

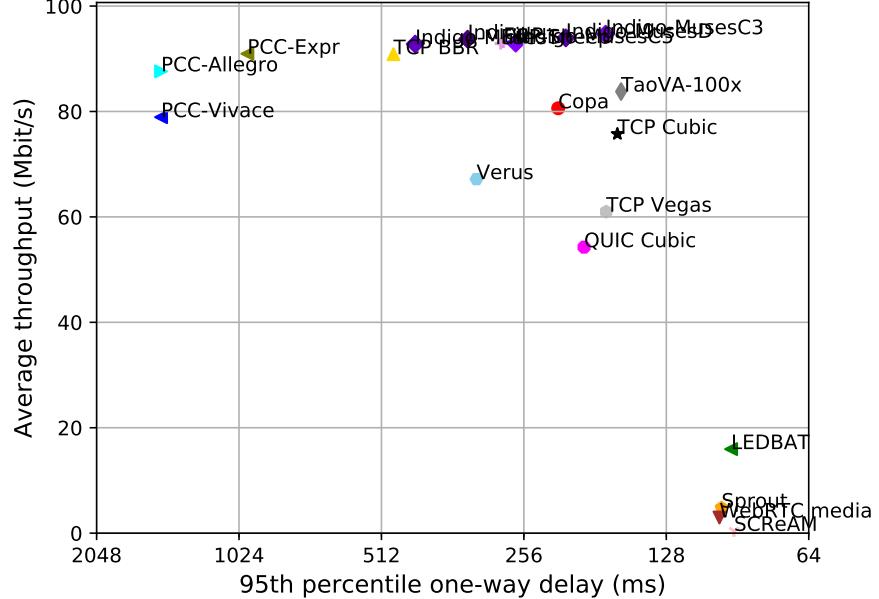
## Pantheon Report

Generated at 2019-03-27 14:27:31 (UTC).  
Data path: Colombia on p4p1 (*remote*) → AWS Brazil 2 on ens5 (*local*).  
Repeated the test of 21 congestion control schemes 5 times.  
Each test lasted for 30 seconds running 3 flows with 10-second interval between two flows.  
NTP offsets were measured against gps.ntp.br and have been applied to correct the timestamps in logs.

