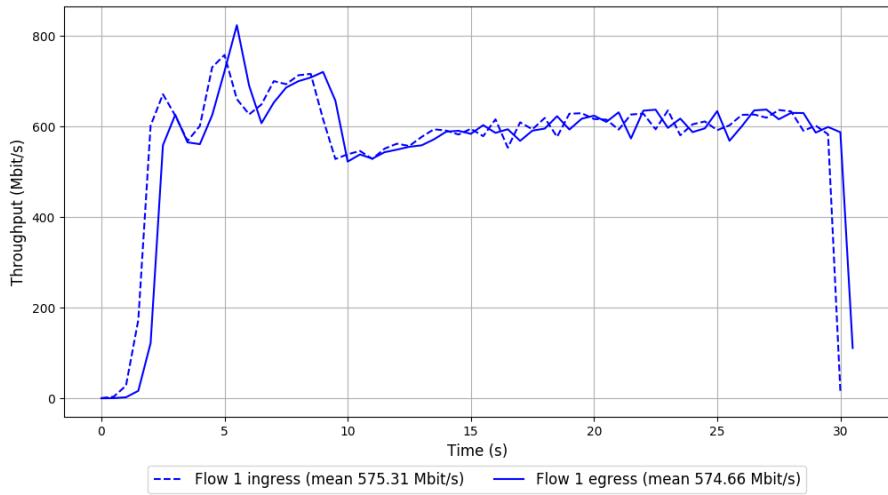


Run 2: Statistics of TCP Cubic

```
Start at: 2019-12-11 03:16:42
End at: 2019-12-11 03:17:12
Local clock offset: 17.142 ms
Remote clock offset: 56.183 ms

# Below is generated by plot.py at 2019-12-11 06:03:31
# Datalink statistics
-- Total of 1 flow:
Average throughput: 574.66 Mbit/s
95th percentile per-packet one-way delay: 141.967 ms
Loss rate: 0.10%
-- Flow 1:
Average throughput: 574.66 Mbit/s
95th percentile per-packet one-way delay: 141.967 ms
Loss rate: 0.10%
```

## Run 2: Report of TCP Cubic — Data Link

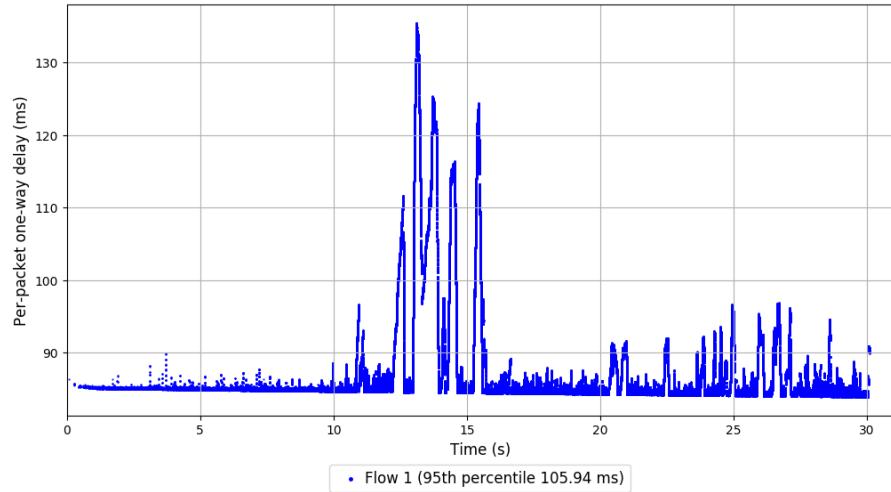
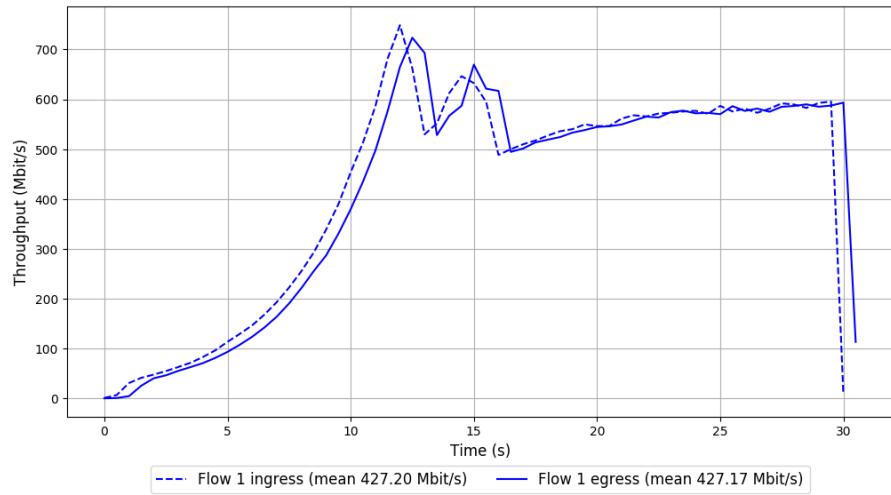


```
Run 3: Statistics of TCP Cubic
```

```
Start at: 2019-12-11 03:51:13
End at: 2019-12-11 03:51:43
Local clock offset: 20.885 ms
Remote clock offset: 24.15 ms

# Below is generated by plot.py at 2019-12-11 06:03:31
# Datalink statistics
-- Total of 1 flow:
Average throughput: 427.17 Mbit/s
95th percentile per-packet one-way delay: 105.935 ms
Loss rate: 0.01%
-- Flow 1:
Average throughput: 427.17 Mbit/s
95th percentile per-packet one-way delay: 105.935 ms
Loss rate: 0.01%
```

### Run 3: Report of TCP Cubic — Data Link

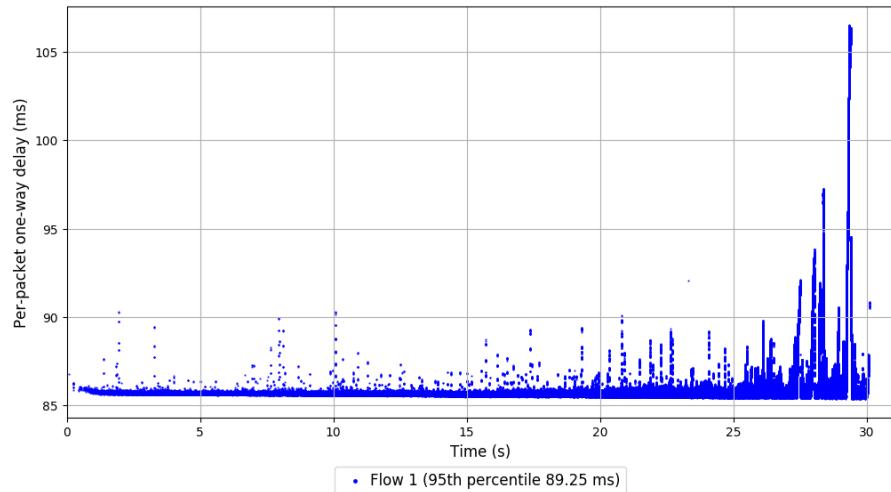
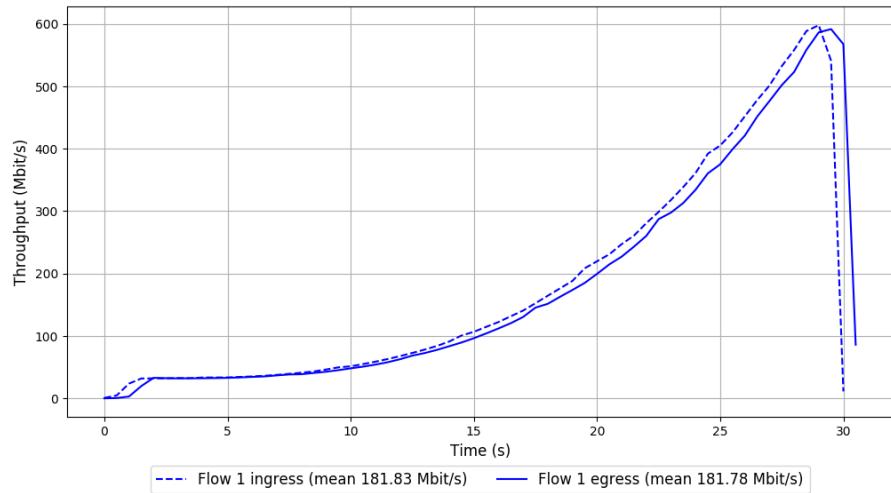


Run 4: Statistics of TCP Cubic

```
Start at: 2019-12-11 04:26:34
End at: 2019-12-11 04:27:04
Local clock offset: 9.422 ms
Remote clock offset: 9.918 ms

# Below is generated by plot.py at 2019-12-11 06:03:31
# Datalink statistics
-- Total of 1 flow:
Average throughput: 181.78 Mbit/s
95th percentile per-packet one-way delay: 89.248 ms
Loss rate: 0.02%
-- Flow 1:
Average throughput: 181.78 Mbit/s
95th percentile per-packet one-way delay: 89.248 ms
Loss rate: 0.02%
```

### Run 4: Report of TCP Cubic — Data Link

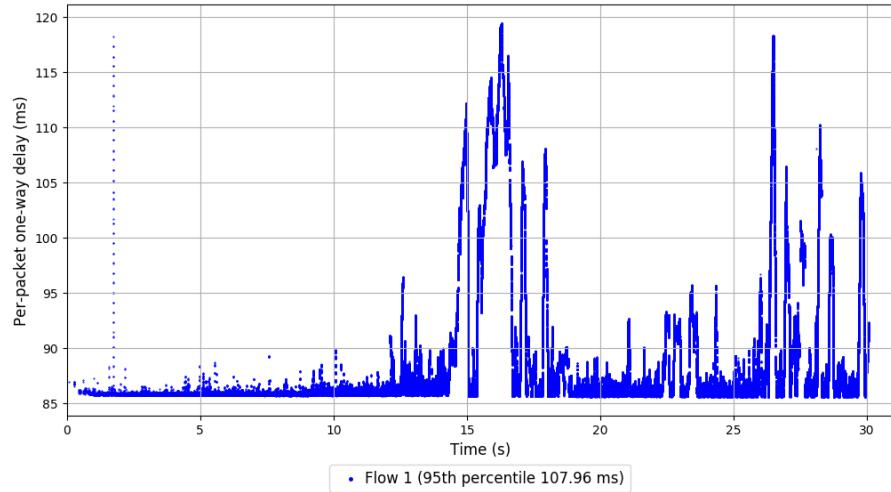
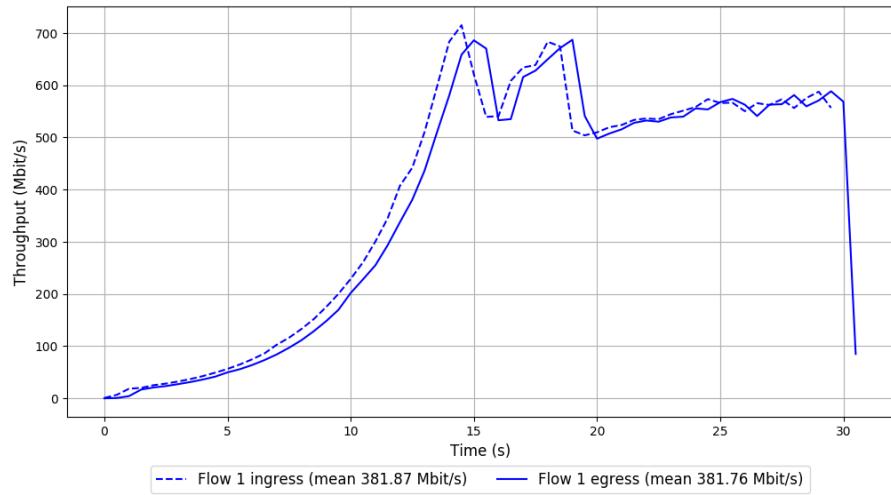


Run 5: Statistics of TCP Cubic

```
Start at: 2019-12-11 05:01:29
End at: 2019-12-11 05:01:59
Local clock offset: 3.806 ms
Remote clock offset: 3.52 ms

# Below is generated by plot.py at 2019-12-11 06:03:31
# Datalink statistics
-- Total of 1 flow:
Average throughput: 381.76 Mbit/s
95th percentile per-packet one-way delay: 107.962 ms
Loss rate: 0.03%
-- Flow 1:
Average throughput: 381.76 Mbit/s
95th percentile per-packet one-way delay: 107.962 ms
Loss rate: 0.03%
```

### Run 5: Report of TCP Cubic — Data Link

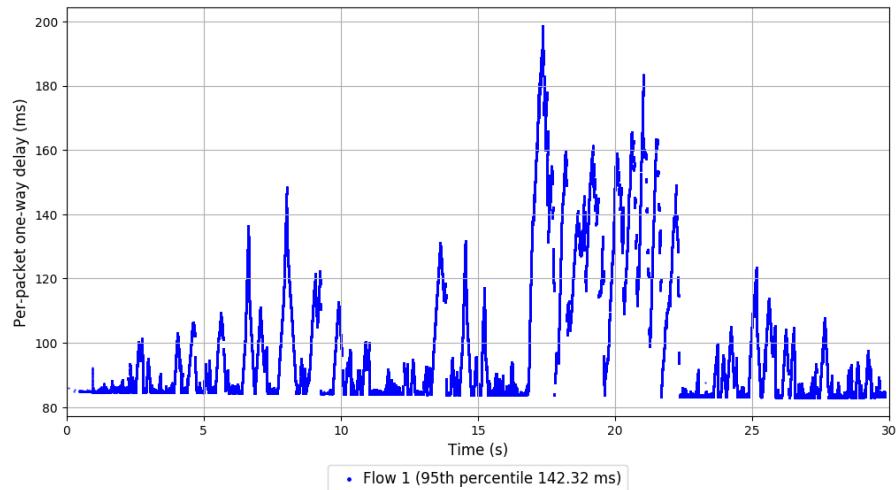
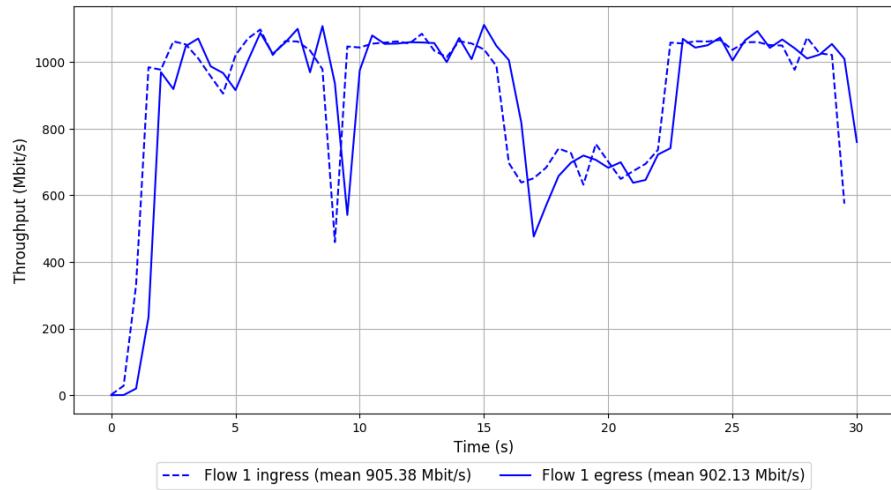


```
Run 1: Statistics of FillP

Start at: 2019-12-11 02:58:52
End at: 2019-12-11 02:59:22
Local clock offset: 10.646 ms
Remote clock offset: 34.581 ms

# Below is generated by plot.py at 2019-12-11 06:11:55
# Datalink statistics
-- Total of 1 flow:
Average throughput: 902.13 Mbit/s
95th percentile per-packet one-way delay: 142.324 ms
Loss rate: 0.37%
-- Flow 1:
Average throughput: 902.13 Mbit/s
95th percentile per-packet one-way delay: 142.324 ms
Loss rate: 0.37%
```

### Run 1: Report of FillP — Data Link

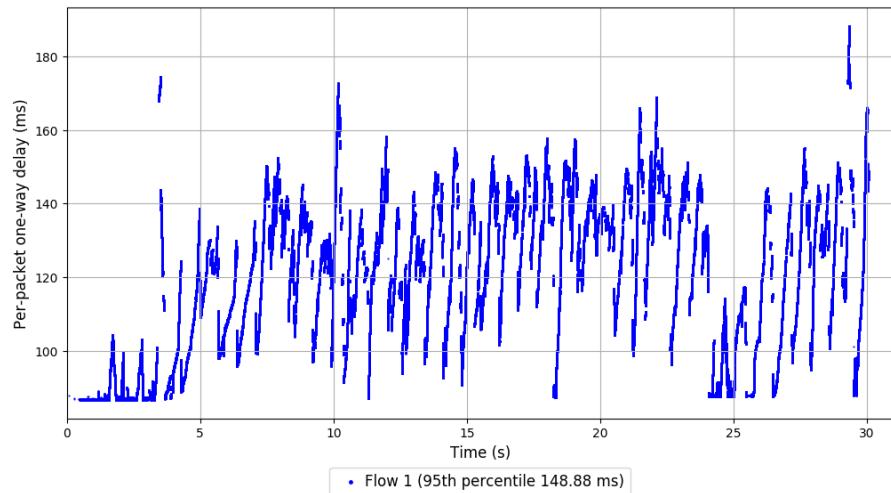
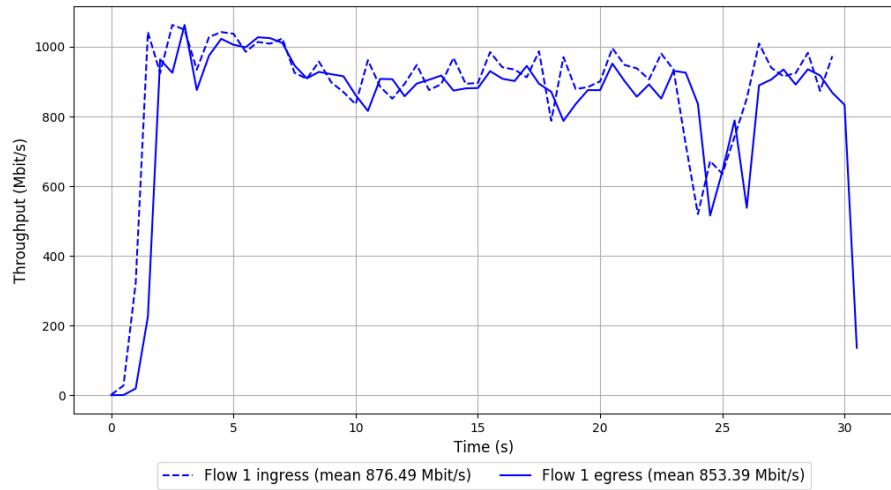


Run 2: Statistics of FillP

```
Start at: 2019-12-11 03:34:07
End at: 2019-12-11 03:34:37
Local clock offset: 22.024 ms
Remote clock offset: 26.516 ms

# Below is generated by plot.py at 2019-12-11 06:11:55
# Datalink statistics
-- Total of 1 flow:
Average throughput: 853.39 Mbit/s
95th percentile per-packet one-way delay: 148.880 ms
Loss rate: 2.62%
-- Flow 1:
Average throughput: 853.39 Mbit/s
95th percentile per-packet one-way delay: 148.880 ms
Loss rate: 2.62%
```

## Run 2: Report of FillP — Data Link

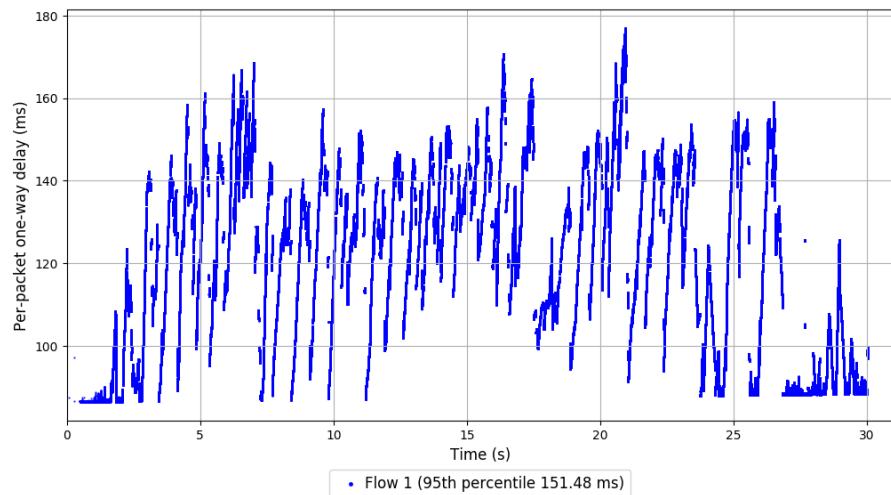
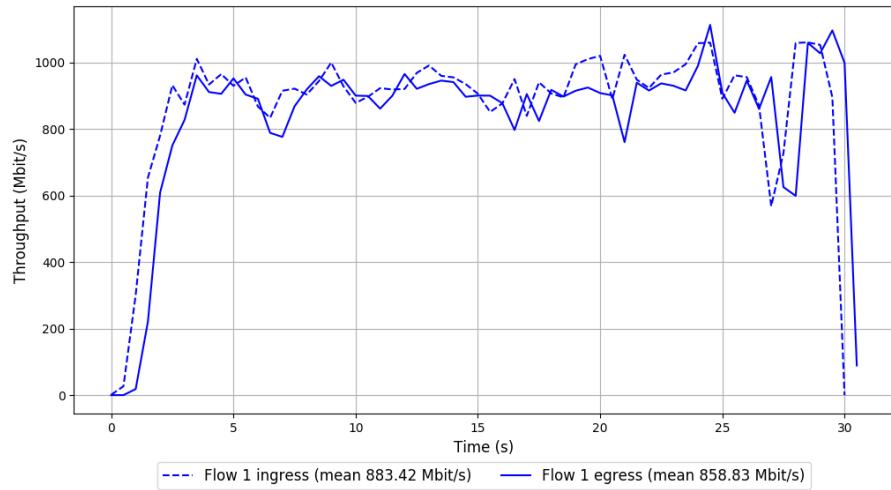


Run 3: Statistics of FillP

```
Start at: 2019-12-11 04:08:44
End at: 2019-12-11 04:09:14
Local clock offset: 12.894 ms
Remote clock offset: 36.755 ms

# Below is generated by plot.py at 2019-12-11 06:13:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 858.83 Mbit/s
95th percentile per-packet one-way delay: 151.476 ms
Loss rate: 3.01%
-- Flow 1:
Average throughput: 858.83 Mbit/s
95th percentile per-packet one-way delay: 151.476 ms
Loss rate: 3.01%
```

### Run 3: Report of FillP — Data Link

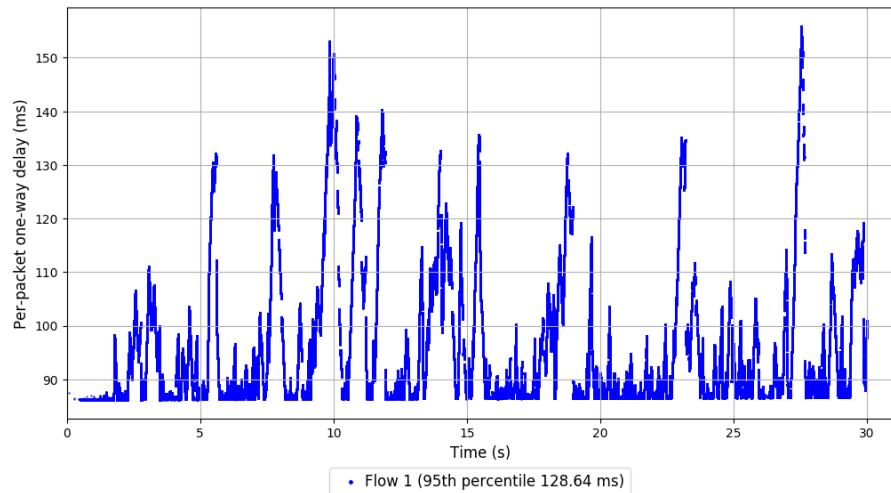
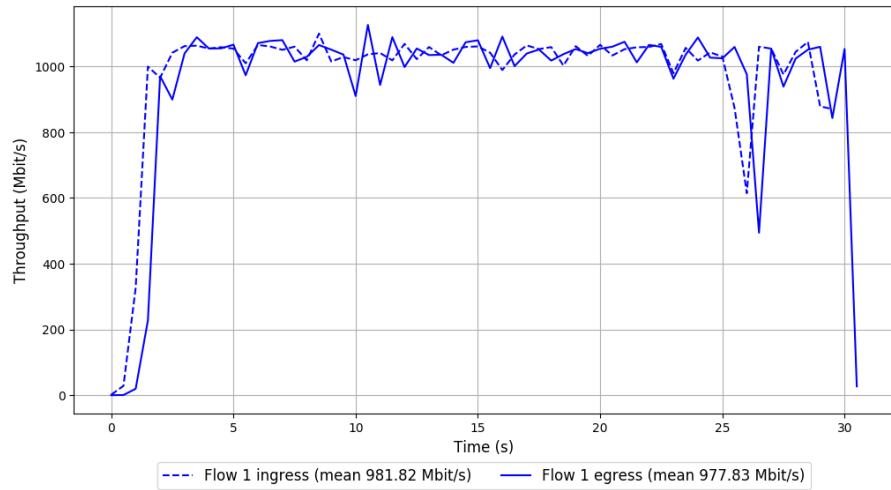


Run 4: Statistics of FillP

```
Start at: 2019-12-11 04:43:55
End at: 2019-12-11 04:44:25
Local clock offset: 6.011 ms
Remote clock offset: 8.679 ms

# Below is generated by plot.py at 2019-12-11 06:19:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 977.83 Mbit/s
95th percentile per-packet one-way delay: 128.636 ms
Loss rate: 0.41%
-- Flow 1:
Average throughput: 977.83 Mbit/s
95th percentile per-packet one-way delay: 128.636 ms
Loss rate: 0.41%
```

#### Run 4: Report of FillP — Data Link

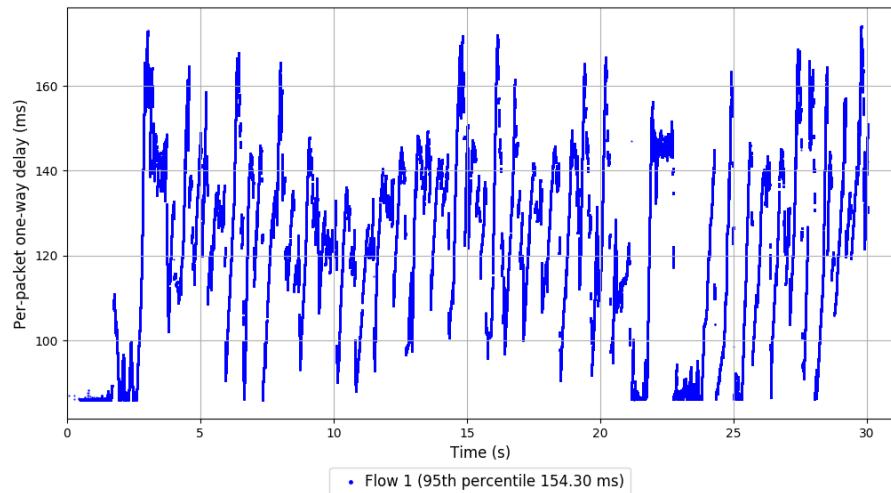
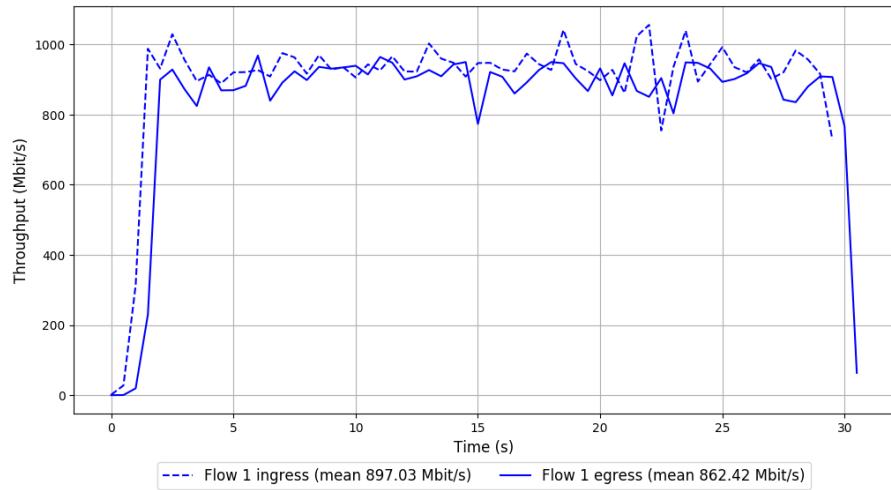


Run 5: Statistics of FillP

```
Start at: 2019-12-11 05:18:50
End at: 2019-12-11 05:19:20
Local clock offset: 1.579 ms
Remote clock offset: 3.427 ms

# Below is generated by plot.py at 2019-12-11 06:19:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 862.42 Mbit/s
95th percentile per-packet one-way delay: 154.299 ms
Loss rate: 3.86%
-- Flow 1:
Average throughput: 862.42 Mbit/s
95th percentile per-packet one-way delay: 154.299 ms
Loss rate: 3.86%
```

### Run 5: Report of FillP — Data Link

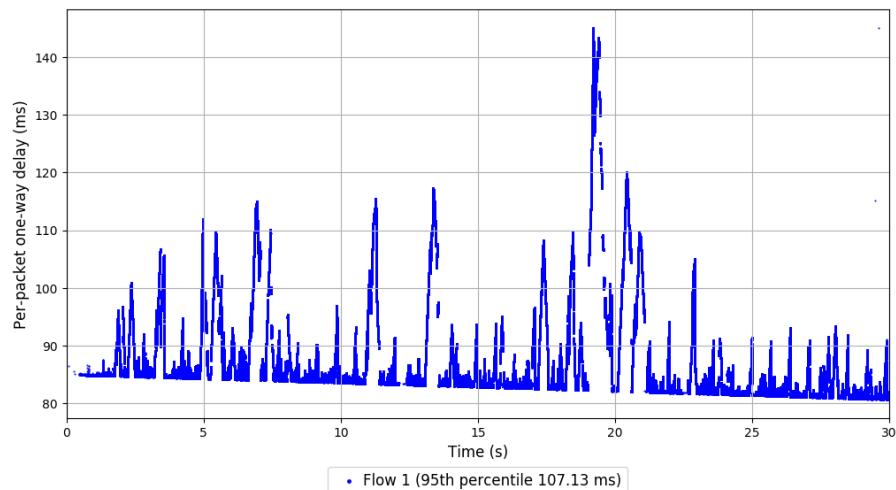
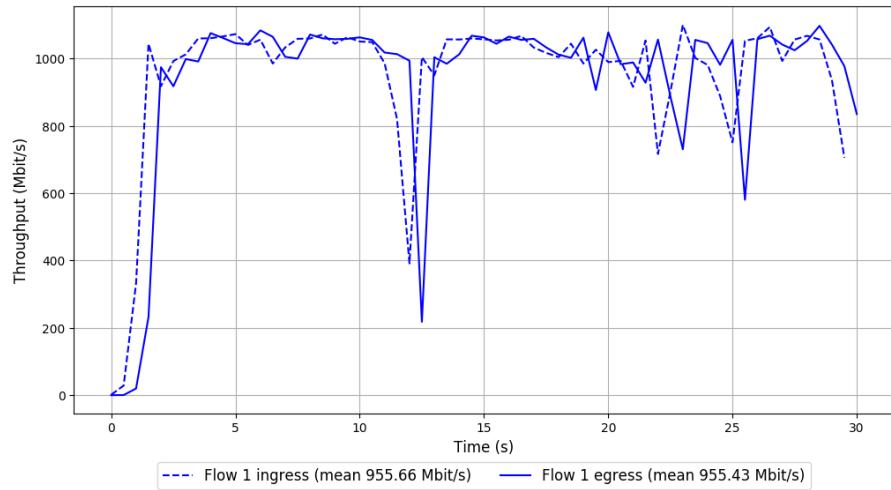


```
Run 1: Statistics of FillP-Sheep
```

```
Start at: 2019-12-11 02:45:35
End at: 2019-12-11 02:46:05
Local clock offset: 7.099 ms
Remote clock offset: 39.259 ms

# Below is generated by plot.py at 2019-12-11 06:19:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 955.43 Mbit/s
95th percentile per-packet one-way delay: 107.133 ms
Loss rate: 0.04%
-- Flow 1:
Average throughput: 955.43 Mbit/s
95th percentile per-packet one-way delay: 107.133 ms
Loss rate: 0.04%
```

### Run 1: Report of FillP-Sheep — Data Link

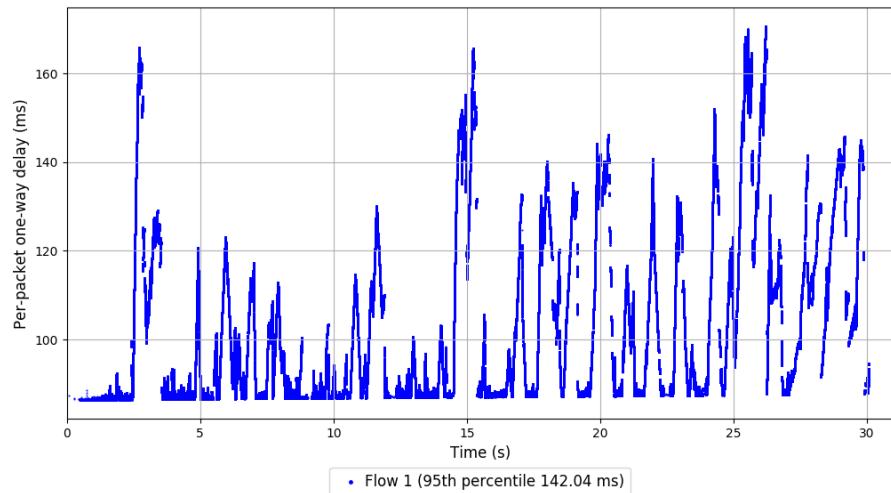
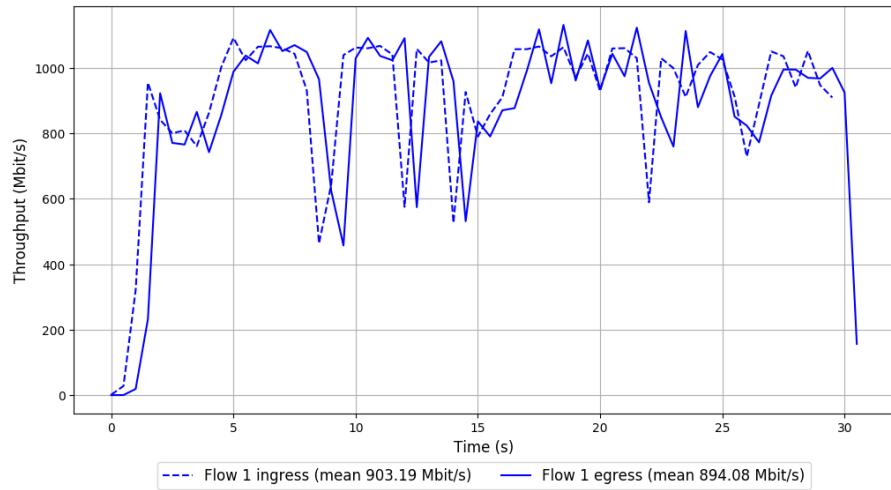


Run 2: Statistics of FillP-Sheep

```
Start at: 2019-12-11 03:21:06
End at: 2019-12-11 03:21:36
Local clock offset: 15.951 ms
Remote clock offset: 25.833 ms

# Below is generated by plot.py at 2019-12-11 06:19:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 894.08 Mbit/s
95th percentile per-packet one-way delay: 142.045 ms
Loss rate: 1.01%
-- Flow 1:
Average throughput: 894.08 Mbit/s
95th percentile per-packet one-way delay: 142.045 ms
Loss rate: 1.01%
```

## Run 2: Report of FillP-Sheep — Data Link

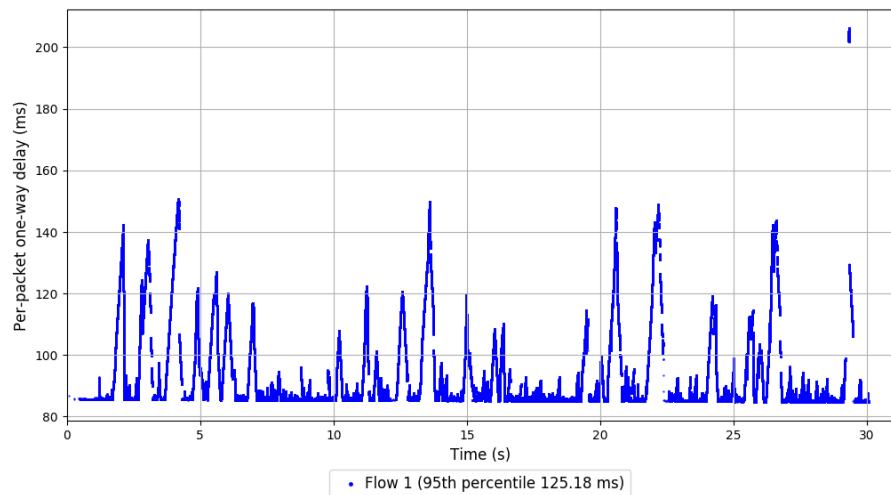
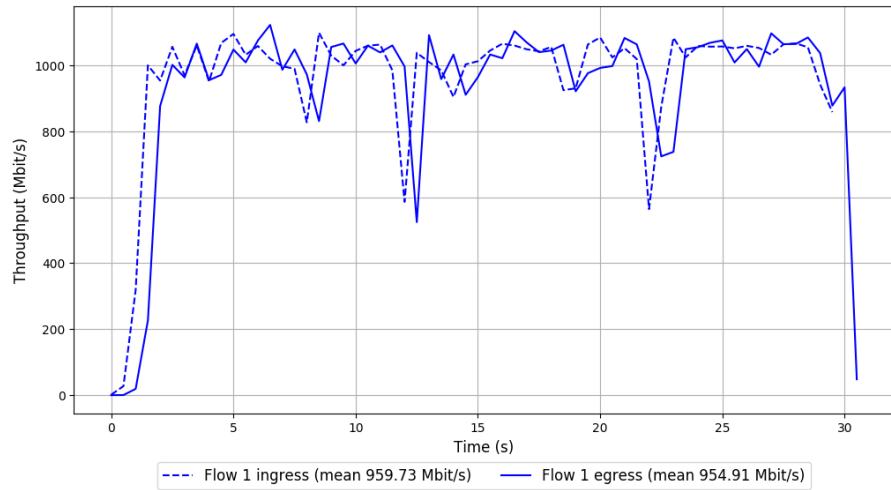


Run 3: Statistics of FillP-Sheep

```
Start at: 2019-12-11 03:55:30
End at: 2019-12-11 03:56:00
Local clock offset: 15.51 ms
Remote clock offset: 27.954 ms

# Below is generated by plot.py at 2019-12-11 06:20:46
# Datalink statistics
-- Total of 1 flow:
Average throughput: 954.91 Mbit/s
95th percentile per-packet one-way delay: 125.184 ms
Loss rate: 0.51%
-- Flow 1:
Average throughput: 954.91 Mbit/s
95th percentile per-packet one-way delay: 125.184 ms
Loss rate: 0.51%
```

### Run 3: Report of FillP-Sheep — Data Link

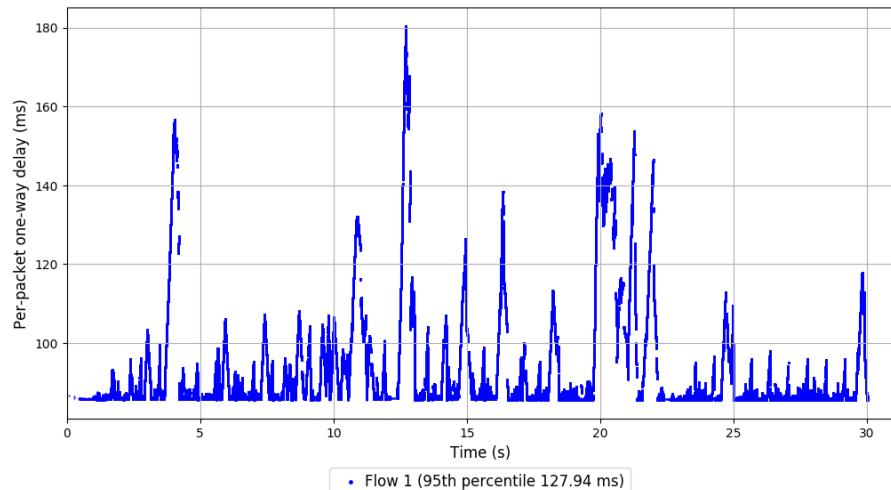
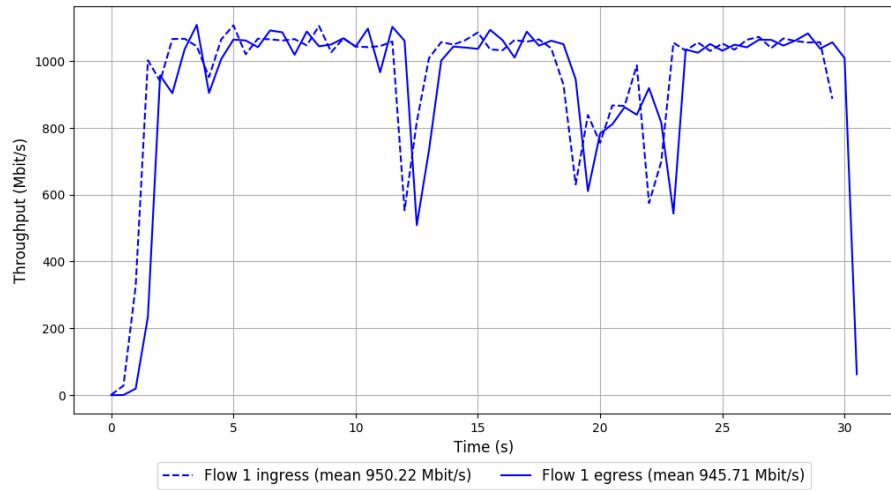


Run 4: Statistics of FillP-Sheep

```
Start at: 2019-12-11 04:30:41
End at: 2019-12-11 04:31:11
Local clock offset: 7.234 ms
Remote clock offset: 9.376 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 945.71 Mbit/s
95th percentile per-packet one-way delay: 127.935 ms
Loss rate: 0.48%
-- Flow 1:
Average throughput: 945.71 Mbit/s
95th percentile per-packet one-way delay: 127.935 ms
Loss rate: 0.48%
```

Run 4: Report of FillP-Sheep — Data Link

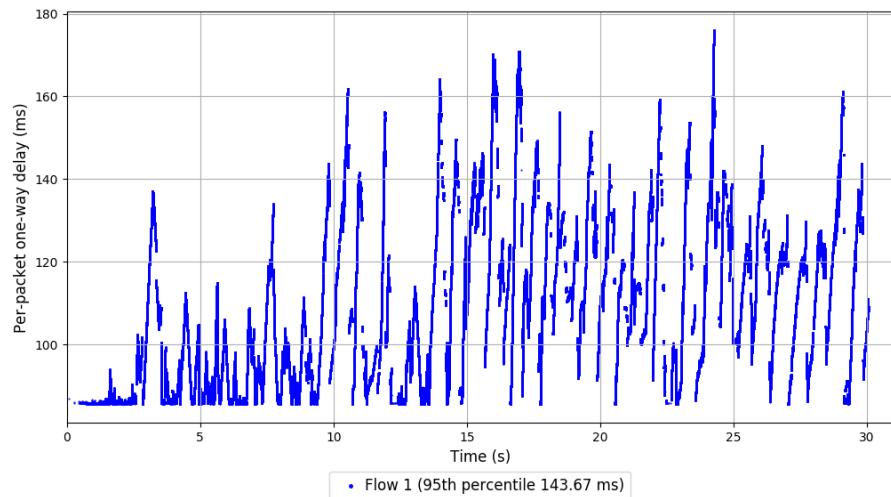
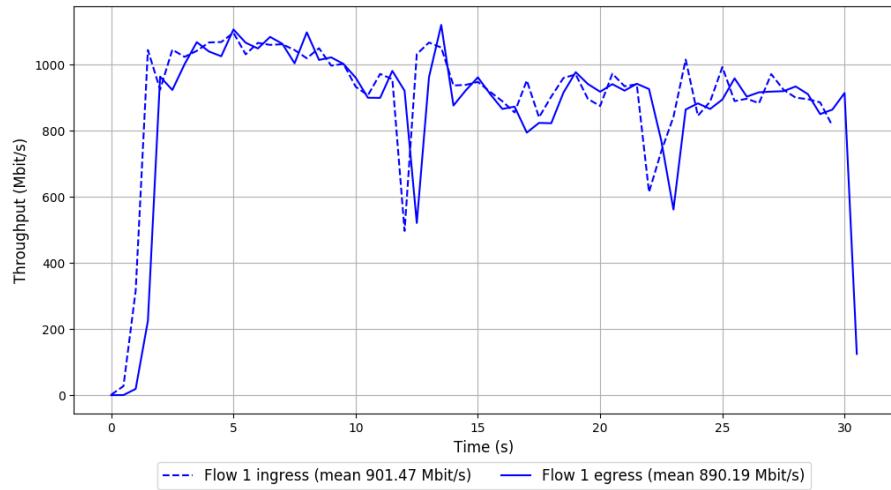