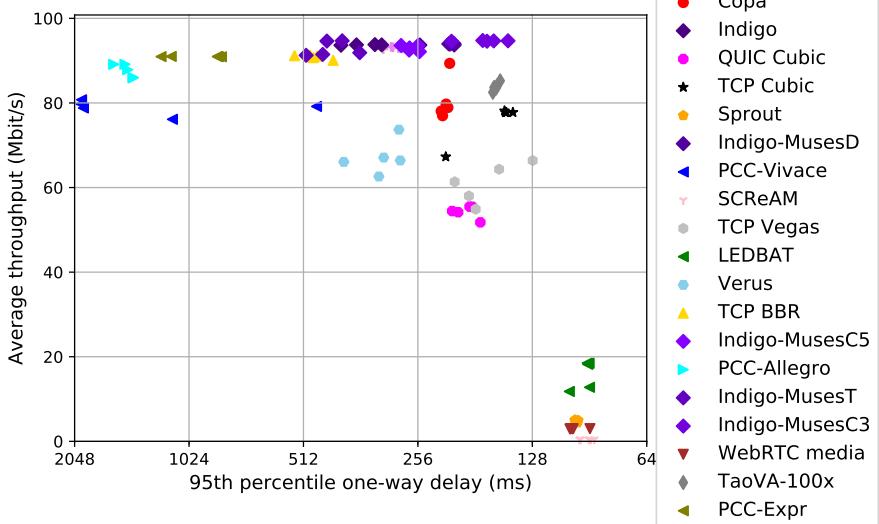
```
System info:  
Linux 4.15.0-1034-aws  
net.core.default_qdisc = fq  
net.core.rmem_default = 16777216  
net.core.rmem_max = 536870912  
net.core.wmem_default = 16777216  
net.core.wmem_max = 536870912  
net.ipv4.tcp_rmem = 4096 16777216 536870912  
net.ipv4.tcp_wmem = 4096 16777216 536870912  
  
Git summary:  
branch: muses @ 7a686f7c2ed0a333082c0bab1fa5c921ab47e6ee  
third_party/fillp @ d6da1459332fcee56963885d7eba17e6a32d4519  
third_party/fillp-sheep @ 0e5bb722943babcd2b090d2c64fcd45e12e923f9  
third_party/genericCC @ d0153f8e594aa89e93b032143cedbdf58e562f4  
third_party/indigo @ 2601c92e4aa9d58d38dc4dfe0ecdbf90c077e64d  
third_party/libutp @ b3465b942e2826f2b179eaab4a906ce6bb7cf3cf  
third_party/muses @ 5ce721187ad823da20955337730c746486ca4966  
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 Colombia to AWS Brazil 2, 5 runs of 30s each per scheme  
 3 flows with 10s interval between flows (mean of all runs by scheme)



test from Colombia to AWS Brazil 2, 5 runs of 30s each per scheme  
 3 flows with 10s interval between flows



↳

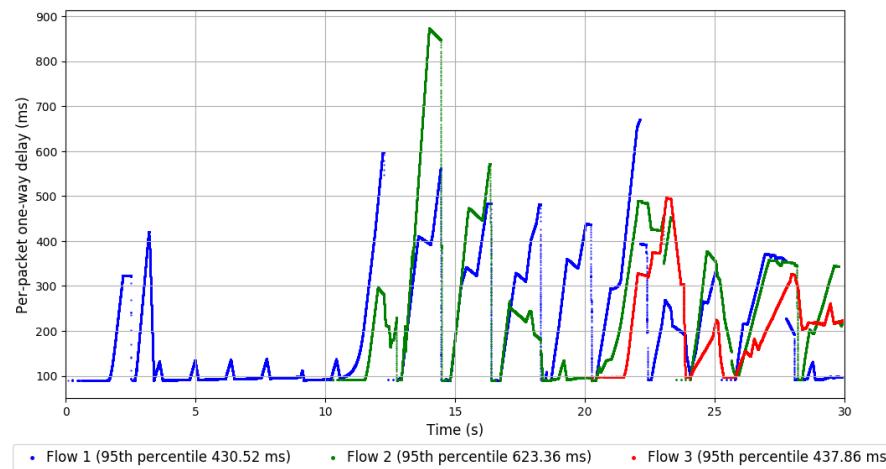
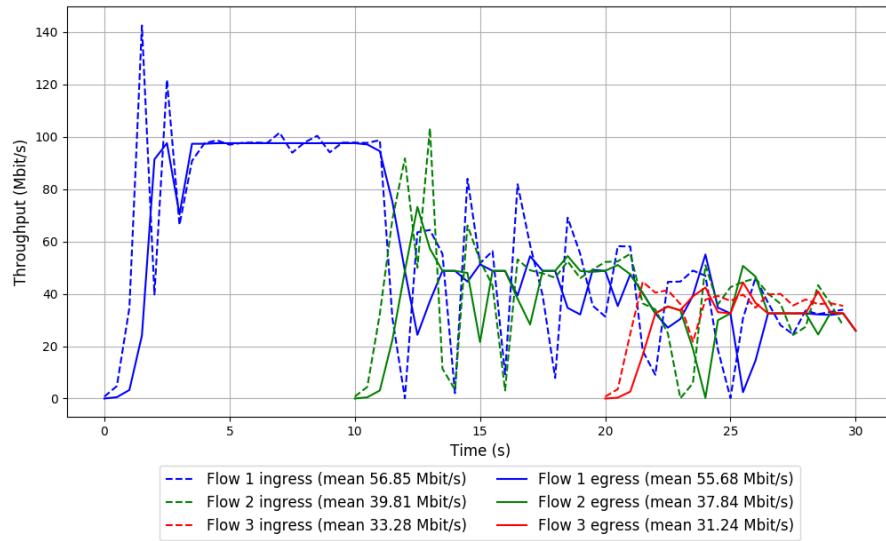
scheme	# runs	mean avg tput (Mbit/s)			mean 95th-%ile delay (ms)			mean loss rate (%)		
		flow 1	flow 2	flow 3	flow 1	flow 2	flow 3	flow 1	flow 2	flow 3
TCP BBR	5	55.70	37.81	30.79	445.03	632.24	421.33	2.60	4.59	6.06
Copa		47.37	35.87	28.62	205.31	144.42	200.89	0.56	0.92	2.26
TCP Cubic		42.55	36.22	27.79	179.30	146.12	158.67	0.38	1.07	2.71
FillP		57.39	39.31	29.50	288.65	262.93	307.09	1.45	3.33	3.62
FillP-Sheep		57.14	38.85	30.24	300.71	242.60	293.55	0.83	1.99	3.60
Indigo		58.46	38.86	29.18	356.00	146.34	141.85	6.50	1.23	2.88
Indigo-MusesC3		60.20	40.08	30.29	142.17	226.05	220.35	2.40	2.31	3.13
Indigo-MusesC5		59.33	39.24	29.33	262.77	276.66	327.14	2.82	4.84	8.26
Indigo-MusesD		61.19	37.82	29.47	213.97	153.69	170.01	5.68	2.76	5.01
Indigo-MusesT		58.18	40.22	30.51	363.55	382.26	529.09	6.37	5.37	7.67
LEDBAT		9.69	7.58	3.79	93.47	93.20	91.96	1.09	1.59	3.53
PCC-Allegro		55.21	34.35	29.50	1511.71	1141.68	1502.30	25.13	12.80	21.19
PCC-Expr		56.65	38.97	25.91	1008.15	902.37	247.04	23.37	6.65	3.16
QUIC Cubic		34.91	22.14	14.27	143.34	211.99	379.78	0.56	1.40	2.95
SCReAM		0.22	0.22	0.22	90.65	89.46	90.68	0.54	0.91	1.63
Sprout		3.00	1.88	1.83	97.96	95.30	97.57	0.85	0.77	2.52
TaoVA-100x		49.45	37.12	29.40	155.88	164.52	156.17	0.45	0.82	1.99
TCP Vegas		35.33	28.60	20.29	179.44	126.98	216.37	0.59	0.93	1.93
Verus		35.55	34.52	26.60	328.67	324.50	369.44	0.64	1.58	3.08
PCC-Vivace		50.75	31.30	22.72	1558.55	689.37	317.26	4.79	3.77	3.74
WebRTC media		1.69	0.93	0.37	95.25	96.57	95.33	0.34	0.64	1.72

Run 1: Statistics of TCP BBR

```
Start at: 2019-03-27 12:16:30
End at: 2019-03-27 12:17:00
Local clock offset: -2.928 ms
Remote clock offset: 6.614 ms

# Below is generated by plot.py at 2019-03-27 14:15:59
# Datalink statistics
-- Total of 3 flows:
Average throughput: 91.07 Mbit/s
95th percentile per-packet one-way delay: 471.688 ms
Loss rate: 4.11%
-- Flow 1:
Average throughput: 55.68 Mbit/s
95th percentile per-packet one-way delay: 430.521 ms
Loss rate: 2.61%
-- Flow 2:
Average throughput: 37.84 Mbit/s
95th percentile per-packet one-way delay: 623.357 ms
Loss rate: 5.78%
-- Flow 3:
Average throughput: 31.24 Mbit/s
95th percentile per-packet one-way delay: 437.856 ms
Loss rate: 7.82%
```

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

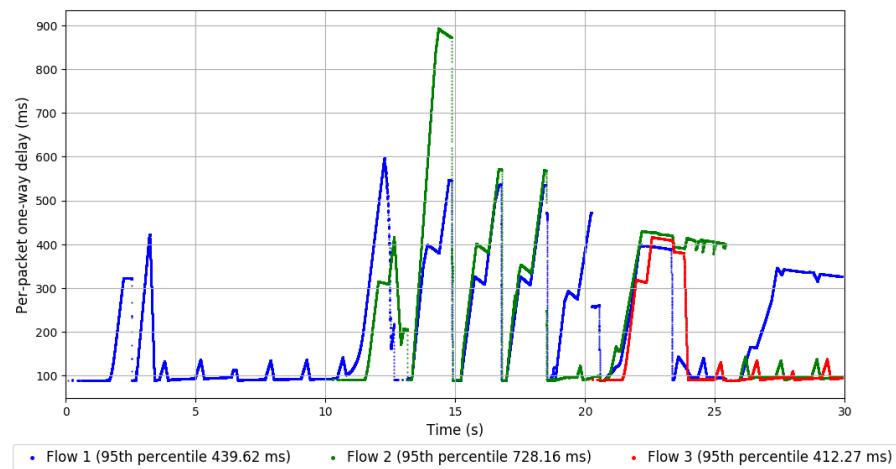
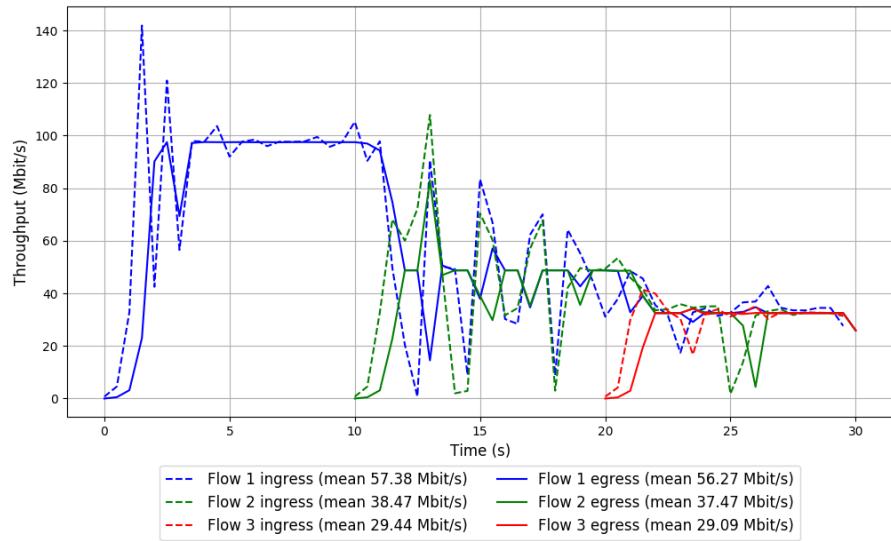


Run 2: Statistics of TCP BBR