Run 5: Statistics of FillP-Sheep

```
Start at: 2019-12-11 05:05:45
End at: 2019-12-11 05:06:15
Local clock offset: 2.7 ms
Remote clock offset: 3.612 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 890.19 Mbit/s
95th percentile per-packet one-way delay: 143.669 ms
Loss rate: 1.30%
-- Flow 1:
Average throughput: 890.19 Mbit/s
95th percentile per-packet one-way delay: 143.669 ms
Loss rate: 1.30%
```

Run 5: Report of FillP-Sheep — Data Link

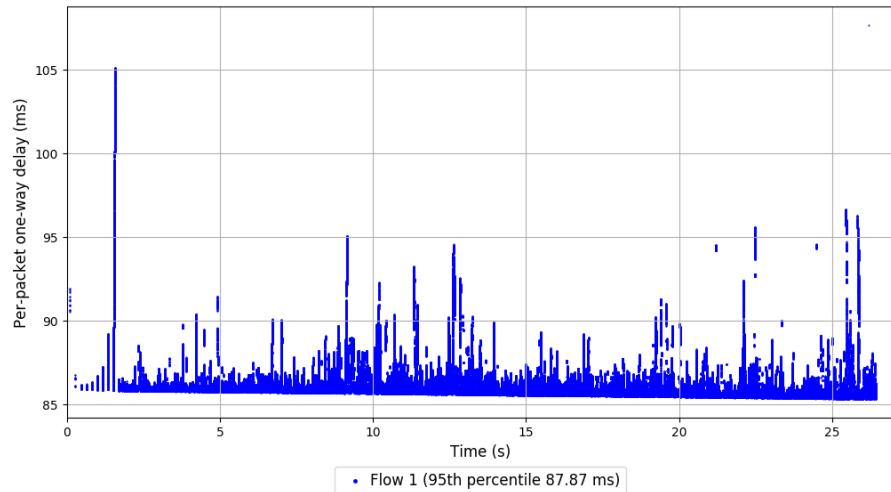
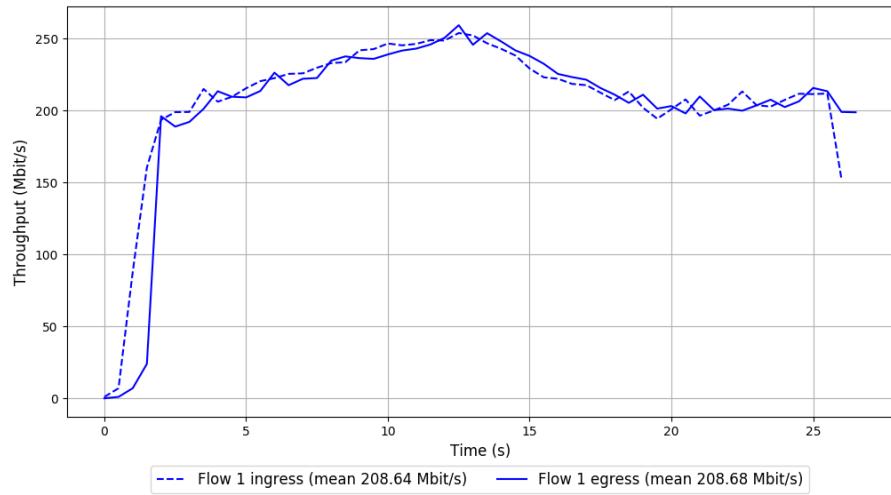


Run 1: Statistics of Indigo

```
Start at: 2019-12-11 03:08:53
End at: 2019-12-11 03:09:23
Local clock offset: 17.368 ms
Remote clock offset: 34.325 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 208.68 Mbit/s
95th percentile per-packet one-way delay: 87.873 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 208.68 Mbit/s
95th percentile per-packet one-way delay: 87.873 ms
Loss rate: 0.00%
```

## Run 1: Report of Indigo — Data Link

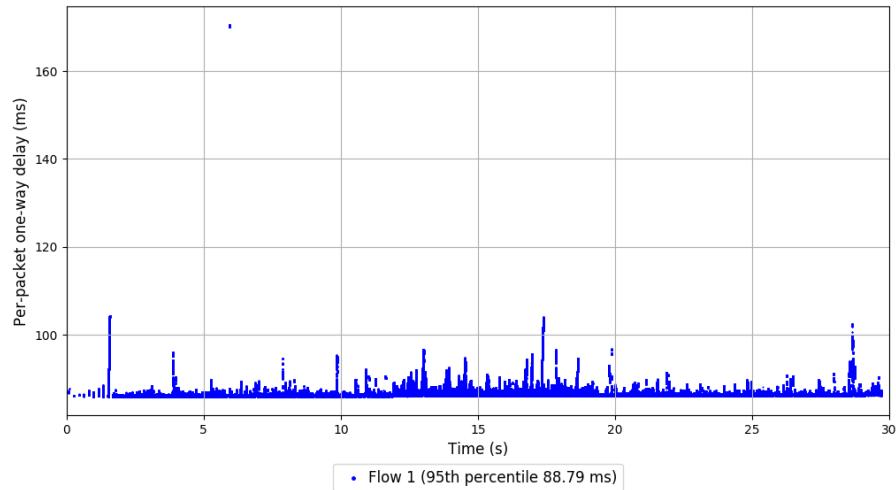
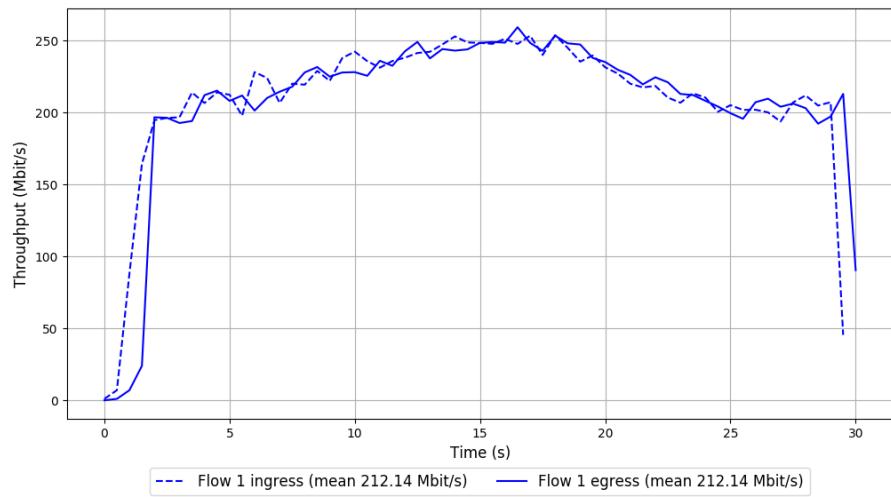


Run 2: Statistics of Indigo

```
Start at: 2019-12-11 03:43:28
End at: 2019-12-11 03:43:58
Local clock offset: 30.09 ms
Remote clock offset: 20.231 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 212.14 Mbit/s
95th percentile per-packet one-way delay: 88.794 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 212.14 Mbit/s
95th percentile per-packet one-way delay: 88.794 ms
Loss rate: 0.00%
```

Run 2: Report of Indigo — Data Link

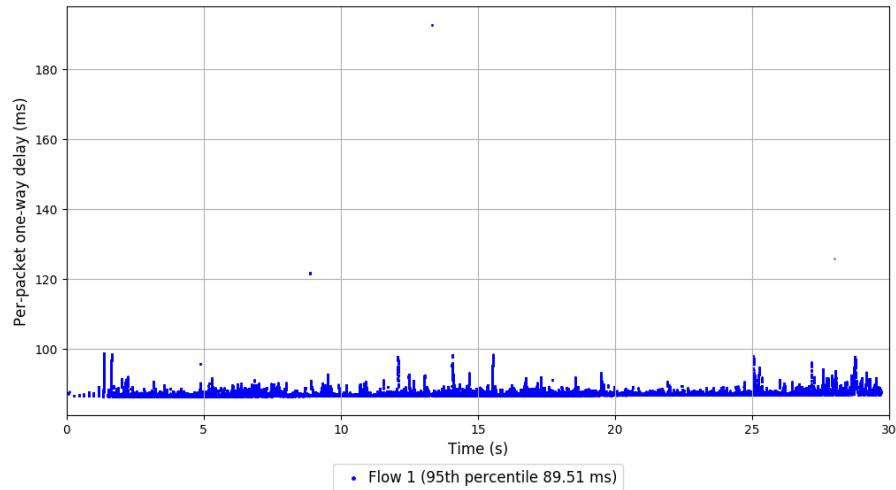
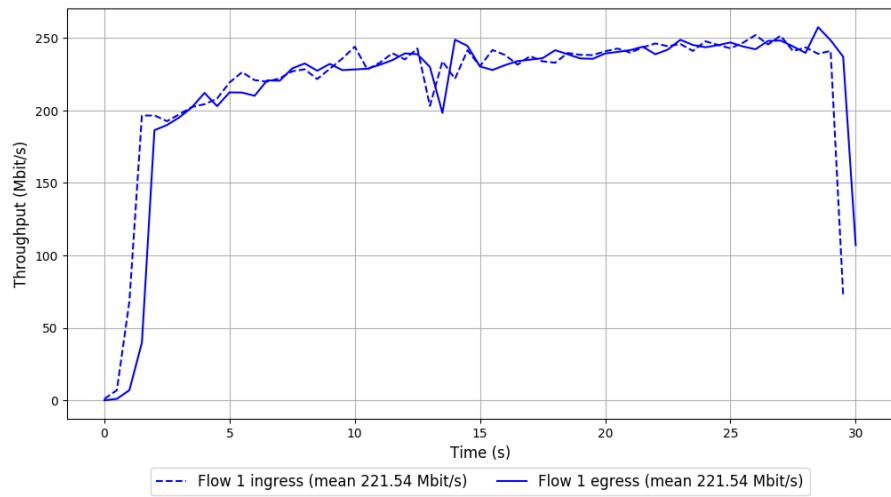


Run 3: Statistics of Indigo

```
Start at: 2019-12-11 04:18:52
End at: 2019-12-11 04:19:22
Local clock offset: 15.672 ms
Remote clock offset: 14.32 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 221.54 Mbit/s
95th percentile per-packet one-way delay: 89.513 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 221.54 Mbit/s
95th percentile per-packet one-way delay: 89.513 ms
Loss rate: 0.00%
```

### Run 3: Report of Indigo — Data Link

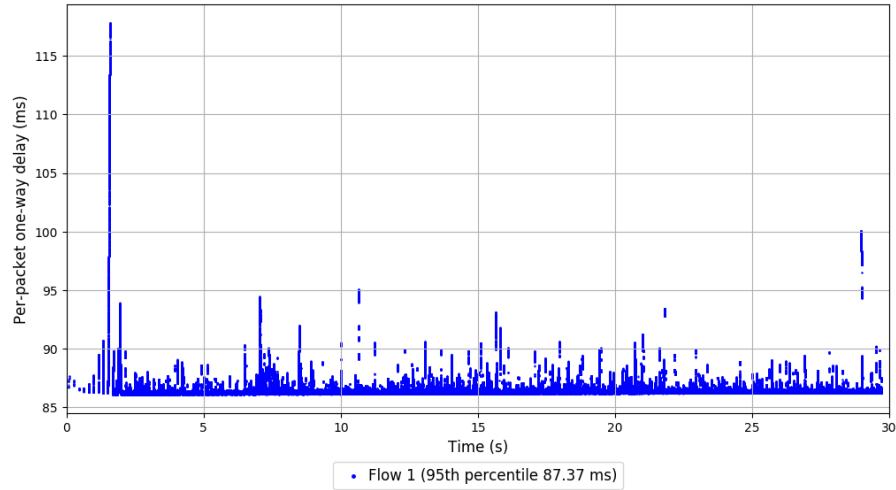
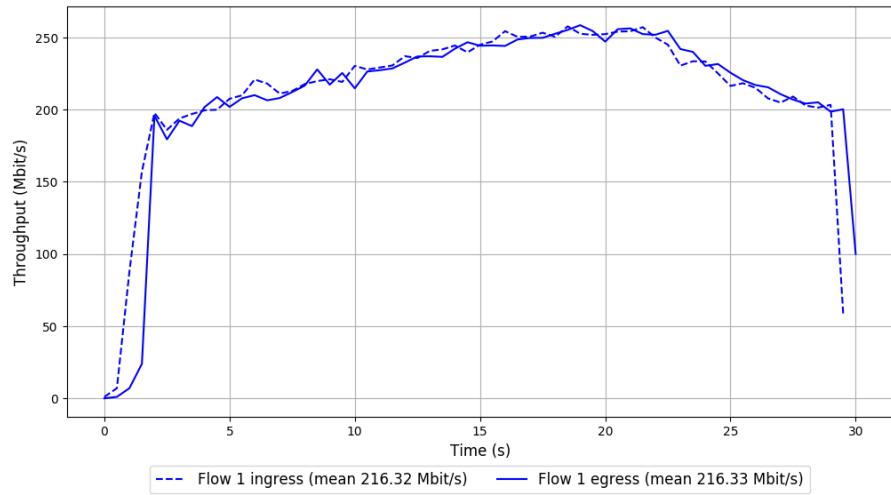


Run 4: Statistics of Indigo

```
Start at: 2019-12-11 04:53:57
End at: 2019-12-11 04:54:27
Local clock offset: 7.441 ms
Remote clock offset: 4.117 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 216.33 Mbit/s
95th percentile per-packet one-way delay: 87.366 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 216.33 Mbit/s
95th percentile per-packet one-way delay: 87.366 ms
Loss rate: 0.00%
```

## Run 4: Report of Indigo — Data Link

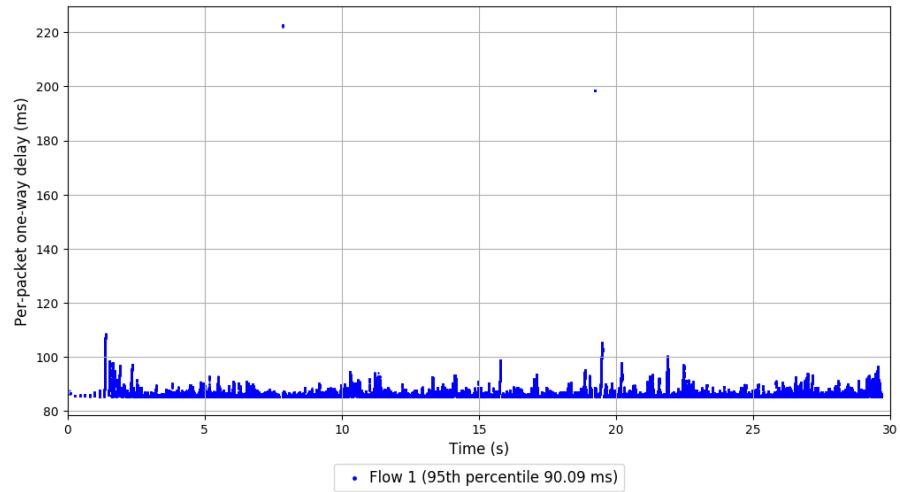
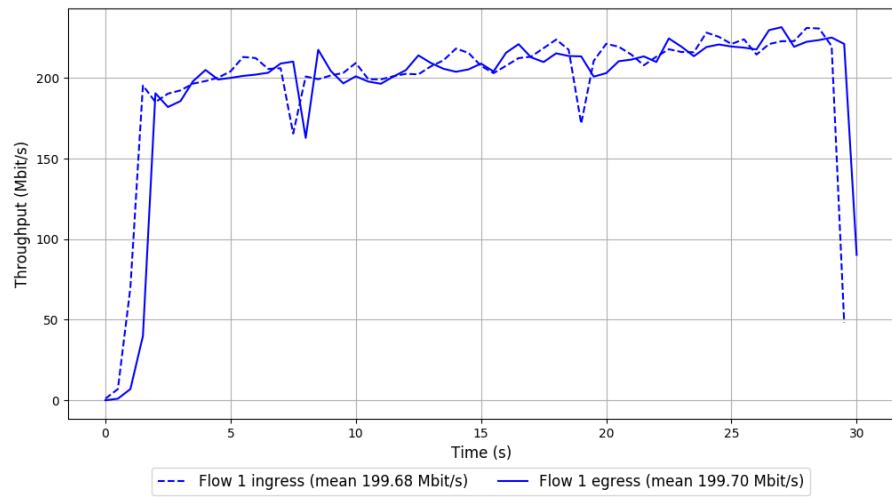


Run 5: Statistics of Indigo

```
Start at: 2019-12-11 05:28:45
End at: 2019-12-11 05:29:15
Local clock offset: 2.114 ms
Remote clock offset: 1.723 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 199.70 Mbit/s
95th percentile per-packet one-way delay: 90.091 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 199.70 Mbit/s
95th percentile per-packet one-way delay: 90.091 ms
Loss rate: 0.00%
```

## Run 5: Report of Indigo — Data Link

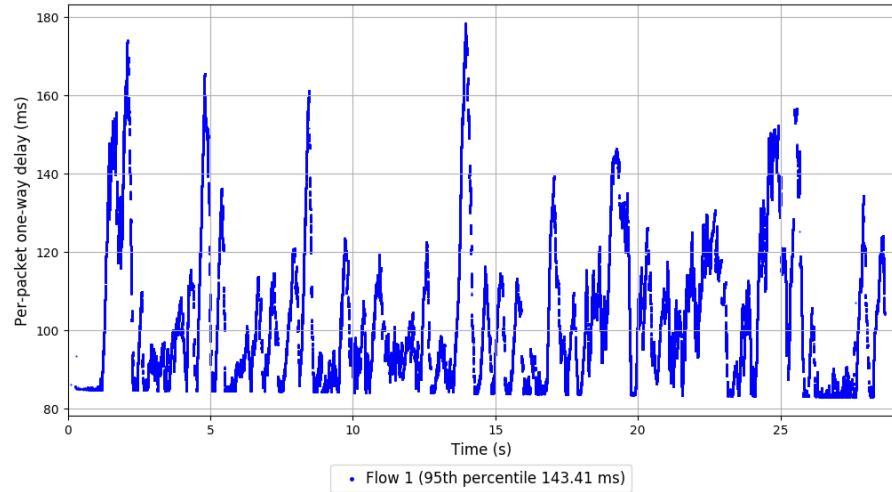
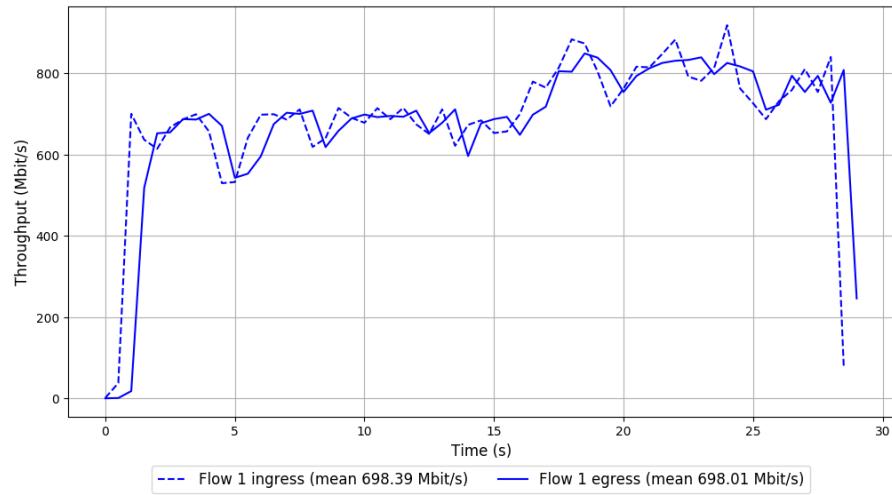


Run 1: Statistics of Indigo-MusesC3

```
Start at: 2019-12-11 03:13:27
End at: 2019-12-11 03:13:57
Local clock offset: 20.377 ms
Remote clock offset: 46.602 ms

# Below is generated by plot.py at 2019-12-11 06:30:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 698.01 Mbit/s
95th percentile per-packet one-way delay: 143.414 ms
Loss rate: 0.06%
-- Flow 1:
Average throughput: 698.01 Mbit/s
95th percentile per-packet one-way delay: 143.414 ms
Loss rate: 0.06%
```

## Run 1: Report of Indigo-MusesC3 — Data Link

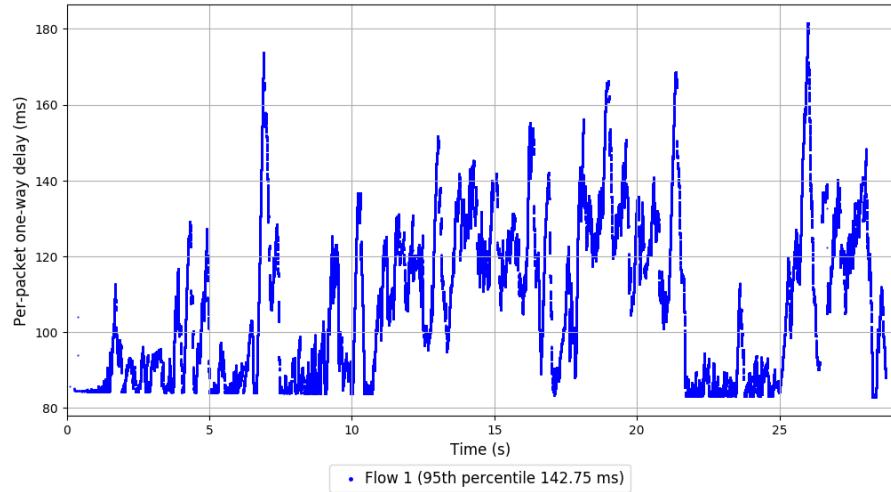
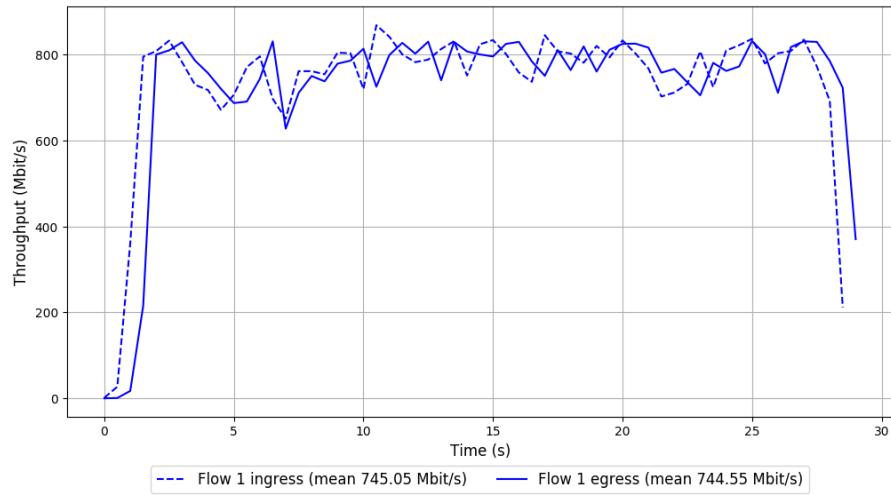


Run 2: Statistics of Indigo-MusesC3

```
Start at: 2019-12-11 03:47:59
End at: 2019-12-11 03:48:29
Local clock offset: 28.461 ms
Remote clock offset: 21.969 ms

# Below is generated by plot.py at 2019-12-11 06:32:27
# Datalink statistics
-- Total of 1 flow:
Average throughput: 744.55 Mbit/s
95th percentile per-packet one-way delay: 142.747 ms
Loss rate: 0.07%
-- Flow 1:
Average throughput: 744.55 Mbit/s
95th percentile per-packet one-way delay: 142.747 ms
Loss rate: 0.07%
```

## Run 2: Report of Indigo-MusesC3 — Data Link

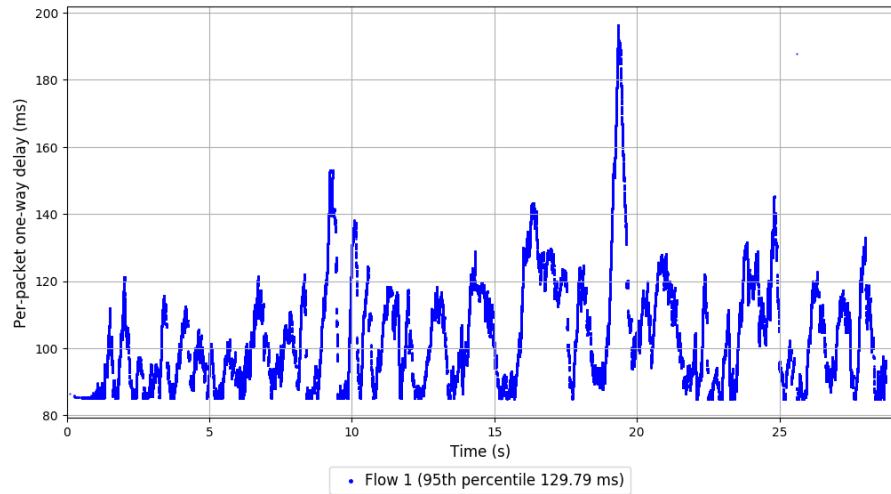
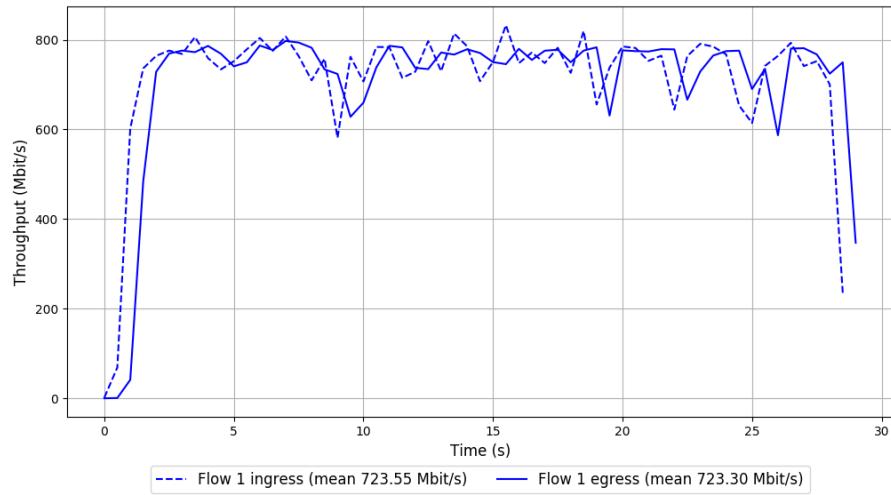


Run 3: Statistics of Indigo-MusesC3

```
Start at: 2019-12-11 04:23:19
End at: 2019-12-11 04:23:49
Local clock offset: 12.827 ms
Remote clock offset: 11.038 ms

# Below is generated by plot.py at 2019-12-11 06:34:28
# Datalink statistics
-- Total of 1 flow:
Average throughput: 723.30 Mbit/s
95th percentile per-packet one-way delay: 129.794 ms
Loss rate: 0.03%
-- Flow 1:
Average throughput: 723.30 Mbit/s
95th percentile per-packet one-way delay: 129.794 ms
Loss rate: 0.03%
```

### Run 3: Report of Indigo-MusesC3 — Data Link

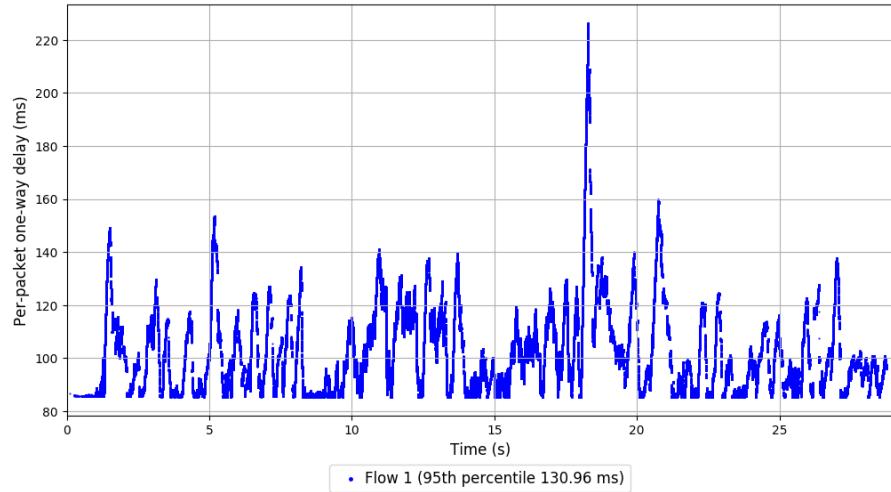
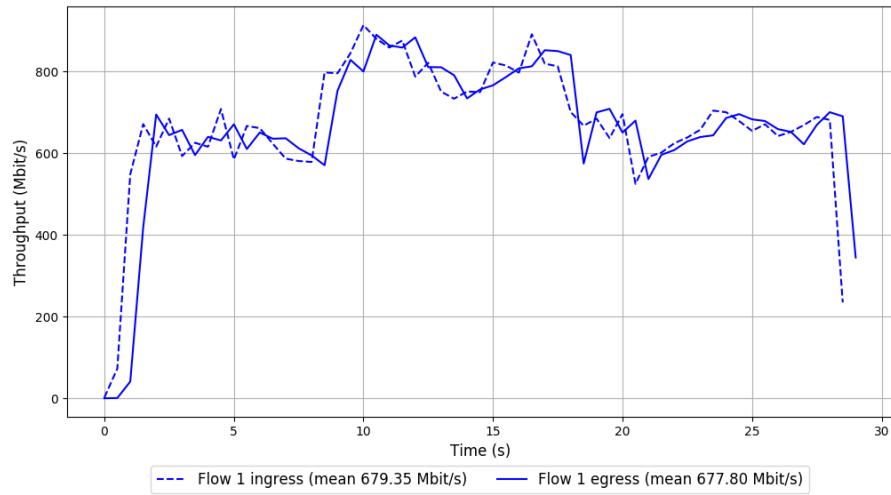


Run 4: Statistics of Indigo-MusesC3

```
Start at: 2019-12-11 04:58:14
End at: 2019-12-11 04:58:44
Local clock offset: 5.372 ms
Remote clock offset: 3.656 ms

# Below is generated by plot.py at 2019-12-11 06:35:00
# Datalink statistics
-- Total of 1 flow:
Average throughput: 677.80 Mbit/s
95th percentile per-packet one-way delay: 130.960 ms
Loss rate: 0.23%
-- Flow 1:
Average throughput: 677.80 Mbit/s
95th percentile per-packet one-way delay: 130.960 ms
Loss rate: 0.23%
```

## Run 4: Report of Indigo-MusesC3 — Data Link

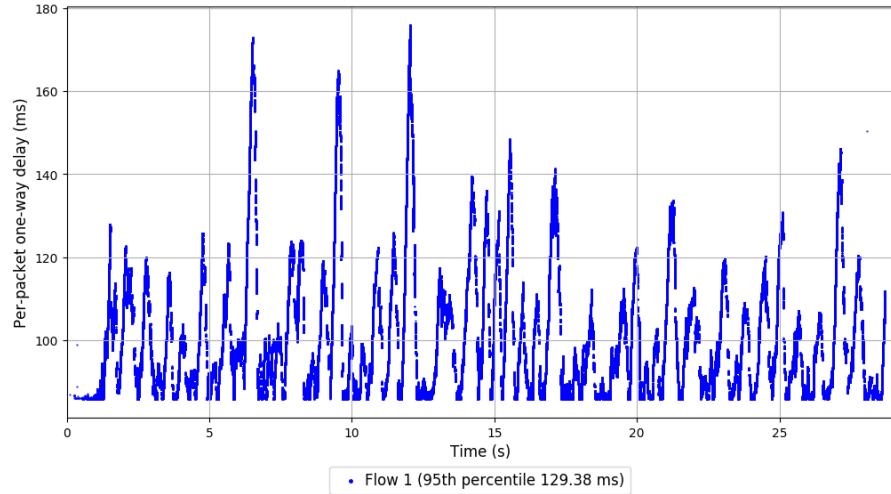
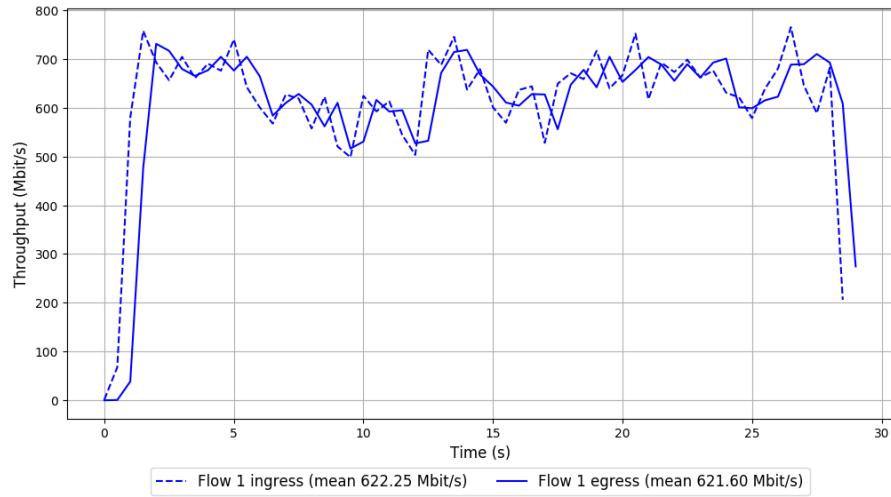


Run 5: Statistics of Indigo-MusesC3

```
Start at: 2019-12-11 05:33:10
End at: 2019-12-11 05:38:40
Local clock offset: 1.057 ms
Remote clock offset: 1.626 ms

# Below is generated by plot.py at 2019-12-11 06:35:00
# Datalink statistics
-- Total of 1 flow:
Average throughput: 621.60 Mbit/s
95th percentile per-packet one-way delay: 129.383 ms
Loss rate: 0.10%
-- Flow 1:
Average throughput: 621.60 Mbit/s
95th percentile per-packet one-way delay: 129.383 ms
Loss rate: 0.10%
```

## Run 5: Report of Indigo-MusesC3 — Data Link

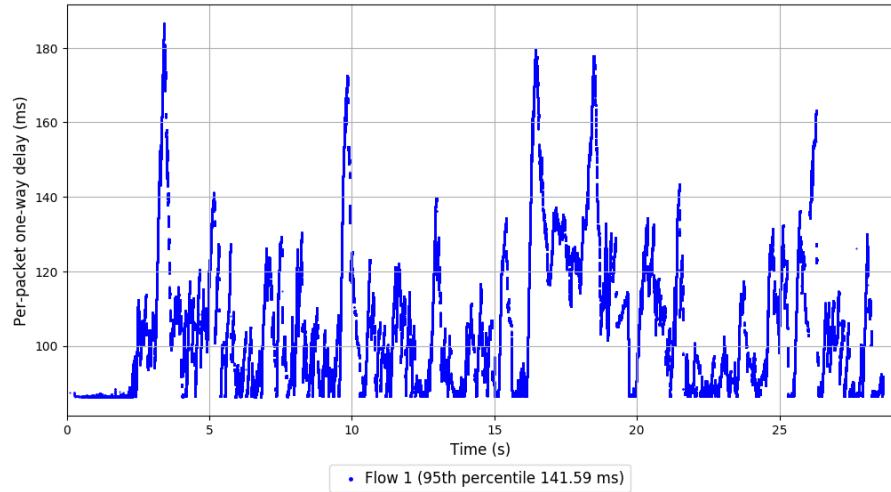
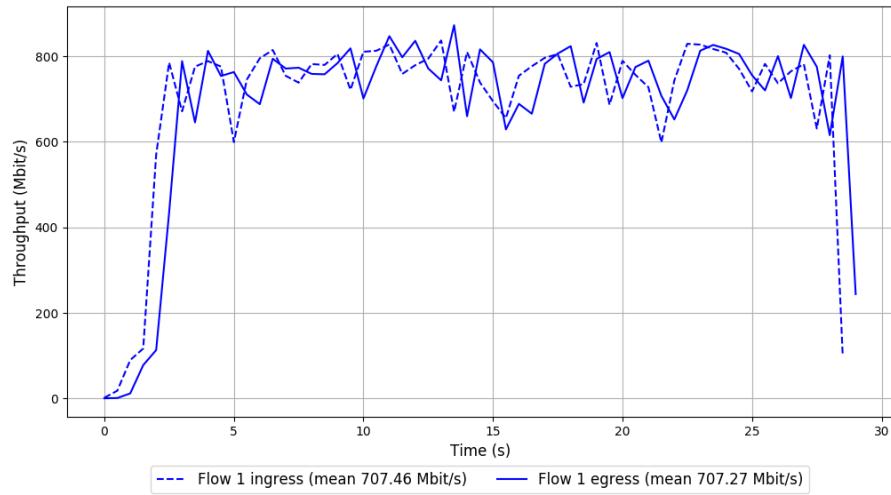


Run 1: Statistics of Indigo-MusesC5

```
Start at: 2019-12-11 02:48:26
End at: 2019-12-11 02:48:56
Local clock offset: 7.118 ms
Remote clock offset: 20.073 ms

# Below is generated by plot.py at 2019-12-11 06:35:33
# Datalink statistics
-- Total of 1 flow:
Average throughput: 707.27 Mbit/s
95th percentile per-packet one-way delay: 141.589 ms
Loss rate: 0.02%
-- Flow 1:
Average throughput: 707.27 Mbit/s
95th percentile per-packet one-way delay: 141.589 ms
Loss rate: 0.02%
```

Run 1: Report of Indigo-MusesC5 — Data Link

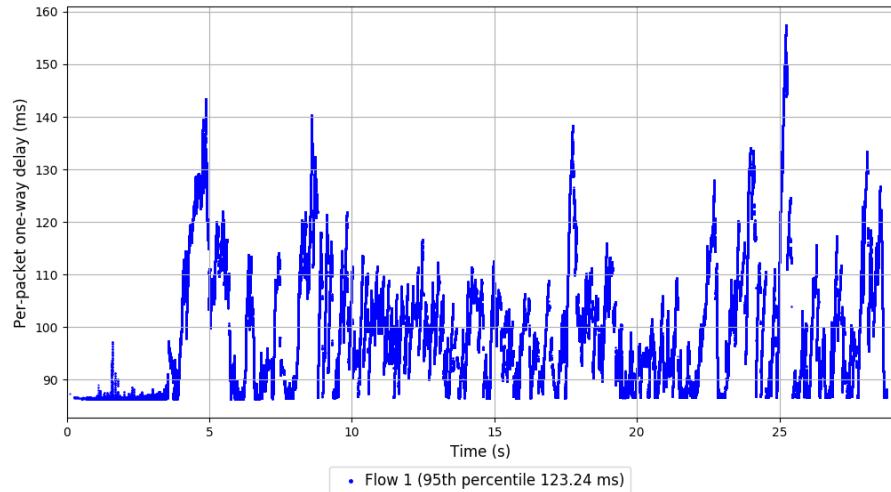
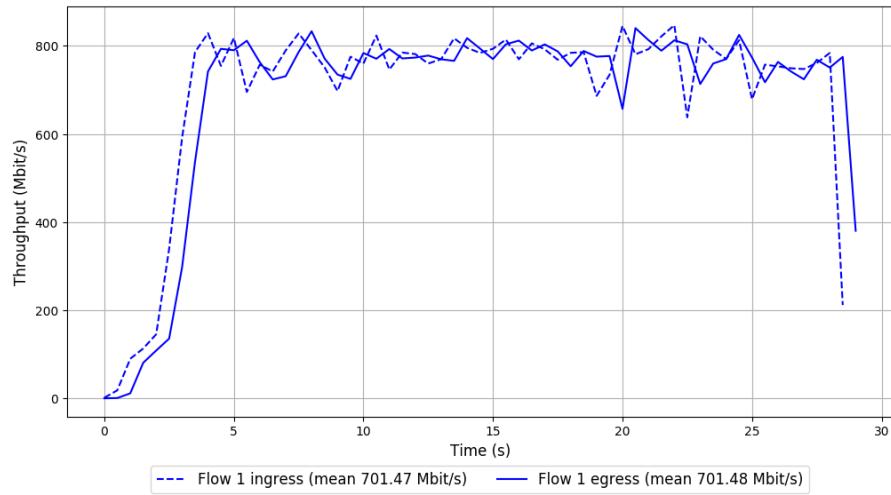


Run 2: Statistics of Indigo-MusesC5

```
Start at: 2019-12-11 03:23:55
End at: 2019-12-11 03:24:25
Local clock offset: 16.418 ms
Remote clock offset: 21.242 ms

# Below is generated by plot.py at 2019-12-11 06:39:56
# Datalink statistics
-- Total of 1 flow:
Average throughput: 701.48 Mbit/s
95th percentile per-packet one-way delay: 123.241 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 701.48 Mbit/s
95th percentile per-packet one-way delay: 123.241 ms
Loss rate: 0.00%
```

## Run 2: Report of Indigo-MusesC5 — Data Link

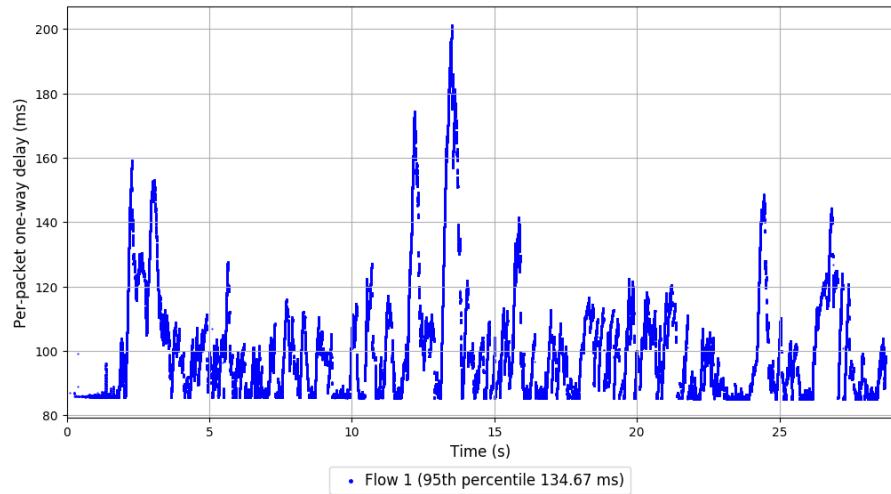
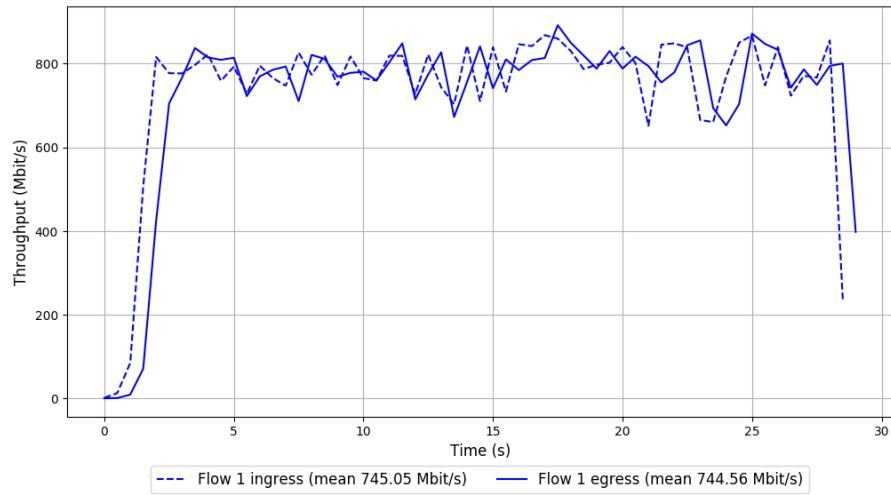


Run 3: Statistics of Indigo-MusesC5

```
Start at: 2019-12-11 03:58:21
End at: 2019-12-11 03:58:51
Local clock offset: 13.583 ms
Remote clock offset: 30.674 ms

# Below is generated by plot.py at 2019-12-11 06:41:10
# Datalink statistics
-- Total of 1 flow:
Average throughput: 744.56 Mbit/s
95th percentile per-packet one-way delay: 134.670 ms
Loss rate: 0.07%
-- Flow 1:
Average throughput: 744.56 Mbit/s
95th percentile per-packet one-way delay: 134.670 ms
Loss rate: 0.07%
```