```
Start at: 2019-03-27 12:43:29
End at: 2019-03-27 12:43:59
Local clock offset: -5.66 ms
Remote clock offset: 4.174 ms

# Below is generated by plot.py at 2019-03-27 14:15:59
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.71 Mbit/s
95th percentile per-packet one-way delay: 482.548 ms
Loss rate: 2.80%
-- Flow 1:
Average throughput: 56.27 Mbit/s
95th percentile per-packet one-way delay: 439.618 ms
Loss rate: 2.50%
-- Flow 2:
Average throughput: 37.47 Mbit/s
95th percentile per-packet one-way delay: 728.165 ms
Loss rate: 3.44%
-- Flow 3:
Average throughput: 29.09 Mbit/s
95th percentile per-packet one-way delay: 412.270 ms
Loss rate: 2.90%
```

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

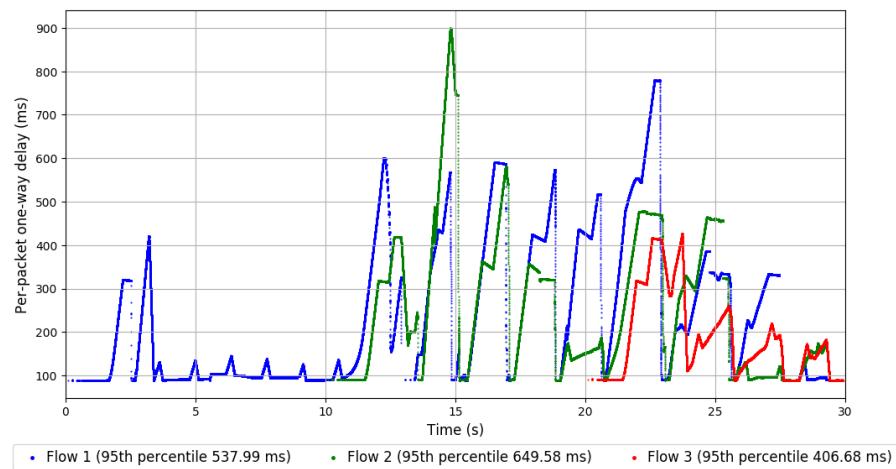
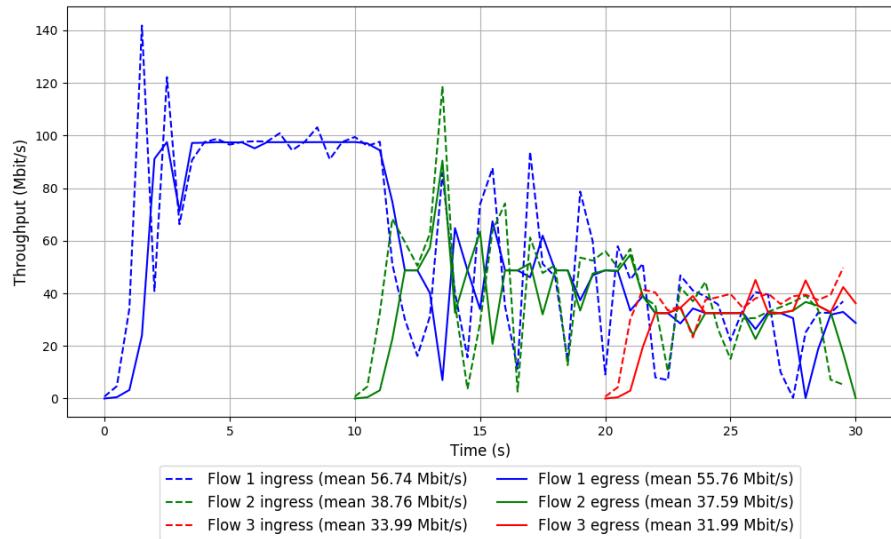


Run 3: Statistics of TCP BBR

```
Start at: 2019-03-27 13:10:38
End at: 2019-03-27 13:11:08
Local clock offset: -4.912 ms
Remote clock offset: 3.487 ms