### Run 3: Report of Indigo-MusesC5 — Data Link

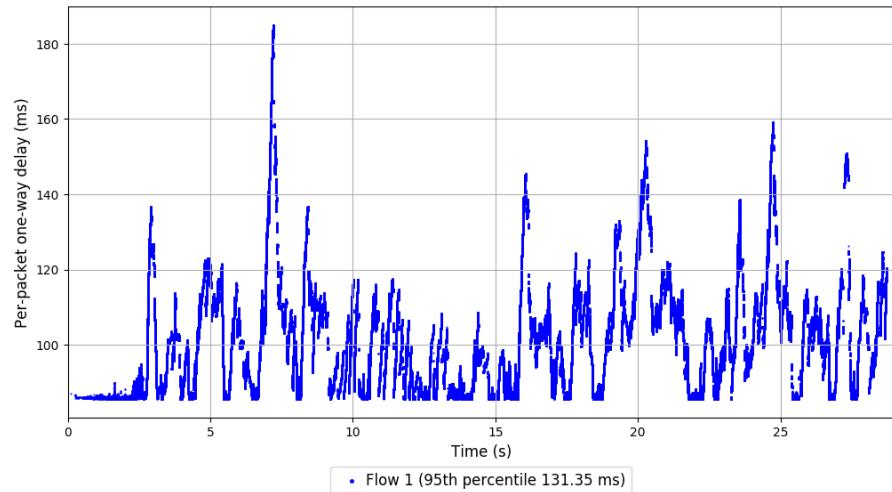
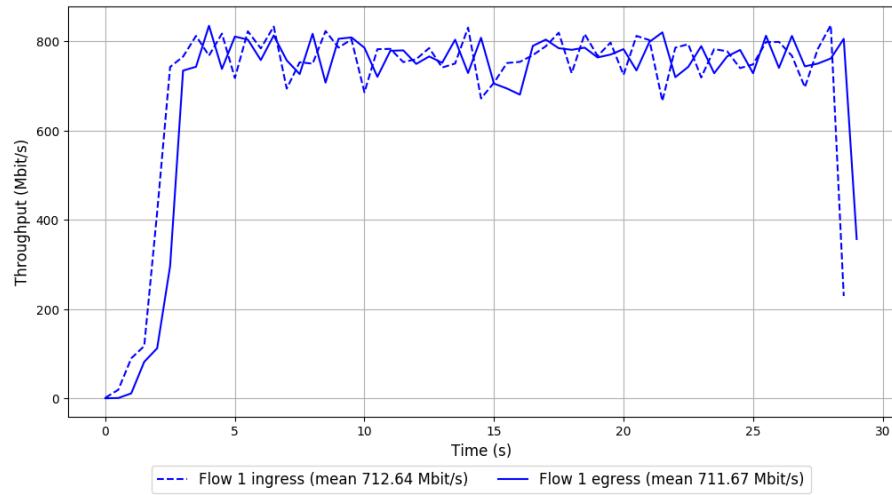


Run 4: Statistics of Indigo-MusesC5

```
Start at: 2019-12-11 04:33:33
End at: 2019-12-11 04:34:03
Local clock offset: 6.4 ms
Remote clock offset: 9.42 ms

# Below is generated by plot.py at 2019-12-11 06:41:10
# Datalink statistics
-- Total of 1 flow:
Average throughput: 711.67 Mbit/s
95th percentile per-packet one-way delay: 131.352 ms
Loss rate: 0.14%
-- Flow 1:
Average throughput: 711.67 Mbit/s
95th percentile per-packet one-way delay: 131.352 ms
Loss rate: 0.14%
```

Run 4: Report of Indigo-MusesC5 — Data Link

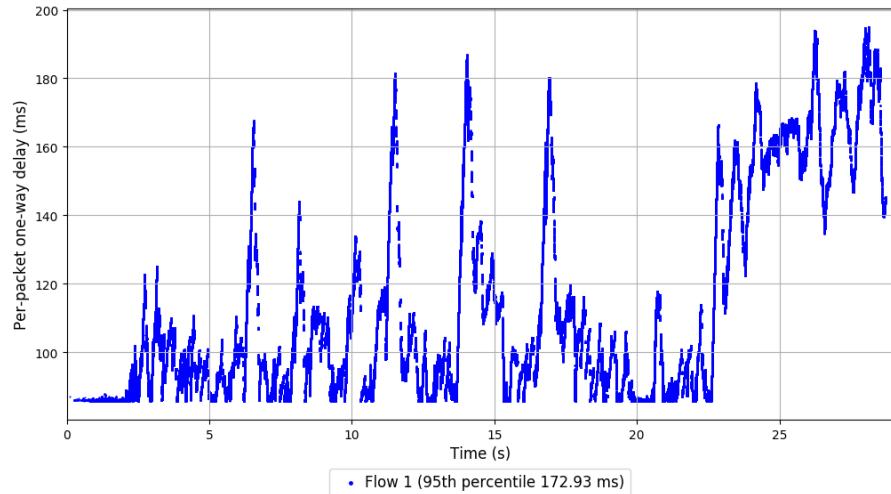
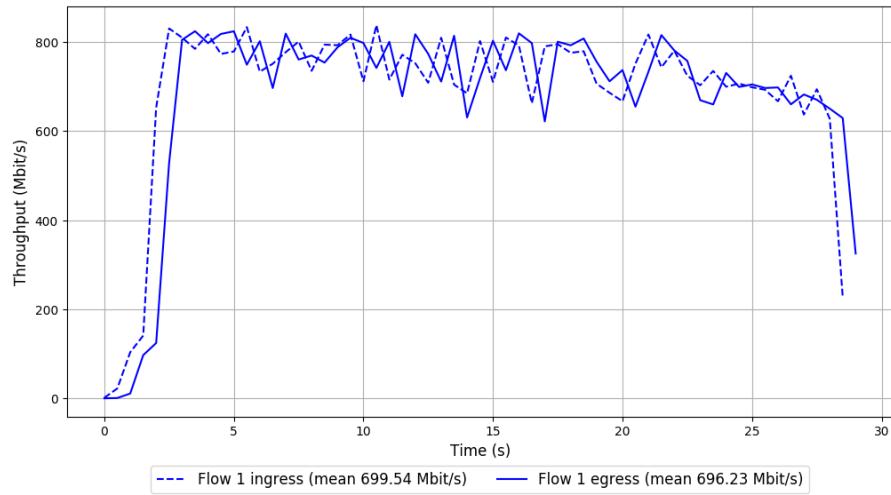


Run 5: Statistics of Indigo-MusesC5

```
Start at: 2019-12-11 05:08:34
End at: 2019-12-11 05:09:04
Local clock offset: 2.176 ms
Remote clock offset: 3.827 ms

# Below is generated by plot.py at 2019-12-11 06:43:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 696.23 Mbit/s
95th percentile per-packet one-way delay: 172.930 ms
Loss rate: 0.47%
-- Flow 1:
Average throughput: 696.23 Mbit/s
95th percentile per-packet one-way delay: 172.930 ms
Loss rate: 0.47%
```

Run 5: Report of Indigo-MusesC5 — Data Link

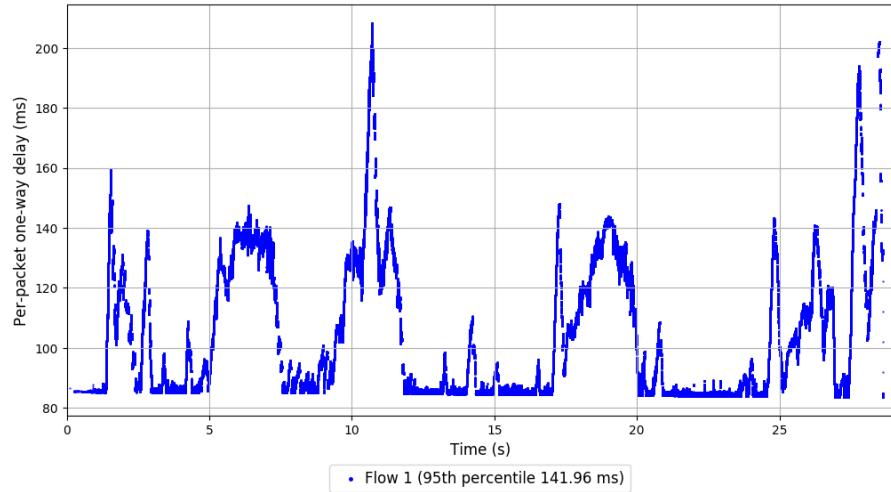
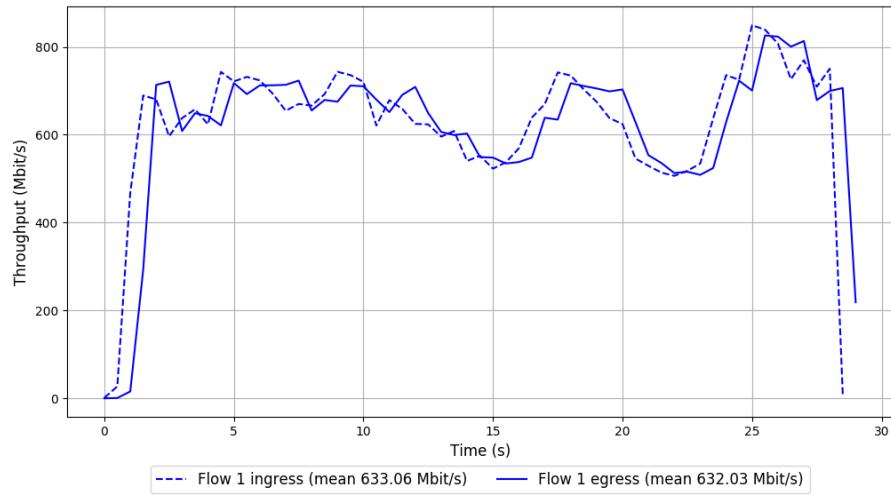


```
Run 1: Statistics of Indigo-MusesD
```

```
Start at: 2019-12-11 03:11:52
End at: 2019-12-11 03:12:22
Local clock offset: 21.163 ms
Remote clock offset: 41.63 ms

# Below is generated by plot.py at 2019-12-11 06:44:05
# Datalink statistics
-- Total of 1 flow:
Average throughput: 632.03 Mbit/s
95th percentile per-packet one-way delay: 141.955 ms
Loss rate: 0.17%
-- Flow 1:
Average throughput: 632.03 Mbit/s
95th percentile per-packet one-way delay: 141.955 ms
Loss rate: 0.17%
```

## Run 1: Report of Indigo-MusesD — Data Link

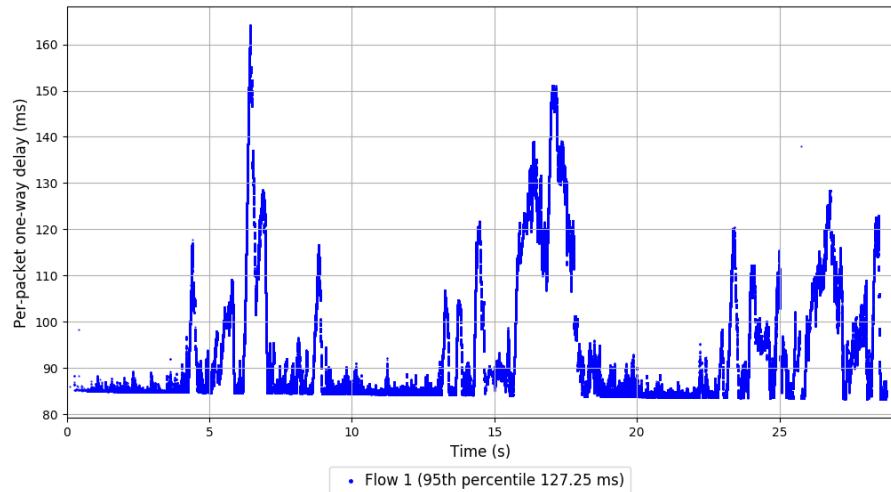
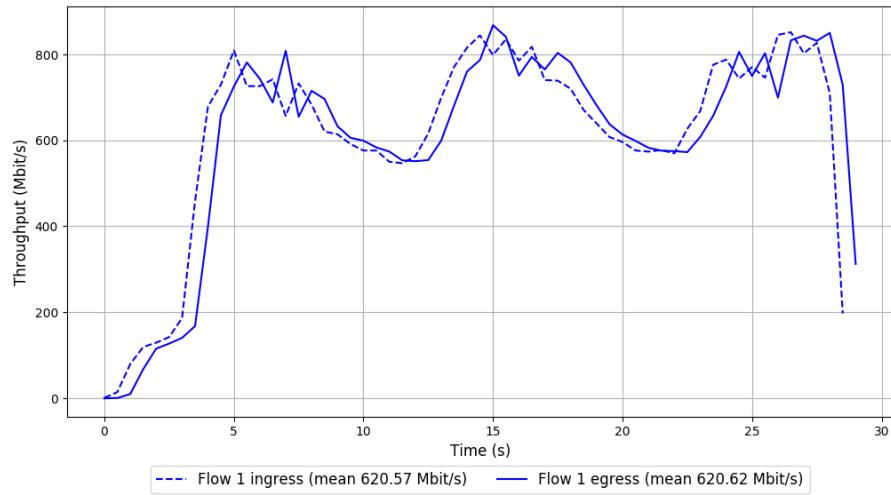


Run 2: Statistics of Indigo-MusesD

```
Start at: 2019-12-11 03:46:24
End at: 2019-12-11 03:46:54
Local clock offset: 32.42 ms
Remote clock offset: 21.178 ms

# Below is generated by plot.py at 2019-12-11 06:44:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 620.62 Mbit/s
95th percentile per-packet one-way delay: 127.252 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 620.62 Mbit/s
95th percentile per-packet one-way delay: 127.252 ms
Loss rate: 0.00%
```

## Run 2: Report of Indigo-MusesD — Data Link

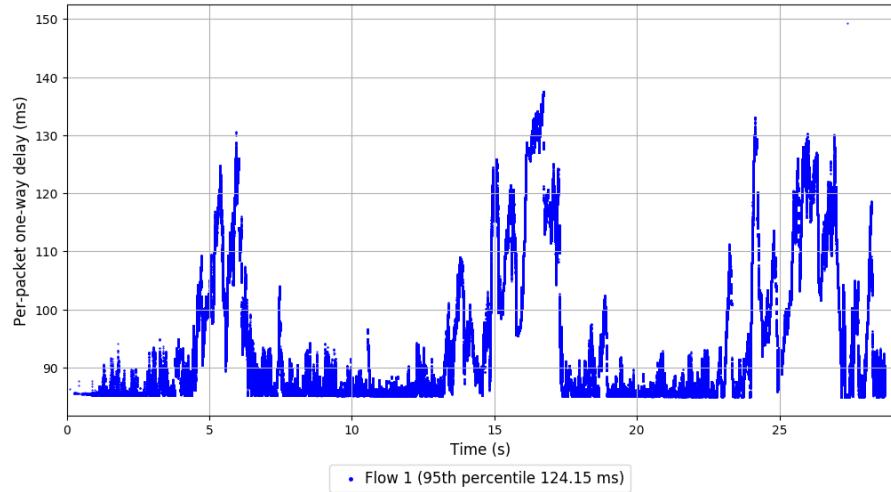
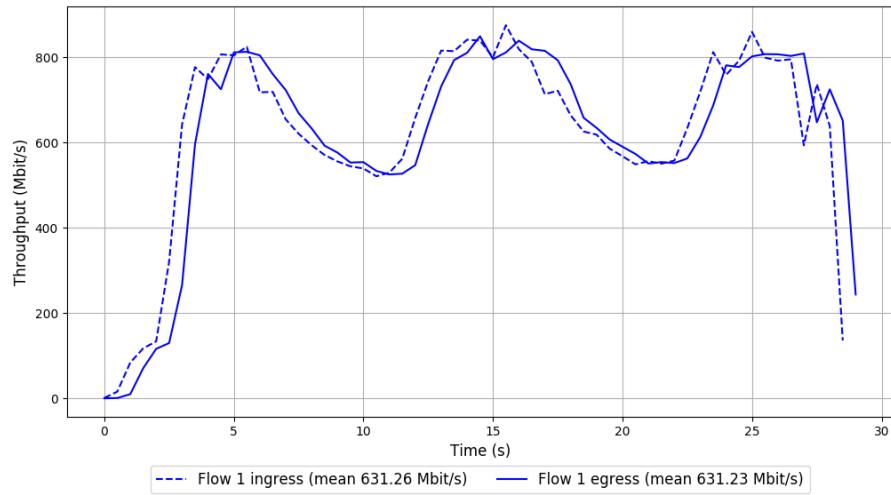


Run 3: Statistics of Indigo-MusesD

```
Start at: 2019-12-11 04:21:42
End at: 2019-12-11 04:22:12
Local clock offset: 14.883 ms
Remote clock offset: 12.066 ms

# Below is generated by plot.py at 2019-12-11 06:44:47
# Datalink statistics
-- Total of 1 flow:
Average throughput: 631.23 Mbit/s
95th percentile per-packet one-way delay: 124.151 ms
Loss rate: 0.01%
-- Flow 1:
Average throughput: 631.23 Mbit/s
95th percentile per-packet one-way delay: 124.151 ms
Loss rate: 0.01%
```

### Run 3: Report of Indigo-MusesD — Data Link

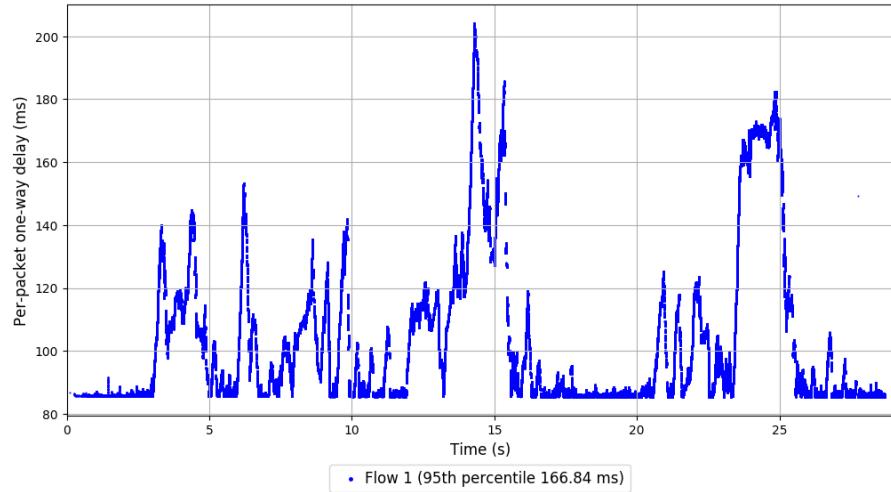
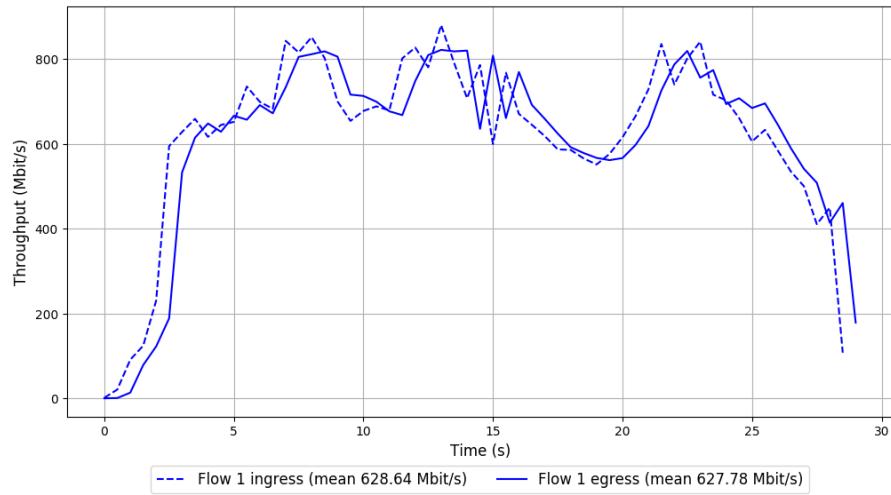


Run 4: Statistics of Indigo-MusesD

```
Start at: 2019-12-11 04:56:37
End at: 2019-12-11 04:57:08
Local clock offset: 6.265 ms
Remote clock offset: 3.739 ms

# Below is generated by plot.py at 2019-12-11 06:45:21
# Datalink statistics
-- Total of 1 flow:
Average throughput: 627.78 Mbit/s
95th percentile per-packet one-way delay: 166.843 ms
Loss rate: 0.14%
-- Flow 1:
Average throughput: 627.78 Mbit/s
95th percentile per-packet one-way delay: 166.843 ms
Loss rate: 0.14%
```

## Run 4: Report of Indigo-MusesD — Data Link

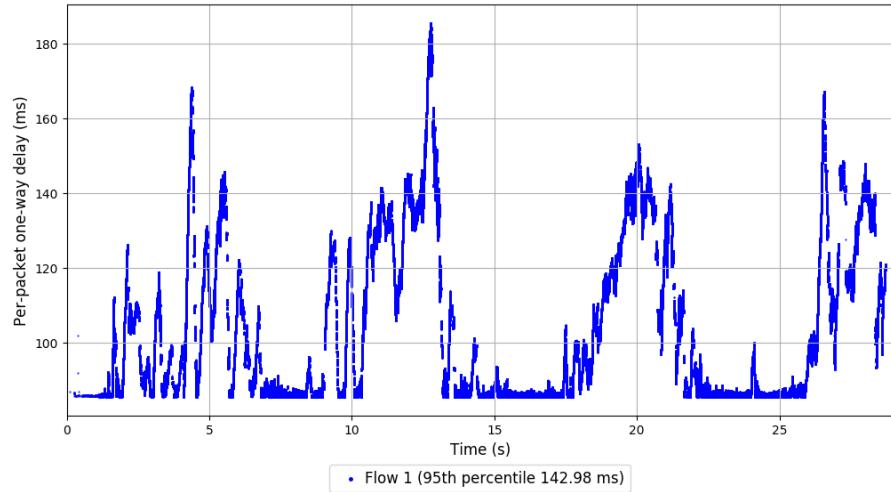
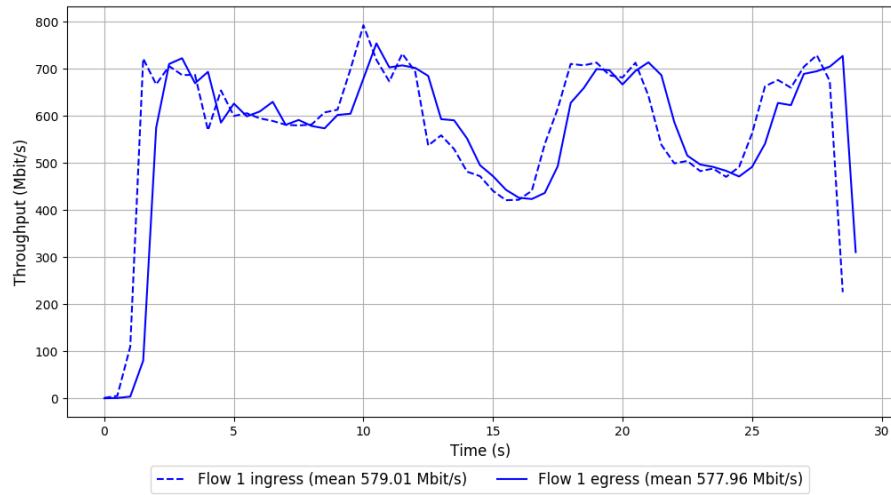


Run 5: Statistics of Indigo-MusesD

```
Start at: 2019-12-11 05:31:36
End at: 2019-12-11 05:32:06
Local clock offset: 1.625 ms
Remote clock offset: 1.658 ms

# Below is generated by plot.py at 2019-12-11 06:48:01
# Datalink statistics
-- Total of 1 flow:
Average throughput: 577.96 Mbit/s
95th percentile per-packet one-way delay: 142.983 ms
Loss rate: 0.18%
-- Flow 1:
Average throughput: 577.96 Mbit/s
95th percentile per-packet one-way delay: 142.983 ms
Loss rate: 0.18%
```

## Run 5: Report of Indigo-MusesD — Data Link



Run 1: Statistics of Indigo-MusesT

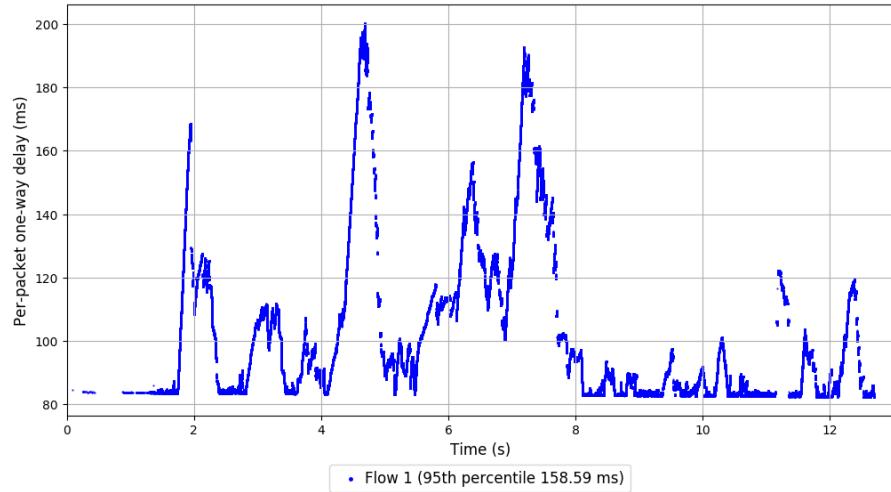
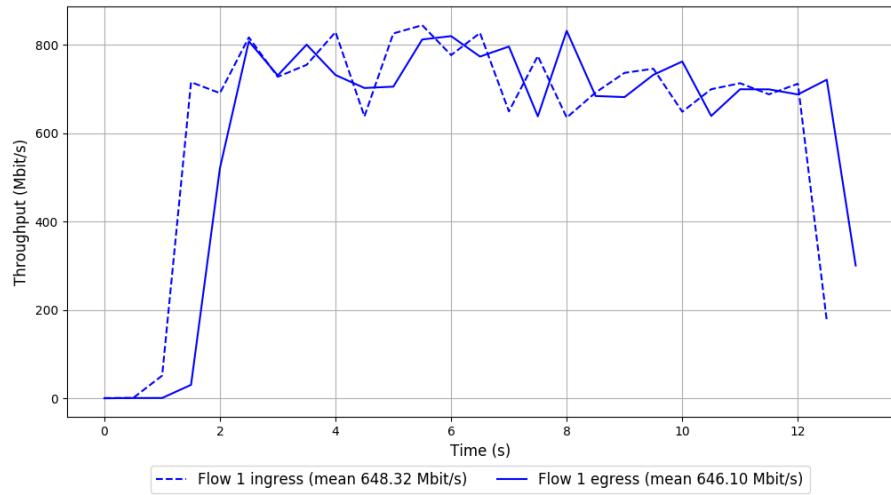
Start at: 2019-12-11 02:44:14

End at: 2019-12-11 02:44:44

Local clock offset: 4.786 ms

Remote clock offset: 27.654 ms

## Run 1: Report of Indigo-MusesT — Data Link

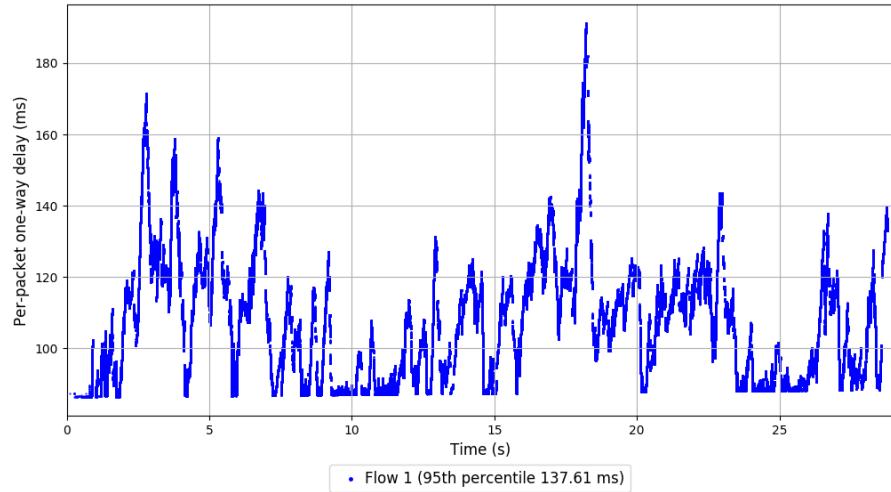
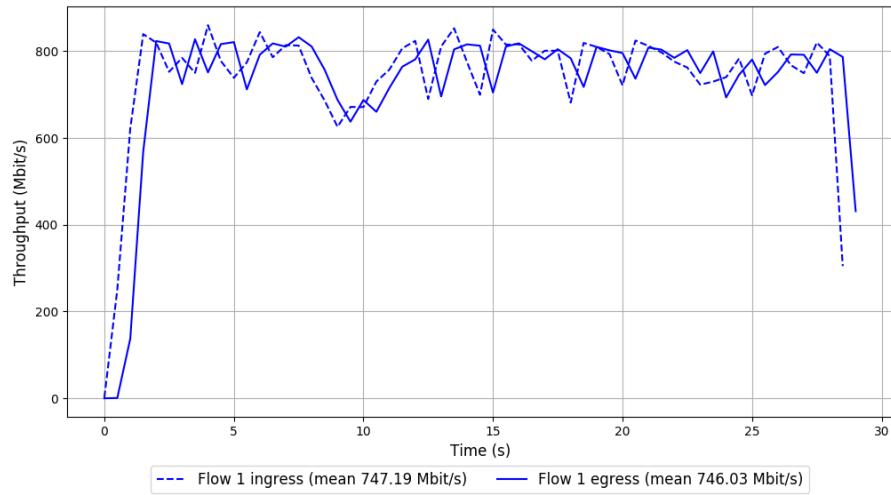


Run 2: Statistics of Indigo-MusesT

```
Start at: 2019-12-11 03:19:27
End at: 2019-12-11 03:19:57
Local clock offset: 16.086 ms
Remote clock offset: 32.276 ms

# Below is generated by plot.py at 2019-12-11 06:52:52
# Datalink statistics
-- Total of 1 flow:
Average throughput: 746.03 Mbit/s
95th percentile per-packet one-way delay: 137.606 ms
Loss rate: 0.14%
-- Flow 1:
Average throughput: 746.03 Mbit/s
95th percentile per-packet one-way delay: 137.606 ms
Loss rate: 0.14%
```

## Run 2: Report of Indigo-MusesT — Data Link

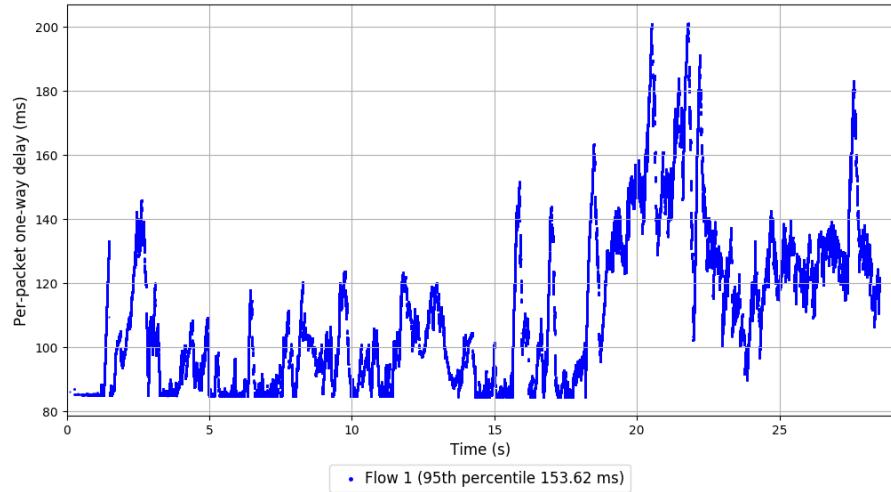
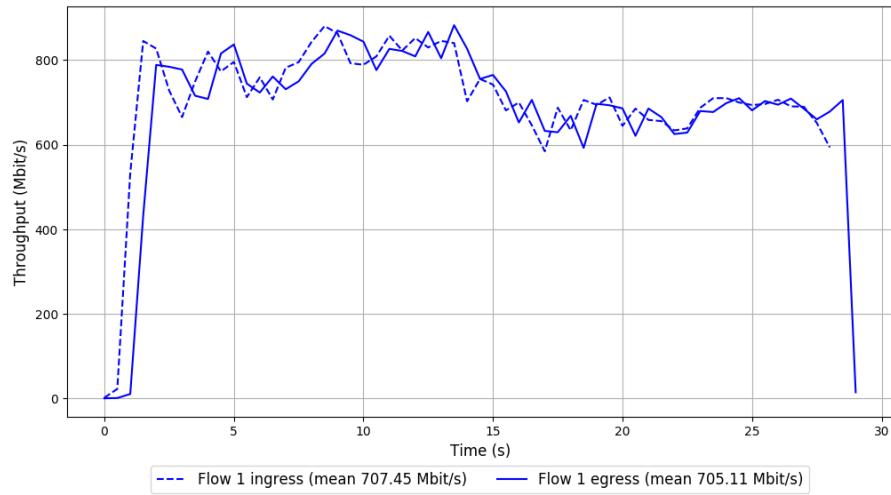


Run 3: Statistics of Indigo-MusesT

```
Start at: 2019-12-11 03:53:51
End at: 2019-12-11 03:54:21
Local clock offset: 17.341 ms
Remote clock offset: 26.356 ms

# Below is generated by plot.py at 2019-12-11 06:53:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 705.11 Mbit/s
95th percentile per-packet one-way delay: 153.624 ms
Loss rate: 0.33%
-- Flow 1:
Average throughput: 705.11 Mbit/s
95th percentile per-packet one-way delay: 153.624 ms
Loss rate: 0.33%
```

### Run 3: Report of Indigo-MusesT — Data Link

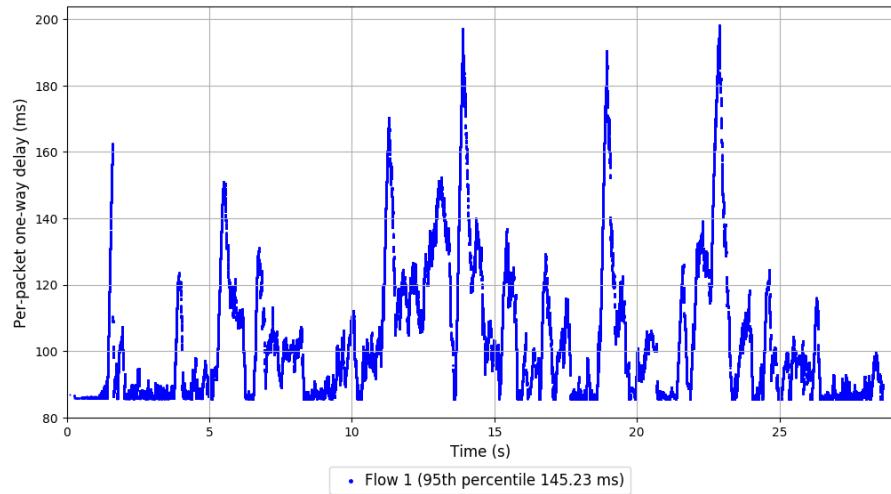
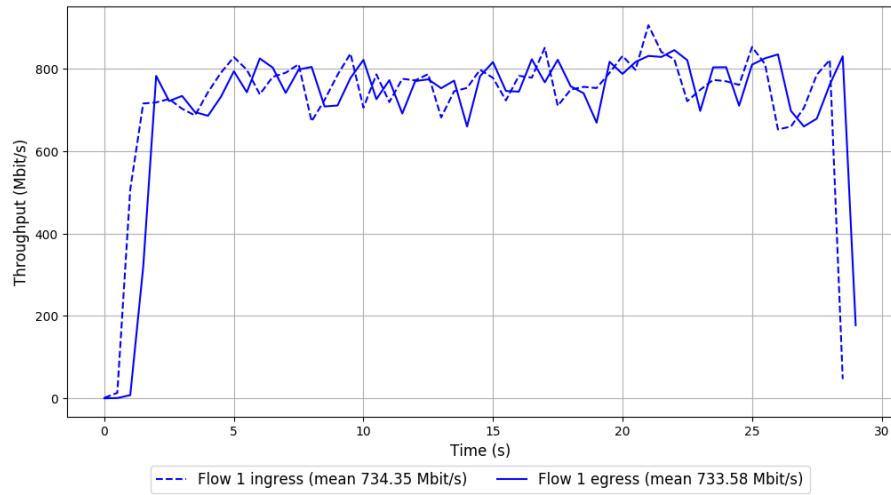


Run 4: Statistics of Indigo-MusesT

```
Start at: 2019-12-11 04:29:01
End at: 2019-12-11 04:29:31
Local clock offset: 7.871 ms
Remote clock offset: 9.512 ms

# Below is generated by plot.py at 2019-12-11 06:54:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 733.58 Mbit/s
95th percentile per-packet one-way delay: 145.233 ms
Loss rate: 0.10%
-- Flow 1:
Average throughput: 733.58 Mbit/s
95th percentile per-packet one-way delay: 145.233 ms
Loss rate: 0.10%
```

Run 4: Report of Indigo-MusesT — Data Link

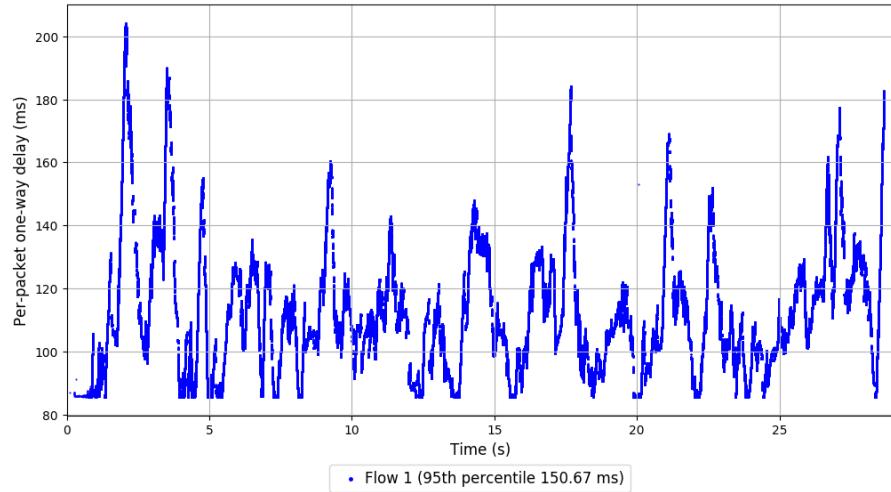
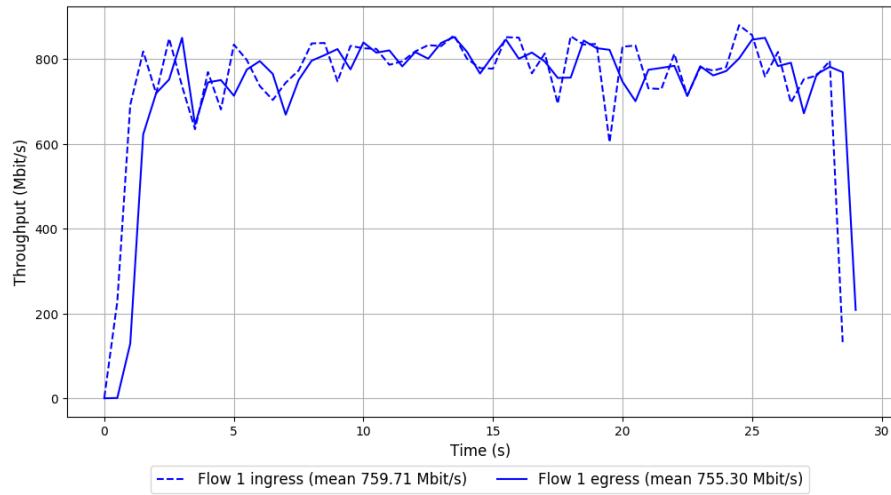


Run 5: Statistics of Indigo-MusesT

```
Start at: 2019-12-11 05:04:04
End at: 2019-12-11 05:04:34
Local clock offset: 3.064 ms
Remote clock offset: 3.6 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 755.30 Mbit/s
95th percentile per-packet one-way delay: 150.667 ms
Loss rate: 0.56%
-- Flow 1:
Average throughput: 755.30 Mbit/s
95th percentile per-packet one-way delay: 150.667 ms
Loss rate: 0.56%
```

Run 5: Report of Indigo-MusesT — Data Link

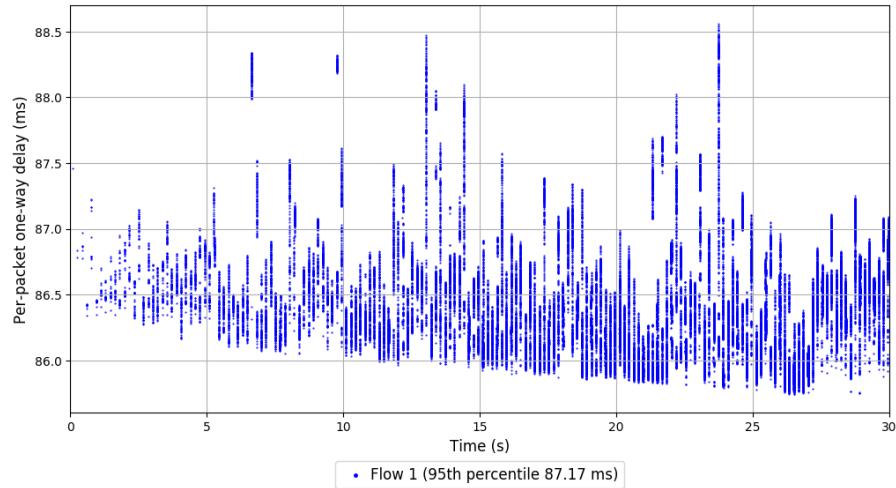
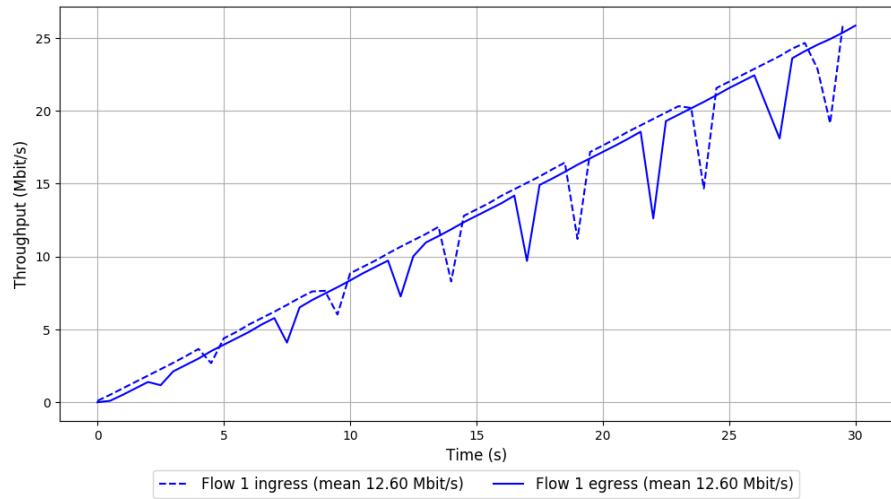


```
Run 1: Statistics of LEDBAT
```

```
Start at: 2019-12-11 03:07:43
End at: 2019-12-11 03:08:13
Local clock offset: 16.148 ms
Remote clock offset: 32.092 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 12.60 Mbit/s
95th percentile per-packet one-way delay: 87.172 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 12.60 Mbit/s
95th percentile per-packet one-way delay: 87.172 ms
Loss rate: 0.00%
```

## Run 1: Report of LEDBAT — Data Link

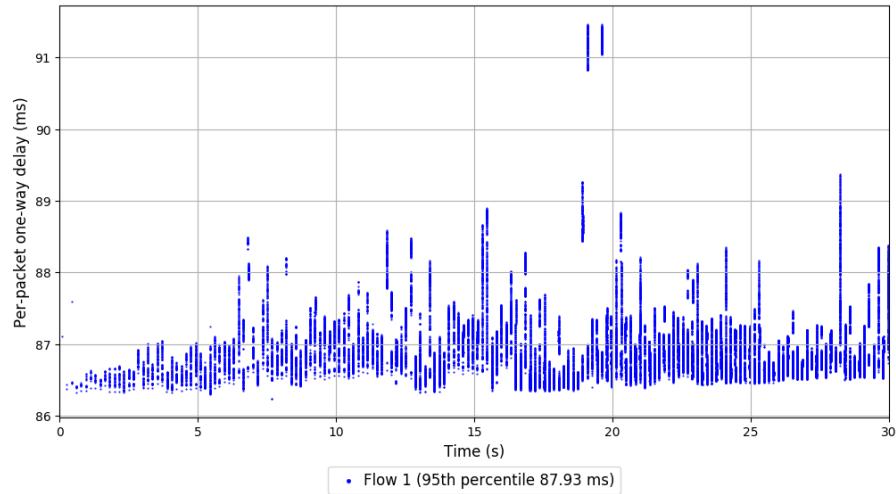
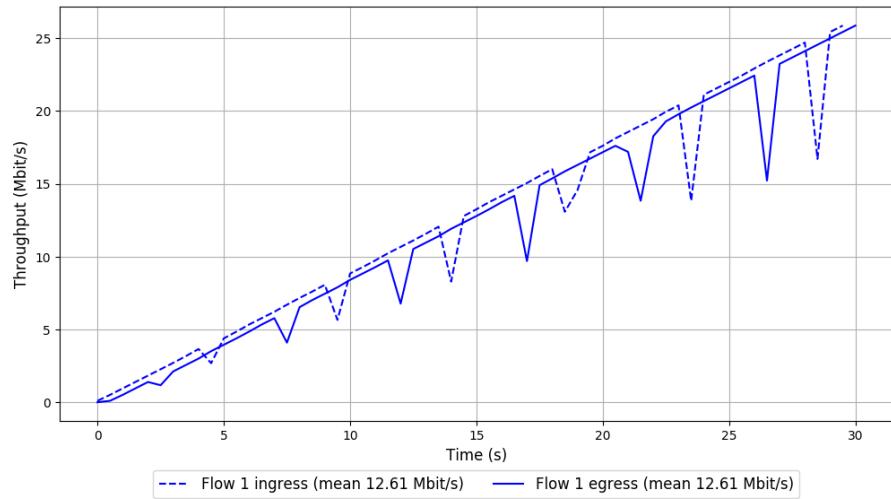


Run 2: Statistics of LEDBAT

```
Start at: 2019-12-11 03:42:18
End at: 2019-12-11 03:42:48
Local clock offset: 28.876 ms
Remote clock offset: 20.15 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 12.61 Mbit/s
95th percentile per-packet one-way delay: 87.928 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 12.61 Mbit/s
95th percentile per-packet one-way delay: 87.928 ms
Loss rate: 0.00%
```

## Run 2: Report of LEDBAT — Data Link

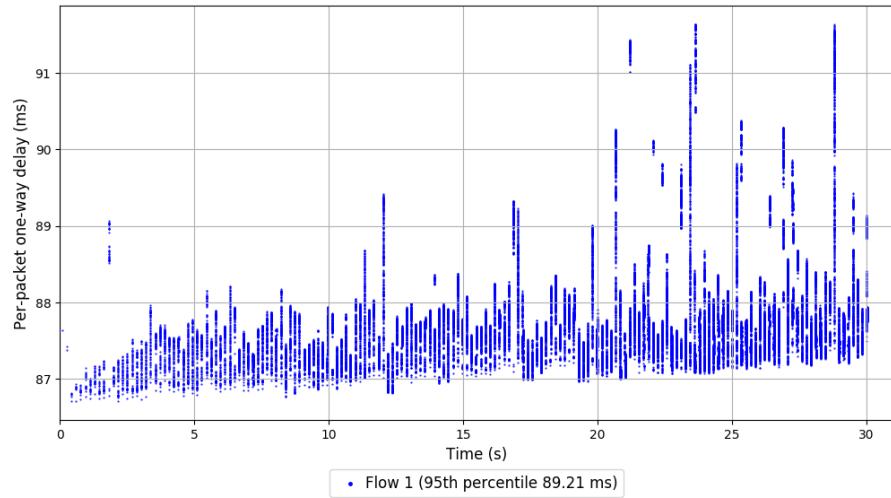
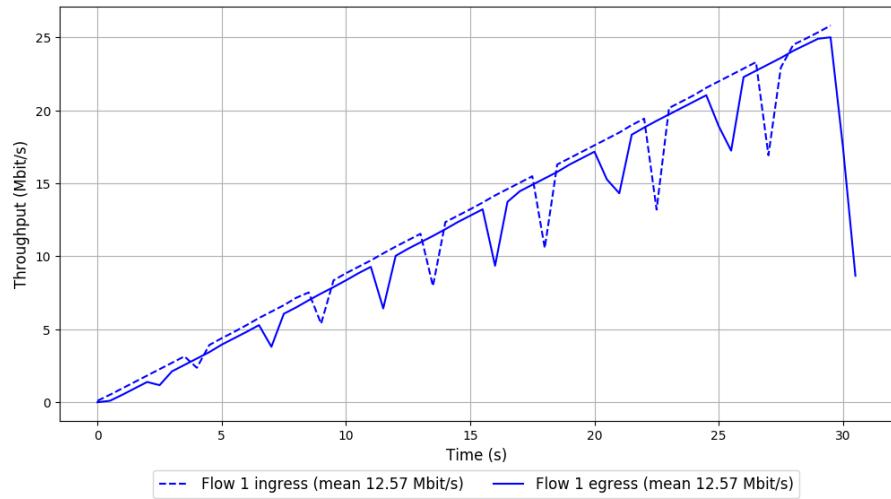


Run 3: Statistics of LEDBAT

```
Start at: 2019-12-11 04:17:42
End at: 2019-12-11 04:18:12
Local clock offset: 15.145 ms
Remote clock offset: 15.498 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 12.57 Mbit/s
95th percentile per-packet one-way delay: 89.214 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 12.57 Mbit/s
95th percentile per-packet one-way delay: 89.214 ms
Loss rate: 0.00%
```

### Run 3: Report of LEDBAT — Data Link

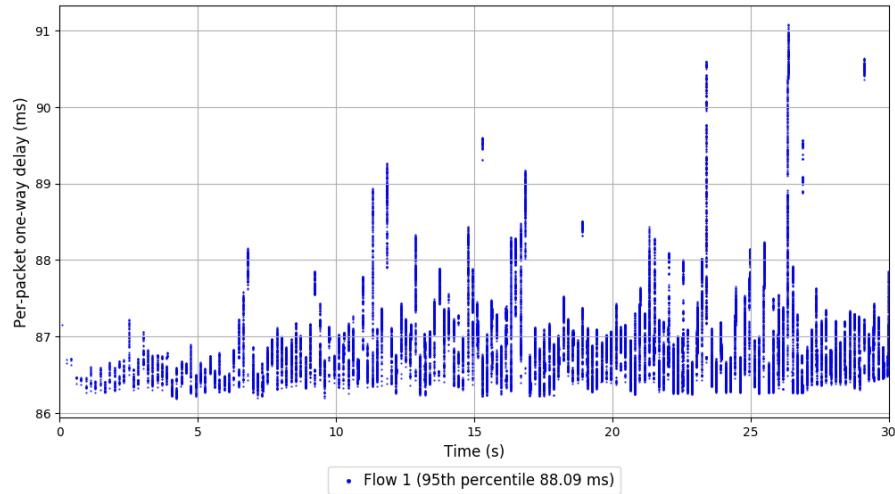
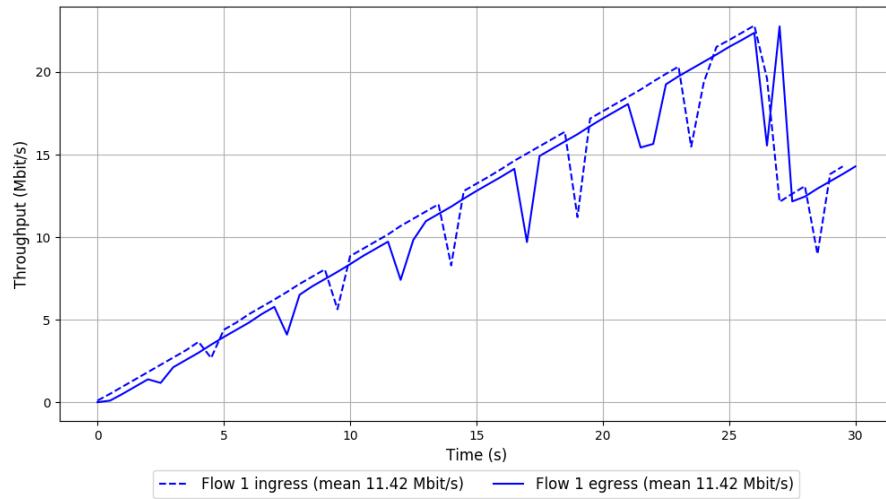


Run 4: Statistics of LEDBAT

```
Start at: 2019-12-11 04:52:47
End at: 2019-12-11 04:53:17
Local clock offset: 7.232 ms
Remote clock offset: 4.318 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 11.42 Mbit/s
95th percentile per-packet one-way delay: 88.094 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 11.42 Mbit/s
95th percentile per-packet one-way delay: 88.094 ms
Loss rate: 0.00%
```

Run 4: Report of LEDBAT — Data Link

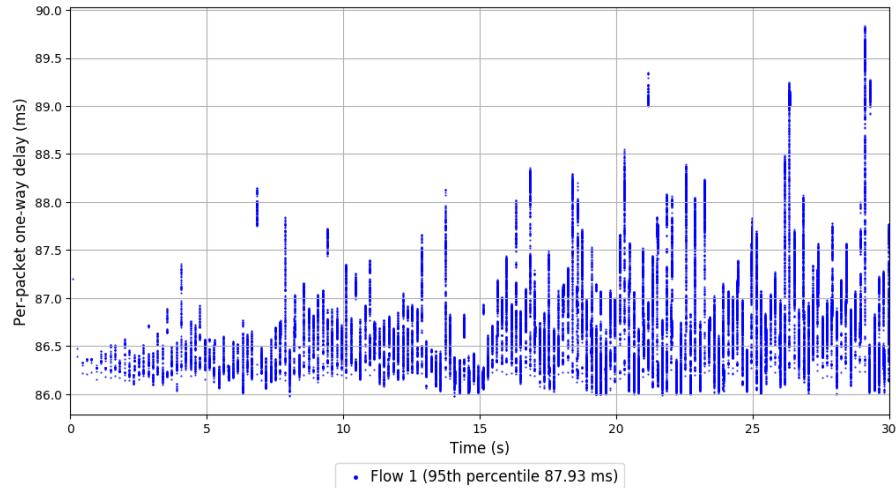
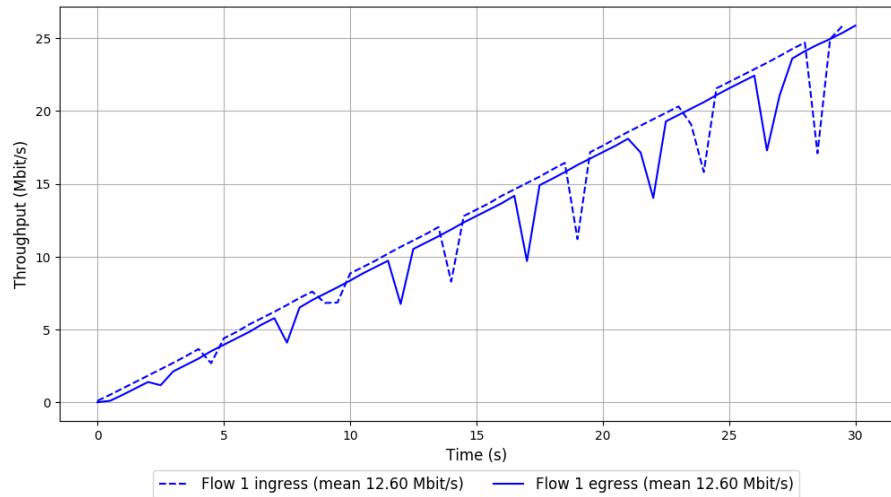


Run 5: Statistics of LEDBAT

```
Start at: 2019-12-11 05:27:34
End at: 2019-12-11 05:28:04
Local clock offset: 1.654 ms
Remote clock offset: 1.85 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 12.60 Mbit/s
95th percentile per-packet one-way delay: 87.932 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 12.60 Mbit/s
95th percentile per-packet one-way delay: 87.932 ms
Loss rate: 0.00%
```

Run 5: Report of LEDBAT — Data Link

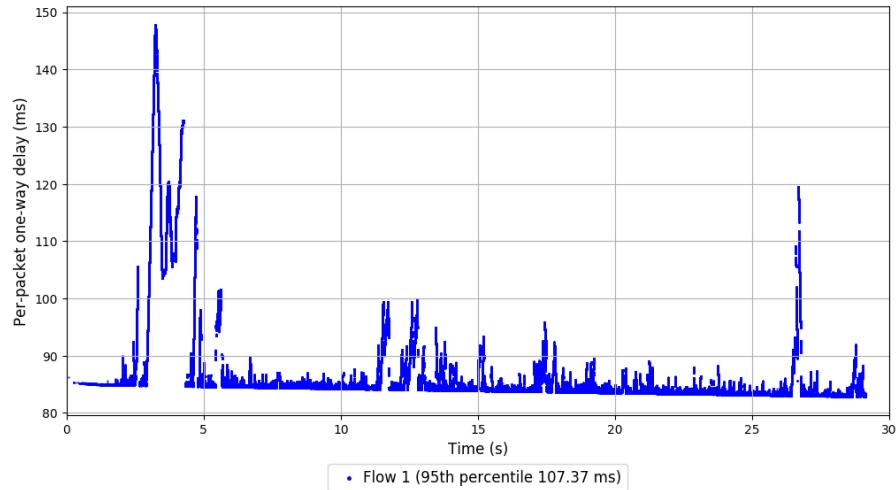
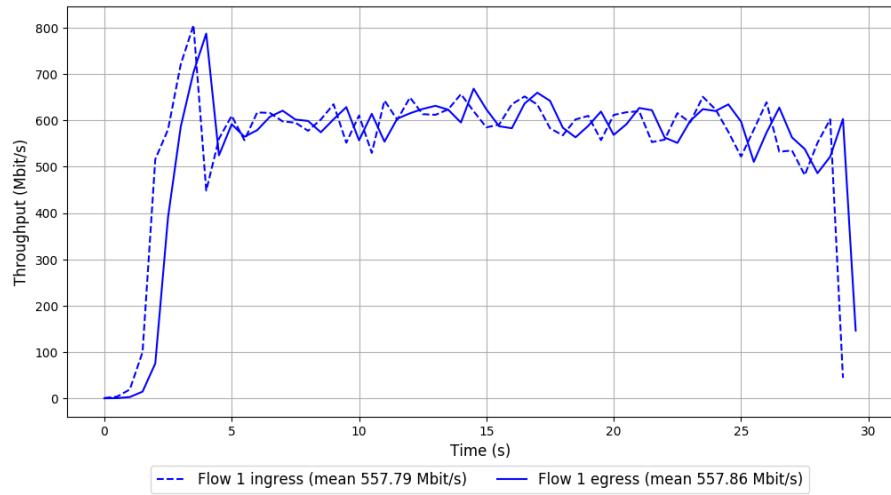


```
Run 1: Statistics of Muses\_DecisionTree

Start at: 2019-12-11 02:57:20
End at: 2019-12-11 02:57:50
Local clock offset: 11.726 ms
Remote clock offset: 29.224 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 557.86 Mbit/s
95th percentile per-packet one-way delay: 107.372 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 557.86 Mbit/s
95th percentile per-packet one-way delay: 107.372 ms
Loss rate: 0.00%
```

Run 1: Report of Muses\_DecisionTree — Data Link

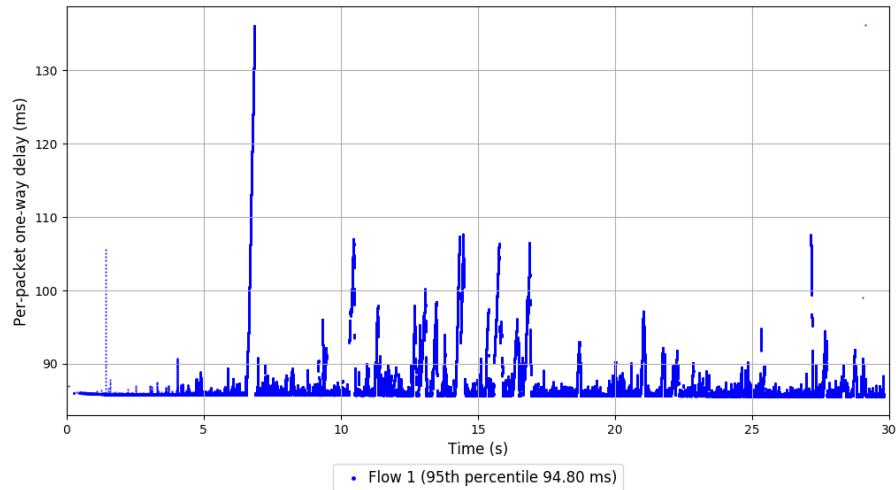
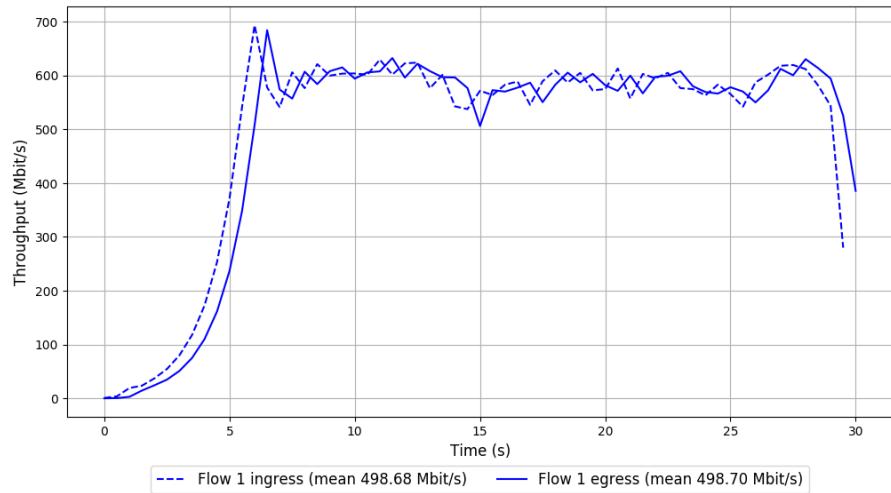


```
Run 2: Statistics of Muses\_DecisionTree
```

```
Start at: 2019-12-11 03:32:36
End at: 2019-12-11 03:33:07
Local clock offset: 21.073 ms
Remote clock offset: 26.025 ms

# Below is generated by plot.py at 2019-12-11 06:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 498.70 Mbit/s
95th percentile per-packet one-way delay: 94.799 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 498.70 Mbit/s
95th percentile per-packet one-way delay: 94.799 ms
Loss rate: 0.00%
```

Run 2: Report of Muses\_DecisionTree — Data Link

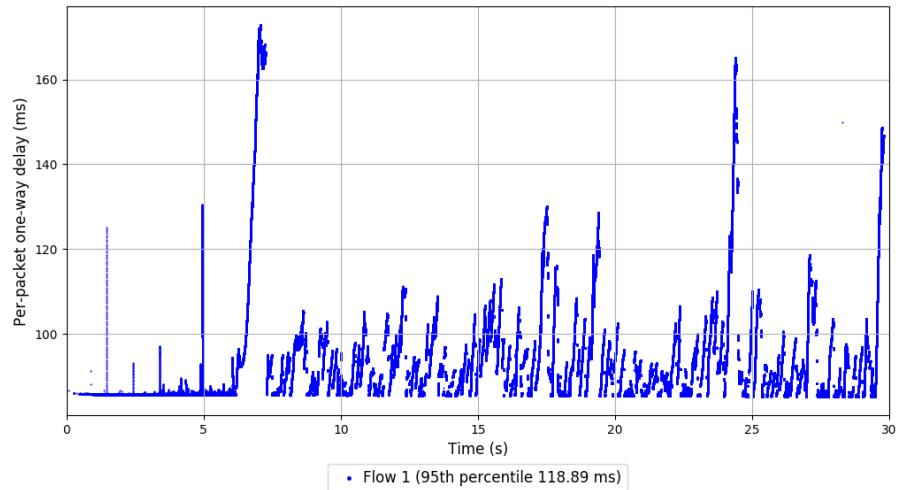
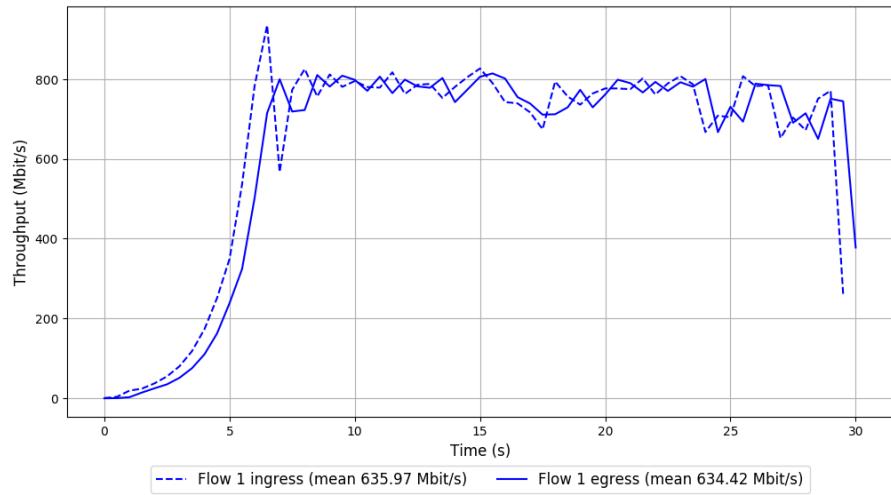


```
Run 3: Statistics of Muses\_DecisionTree

Start at: 2019-12-11 04:07:07
End at: 2019-12-11 04:07:37
Local clock offset: 12.399 ms
Remote clock offset: 39.933 ms

# Below is generated by plot.py at 2019-12-11 06:55:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 634.42 Mbit/s
95th percentile per-packet one-way delay: 118.885 ms
Loss rate: 0.24%
-- Flow 1:
Average throughput: 634.42 Mbit/s
95th percentile per-packet one-way delay: 118.885 ms
Loss rate: 0.24%
```

Run 3: Report of Muses\_DecisionTree — Data Link

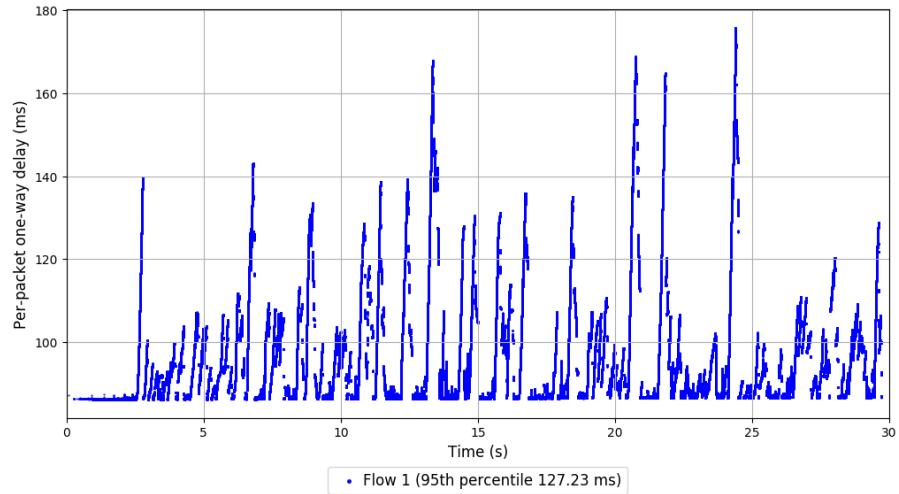
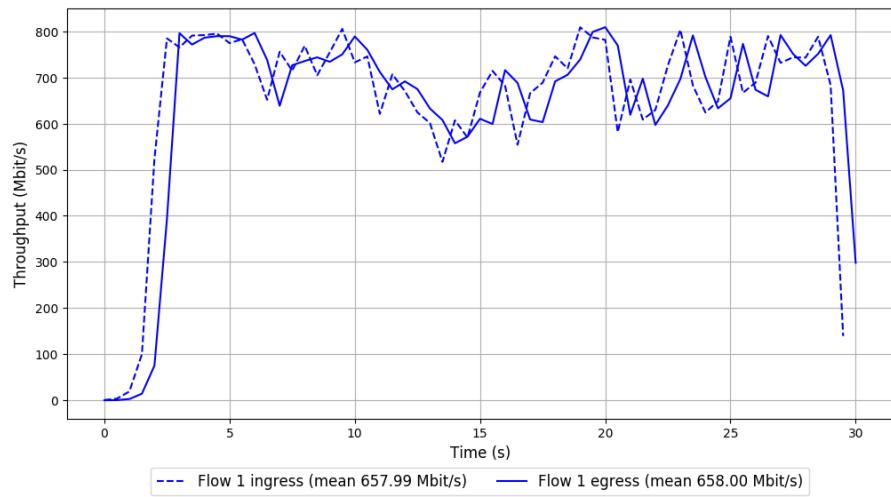


```
Run 4: Statistics of Muses\_DecisionTree

Start at: 2019-12-11 04:42:16
End at: 2019-12-11 04:42:46
Local clock offset: 5.837 ms
Remote clock offset: 10.18 ms

# Below is generated by plot.py at 2019-12-11 06:59:01
# Datalink statistics
-- Total of 1 flow:
Average throughput: 658.00 Mbit/s
95th percentile per-packet one-way delay: 127.234 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 658.00 Mbit/s
95th percentile per-packet one-way delay: 127.234 ms
Loss rate: 0.00%
```

Run 4: Report of Muses\_DecisionTree — Data Link

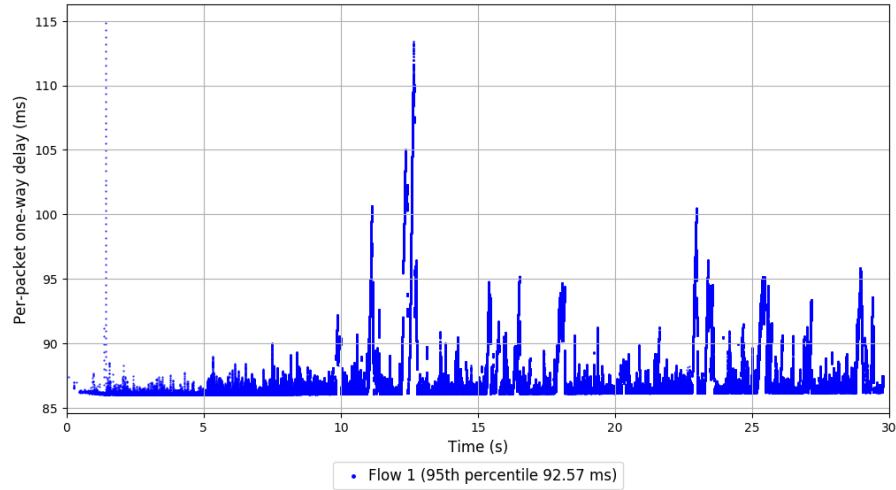
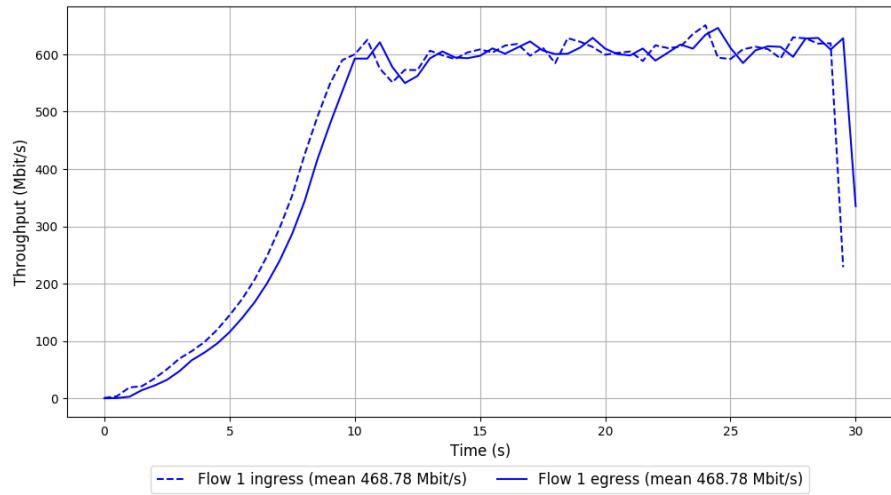


```
Run 5: Statistics of Muses\_DecisionTree

Start at: 2019-12-11 05:17:20
End at: 2019-12-11 05:17:50
Local clock offset: 1.503 ms
Remote clock offset: 3.939 ms

# Below is generated by plot.py at 2019-12-11 06:59:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 468.78 Mbit/s
95th percentile per-packet one-way delay: 92.568 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 468.78 Mbit/s
95th percentile per-packet one-way delay: 92.568 ms
Loss rate: 0.00%
```

Run 5: Report of Muses\_DecisionTree — Data Link

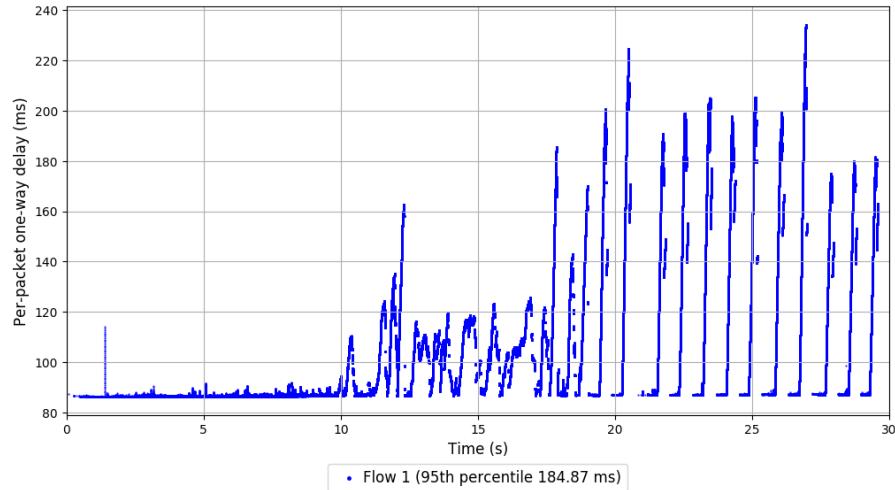
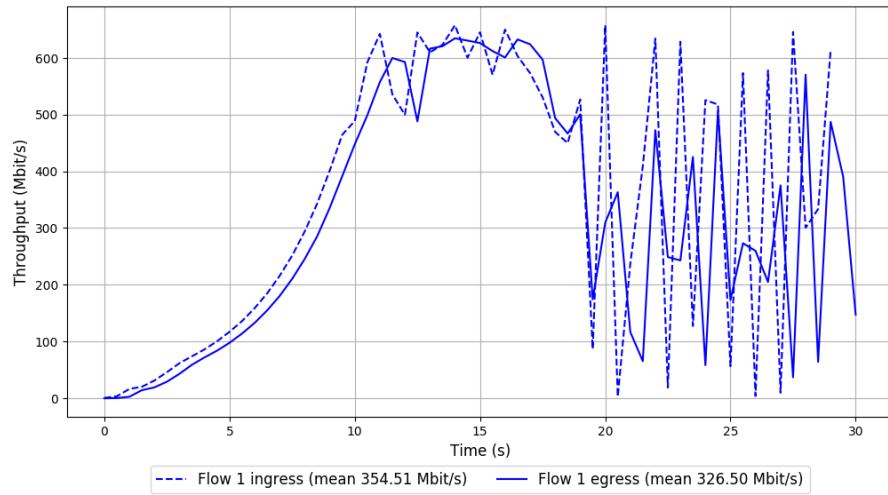


```
Run 1: Statistics of Muses\_DecisionTreeH0

Start at: 2019-12-11 03:01:59
End at: 2019-12-11 03:02:29
Local clock offset: 11.237 ms
Remote clock offset: 28.838 ms

# Below is generated by plot.py at 2019-12-11 06:59:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 326.50 Mbit/s
95th percentile per-packet one-way delay: 184.869 ms
Loss rate: 7.67%
-- Flow 1:
Average throughput: 326.50 Mbit/s
95th percentile per-packet one-way delay: 184.869 ms
Loss rate: 7.67%
```

Run 1: Report of Muses\_DecisionTreeH0 — Data Link

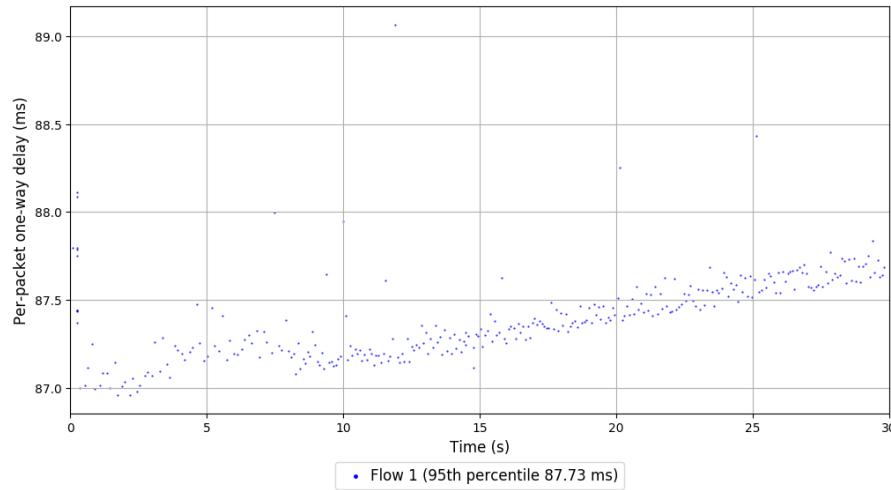
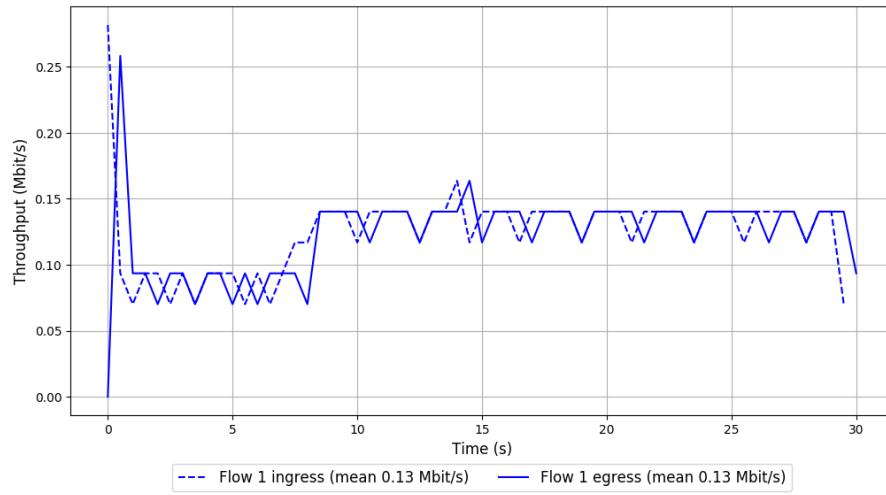


```
Run 2: Statistics of Muses\_DecisionTreeH0

Start at: 2019-12-11 03:37:11
End at: 2019-12-11 03:37:41
Local clock offset: 24.431 ms
Remote clock offset: 22.302 ms

# Below is generated by plot.py at 2019-12-11 06:59:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.13 Mbit/s
95th percentile per-packet one-way delay: 87.732 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.13 Mbit/s
95th percentile per-packet one-way delay: 87.732 ms
Loss rate: 0.00%
```

Run 2: Report of Muses\_DecisionTreeH0 — Data Link

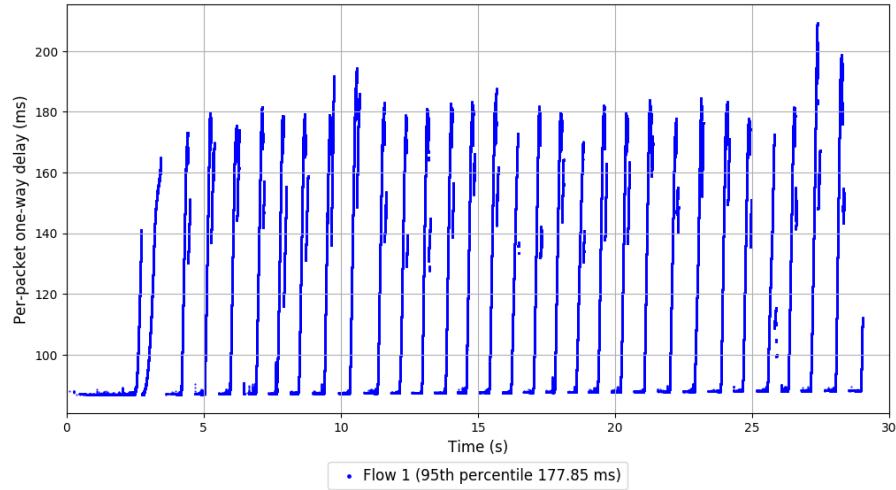
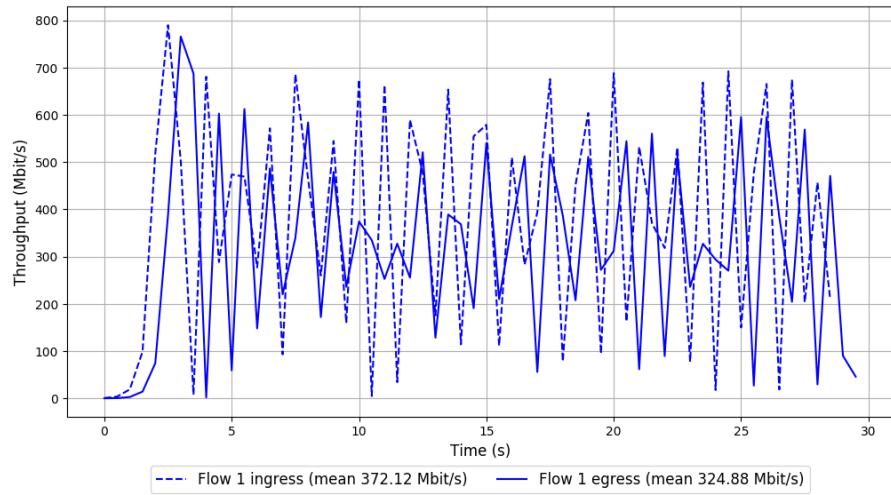


```
Run 3: Statistics of Muses\_DecisionTreeH0

Start at: 2019-12-11 04:11:50
End at: 2019-12-11 04:12:20
Local clock offset: 13.274 ms
Remote clock offset: 26.748 ms

# Below is generated by plot.py at 2019-12-11 06:59:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 324.88 Mbit/s
95th percentile per-packet one-way delay: 177.853 ms
Loss rate: 12.69%
-- Flow 1:
Average throughput: 324.88 Mbit/s
95th percentile per-packet one-way delay: 177.853 ms
Loss rate: 12.69%
```

Run 3: Report of Muses\_DecisionTreeH0 — Data Link

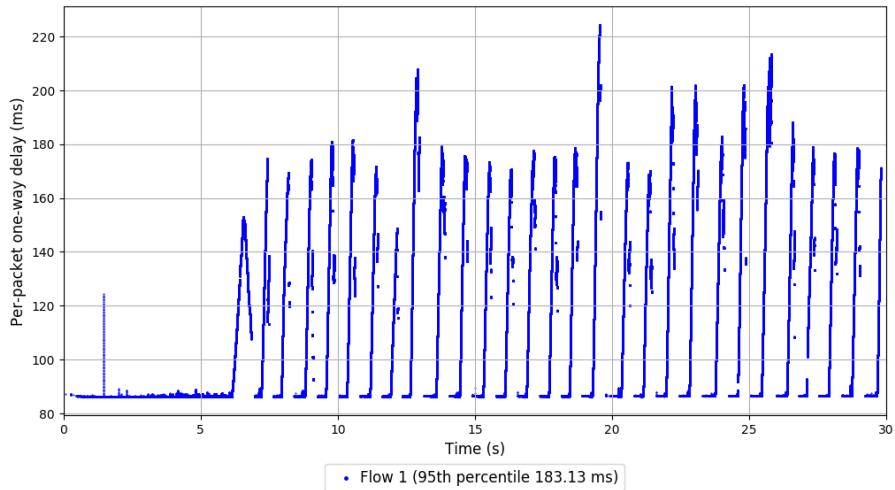
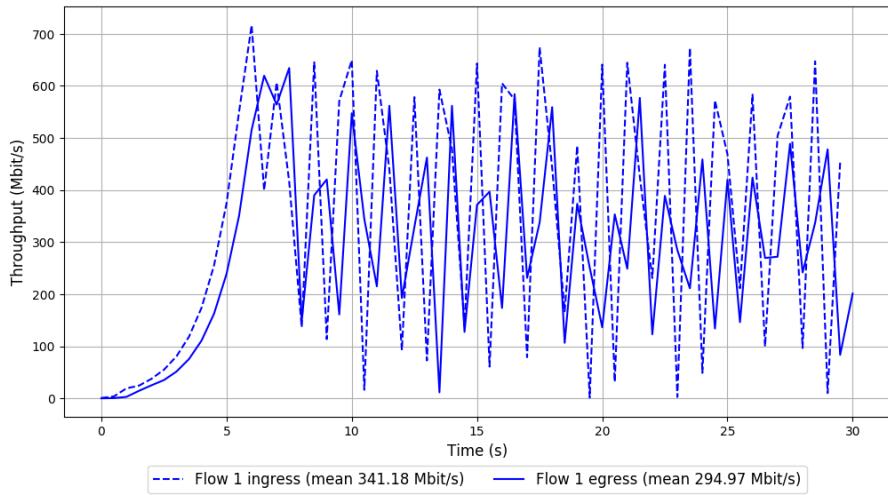


```
Run 4: Statistics of Muses\_DecisionTreeH0

Start at: 2019-12-11 04:47:04
End at: 2019-12-11 04:47:34
Local clock offset: 6.359 ms
Remote clock offset: 6.569 ms

# Below is generated by plot.py at 2019-12-11 06:59:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 294.97 Mbit/s
95th percentile per-packet one-way delay: 183.135 ms
Loss rate: 13.54%
-- Flow 1:
Average throughput: 294.97 Mbit/s
95th percentile per-packet one-way delay: 183.135 ms
Loss rate: 13.54%
```

Run 4: Report of Muses\_DecisionTreeH0 — Data Link

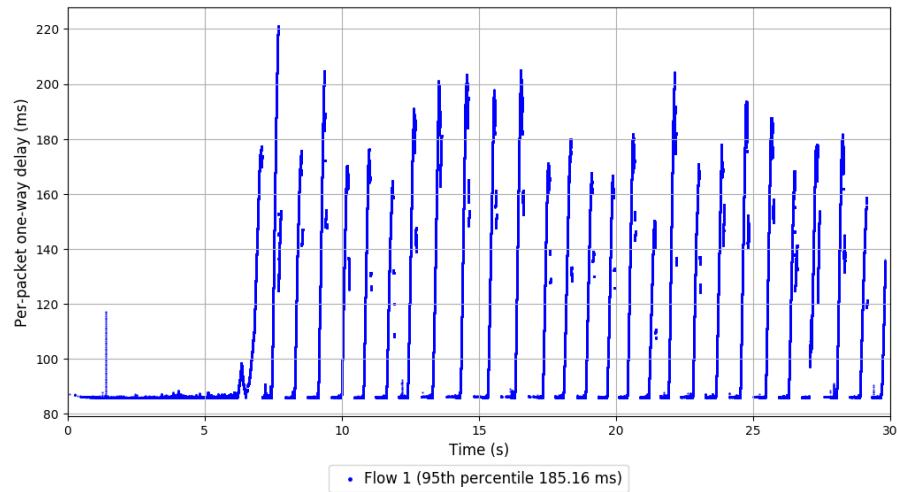
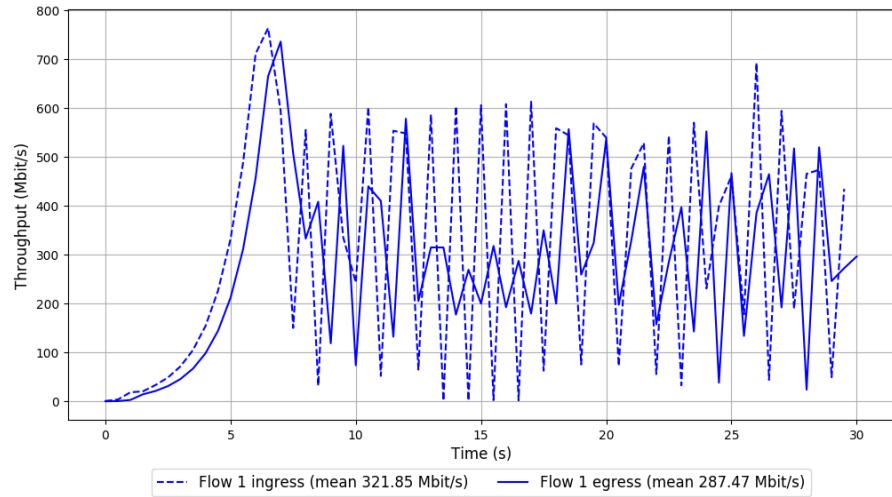


```
Run 5: Statistics of Muses\_DecisionTreeH0

Start at: 2019-12-11 05:21:56
End at: 2019-12-11 05:22:26
Local clock offset: 1.658 ms
Remote clock offset: 2.602 ms

# Below is generated by plot.py at 2019-12-11 06:59:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 287.47 Mbit/s
95th percentile per-packet one-way delay: 185.155 ms
Loss rate: 10.68%
-- Flow 1:
Average throughput: 287.47 Mbit/s
95th percentile per-packet one-way delay: 185.155 ms
Loss rate: 10.68%
```