# Below is generated by plot.py at 2019-03-27 14:16:00
# Datalink statistics
-- Total of 3 flows:
Average throughput: 91.16 Mbit/s
95th percentile per-packet one-way delay: 540.577 ms
Loss rate: 3.43%
-- Flow 1:
Average throughput: 55.76 Mbit/s
95th percentile per-packet one-way delay: 537.985 ms
Loss rate: 2.28%
-- Flow 2:
Average throughput: 37.59 Mbit/s
95th percentile per-packet one-way delay: 649.582 ms
Loss rate: 4.17%
-- Flow 3:
Average throughput: 31.99 Mbit/s
95th percentile per-packet one-way delay: 406.676 ms
Loss rate: 7.54%
```

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

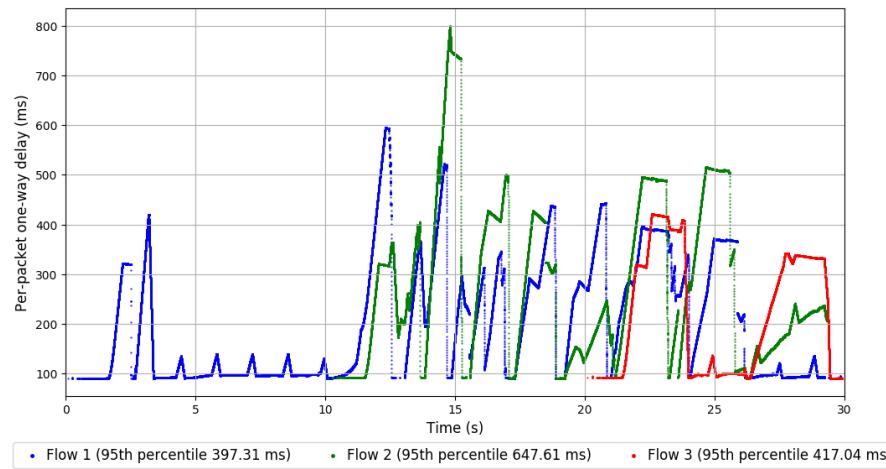
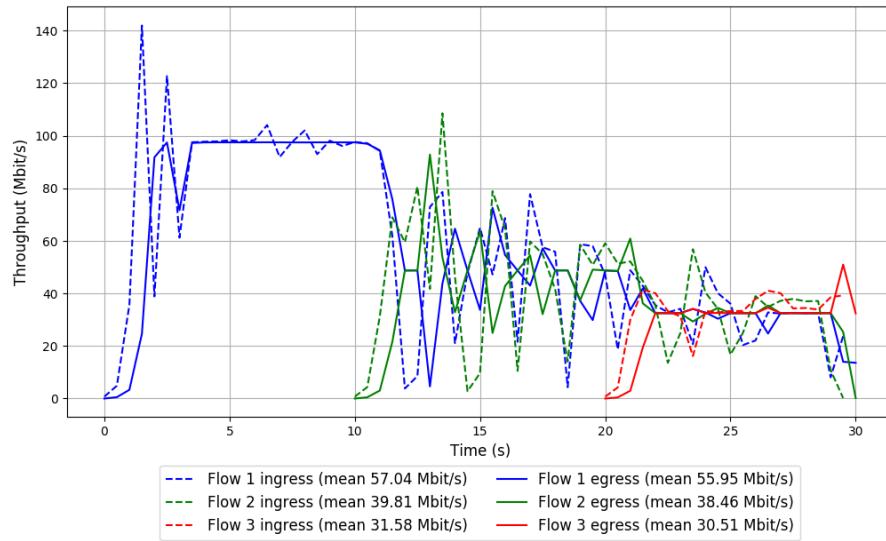


Run 4: Statistics of TCP BBR

```
Start at: 2019-03-27 13:37:38
End at: 2019-03-27 13:38:08
Local clock offset: -3.496 ms
Remote clock offset: 3.108 ms

# Below is generated by plot.py at 2019-03-27 14:16:00
# Datalink statistics
-- Total of 3 flows:
Average throughput: 91.32 Mbit/s
95th percentile per-packet one-way delay: 492.164 ms
Loss rate: 3.24%
-- Flow 1:
Average throughput: 55.95 Mbit/s
95th percentile per-packet one-way delay: 397.305 ms
Loss rate: 2.46%
-- Flow 2:
Average throughput: 38.46 Mbit/s
95th percentile per-packet one-way delay: 647.605 ms
Loss rate: 4.22%
-- Flow 3:
Average throughput: 30.51 Mbit/s
95th percentile per-packet one-way delay: 417.041 ms
Loss rate: 5.05%
```

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

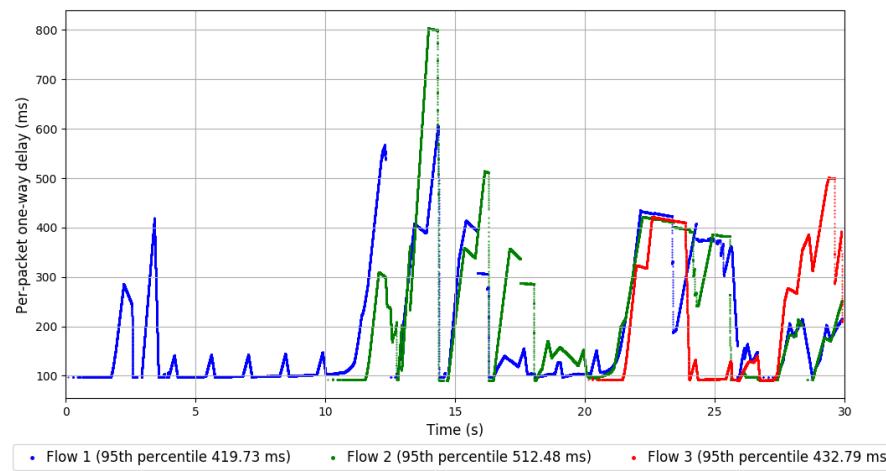
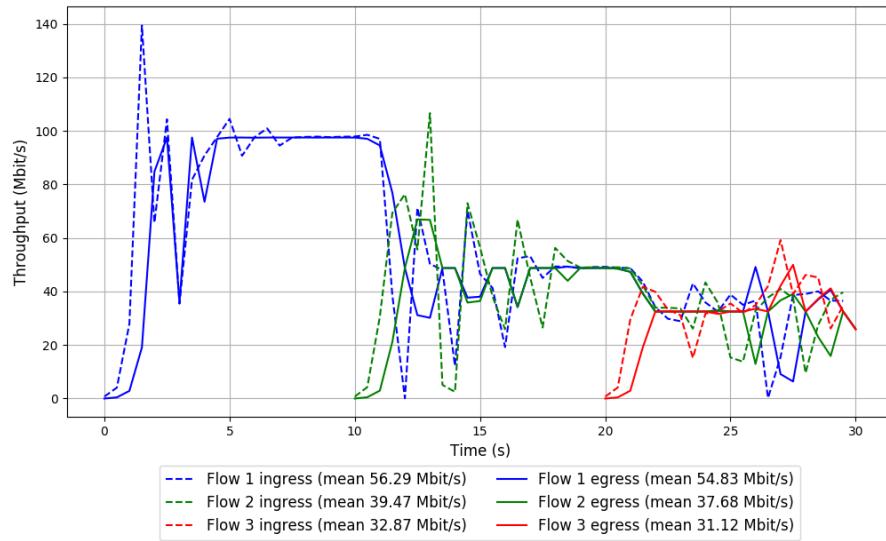


Run 5: Statistics of TCP BBR

```
Start at: 2019-03-27 14:04:40
End at: 2019-03-27 14:05:10
Local clock offset: -4.758 ms
Remote clock offset: 4.241 ms

# Below is generated by plot.py at 2019-03-27 14:16:00
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.09 Mbit/s
95th percentile per-packet one-way delay: 427.617 ms
Loss rate: 4.23%
-- Flow 1:
Average throughput: 54.83 Mbit/s
95th percentile per-packet one-way delay: 419.726 ms
Loss rate: 3.17%
-- Flow 2:
Average throughput: 37.68 Mbit/s
95th percentile per-packet one-way delay: 512.483 ms
Loss rate: 5.36%
-- Flow 3:
Average throughput: 31.12 Mbit/s
95th percentile per-packet one-way delay: 432.791 ms
Loss rate: 6.98%
```

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

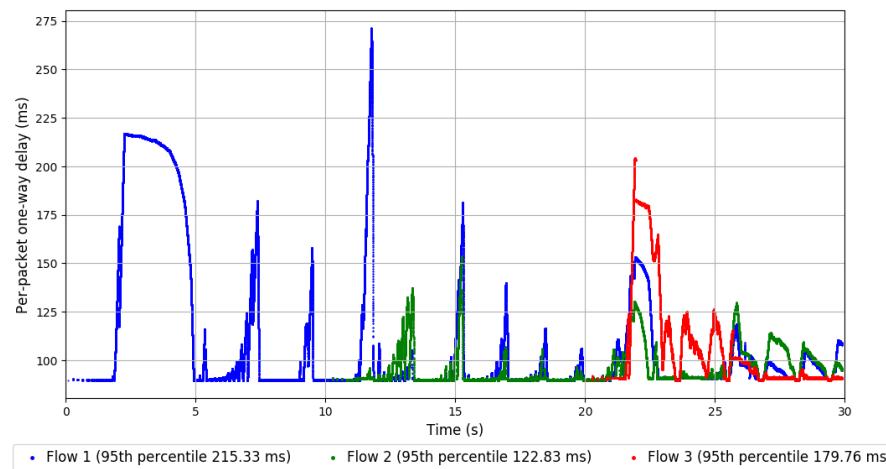
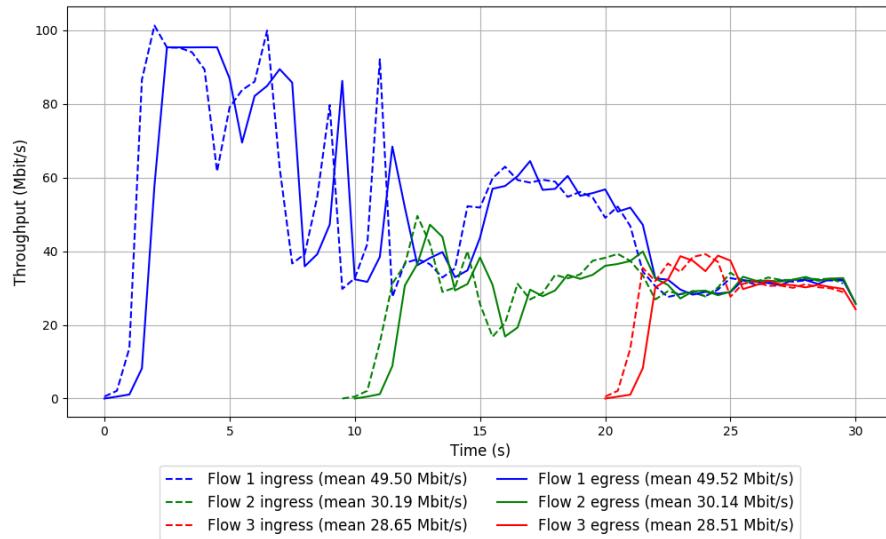


Run 1: Statistics of Copa