Run 5: Report of Muses\_DecisionTreeH0 — Data Link

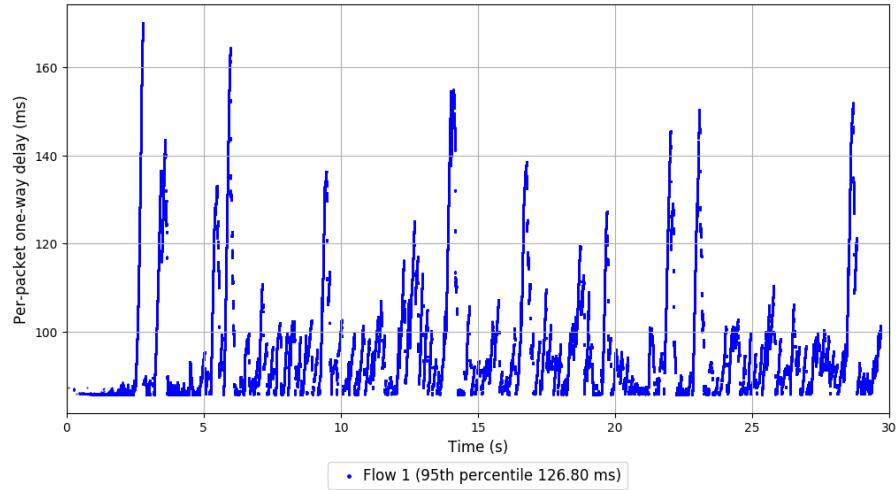
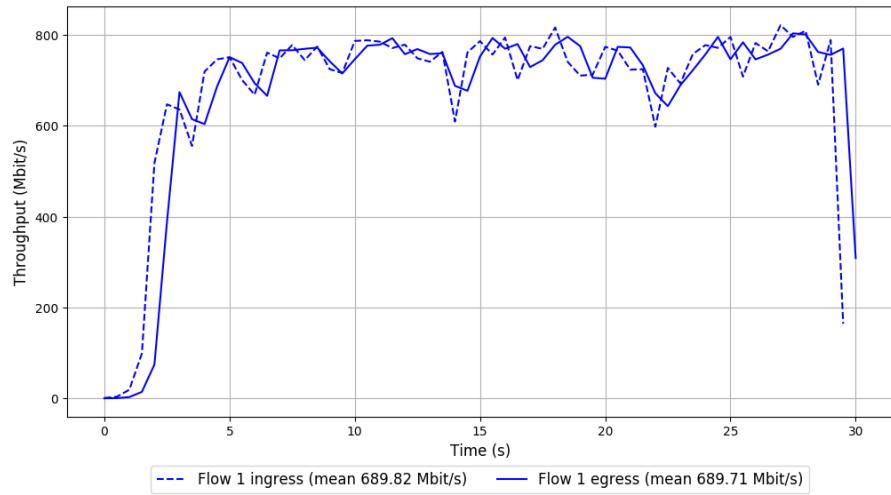


```
Run 1: Statistics of Muses\_DecisionTreeR0

Start at: 2019-12-11 03:04:32
End at: 2019-12-11 03:05:02
Local clock offset: 13.423 ms
Remote clock offset: 27.722 ms

# Below is generated by plot.py at 2019-12-11 07:05:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 689.71 Mbit/s
95th percentile per-packet one-way delay: 126.801 ms
Loss rate: 0.02%
-- Flow 1:
Average throughput: 689.71 Mbit/s
95th percentile per-packet one-way delay: 126.801 ms
Loss rate: 0.02%
```

Run 1: Report of Muses\_DecisionTreeR0 — Data Link

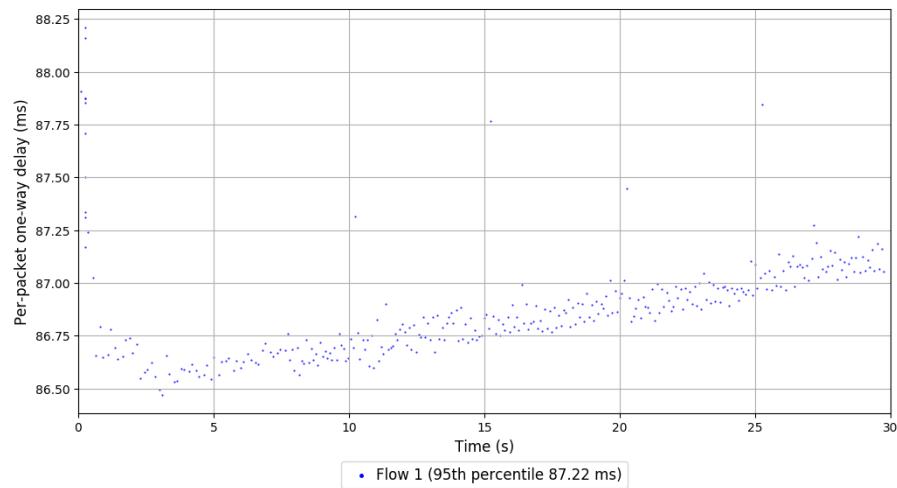
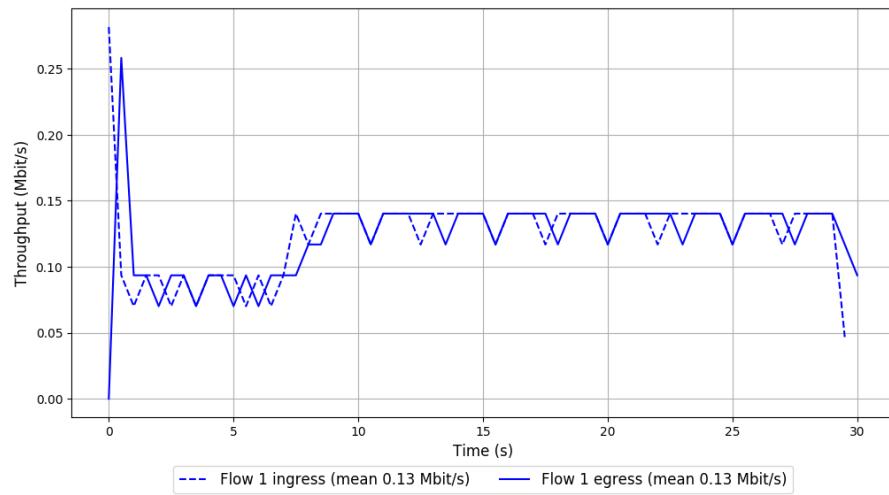


```
Run 2: Statistics of Muses\_DecisionTreeR0

Start at: 2019-12-11 03:39:32
End at: 2019-12-11 03:40:02
Local clock offset: 26.386 ms
Remote clock offset: 20.646 ms

# Below is generated by plot.py at 2019-12-11 07:05:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.13 Mbit/s
95th percentile per-packet one-way delay: 87.220 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.13 Mbit/s
95th percentile per-packet one-way delay: 87.220 ms
Loss rate: 0.00%
```

Run 2: Report of Muses\_DecisionTreeR0 — Data Link

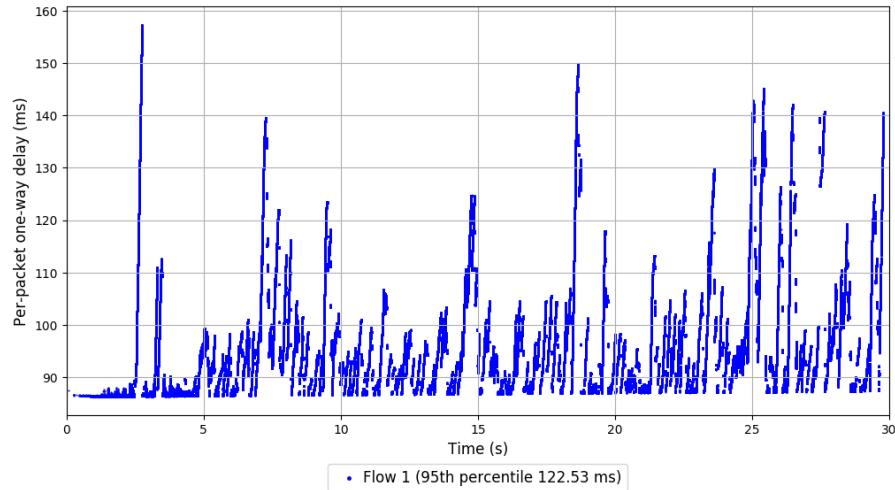
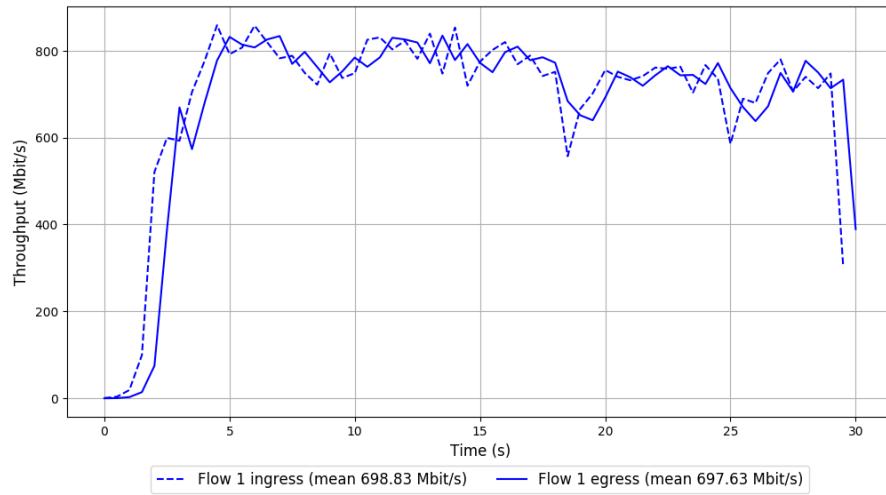


```
Run 3: Statistics of Muses\_DecisionTreeR0

Start at: 2019-12-11 04:14:26
End at: 2019-12-11 04:14:56
Local clock offset: 14.033 ms
Remote clock offset: 20.464 ms

# Below is generated by plot.py at 2019-12-11 07:05:48
# Datalink statistics
-- Total of 1 flow:
Average throughput: 697.63 Mbit/s
95th percentile per-packet one-way delay: 122.531 ms
Loss rate: 0.16%
-- Flow 1:
Average throughput: 697.63 Mbit/s
95th percentile per-packet one-way delay: 122.531 ms
Loss rate: 0.16%
```

Run 3: Report of Muses\_DecisionTreeR0 — Data Link

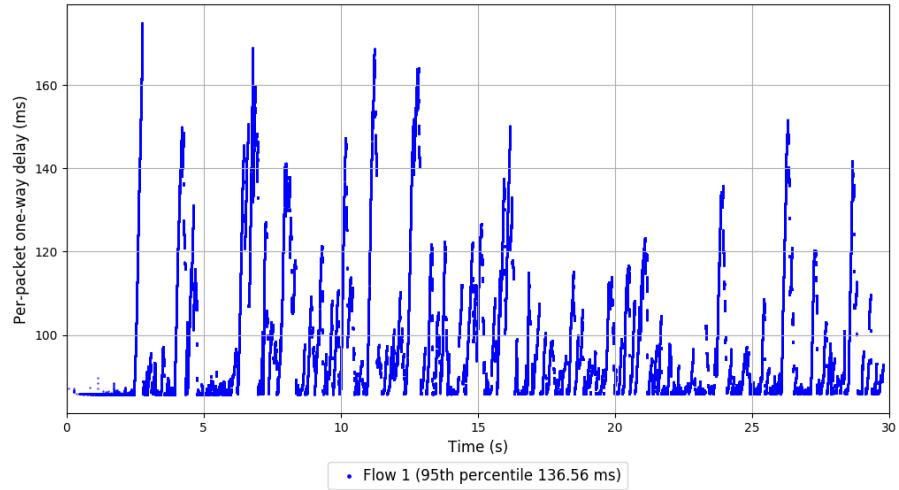
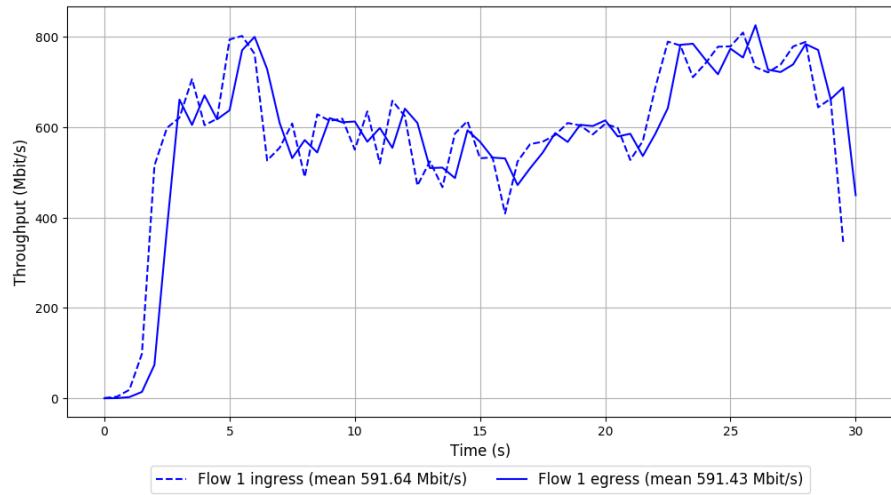


```
Run 4: Statistics of Muses\_DecisionTreeR0

Start at: 2019-12-11 04:49:37
End at: 2019-12-11 04:50:07
Local clock offset: 7.057 ms
Remote clock offset: 5.191 ms

# Below is generated by plot.py at 2019-12-11 07:06:57
# Datalink statistics
-- Total of 1 flow:
Average throughput: 591.43 Mbit/s
95th percentile per-packet one-way delay: 136.556 ms
Loss rate: 0.04%
-- Flow 1:
Average throughput: 591.43 Mbit/s
95th percentile per-packet one-way delay: 136.556 ms
Loss rate: 0.04%
```

Run 4: Report of Muses\_DecisionTreeR0 — Data Link

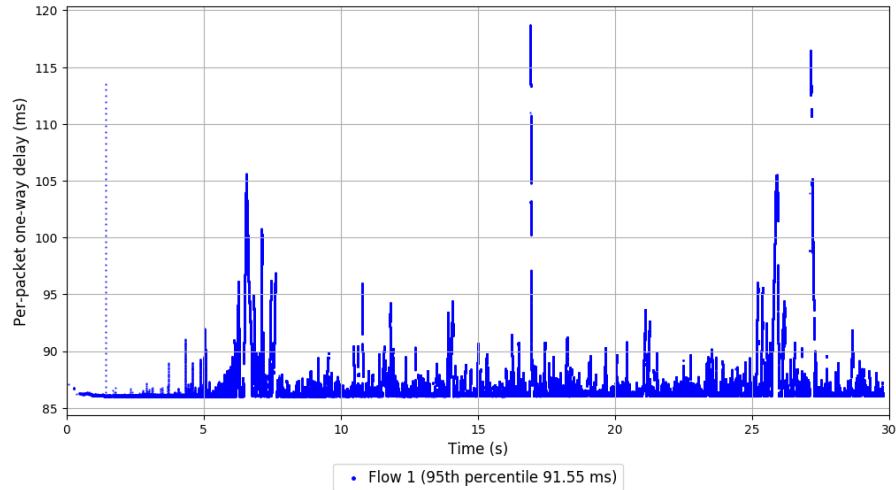
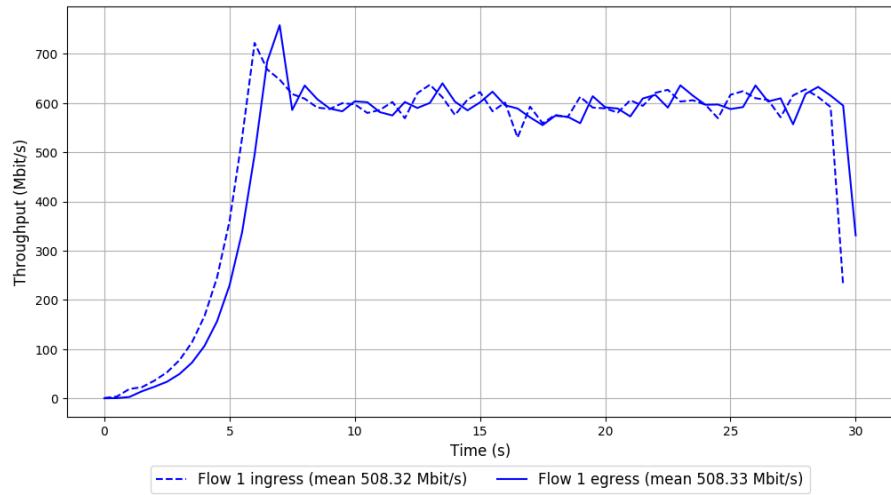


```
Run 5: Statistics of Muses\_DecisionTreeR0

Start at: 2019-12-11 05:24:31
End at: 2019-12-11 05:25:01
Local clock offset: 1.536 ms
Remote clock offset: 2.123 ms

# Below is generated by plot.py at 2019-12-11 07:06:57
# Datalink statistics
-- Total of 1 flow:
Average throughput: 508.33 Mbit/s
95th percentile per-packet one-way delay: 91.548 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 508.33 Mbit/s
95th percentile per-packet one-way delay: 91.548 ms
Loss rate: 0.00%
```

Run 5: Report of Muses\_DecisionTreeR0 — Data Link

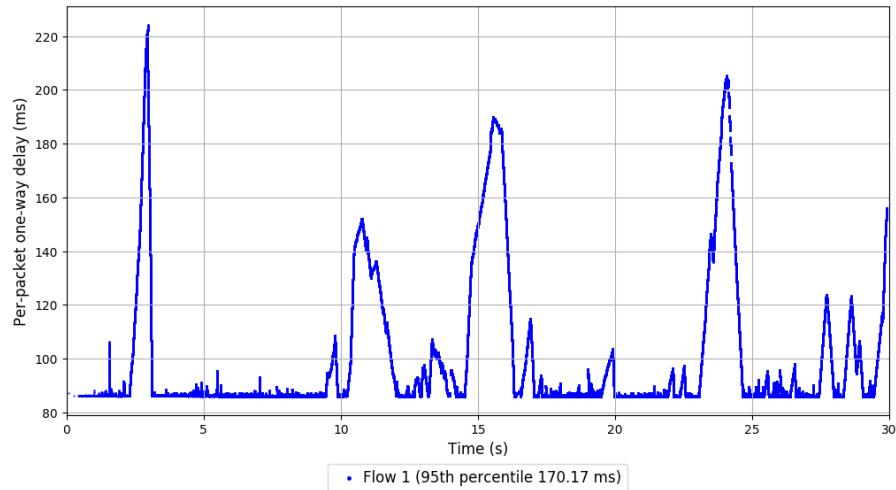
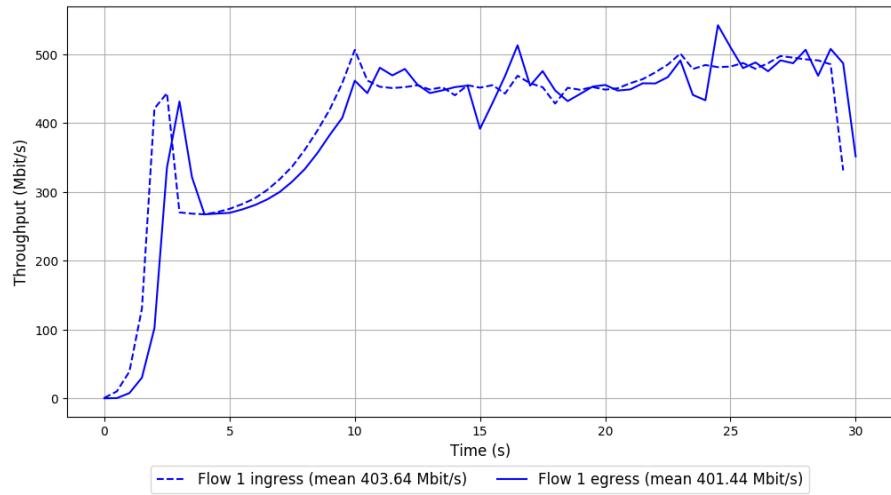


```
Run 1: Statistics of PCC-Allegro
```

```
Start at: 2019-12-11 03:06:11
End at: 2019-12-11 03:06:41
Local clock offset: 14.498 ms
Remote clock offset: 29.304 ms

# Below is generated by plot.py at 2019-12-11 07:10:45
# Datalink statistics
-- Total of 1 flow:
Average throughput: 401.44 Mbit/s
95th percentile per-packet one-way delay: 170.170 ms
Loss rate: 0.55%
-- Flow 1:
Average throughput: 401.44 Mbit/s
95th percentile per-packet one-way delay: 170.170 ms
Loss rate: 0.55%
```

Run 1: Report of PCC-Allegro — Data Link

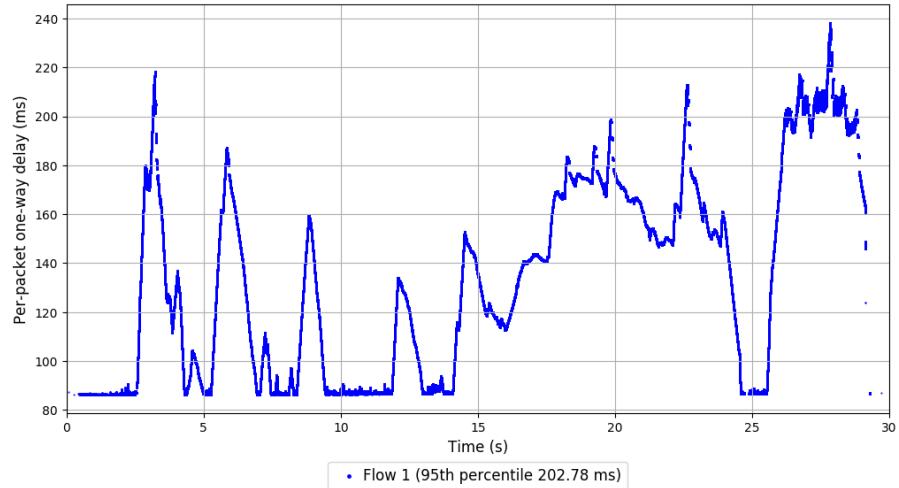
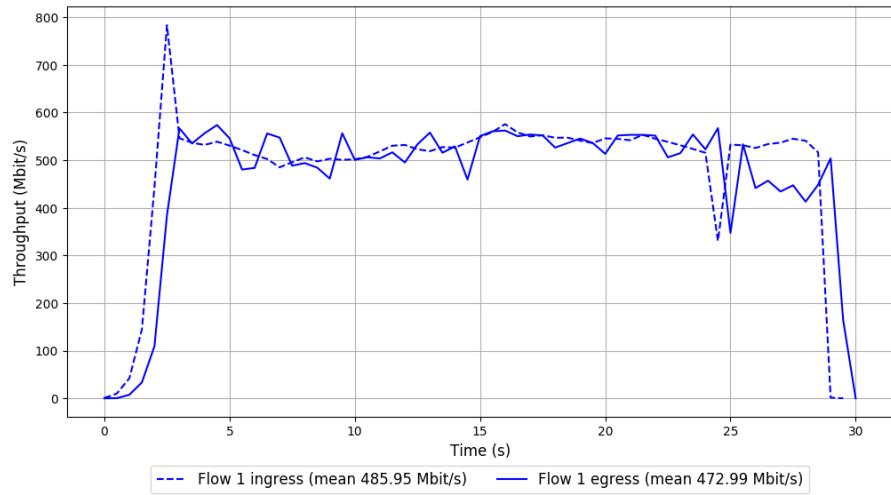


Run 2: Statistics of PCC-Allegro

```
Start at: 2019-12-11 03:40:41
End at: 2019-12-11 03:41:11
Local clock offset: 27.39 ms
Remote clock offset: 20.36 ms

# Below is generated by plot.py at 2019-12-11 07:12:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 472.99 Mbit/s
95th percentile per-packet one-way delay: 202.780 ms
Loss rate: 2.67%
-- Flow 1:
Average throughput: 472.99 Mbit/s
95th percentile per-packet one-way delay: 202.780 ms
Loss rate: 2.67%
```

Run 2: Report of PCC-Allegro — Data Link

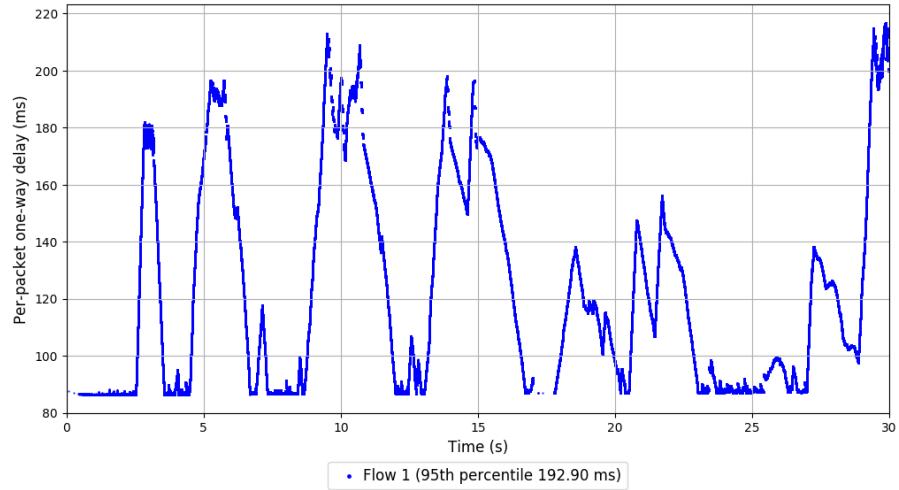
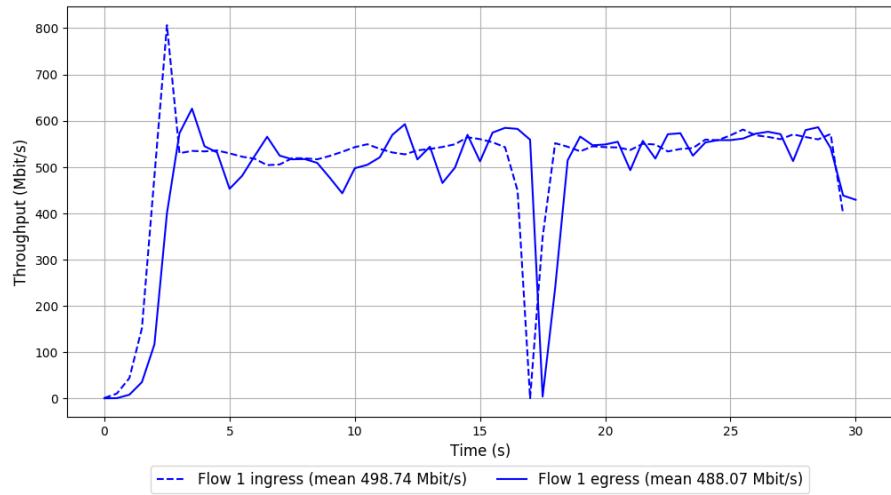


Run 3: Statistics of PCC-Allegro

```
Start at: 2019-12-11 04:16:05
End at: 2019-12-11 04:16:35
Local clock offset: 14.673 ms
Remote clock offset: 17.912 ms

# Below is generated by plot.py at 2019-12-11 07:13:55
# Datalink statistics
-- Total of 1 flow:
Average throughput: 488.07 Mbit/s
95th percentile per-packet one-way delay: 192.903 ms
Loss rate: 2.15%
-- Flow 1:
Average throughput: 488.07 Mbit/s
95th percentile per-packet one-way delay: 192.903 ms
Loss rate: 2.15%
```

Run 3: Report of PCC-Allegro — Data Link

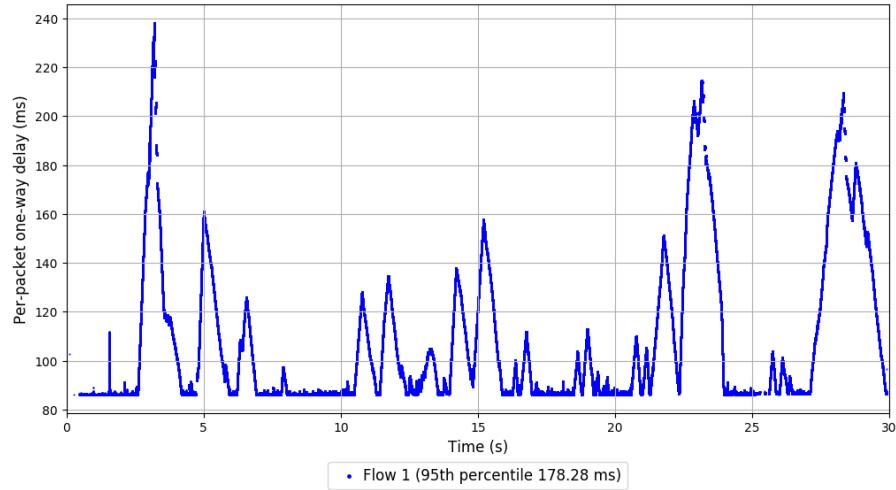
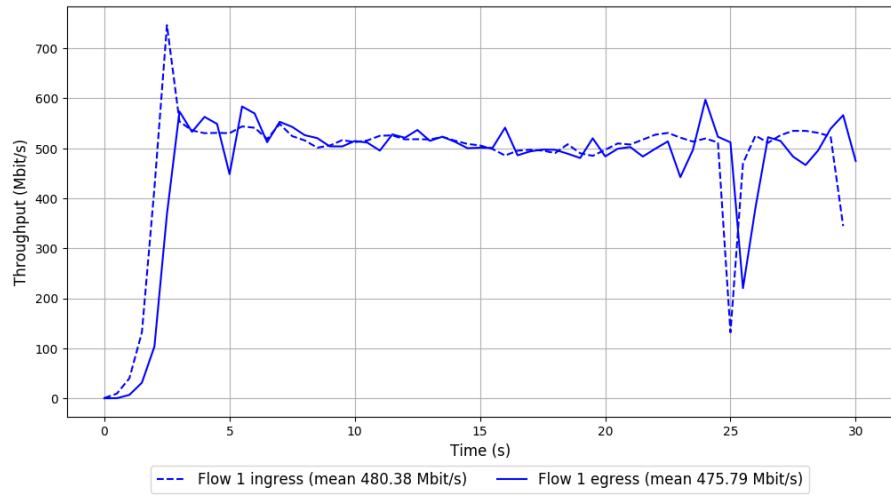


Run 4: Statistics of PCC-Allegro

```
Start at: 2019-12-11 04:51:11
End at: 2019-12-11 04:51:41
Local clock offset: 6.965 ms
Remote clock offset: 4.791 ms

# Below is generated by plot.py at 2019-12-11 07:13:55
# Datalink statistics
-- Total of 1 flow:
Average throughput: 475.79 Mbit/s
95th percentile per-packet one-way delay: 178.285 ms
Loss rate: 1.01%
-- Flow 1:
Average throughput: 475.79 Mbit/s
95th percentile per-packet one-way delay: 178.285 ms
Loss rate: 1.01%
```

Run 4: Report of PCC-Allegro — Data Link

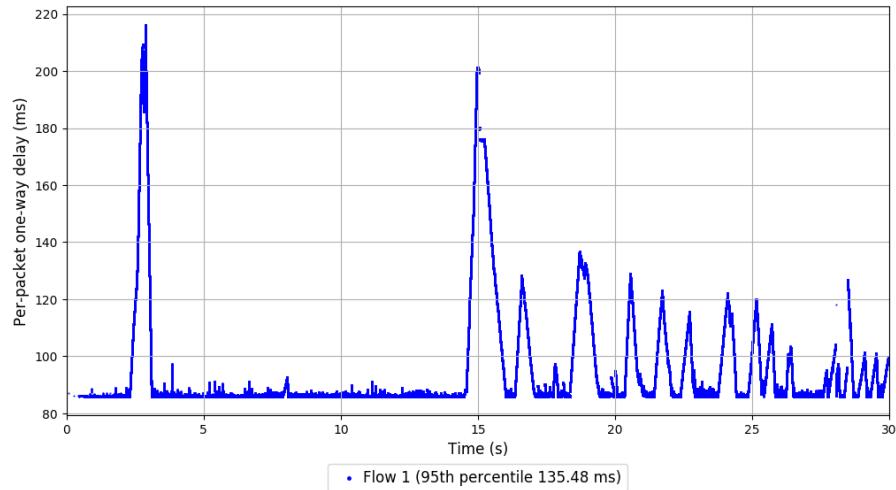
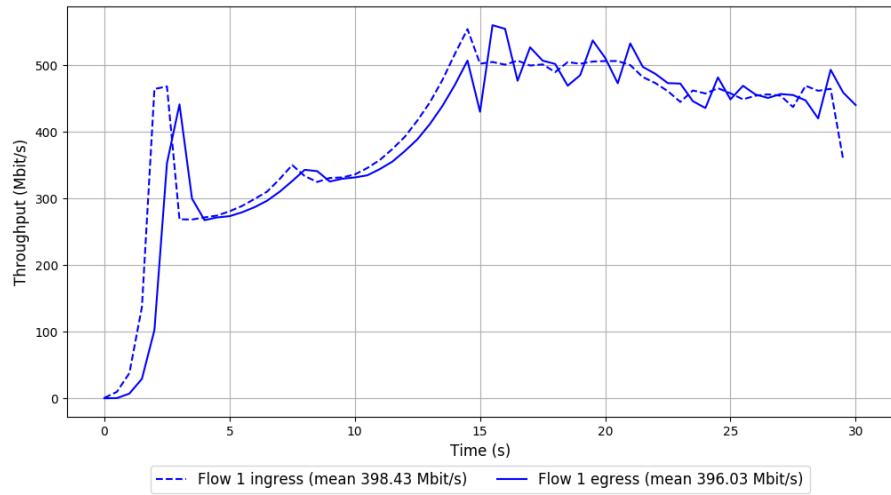


Run 5: Statistics of PCC-Allegro

```
Start at: 2019-12-11 05:26:02
End at: 2019-12-11 05:26:32
Local clock offset: 1.692 ms
Remote clock offset: 1.96 ms

# Below is generated by plot.py at 2019-12-11 07:17:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 396.03 Mbit/s
95th percentile per-packet one-way delay: 135.484 ms
Loss rate: 0.60%
-- Flow 1:
Average throughput: 396.03 Mbit/s
95th percentile per-packet one-way delay: 135.484 ms
Loss rate: 0.60%
```

Run 5: Report of PCC-Allegro — Data Link

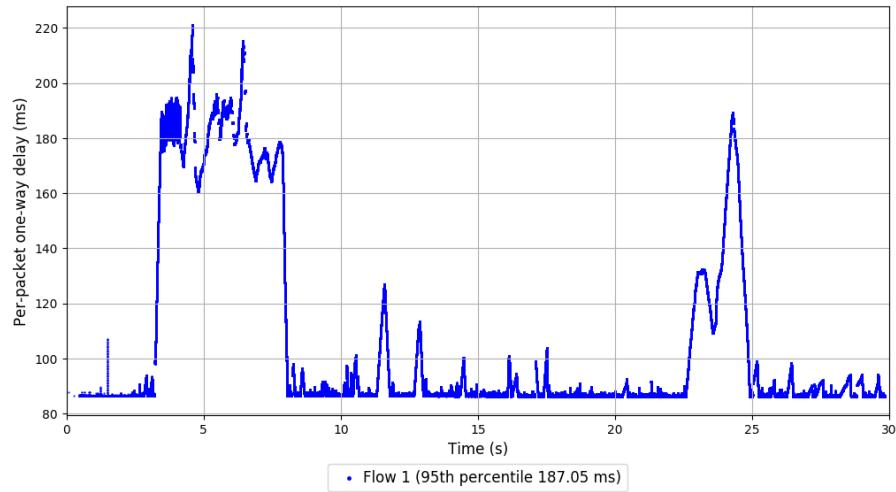
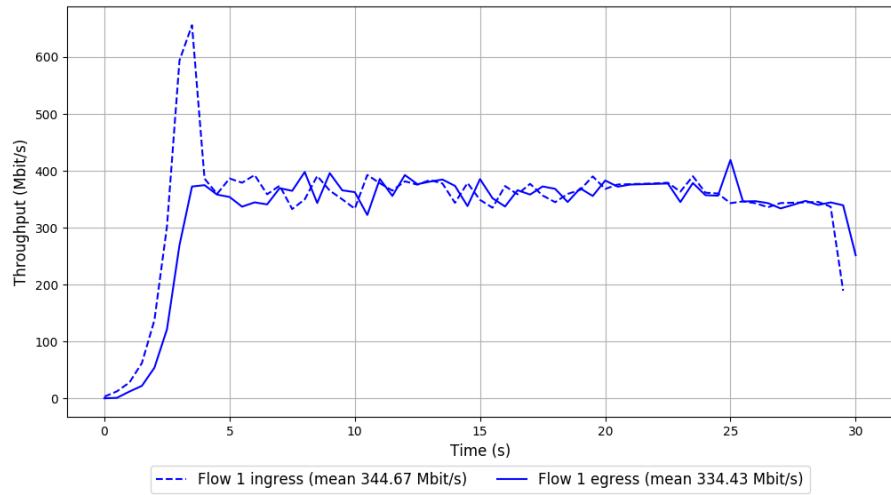


```
Run 1: Statistics of PCC-Expr
```

```
Start at: 2019-12-11 02:54:14
End at: 2019-12-11 02:54:44
Local clock offset: 12.419 ms
Remote clock offset: 19.775 ms

# Below is generated by plot.py at 2019-12-11 07:17:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 334.43 Mbit/s
95th percentile per-packet one-way delay: 187.049 ms
Loss rate: 2.98%
-- Flow 1:
Average throughput: 334.43 Mbit/s
95th percentile per-packet one-way delay: 187.049 ms
Loss rate: 2.98%
```

Run 1: Report of PCC-Expr — Data Link

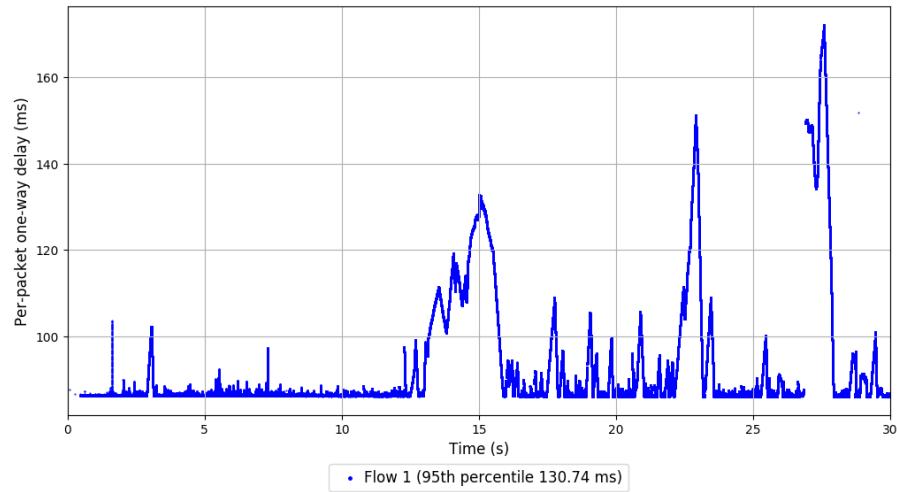
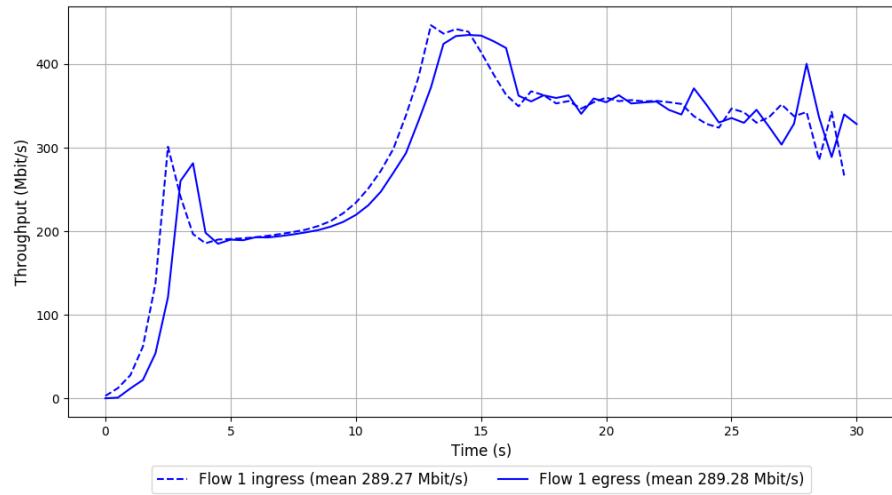


Run 2: Statistics of PCC-Expr

```
Start at: 2019-12-11 03:29:36
End at: 2019-12-11 03:30:06
Local clock offset: 18.876 ms
Remote clock offset: 22.816 ms

# Below is generated by plot.py at 2019-12-11 07:17:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 289.28 Mbit/s
95th percentile per-packet one-way delay: 130.736 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 289.28 Mbit/s
95th percentile per-packet one-way delay: 130.736 ms
Loss rate: 0.00%
```

Run 2: Report of PCC-Expr — Data Link

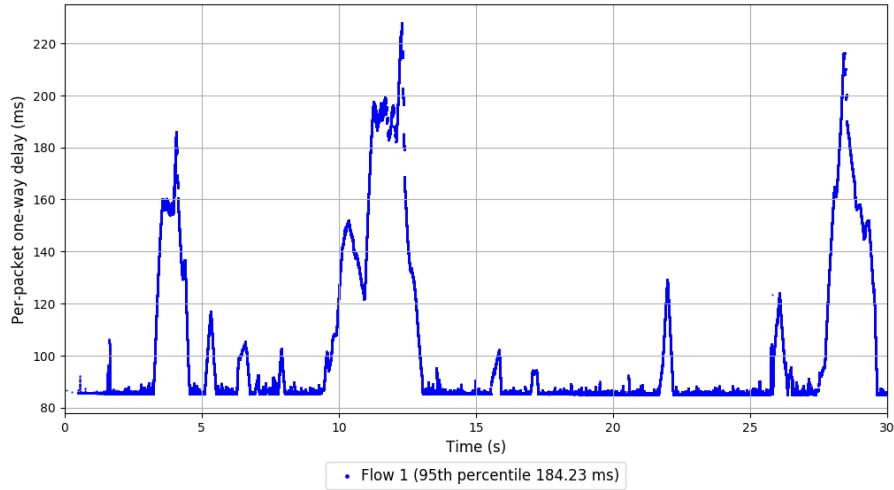
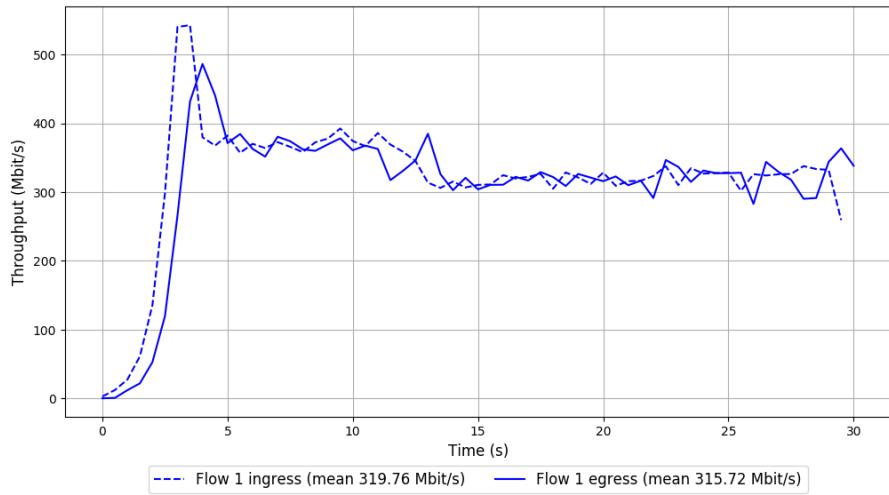


Run 3: Statistics of PCC-Expr

```
Start at: 2019-12-11 04:04:03
End at: 2019-12-11 04:04:33
Local clock offset: 12.242 ms
Remote clock offset: 36.478 ms

# Below is generated by plot.py at 2019-12-11 07:17:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 315.72 Mbit/s
95th percentile per-packet one-way delay: 184.230 ms
Loss rate: 1.27%
-- Flow 1:
Average throughput: 315.72 Mbit/s
95th percentile per-packet one-way delay: 184.230 ms
Loss rate: 1.27%
```