```
Start at: 2019-03-27 12:13:52
End at: 2019-03-27 12:14:22
Local clock offset: -2.831 ms
Remote clock offset: 6.769 ms

# Below is generated by plot.py at 2019-03-27 14:16:42
# Datalink statistics
-- Total of 3 flows:
Average throughput: 78.92 Mbit/s
95th percentile per-packet one-way delay: 213.449 ms
Loss rate: 0.87%
-- Flow 1:
Average throughput: 49.52 Mbit/s
95th percentile per-packet one-way delay: 215.328 ms
Loss rate: 0.54%
-- Flow 2:
Average throughput: 30.14 Mbit/s
95th percentile per-packet one-way delay: 122.831 ms
Loss rate: 1.04%
-- Flow 3:
Average throughput: 28.51 Mbit/s
95th percentile per-packet one-way delay: 179.758 ms
Loss rate: 2.21%
```

## Run 1: Report of Copa — Data Link

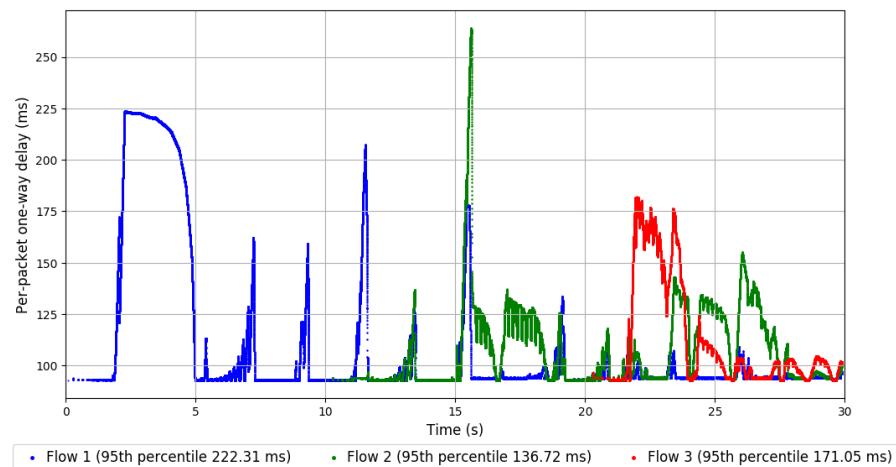
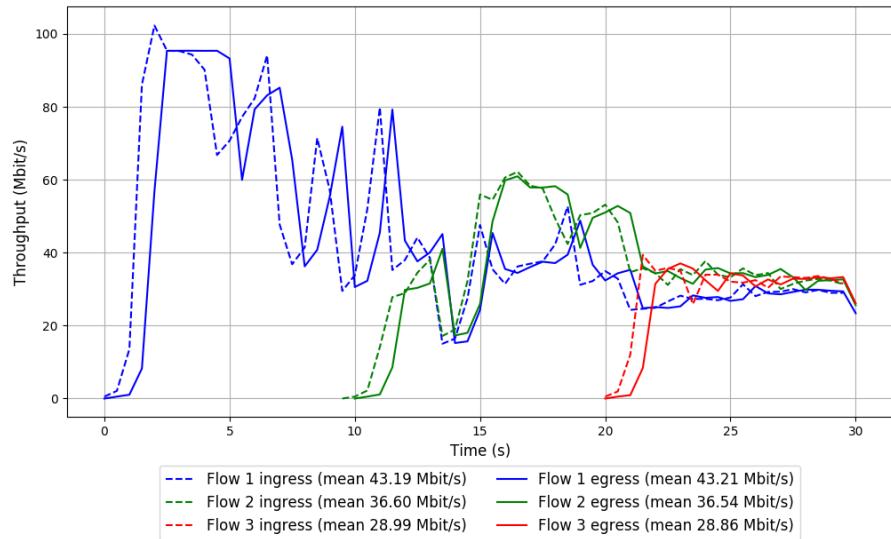


Run 2: Statistics of Copa