Run 3: Report of PCC-Expr — Data Link

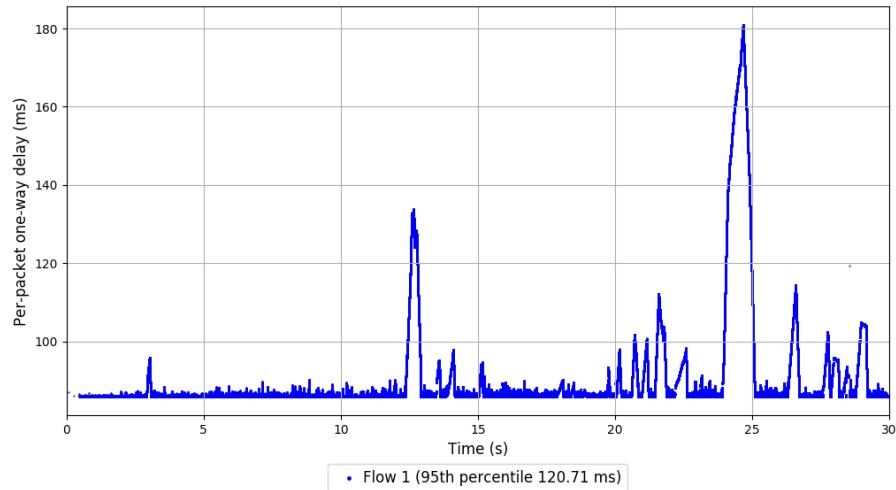
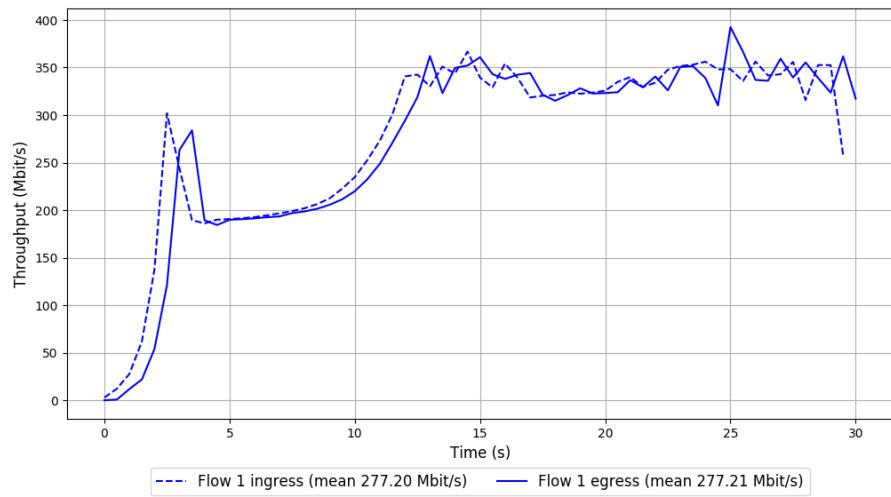


Run 4: Statistics of PCC-Expr

```
Start at: 2019-12-11 04:39:19
End at: 2019-12-11 04:39:49
Local clock offset: 5.739 ms
Remote clock offset: 10.127 ms

# Below is generated by plot.py at 2019-12-11 07:18:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 277.21 Mbit/s
95th percentile per-packet one-way delay: 120.710 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 277.21 Mbit/s
95th percentile per-packet one-way delay: 120.710 ms
Loss rate: 0.00%
```

Run 4: Report of PCC-Expr — Data Link

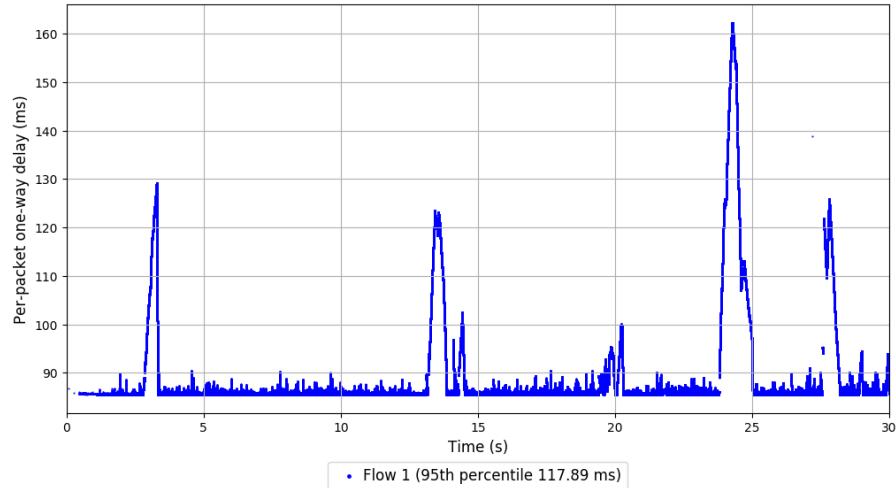
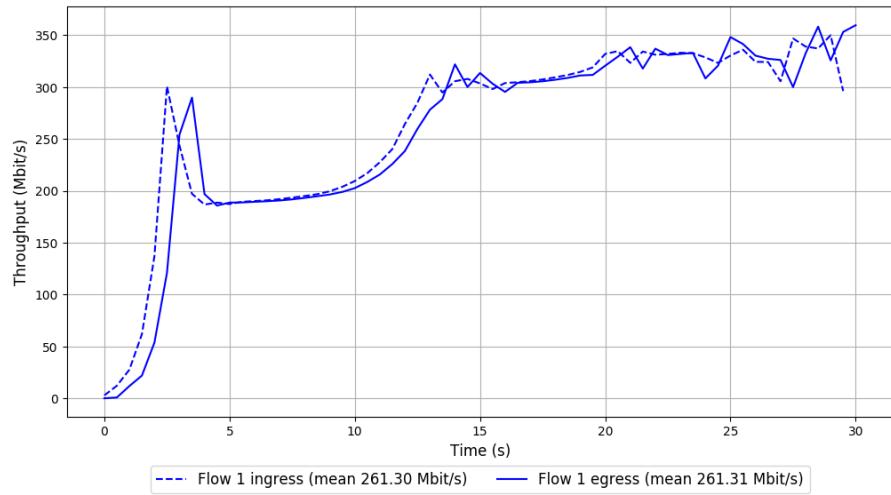


Run 5: Statistics of PCC-Expr

```
Start at: 2019-12-11 05:14:25
End at: 2019-12-11 05:14:55
Local clock offset: 1.925 ms
Remote clock offset: 4.366 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 261.31 Mbit/s
95th percentile per-packet one-way delay: 117.885 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 261.31 Mbit/s
95th percentile per-packet one-way delay: 117.885 ms
Loss rate: 0.00%
```

Run 5: Report of PCC-Expr — Data Link

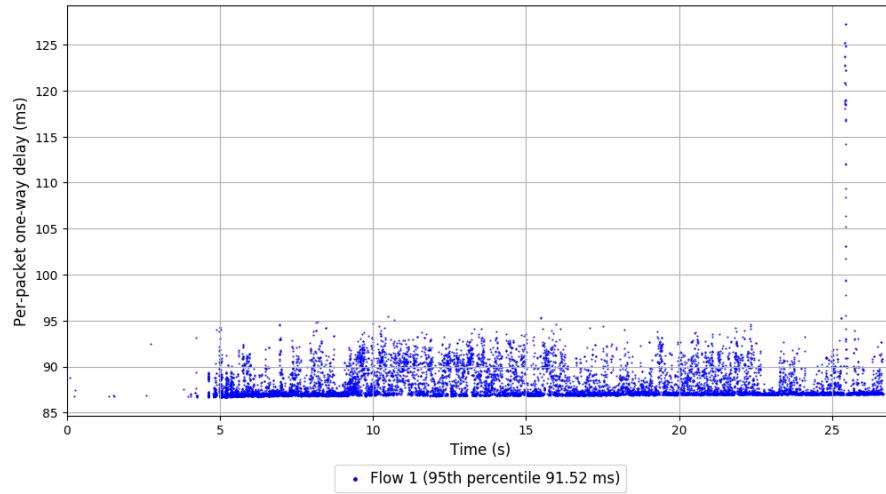
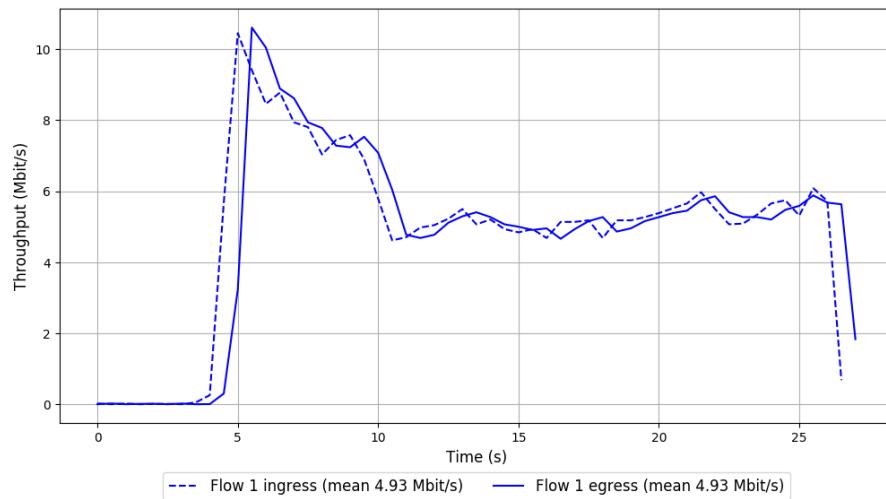


```
Run 1: Statistics of QUIC Cubic
```

```
Start at: 2019-12-11 03:03:22
End at: 2019-12-11 03:03:53
Local clock offset: 12.184 ms
Remote clock offset: 27.68 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 4.93 Mbit/s
95th percentile per-packet one-way delay: 91.521 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 4.93 Mbit/s
95th percentile per-packet one-way delay: 91.521 ms
Loss rate: 0.00%
```

Run 1: Report of QUIC Cubic — Data Link

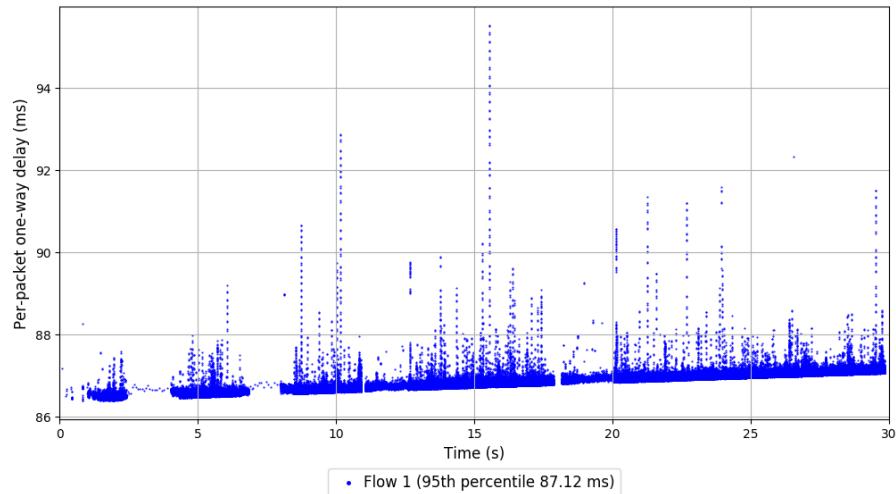
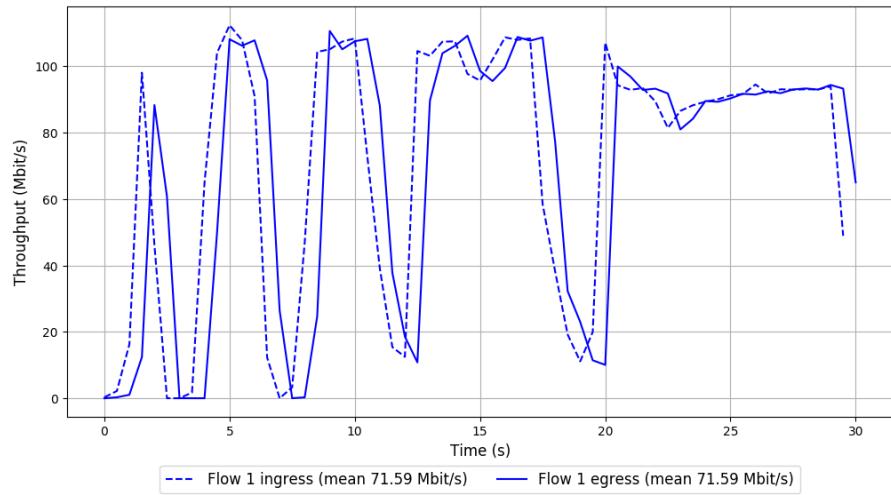


Run 2: Statistics of QUIC Cubic

```
Start at: 2019-12-11 03:38:20
End at: 2019-12-11 03:38:50
Local clock offset: 25.346 ms
Remote clock offset: 21.37 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 71.59 Mbit/s
95th percentile per-packet one-way delay: 87.122 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 71.59 Mbit/s
95th percentile per-packet one-way delay: 87.122 ms
Loss rate: 0.00%
```

Run 2: Report of QUIC Cubic — Data Link

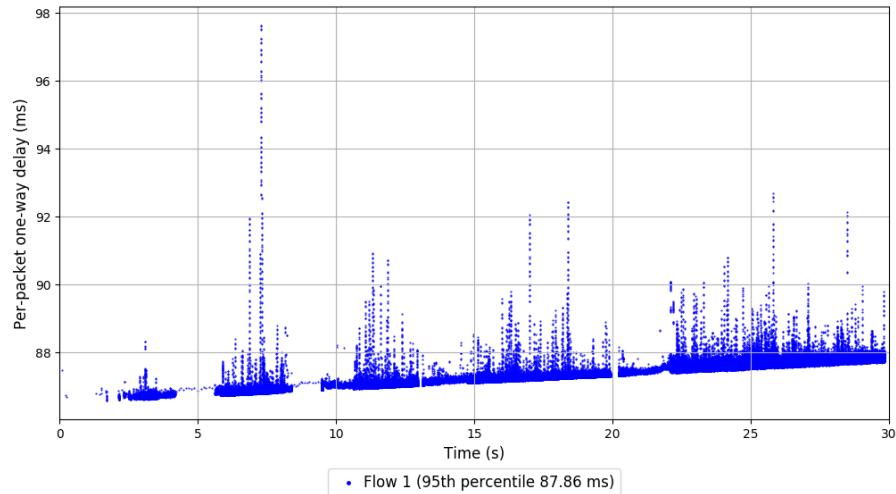
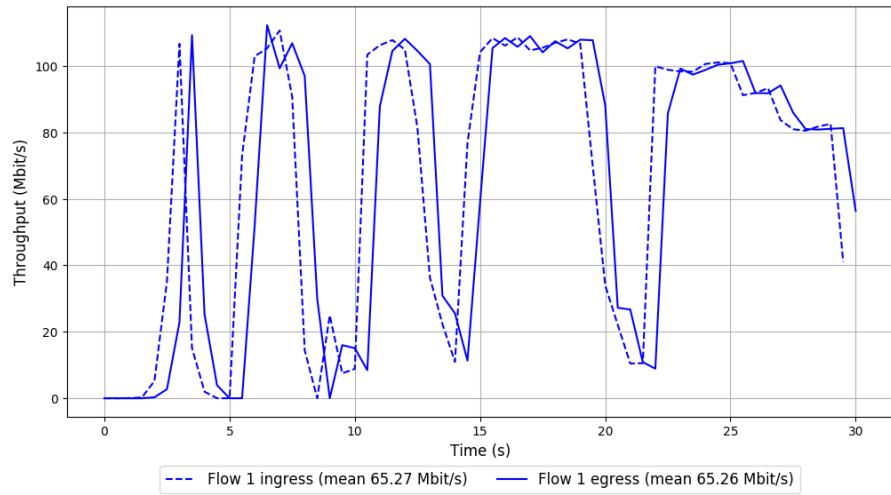


Run 3: Statistics of QUIC Cubic

```
Start at: 2019-12-11 04:13:14
End at: 2019-12-11 04:13:44
Local clock offset: 13.738 ms
Remote clock offset: 23.286 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 65.26 Mbit/s
95th percentile per-packet one-way delay: 87.858 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 65.26 Mbit/s
95th percentile per-packet one-way delay: 87.858 ms
Loss rate: 0.00%
```

Run 3: Report of QUIC Cubic — Data Link

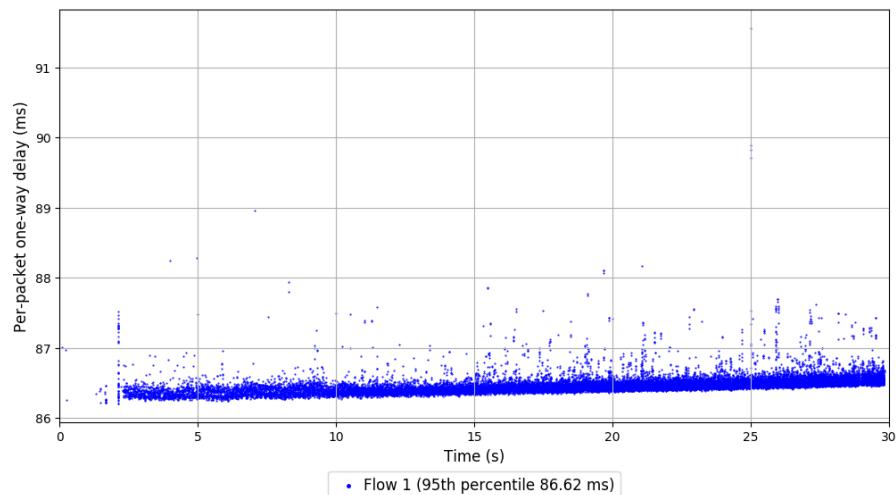
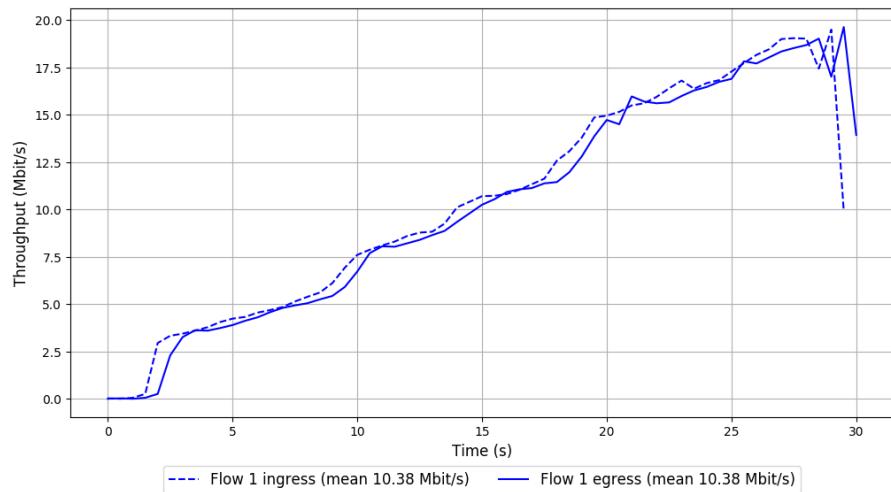


Run 4: Statistics of QUIC Cubic

```
Start at: 2019-12-11 04:48:27
End at: 2019-12-11 04:48:57
Local clock offset: 6.632 ms
Remote clock offset: 5.669 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 10.38 Mbit/s
95th percentile per-packet one-way delay: 86.617 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 10.38 Mbit/s
95th percentile per-packet one-way delay: 86.617 ms
Loss rate: 0.00%
```

#### Run 4: Report of QUIC Cubic — Data Link

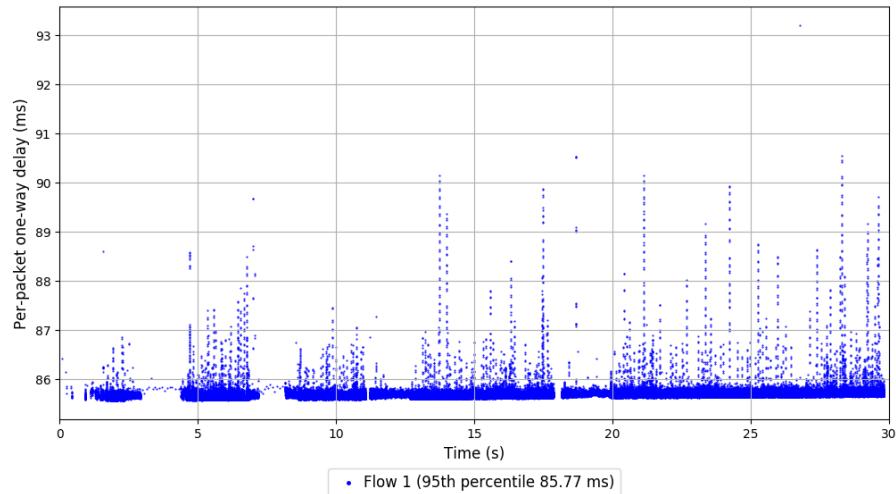
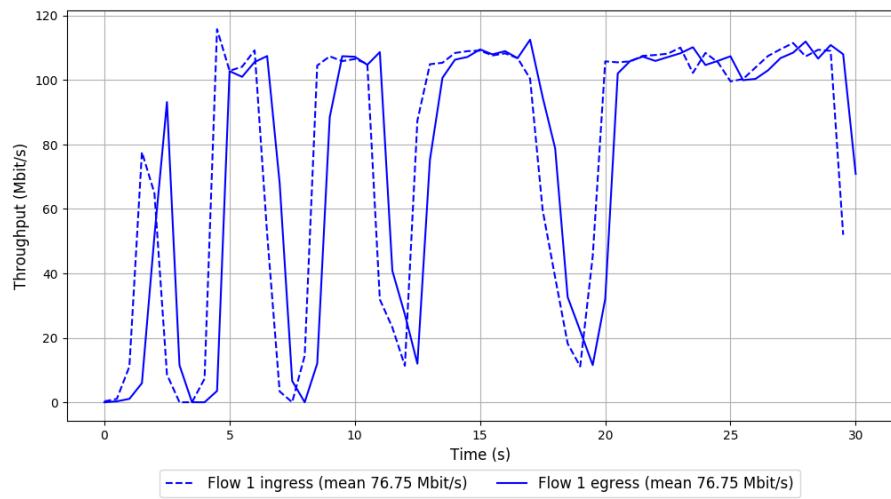


Run 5: Statistics of QUIC Cubic

```
Start at: 2019-12-11 05:23:19
End at: 2019-12-11 05:23:49
Local clock offset: 1.9 ms
Remote clock offset: 2.338 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 76.75 Mbit/s
95th percentile per-packet one-way delay: 85.773 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 76.75 Mbit/s
95th percentile per-packet one-way delay: 85.773 ms
Loss rate: 0.00%
```

Run 5: Report of QUIC Cubic — Data Link

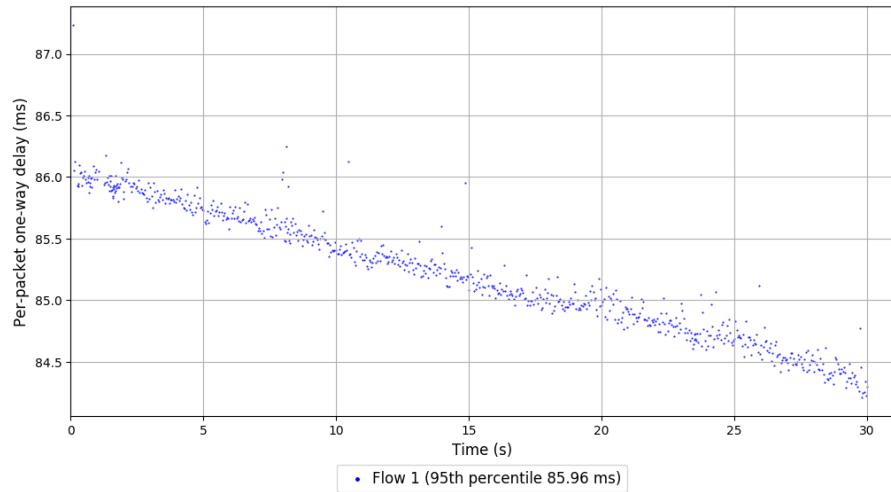
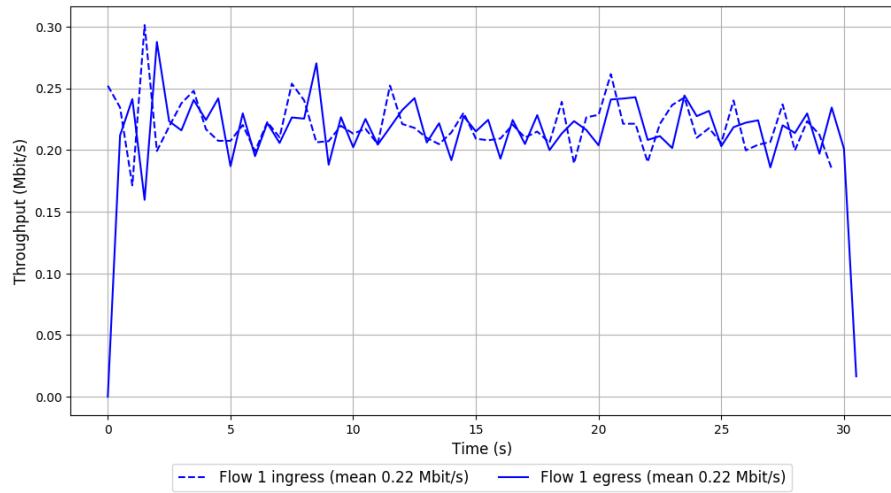


```
Run 1: Statistics of SCReAM

Start at: 2019-12-11 02:50:05
End at: 2019-12-11 02:50:35
Local clock offset: 7.243 ms
Remote clock offset: 21.711 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 85.960 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 85.960 ms
Loss rate: 0.00%
```

Run 1: Report of SCReAM — Data Link

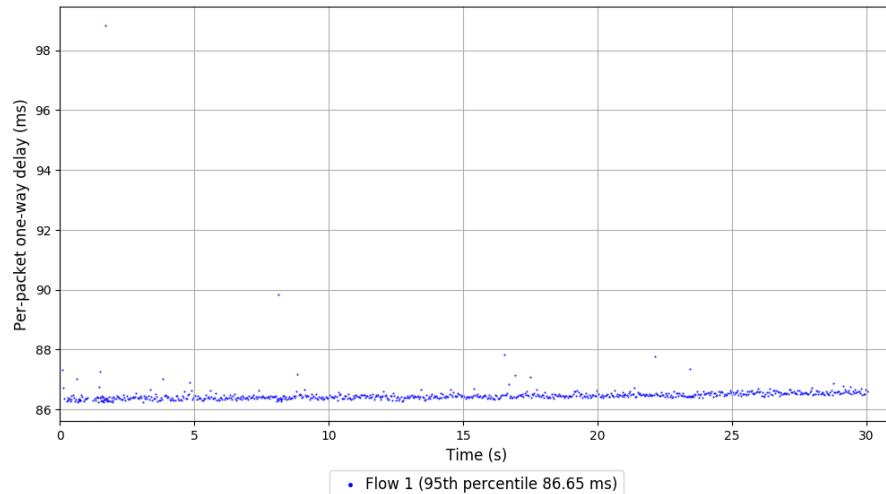
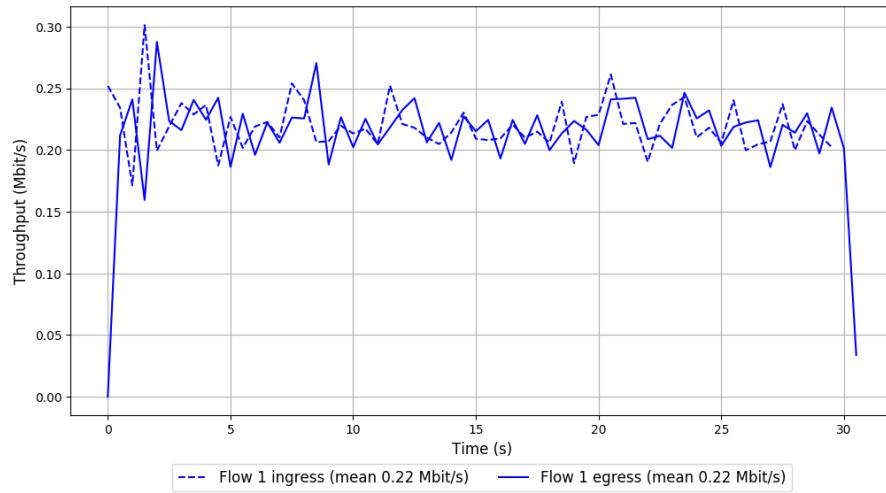


Run 2: Statistics of SCReAM

```
Start at: 2019-12-11 03:25:33
End at: 2019-12-11 03:26:03
Local clock offset: 16.886 ms
Remote clock offset: 20.495 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 86.647 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 86.647 ms
Loss rate: 0.00%
```

Run 2: Report of SCReAM — Data Link

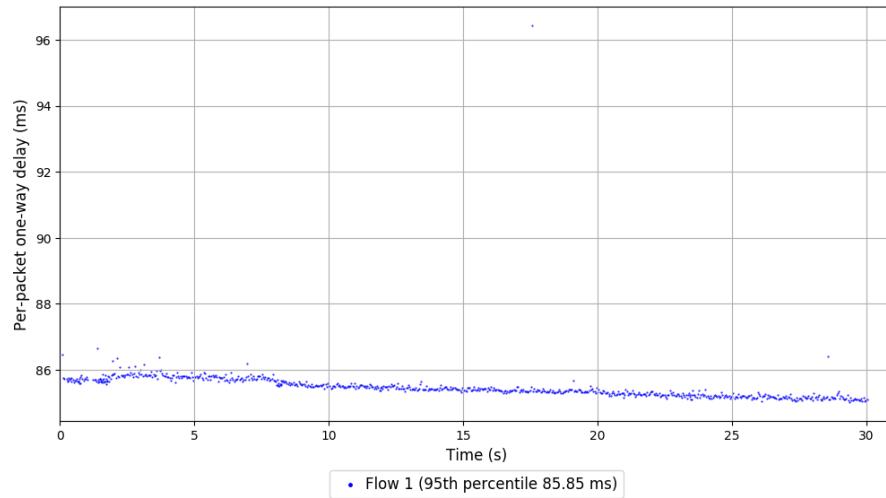
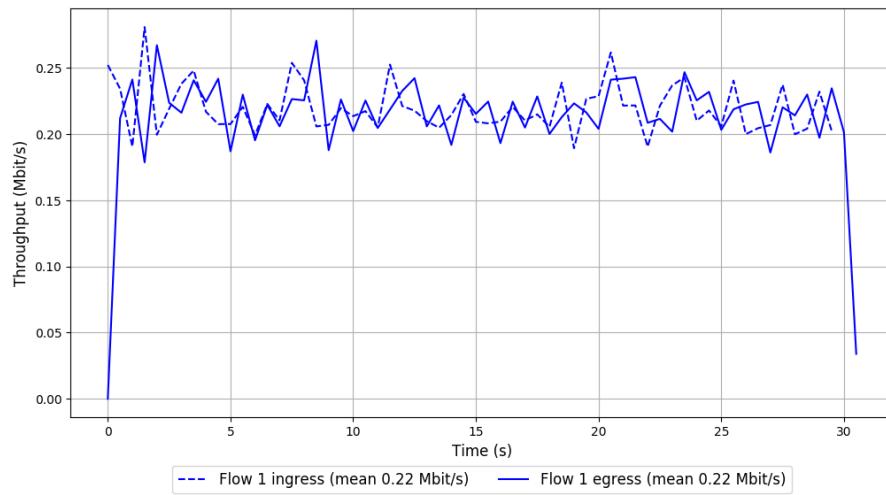


Run 3: Statistics of SCReAM

```
Start at: 2019-12-11 04:00:01
End at: 2019-12-11 04:00:31
Local clock offset: 12.902 ms
Remote clock offset: 32.273 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 85.846 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 85.846 ms
Loss rate: 0.00%
```

Run 3: Report of SCReAM — Data Link

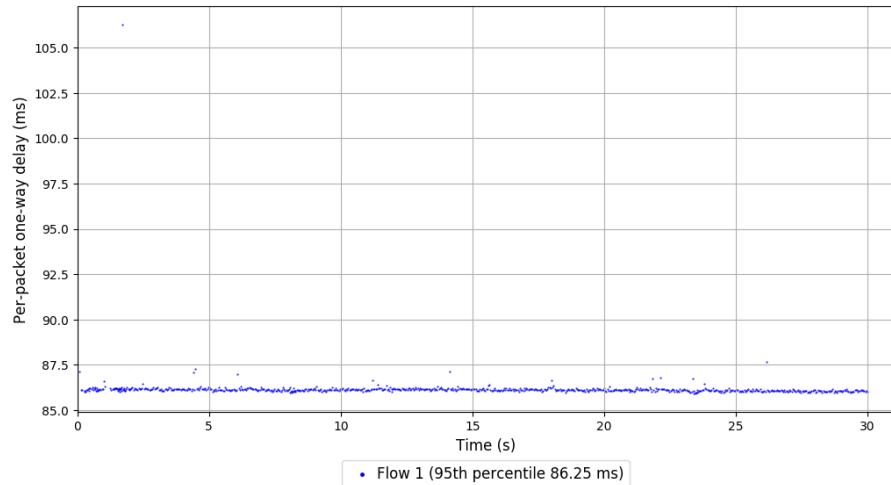
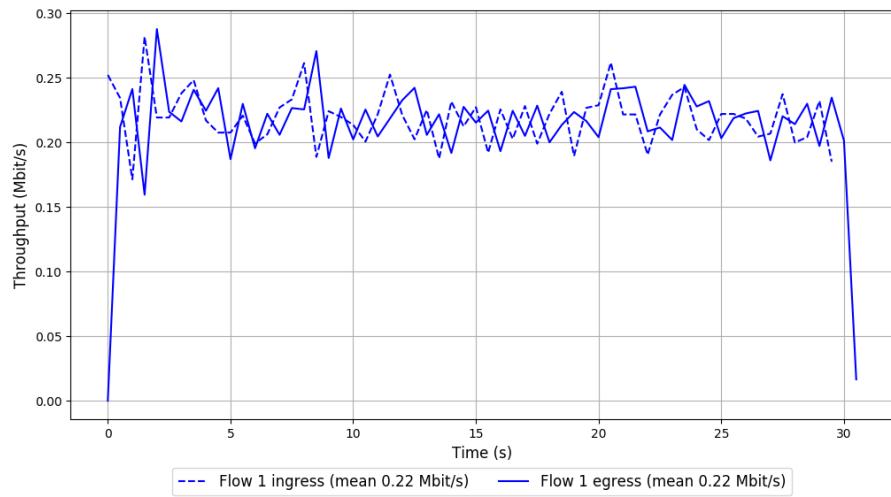


Run 4: Statistics of SCReAM

```
Start at: 2019-12-11 04:35:13
End at: 2019-12-11 04:35:43
Local clock offset: 6.04 ms
Remote clock offset: 9.583 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 86.248 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 86.248 ms
Loss rate: 0.00%
```

### Run 4: Report of SCReAM — Data Link

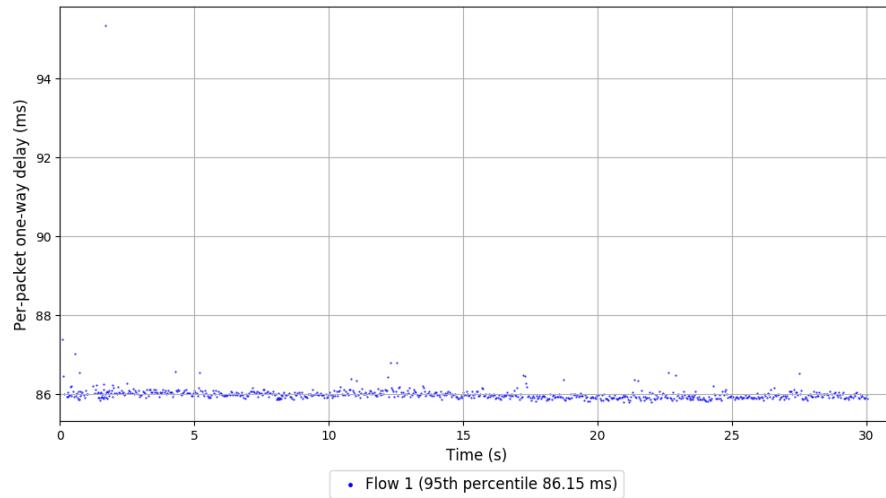
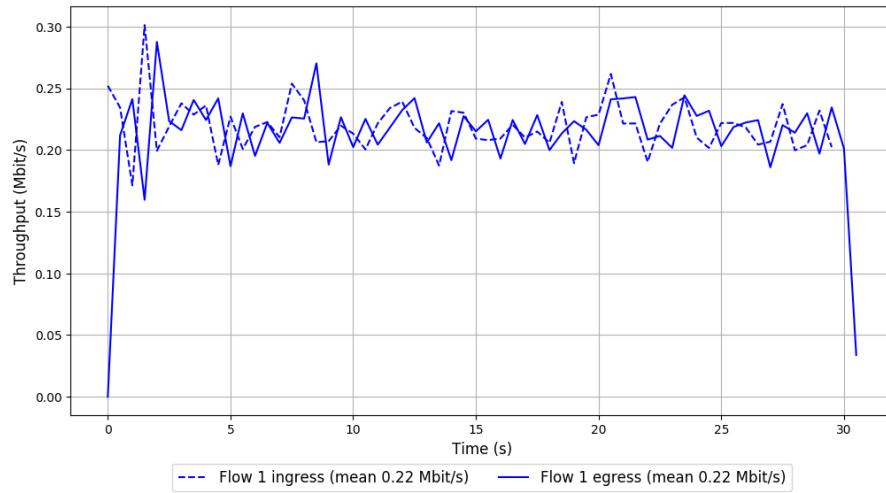


Run 5: Statistics of SCReAM

```
Start at: 2019-12-11 05:10:13
End at: 2019-12-11 05:10:43
Local clock offset: 1.987 ms
Remote clock offset: 3.952 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 86.154 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 86.154 ms
Loss rate: 0.00%
```

Run 5: Report of SCReAM — Data Link

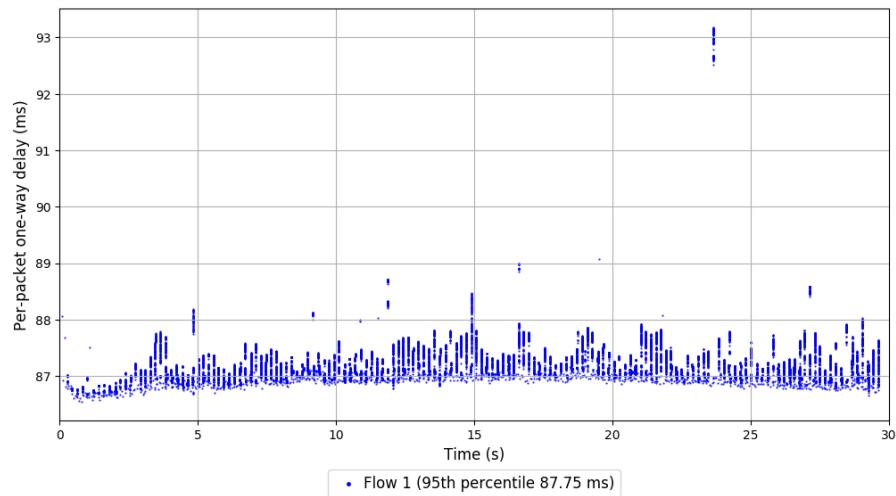
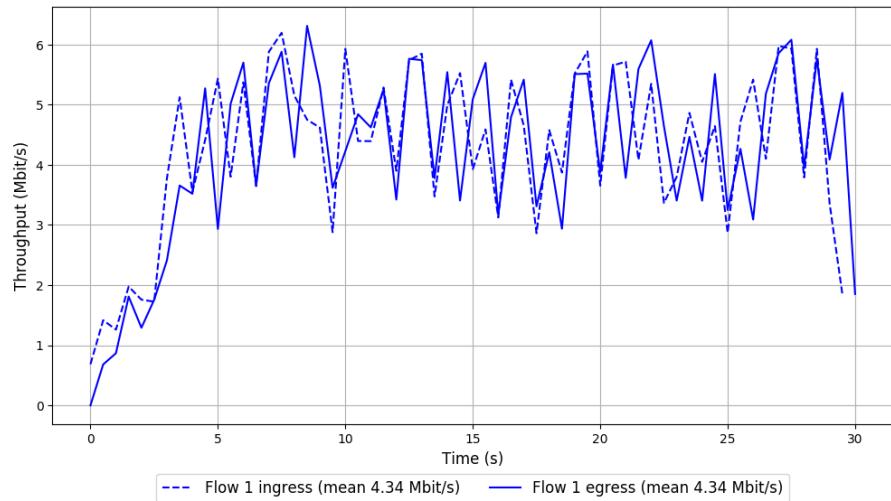


Run 1: Statistics of Sprout

```
Start at: 2019-12-11 02:43:04
End at: 2019-12-11 02:43:34
Local clock offset: 5.372 ms
Remote clock offset: 26.79 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 4.34 Mbit/s
95th percentile per-packet one-way delay: 87.747 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 4.34 Mbit/s
95th percentile per-packet one-way delay: 87.747 ms
Loss rate: 0.00%
```

Run 1: Report of Sprout — Data Link

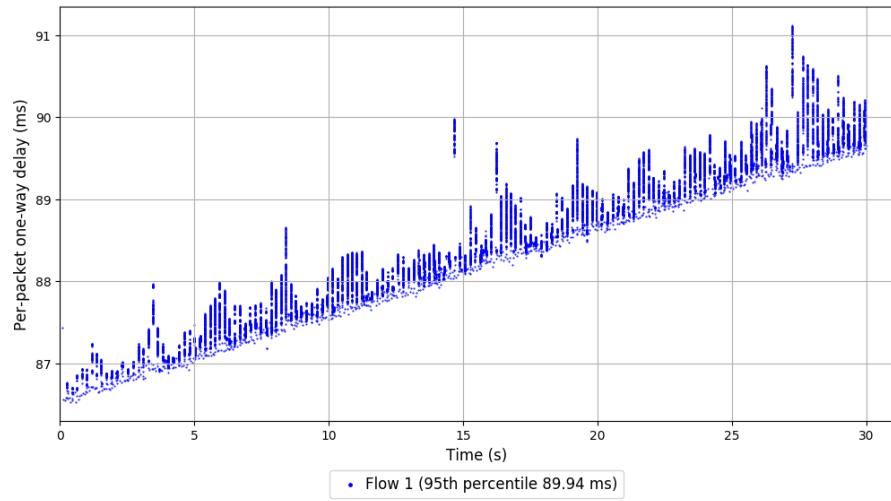
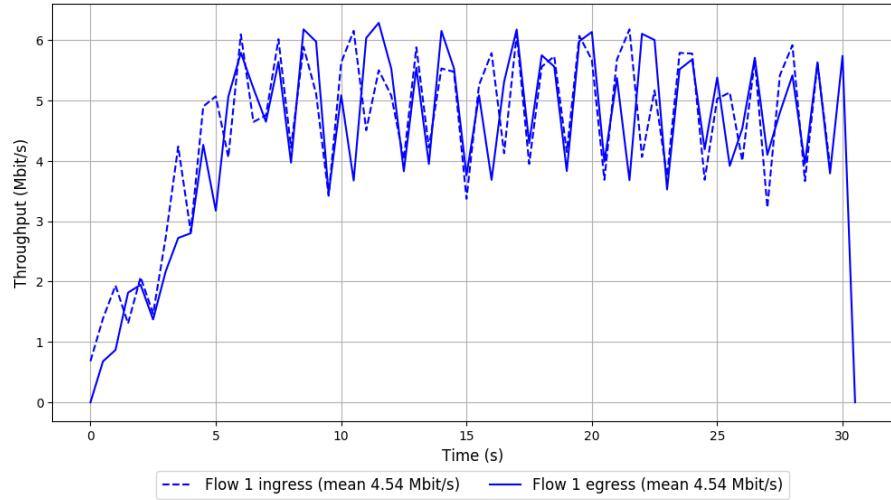


Run 2: Statistics of Sprout

```
Start at: 2019-12-11 03:18:17
End at: 2019-12-11 03:18:47
Local clock offset: 16.35 ms
Remote clock offset: 39.311 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 4.54 Mbit/s
95th percentile per-packet one-way delay: 89.935 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 4.54 Mbit/s
95th percentile per-packet one-way delay: 89.935 ms
Loss rate: 0.00%
```

Run 2: Report of Sprout — Data Link

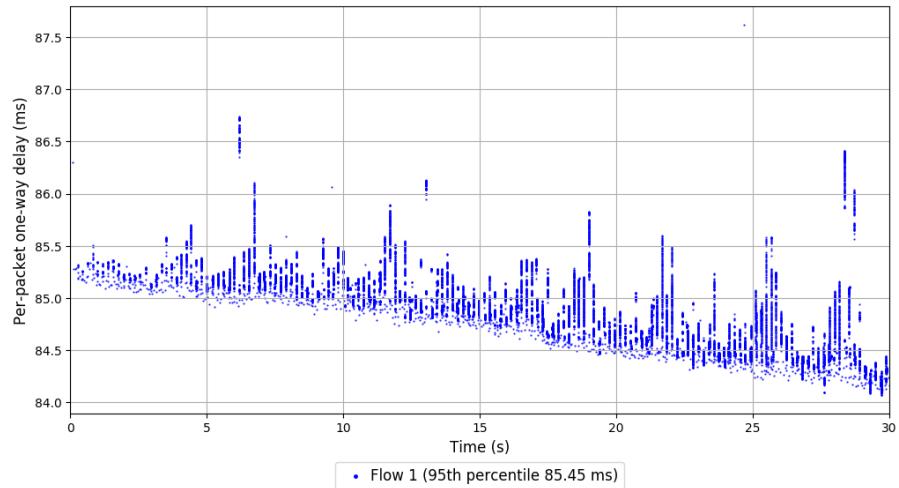
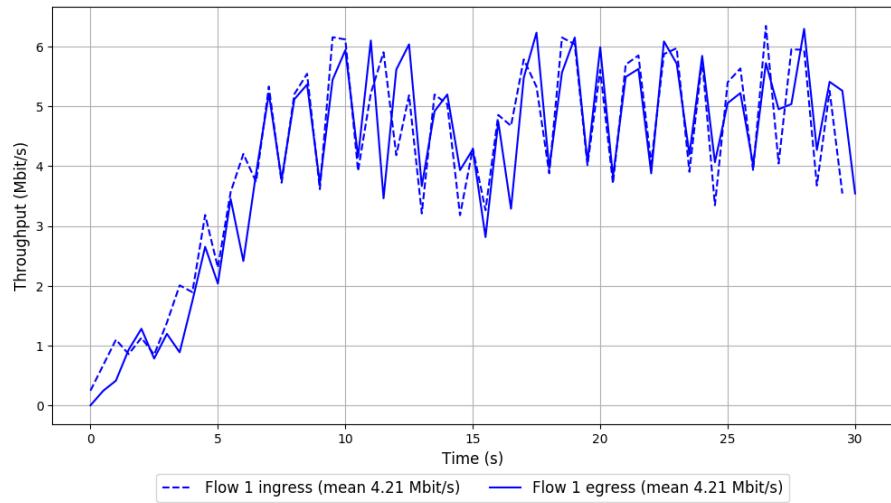


Run 3: Statistics of Sprout

```
Start at: 2019-12-11 03:52:41
End at: 2019-12-11 03:53:11
Local clock offset: 18.768 ms
Remote clock offset: 25.393 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 4.21 Mbit/s
95th percentile per-packet one-way delay: 85.448 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 4.21 Mbit/s
95th percentile per-packet one-way delay: 85.448 ms
Loss rate: 0.00%
```

### Run 3: Report of Sprout — Data Link

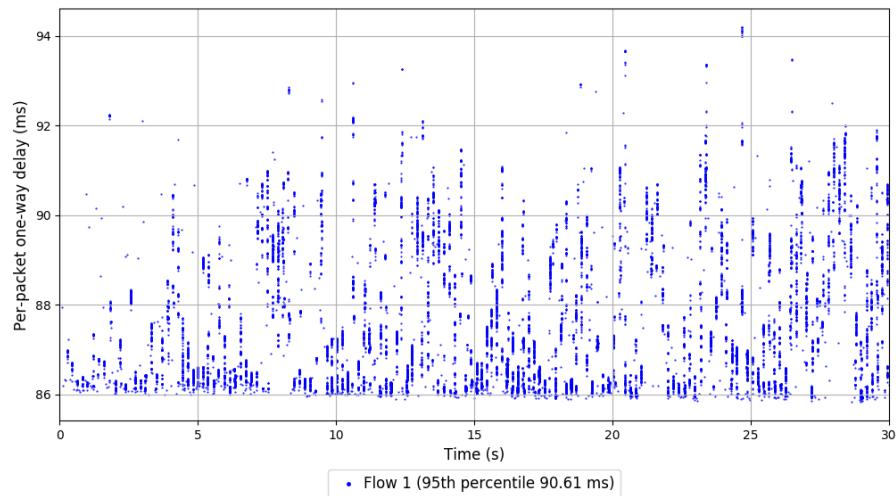
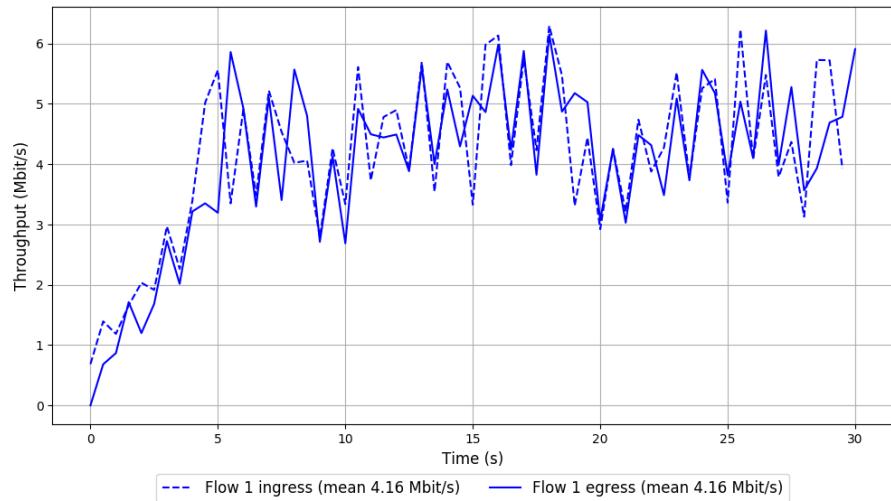


Run 4: Statistics of Sprout

```
Start at: 2019-12-11 04:27:51
End at: 2019-12-11 04:28:21
Local clock offset: 8.6 ms
Remote clock offset: 9.644 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 4.16 Mbit/s
95th percentile per-packet one-way delay: 90.613 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 4.16 Mbit/s
95th percentile per-packet one-way delay: 90.613 ms
Loss rate: 0.00%
```

## Run 4: Report of Sprout — Data Link

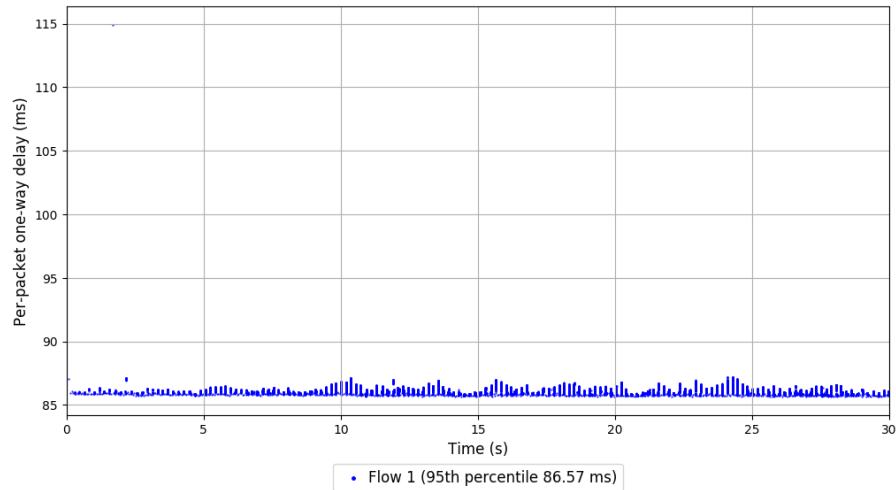
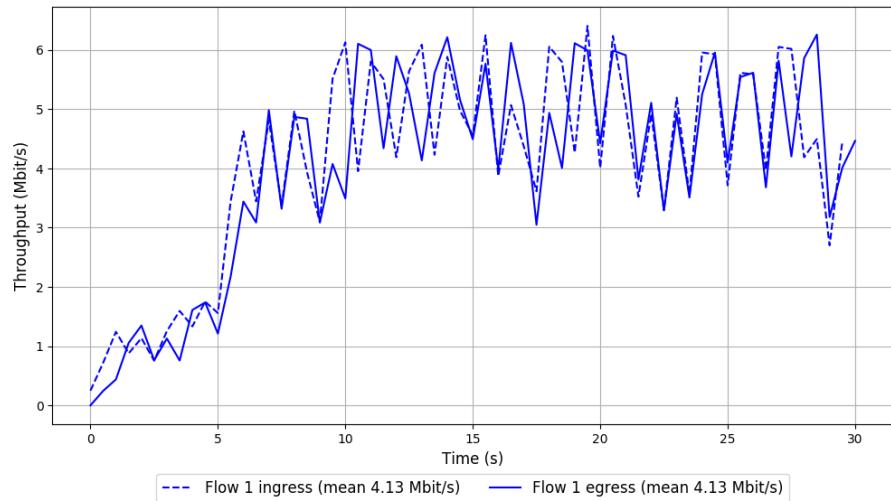


Run 5: Statistics of Sprout

```
Start at: 2019-12-11 05:02:55
End at: 2019-12-11 05:03:25
Local clock offset: 3.411 ms
Remote clock offset: 3.544 ms

# Below is generated by plot.py at 2019-12-11 07:20:51
# Datalink statistics
-- Total of 1 flow:
Average throughput: 4.13 Mbit/s
95th percentile per-packet one-way delay: 86.574 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 4.13 Mbit/s
95th percentile per-packet one-way delay: 86.574 ms
Loss rate: 0.00%
```

### Run 5: Report of Sprout — Data Link

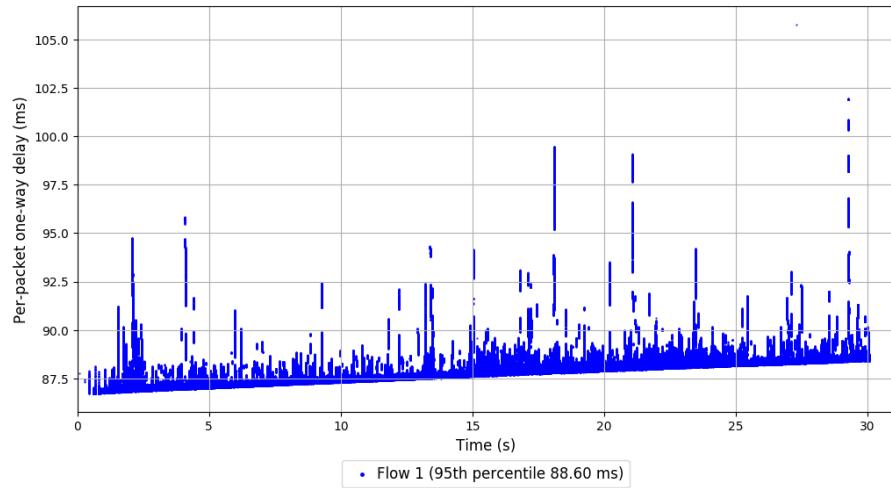
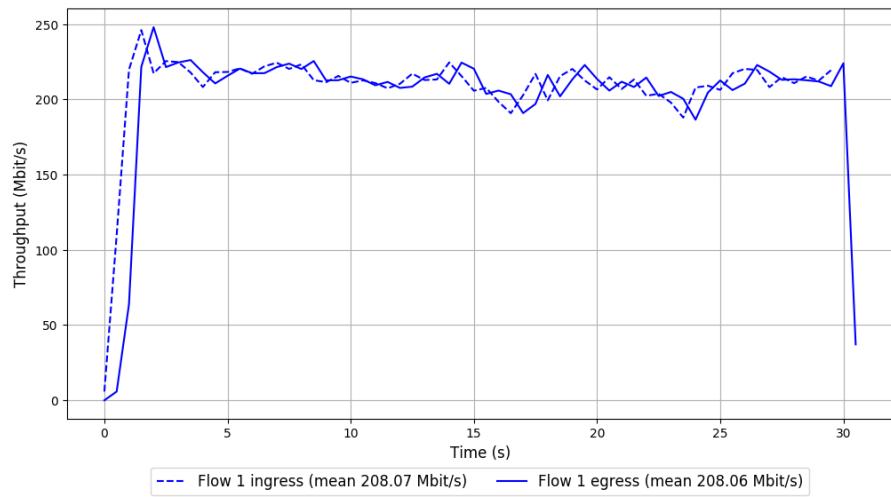


Run 1: Statistics of TaoVA-100x

```
Start at: 2019-12-11 03:00:33
End at: 2019-12-11 03:01:03
Local clock offset: 10.578 ms
Remote clock offset: 32.718 ms

# Below is generated by plot.py at 2019-12-11 07:21:42
# Datalink statistics
-- Total of 1 flow:
Average throughput: 208.06 Mbit/s
95th percentile per-packet one-way delay: 88.602 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 208.06 Mbit/s
95th percentile per-packet one-way delay: 88.602 ms
Loss rate: 0.00%
```

Run 1: Report of TaoVA-100x — Data Link

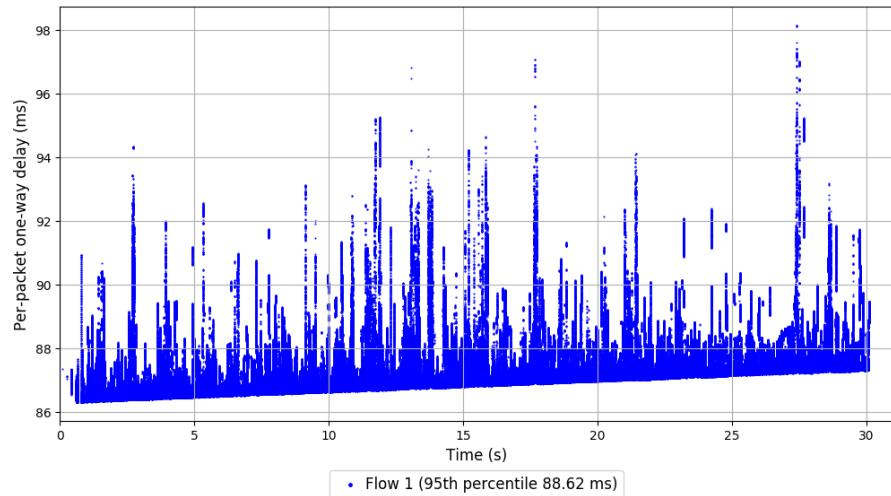
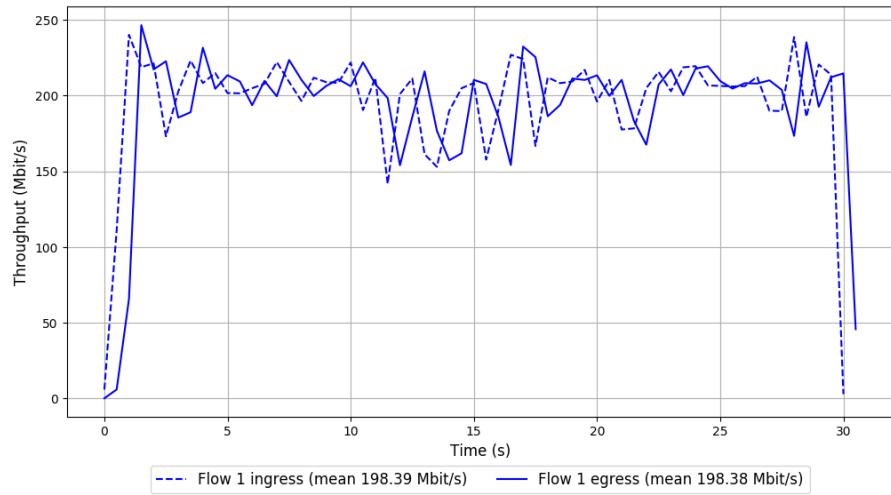


Run 2: Statistics of TaoVA-100x

```
Start at: 2019-12-11 03:35:46
End at: 2019-12-11 03:36:16
Local clock offset: 23.319 ms
Remote clock offset: 23.747 ms

# Below is generated by plot.py at 2019-12-11 07:21:42
# Datalink statistics
-- Total of 1 flow:
Average throughput: 198.38 Mbit/s
95th percentile per-packet one-way delay: 88.616 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 198.38 Mbit/s
95th percentile per-packet one-way delay: 88.616 ms
Loss rate: 0.00%
```

Run 2: Report of TaoVA-100x — Data Link

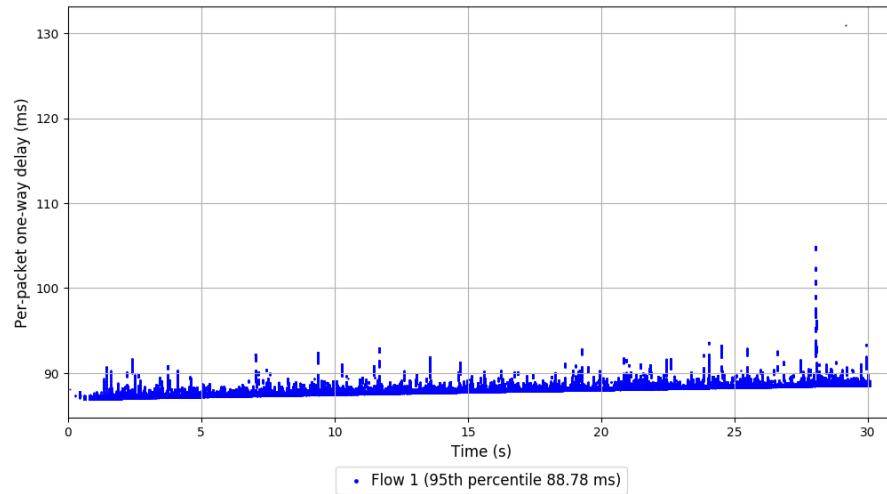
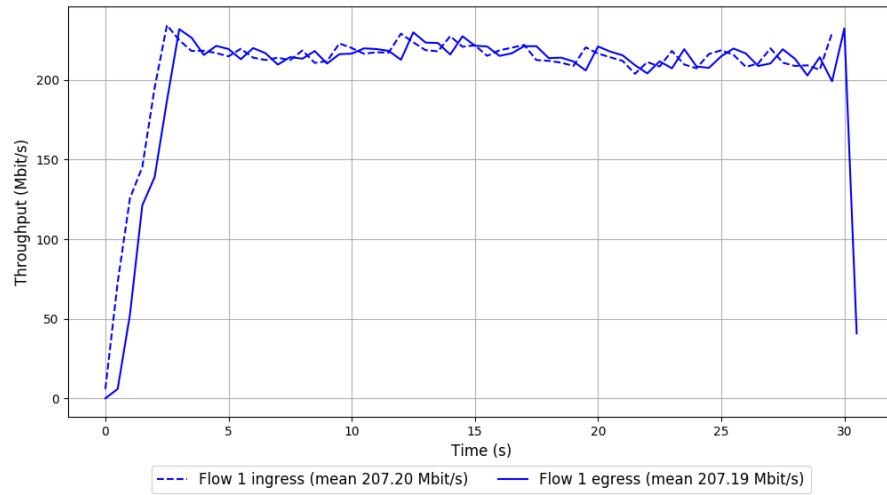


Run 3: Statistics of TaoVA-100x

```
Start at: 2019-12-11 04:10:24
End at: 2019-12-11 04:10:54
Local clock offset: 13.024 ms
Remote clock offset: 31.25 ms

# Below is generated by plot.py at 2019-12-11 07:21:56
# Datalink statistics
-- Total of 1 flow:
Average throughput: 207.19 Mbit/s
95th percentile per-packet one-way delay: 88.780 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 207.19 Mbit/s
95th percentile per-packet one-way delay: 88.780 ms
Loss rate: 0.00%
```

Run 3: Report of TaoVA-100x — Data Link

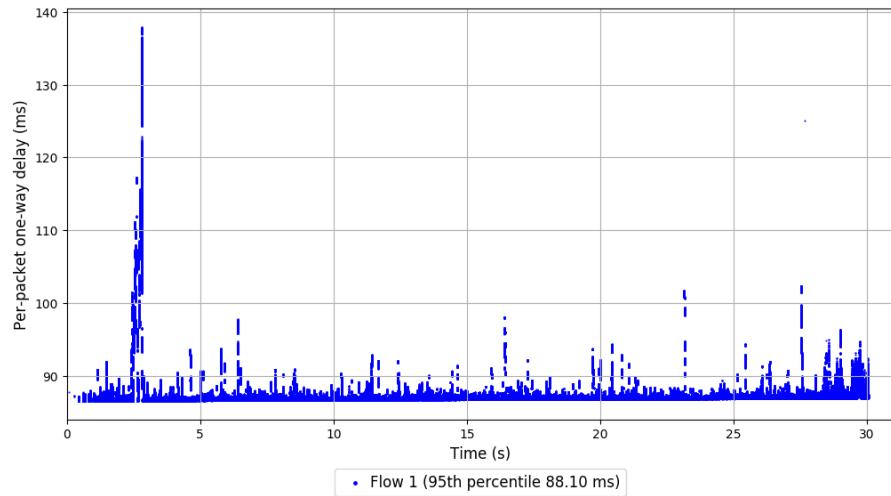
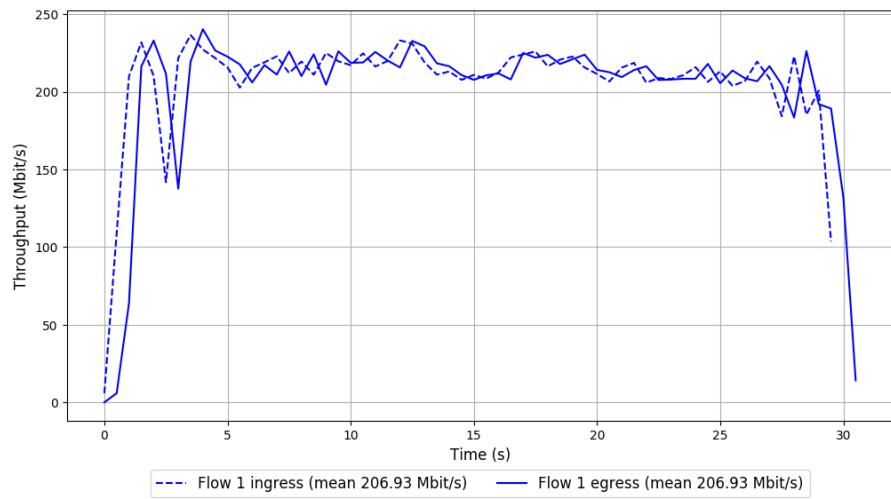


Run 4: Statistics of TaoVA-100x

```
Start at: 2019-12-11 04:45:39
End at: 2019-12-11 04:46:09
Local clock offset: 6.161 ms
Remote clock offset: 7.397 ms

# Below is generated by plot.py at 2019-12-11 07:22:11
# Datalink statistics
-- Total of 1 flow:
Average throughput: 206.93 Mbit/s
95th percentile per-packet one-way delay: 88.096 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 206.93 Mbit/s
95th percentile per-packet one-way delay: 88.096 ms
Loss rate: 0.00%
```

Run 4: Report of TaoVA-100x — Data Link

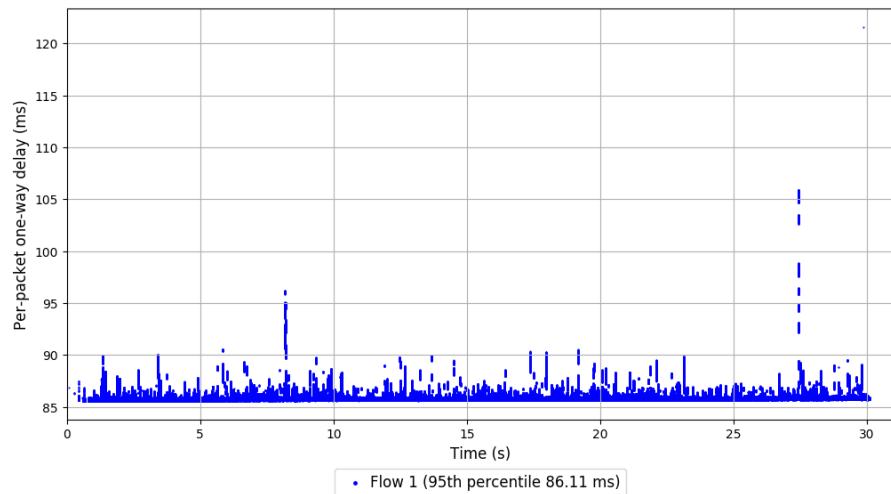
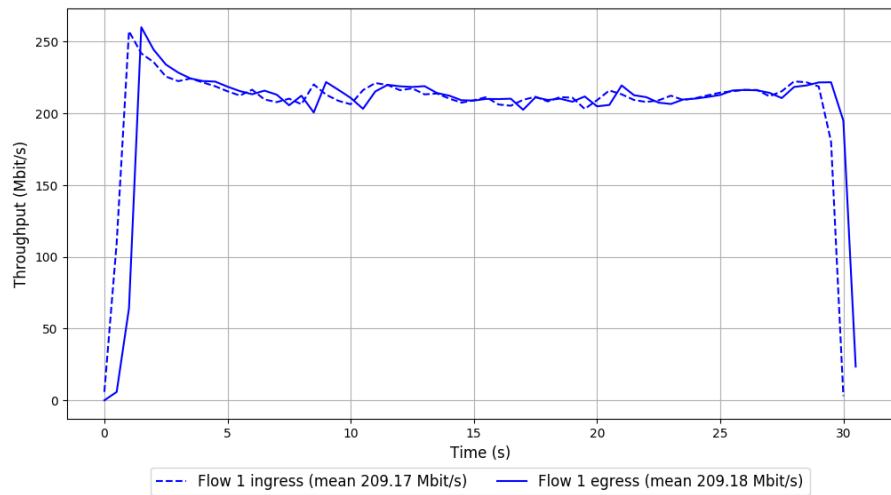


Run 5: Statistics of TaoVA-100x

```
Start at: 2019-12-11 05:20:30
End at: 2019-12-11 05:21:00
Local clock offset: 1.884 ms
Remote clock offset: 2.918 ms

# Below is generated by plot.py at 2019-12-11 07:22:37
# Datalink statistics
-- Total of 1 flow:
Average throughput: 209.18 Mbit/s
95th percentile per-packet one-way delay: 86.115 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 209.18 Mbit/s
95th percentile per-packet one-way delay: 86.115 ms
Loss rate: 0.00%
```

Run 5: Report of TaoVA-100x — Data Link

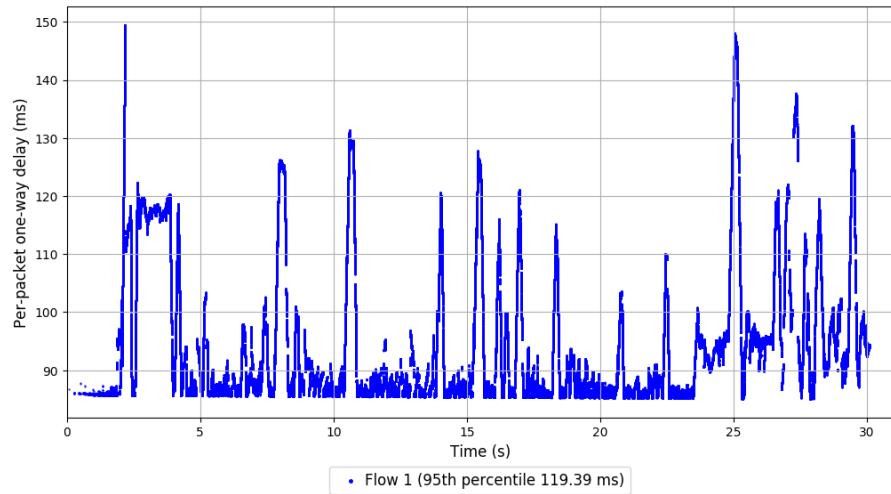
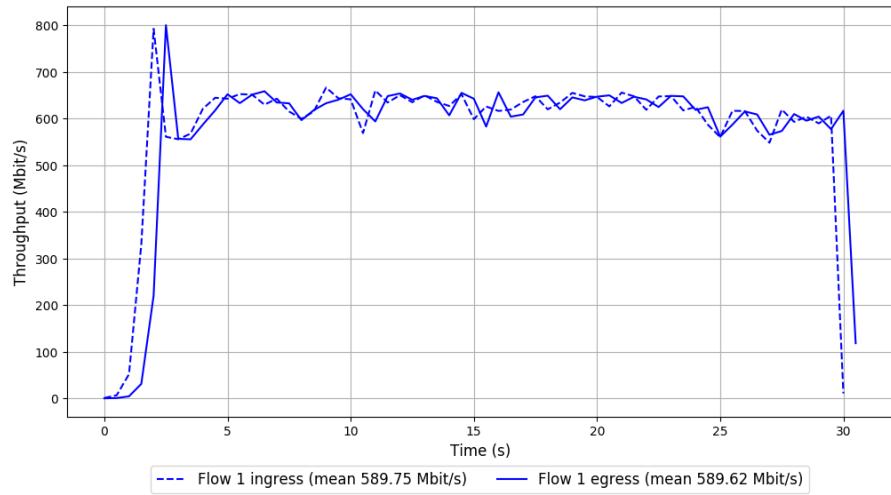


Run 1: Statistics of TCP Vegas

```
Start at: 2019-12-11 03:10:17
End at: 2019-12-11 03:10:47
Local clock offset: 19.132 ms
Remote clock offset: 37.663 ms

# Below is generated by plot.py at 2019-12-11 07:27:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 589.62 Mbit/s
95th percentile per-packet one-way delay: 119.392 ms
Loss rate: 0.02%
-- Flow 1:
Average throughput: 589.62 Mbit/s
95th percentile per-packet one-way delay: 119.392 ms
Loss rate: 0.02%
```

### Run 1: Report of TCP Vegas — Data Link

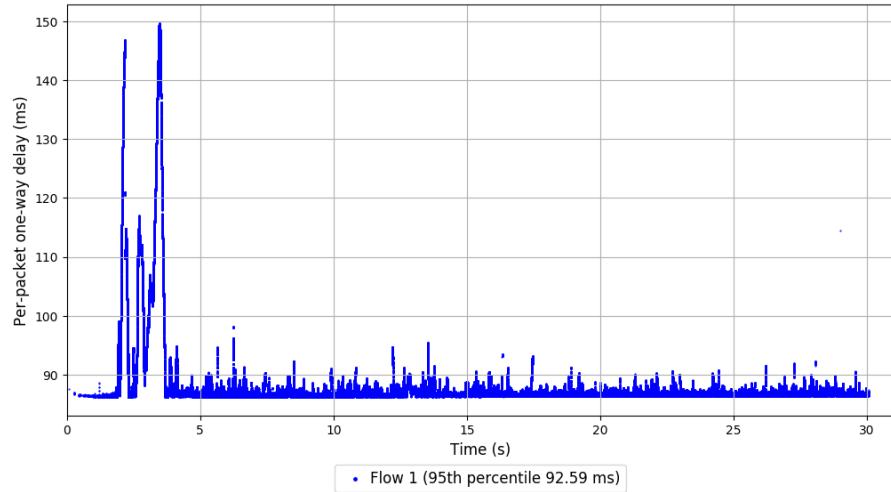
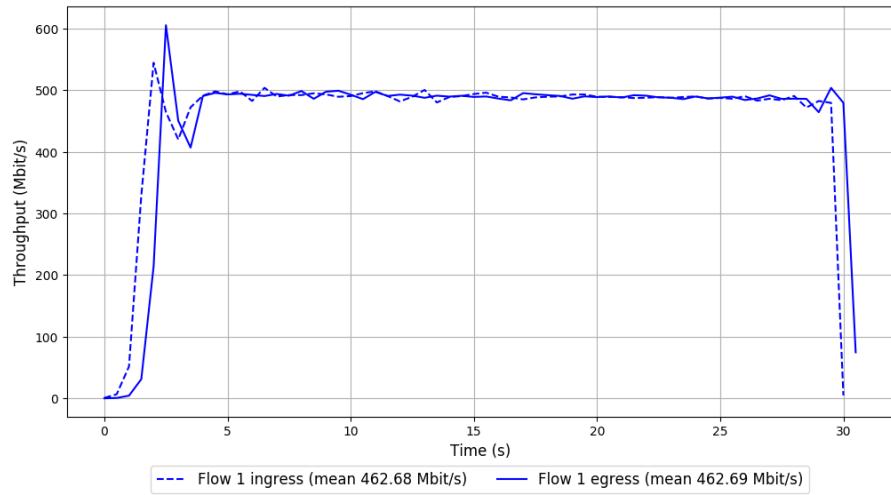


Run 2: Statistics of TCP Vegas

```
Start at: 2019-12-11 03:44:54
End at: 2019-12-11 03:45:24
Local clock offset: 31.05 ms
Remote clock offset: 20.6 ms

# Below is generated by plot.py at 2019-12-11 07:27:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 462.69 Mbit/s
95th percentile per-packet one-way delay: 92.590 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 462.69 Mbit/s
95th percentile per-packet one-way delay: 92.590 ms
Loss rate: 0.00%
```

## Run 2: Report of TCP Vegas — Data Link

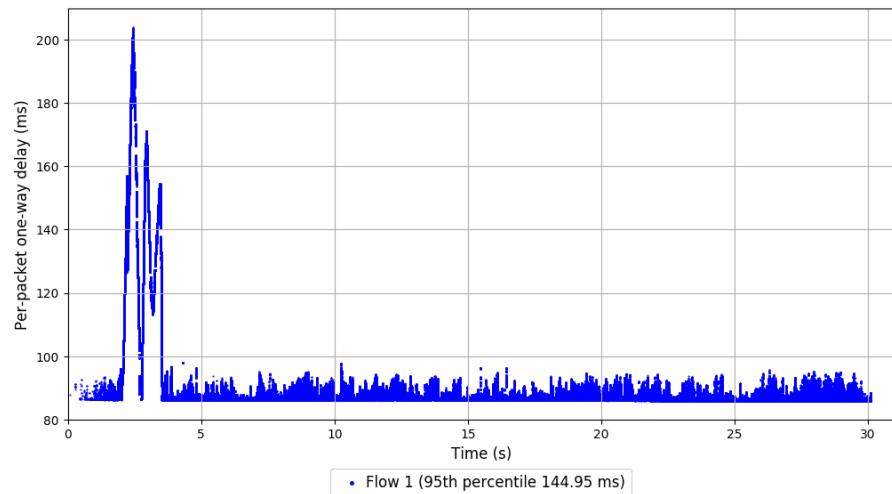
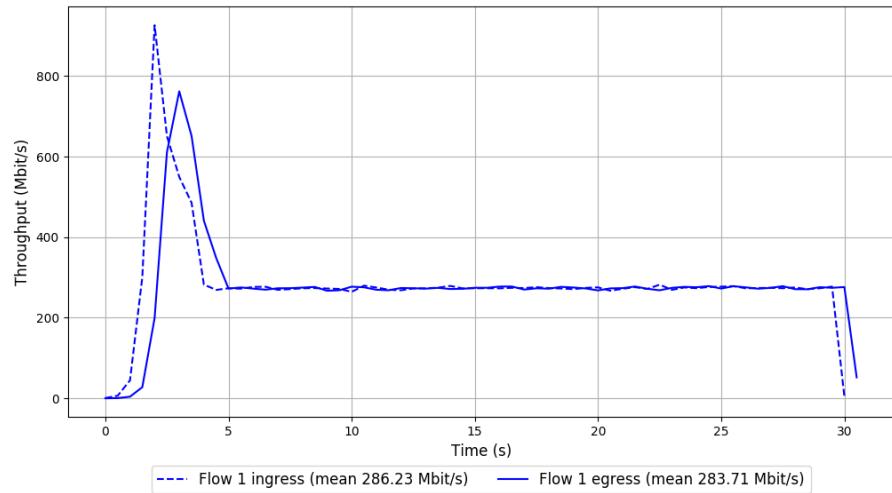


Run 3: Statistics of TCP Vegas

```
Start at: 2019-12-11 04:20:19
End at: 2019-12-11 04:20:49
Local clock offset: 16.218 ms
Remote clock offset: 12.958 ms

# Below is generated by plot.py at 2019-12-11 07:27:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 283.71 Mbit/s
95th percentile per-packet one-way delay: 144.954 ms
Loss rate: 0.88%
-- Flow 1:
Average throughput: 283.71 Mbit/s
95th percentile per-packet one-way delay: 144.954 ms
Loss rate: 0.88%
```

### Run 3: Report of TCP Vegas — Data Link

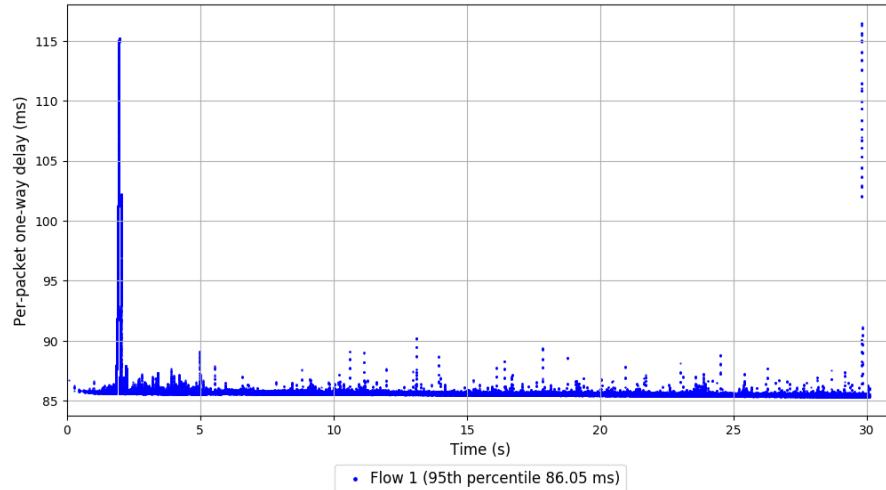
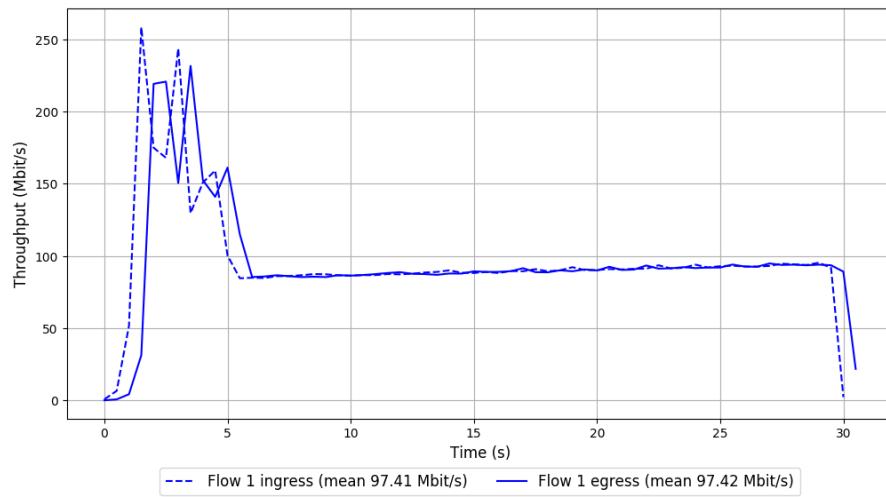


Run 4: Statistics of TCP Vegas

```
Start at: 2019-12-11 04:55:24
End at: 2019-12-11 04:55:54
Local clock offset: 7.239 ms
Remote clock offset: 3.878 ms

# Below is generated by plot.py at 2019-12-11 07:27:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 97.42 Mbit/s
95th percentile per-packet one-way delay: 86.051 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 97.42 Mbit/s
95th percentile per-packet one-way delay: 86.051 ms
Loss rate: 0.00%
```

### Run 4: Report of TCP Vegas — Data Link

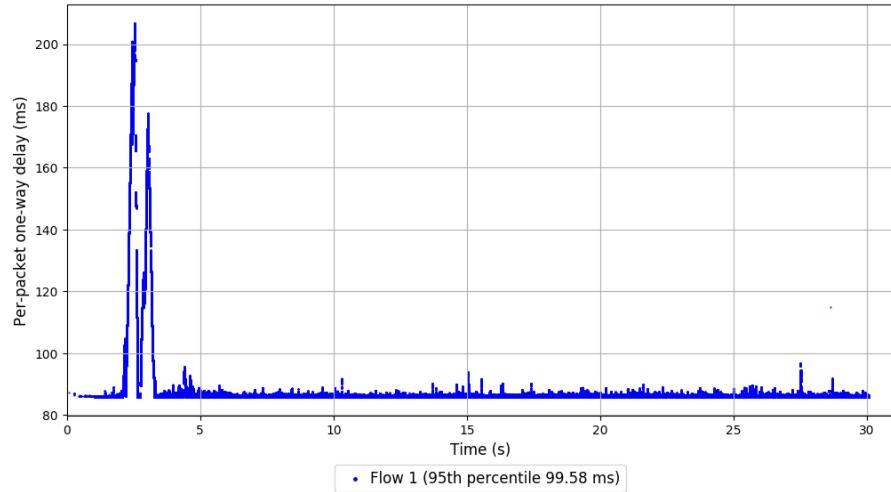
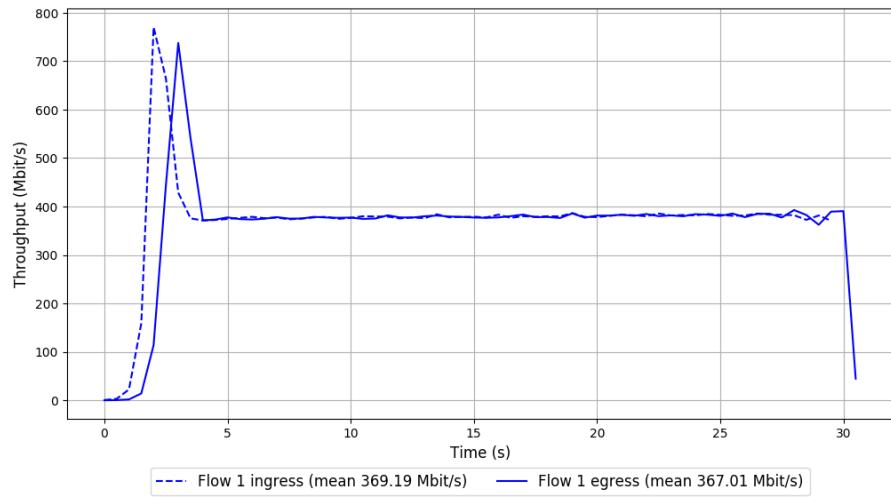


Run 5: Statistics of TCP Vegas

```
Start at: 2019-12-11 05:30:10
End at: 2019-12-11 05:30:40
Local clock offset: 1.43 ms
Remote clock offset: 1.676 ms

# Below is generated by plot.py at 2019-12-11 07:27:33
# Datalink statistics
-- Total of 1 flow:
Average throughput: 367.01 Mbit/s
95th percentile per-packet one-way delay: 99.585 ms
Loss rate: 0.59%
-- Flow 1:
Average throughput: 367.01 Mbit/s
95th percentile per-packet one-way delay: 99.585 ms
Loss rate: 0.59%
```

### Run 5: Report of TCP Vegas — Data Link

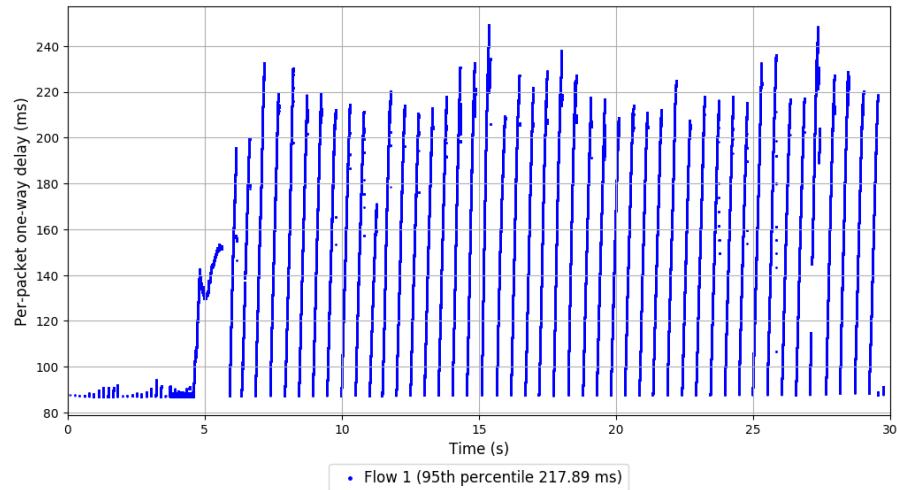
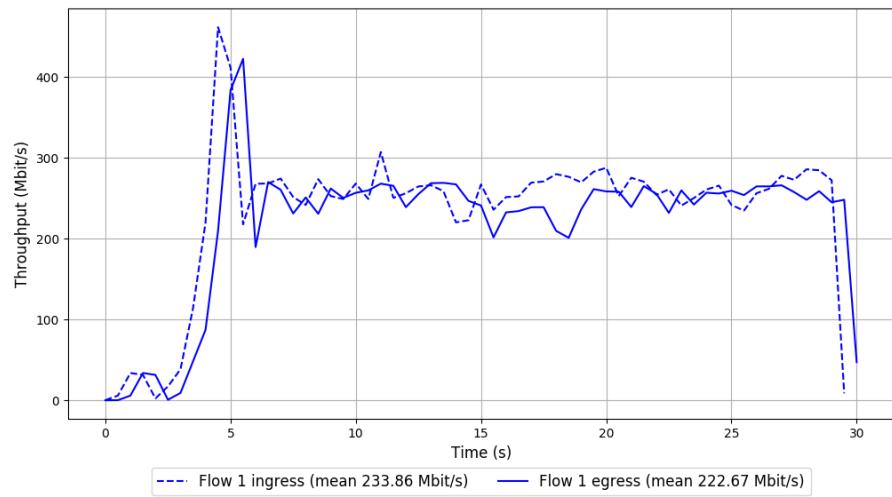


Run 1: Statistics of Verus

```
Start at: 2019-12-11 02:52:47
End at: 2019-12-11 02:53:17
Local clock offset: 10.136 ms
Remote clock offset: 18.854 ms

# Below is generated by plot.py at 2019-12-11 07:28:24
# Datalink statistics
-- Total of 1 flow:
Average throughput: 222.67 Mbit/s
95th percentile per-packet one-way delay: 217.886 ms
Loss rate: 4.78%
-- Flow 1:
Average throughput: 222.67 Mbit/s
95th percentile per-packet one-way delay: 217.886 ms
Loss rate: 4.78%
```

Run 1: Report of Verus — Data Link

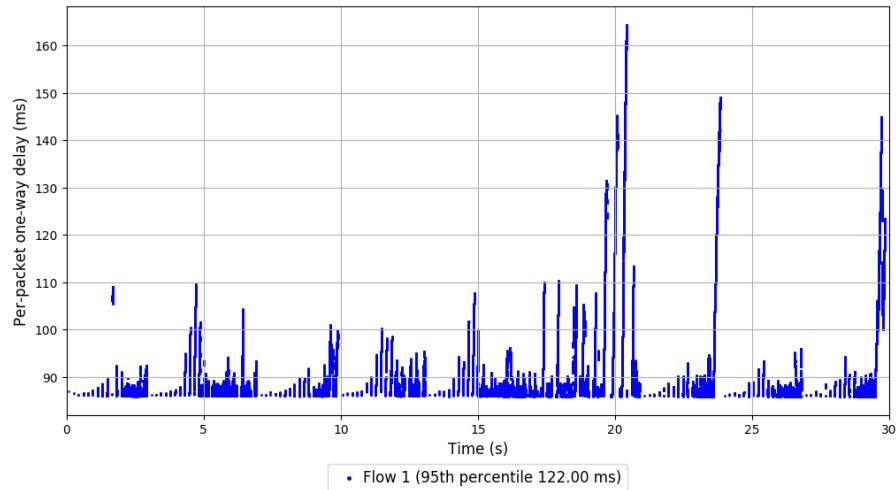
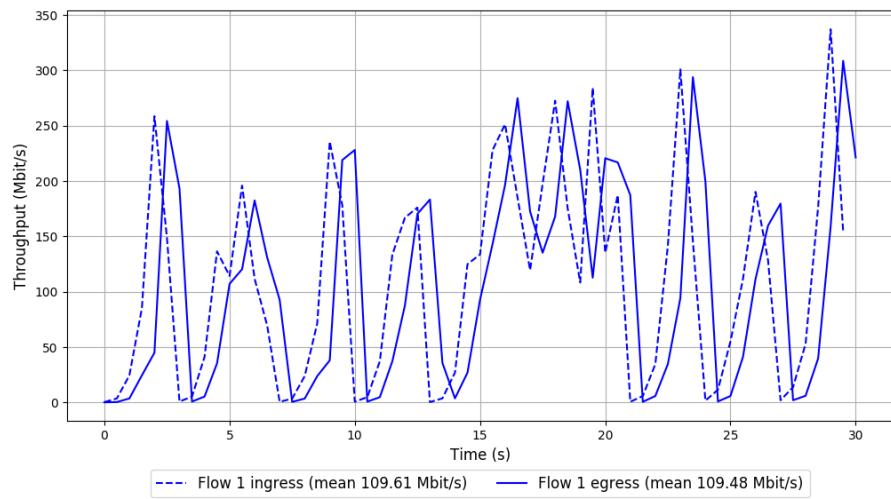


Run 2: Statistics of Verus

```
Start at: 2019-12-11 03:28:18
End at: 2019-12-11 03:28:48
Local clock offset: 18.246 ms
Remote clock offset: 21.648 ms

# Below is generated by plot.py at 2019-12-11 07:28:24
# Datalink statistics
-- Total of 1 flow:
Average throughput: 109.48 Mbit/s
95th percentile per-packet one-way delay: 121.998 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 109.48 Mbit/s
95th percentile per-packet one-way delay: 121.998 ms
Loss rate: 0.00%
```

## Run 2: Report of Verus — Data Link

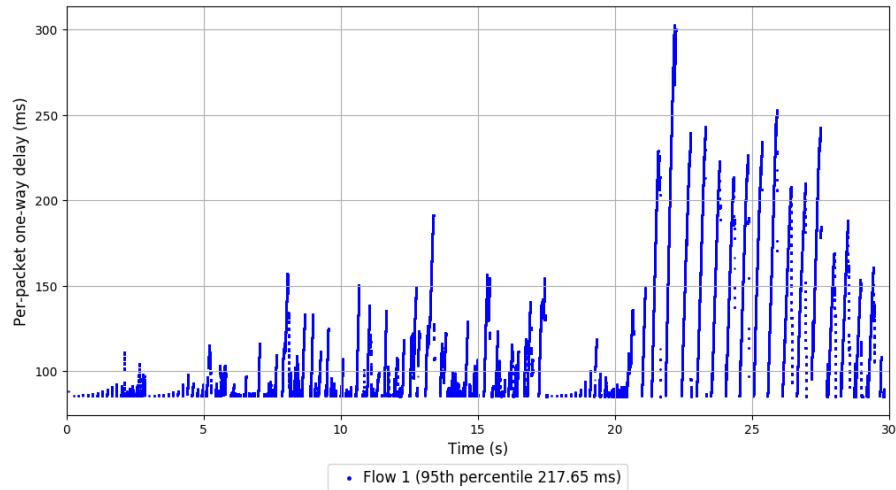
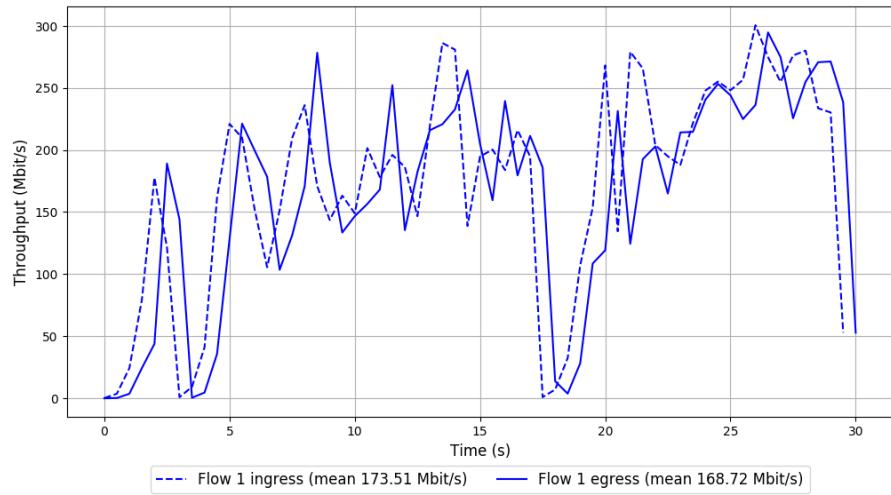


Run 3: Statistics of Verus

```
Start at: 2019-12-11 04:02:40
End at: 2019-12-11 04:03:10
Local clock offset: 12.246 ms
Remote clock offset: 35.161 ms

# Below is generated by plot.py at 2019-12-11 07:28:24
# Datalink statistics
-- Total of 1 flow:
Average throughput: 168.72 Mbit/s
95th percentile per-packet one-way delay: 217.650 ms
Loss rate: 2.77%
-- Flow 1:
Average throughput: 168.72 Mbit/s
95th percentile per-packet one-way delay: 217.650 ms
Loss rate: 2.77%
```

### Run 3: Report of Verus — Data Link

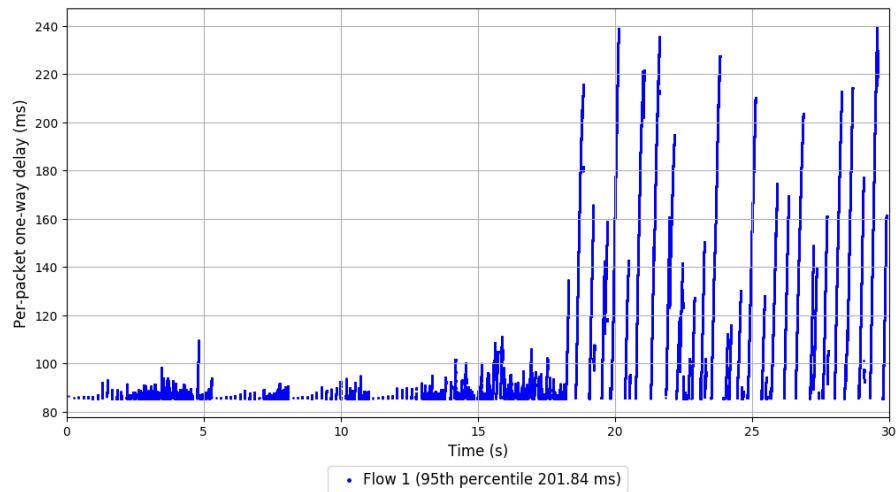
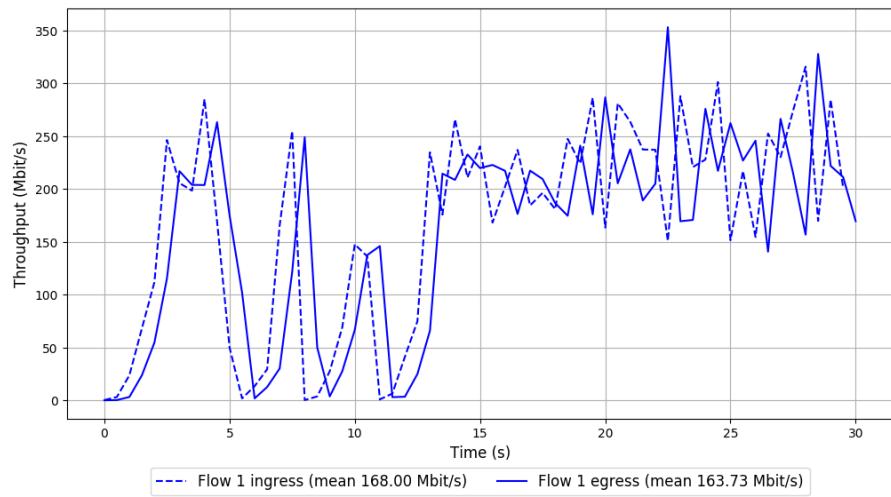


Run 4: Statistics of Verus

```
Start at: 2019-12-11 04:37:56
End at: 2019-12-11 04:38:26
Local clock offset: 6.141 ms
Remote clock offset: 9.898 ms

# Below is generated by plot.py at 2019-12-11 07:28:24
# Datalink statistics
-- Total of 1 flow:
Average throughput: 163.73 Mbit/s
95th percentile per-packet one-way delay: 201.838 ms
Loss rate: 2.54%
-- Flow 1:
Average throughput: 163.73 Mbit/s
95th percentile per-packet one-way delay: 201.838 ms
Loss rate: 2.54%
```

### Run 4: Report of Verus — Data Link

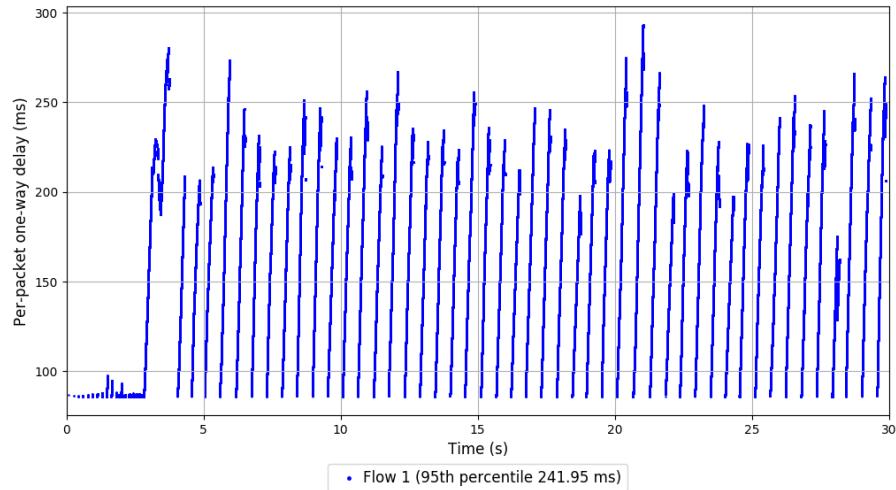
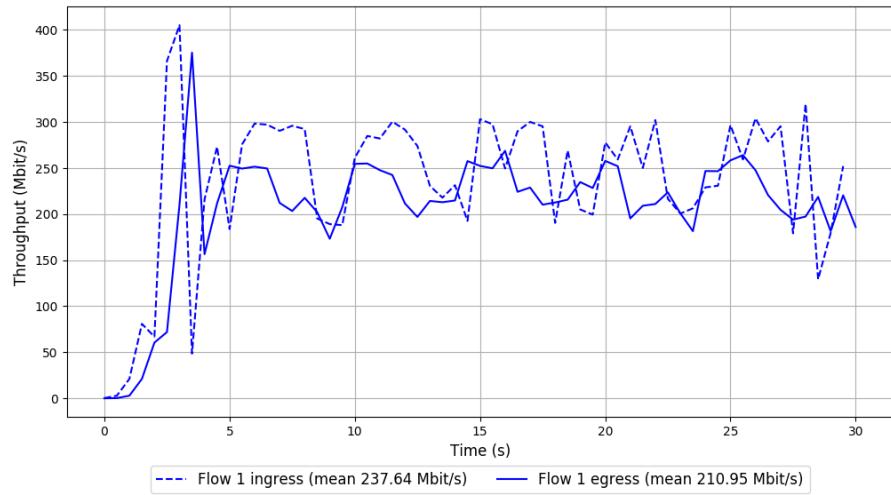


Run 5: Statistics of Verus

```
Start at: 2019-12-11 05:12:58
End at: 2019-12-11 05:13:28
Local clock offset: 1.639 ms
Remote clock offset: 4.196 ms

# Below is generated by plot.py at 2019-12-11 07:30:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 210.95 Mbit/s
95th percentile per-packet one-way delay: 241.946 ms
Loss rate: 10.87%
-- Flow 1:
Average throughput: 210.95 Mbit/s
95th percentile per-packet one-way delay: 241.946 ms
Loss rate: 10.87%
```

### Run 5: Report of Verus — Data Link

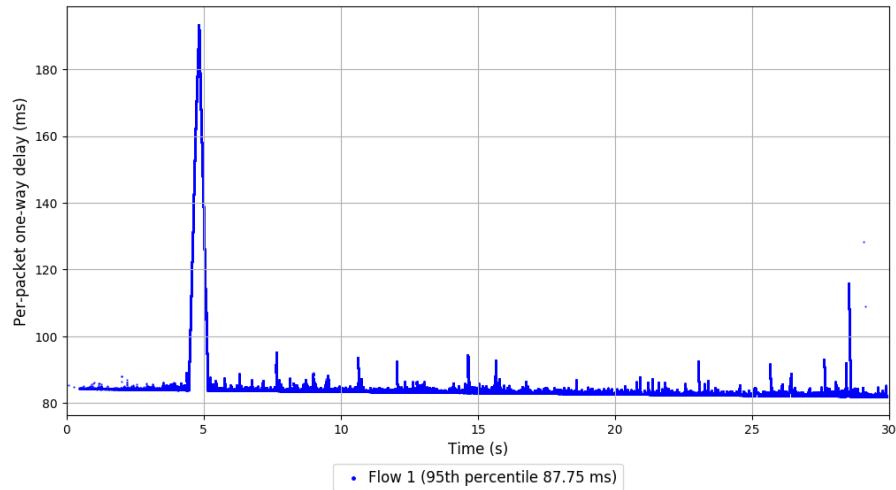
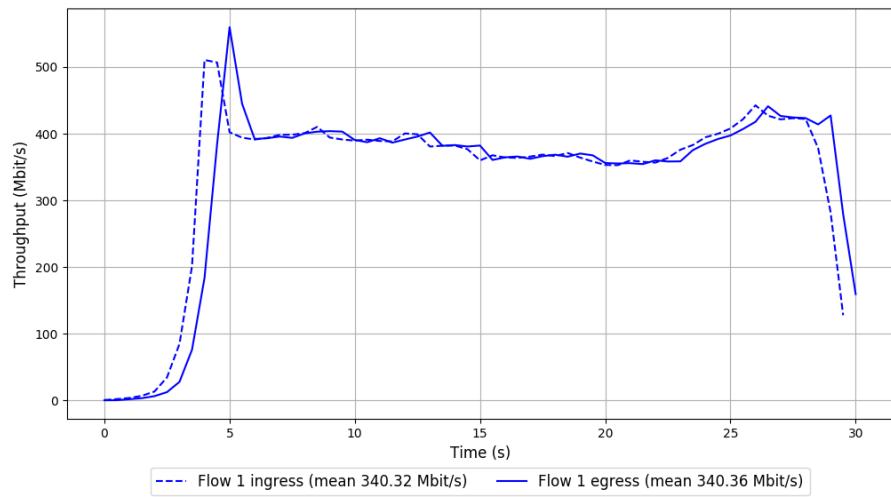


Run 1: Statistics of PCC-Vivace

```
Start at: 2019-12-11 02:55:50
End at: 2019-12-11 02:56:20
Local clock offset: 13.729 ms
Remote clock offset: 23.53 ms

# Below is generated by plot.py at 2019-12-11 07:30:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 340.36 Mbit/s
95th percentile per-packet one-way delay: 87.753 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 340.36 Mbit/s
95th percentile per-packet one-way delay: 87.753 ms
Loss rate: 0.00%
```

Run 1: Report of PCC-Vivace — Data Link

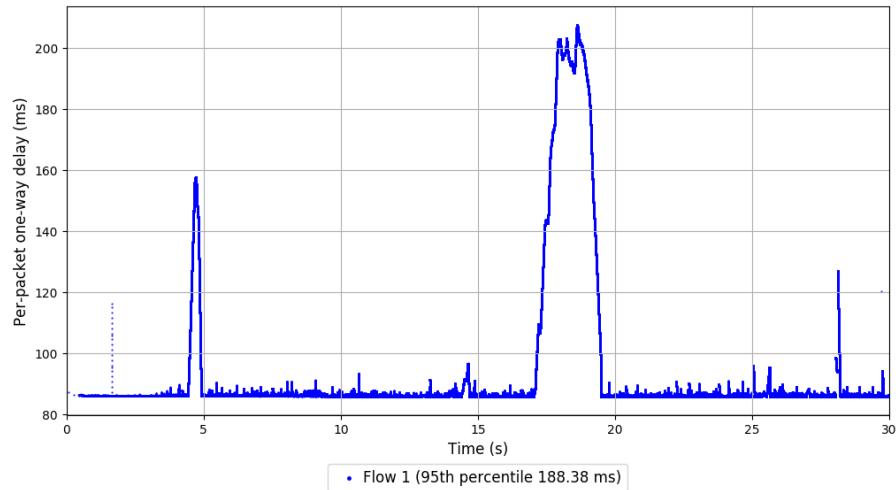
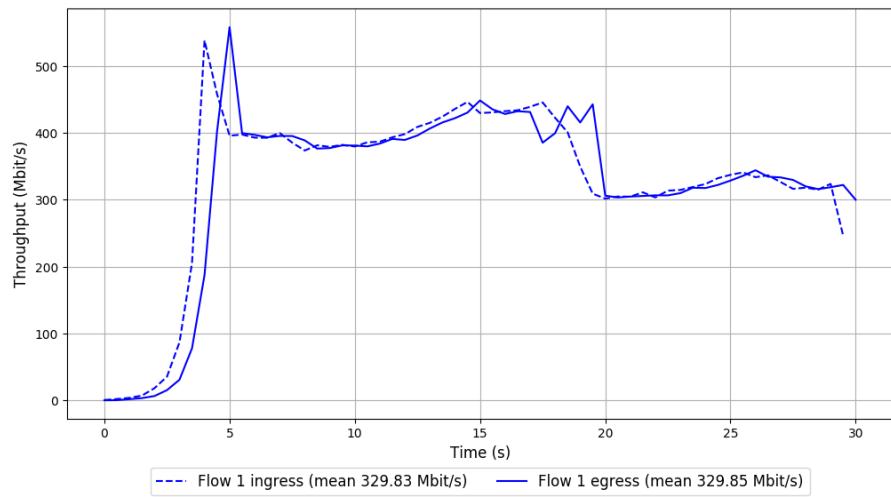


Run 2: Statistics of PCC-Vivace

```
Start at: 2019-12-11 03:31:08
End at: 2019-12-11 03:31:38
Local clock offset: 19.889 ms
Remote clock offset: 24.339 ms

# Below is generated by plot.py at 2019-12-11 07:30:44
# Datalink statistics
-- Total of 1 flow:
Average throughput: 329.85 Mbit/s
95th percentile per-packet one-way delay: 188.379 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 329.85 Mbit/s
95th percentile per-packet one-way delay: 188.379 ms
Loss rate: 0.00%
```

Run 2: Report of PCC-Vivace — Data Link

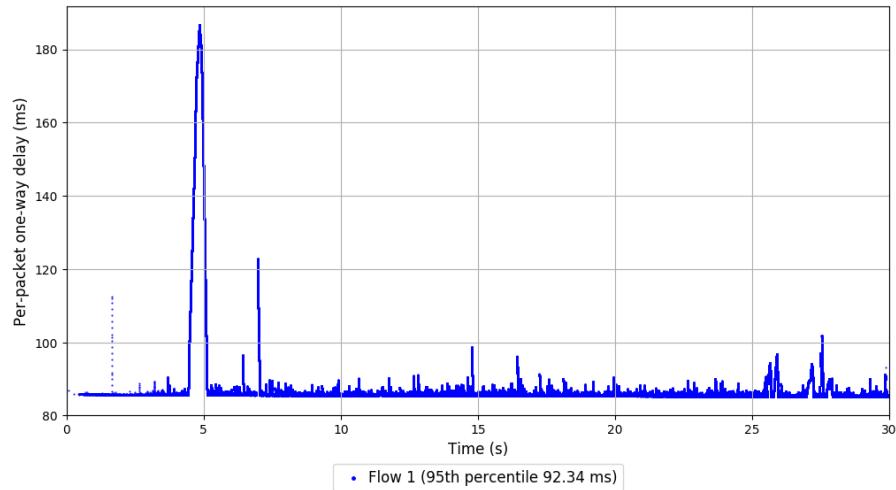
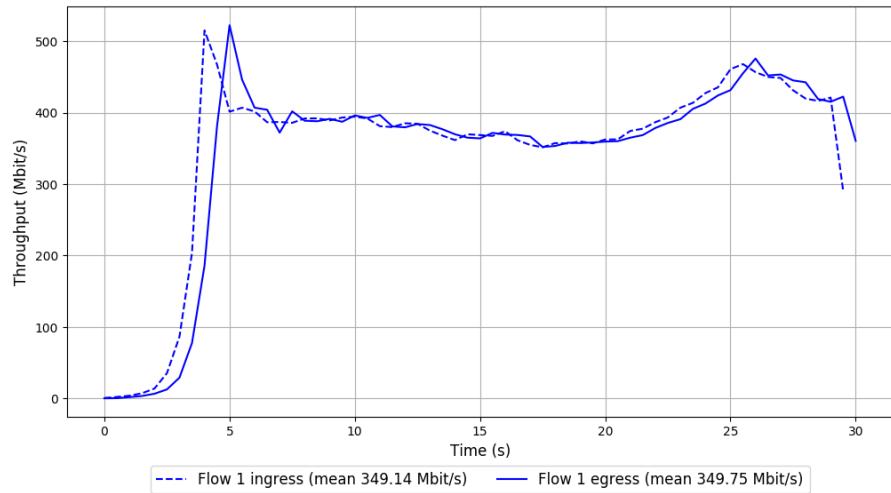


Run 3: Statistics of PCC-Vivace

```
Start at: 2019-12-11 04:05:37
End at: 2019-12-11 04:06:07
Local clock offset: 12.289 ms
Remote clock offset: 38.186 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 349.75 Mbit/s
95th percentile per-packet one-way delay: 92.343 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 349.75 Mbit/s
95th percentile per-packet one-way delay: 92.343 ms
Loss rate: 0.00%
```

Run 3: Report of PCC-Vivace — Data Link

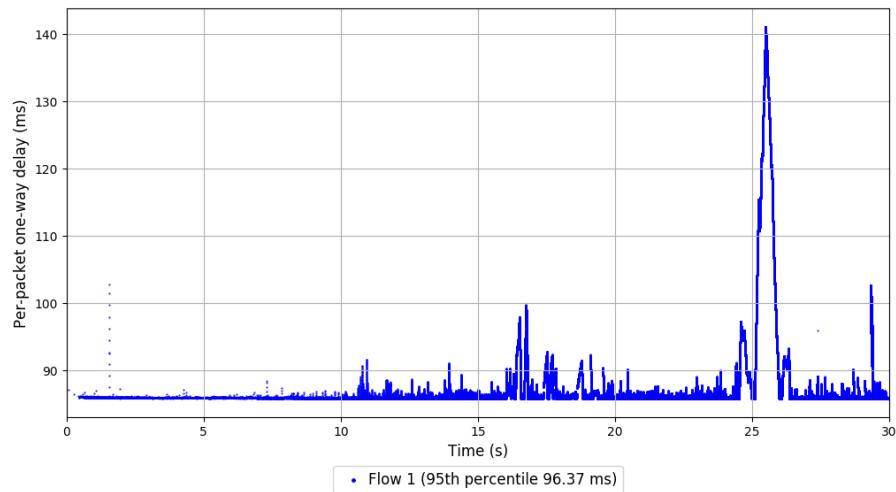
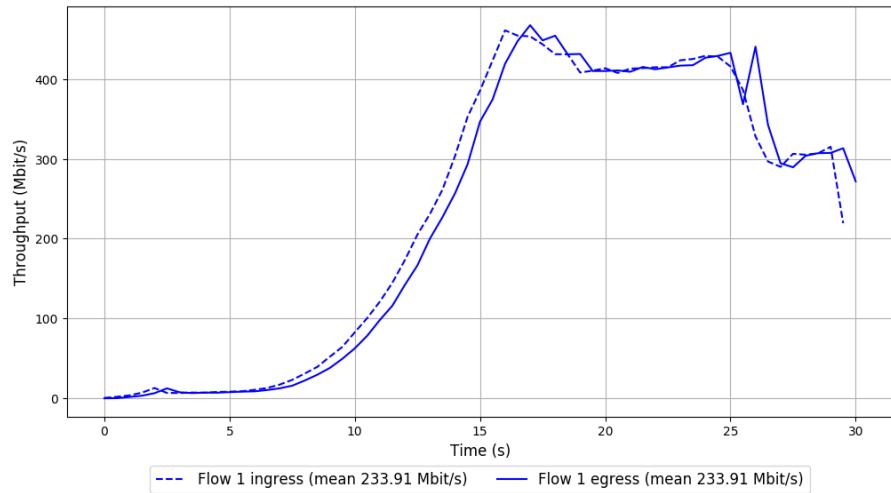


Run 4: Statistics of PCC-Vivace

```
Start at: 2019-12-11 04:40:53
End at: 2019-12-11 04:41:23
Local clock offset: 5.785 ms
Remote clock offset: 10.357 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 233.91 Mbit/s
95th percentile per-packet one-way delay: 96.371 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 233.91 Mbit/s
95th percentile per-packet one-way delay: 96.371 ms
Loss rate: 0.00%
```

Run 4: Report of PCC-Vivace — Data Link

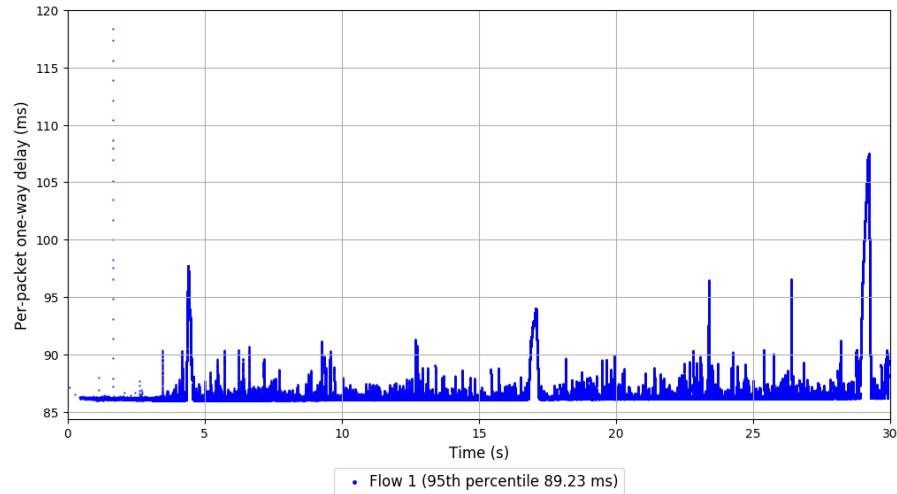
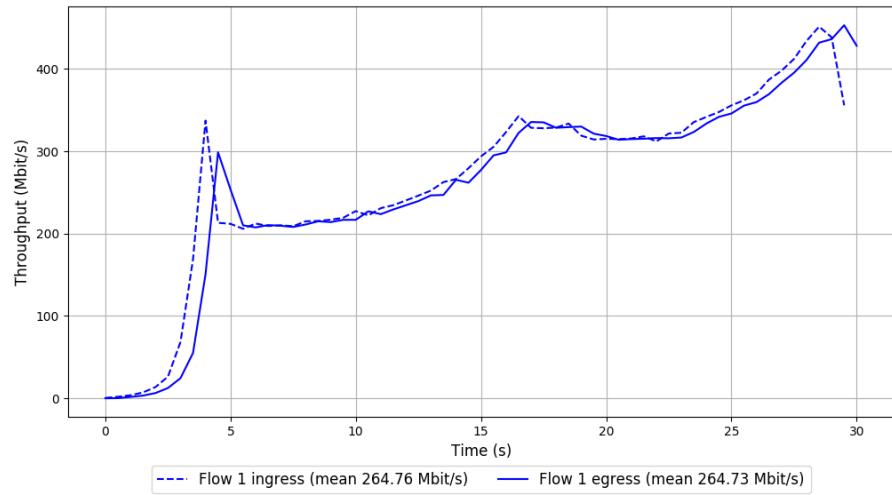


Run 5: Statistics of PCC-Vivace

```
Start at: 2019-12-11 05:15:55
End at: 2019-12-11 05:16:25
Local clock offset: 1.542 ms
Remote clock offset: 4.529 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 264.73 Mbit/s
95th percentile per-packet one-way delay: 89.235 ms
Loss rate: 0.01%
-- Flow 1:
Average throughput: 264.73 Mbit/s
95th percentile per-packet one-way delay: 89.235 ms
Loss rate: 0.01%
```

Run 5: Report of PCC-Vivace — Data Link



Run 1: Statistics of WebRTC media

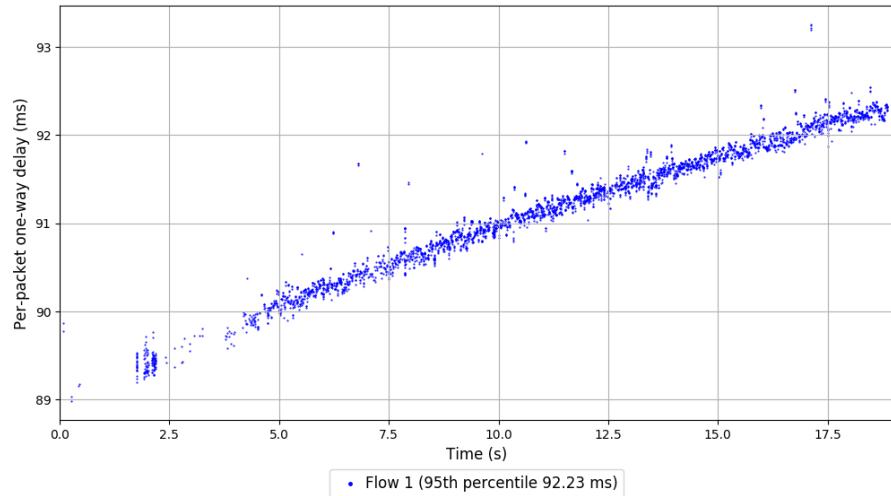
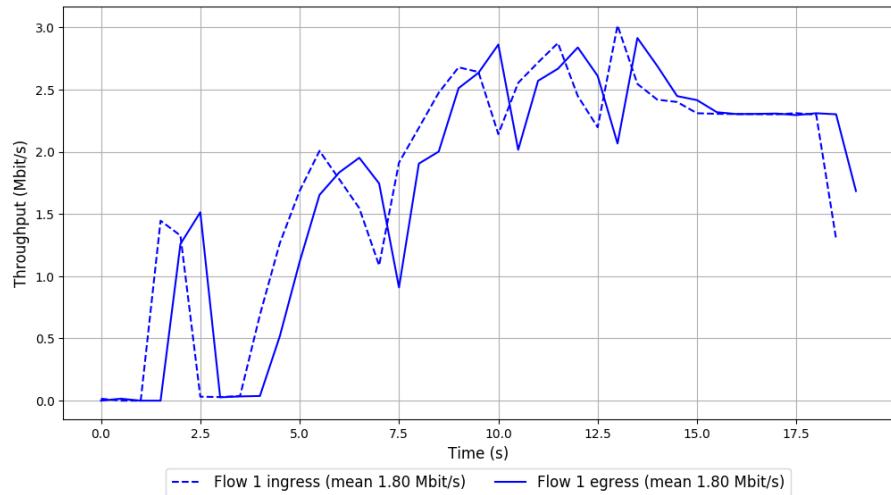
Start at: 2019-12-11 02:47:17

End at: 2019-12-11 02:47:48

Local clock offset: 9.084 ms

Remote clock offset: 30.689 ms

### Run 1: Report of WebRTC media — Data Link

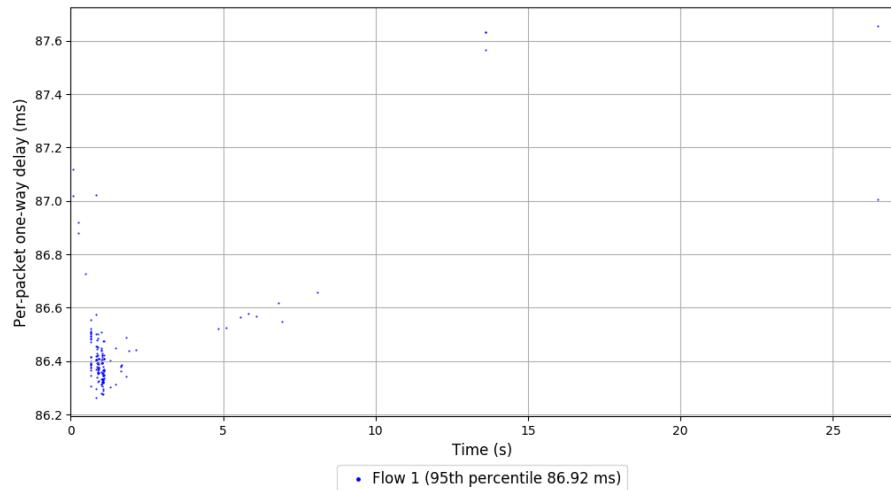
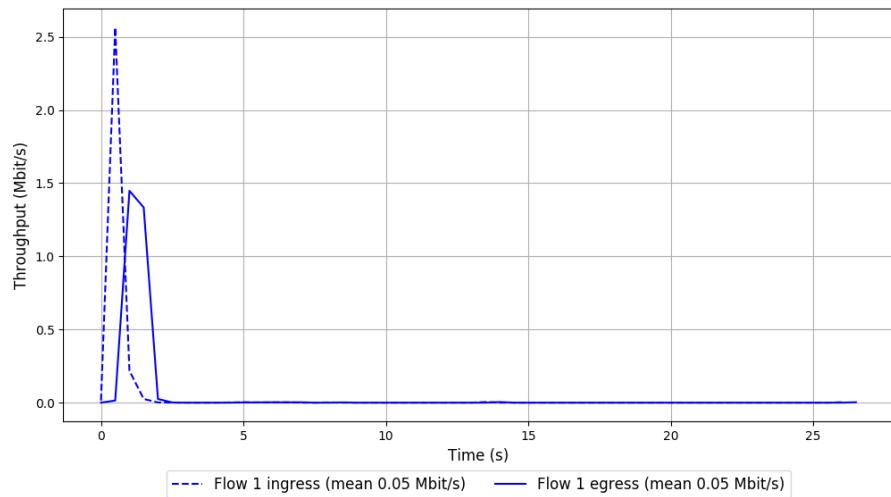


Run 2: Statistics of WebRTC media

```
Start at: 2019-12-11 03:22:47
End at: 2019-12-11 03:23:17
Local clock offset: 16.11 ms
Remote clock offset: 22.407 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.05 Mbit/s
95th percentile per-packet one-way delay: 86.920 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.05 Mbit/s
95th percentile per-packet one-way delay: 86.920 ms
Loss rate: 0.00%
```

## Run 2: Report of WebRTC media — Data Link

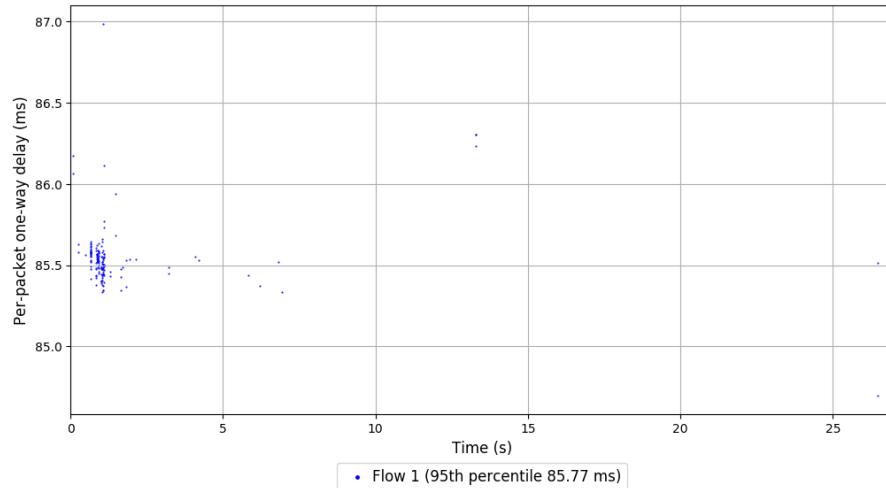
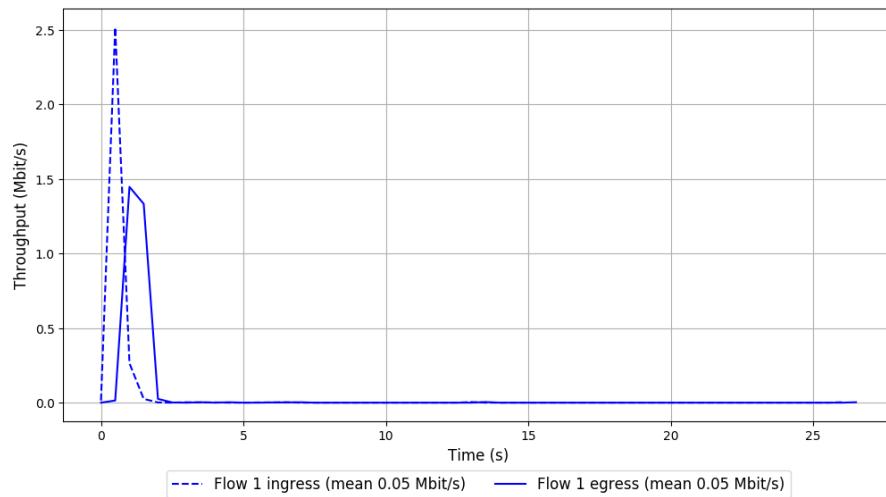


Run 3: Statistics of WebRTC media

```
Start at: 2019-12-11 03:57:12
End at: 2019-12-11 03:57:42
Local clock offset: 14.262 ms
Remote clock offset: 29.412 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.05 Mbit/s
95th percentile per-packet one-way delay: 85.773 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.05 Mbit/s
95th percentile per-packet one-way delay: 85.773 ms
Loss rate: 0.00%
```

Run 3: Report of WebRTC media — Data Link

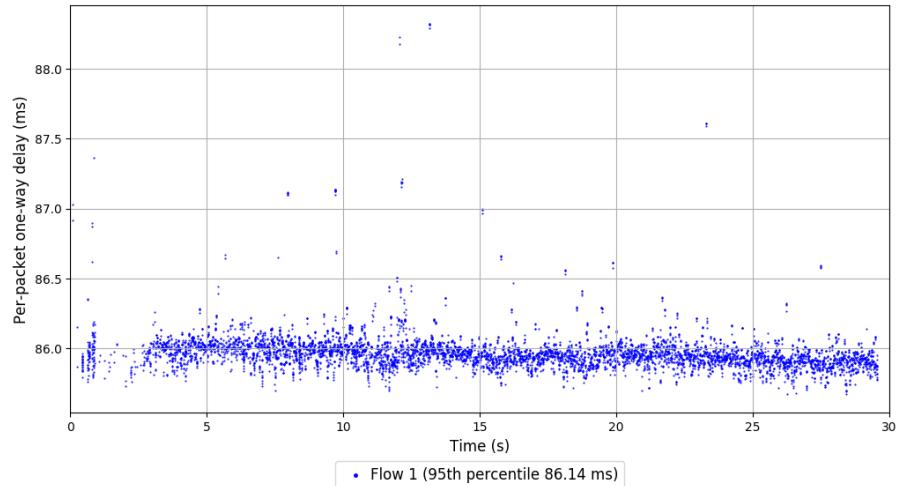
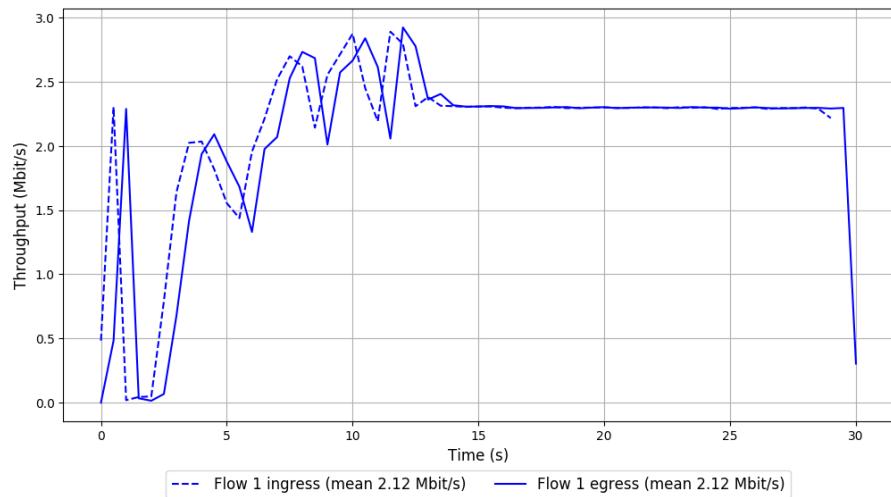


Run 4: Statistics of WebRTC media

```
Start at: 2019-12-11 04:32:24
End at: 2019-12-11 04:32:54
Local clock offset: 6.65 ms
Remote clock offset: 9.378 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 2.12 Mbit/s
95th percentile per-packet one-way delay: 86.135 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 2.12 Mbit/s
95th percentile per-packet one-way delay: 86.135 ms
Loss rate: 0.00%
```

Run 4: Report of WebRTC media — Data Link



Run 5: Statistics of WebRTC media

```
Start at: 2019-12-11 05:07:26
End at: 2019-12-11 05:07:56
Local clock offset: 2.308 ms
Remote clock offset: 3.759 ms

# Below is generated by plot.py at 2019-12-11 07:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.05 Mbit/s
95th percentile per-packet one-way delay: 86.524 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.05 Mbit/s
95th percentile per-packet one-way delay: 86.524 ms
Loss rate: 0.00%
```

Run 5: Report of WebRTC media — Data Link