```
Start at: 2019-03-27 12:40:51
End at: 2019-03-27 12:41:21
Local clock offset: -5.64 ms
Remote clock offset: 0.427 ms

# Below is generated by plot.py at 2019-03-27 14:16:42
# Datalink statistics
-- Total of 3 flows:
Average throughput: 76.98 Mbit/s
95th percentile per-packet one-way delay: 220.443 ms
Loss rate: 0.88%
-- Flow 1:
Average throughput: 43.21 Mbit/s
95th percentile per-packet one-way delay: 222.314 ms
Loss rate: 0.52%
-- Flow 2:
Average throughput: 36.54 Mbit/s
95th percentile per-packet one-way delay: 136.721 ms
Loss rate: 1.01%
-- Flow 3:
Average throughput: 28.86 Mbit/s
95th percentile per-packet one-way delay: 171.051 ms
Loss rate: 2.17%
```

## Run 2: Report of Copa — Data Link

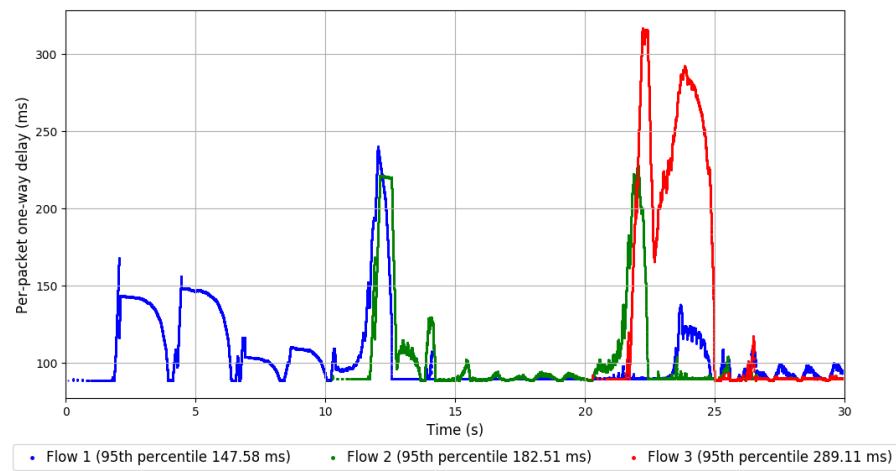
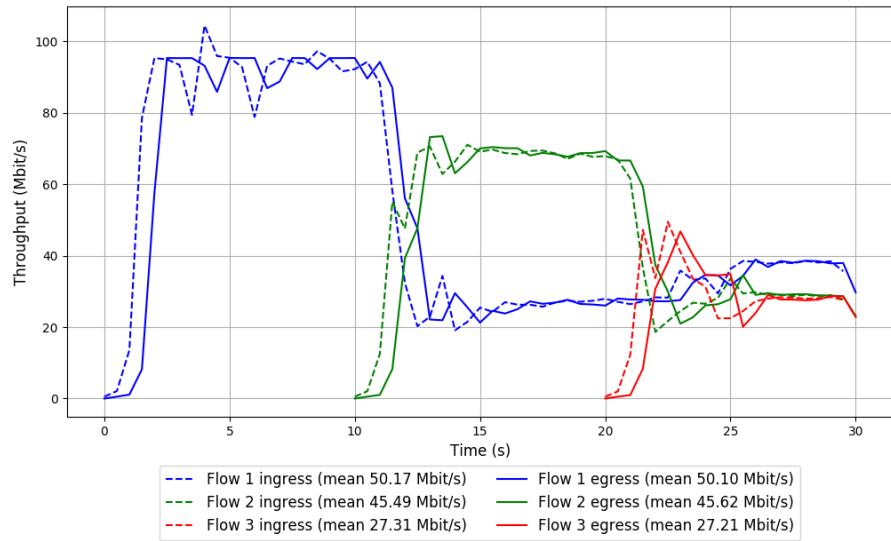


Run 3: Statistics of Copa

```
Start at: 2019-03-27 13:07:59
End at: 2019-03-27 13:08:29
Local clock offset: -4.114 ms
Remote clock offset: 4.461 ms

# Below is generated by plot.py at 2019-03-27 14:16:54
# Datalink statistics
-- Total of 3 flows:
Average throughput: 89.36 Mbit/s
95th percentile per-packet one-way delay: 211.151 ms
Loss rate: 0.81%
-- Flow 1:
Average throughput: 50.10 Mbit/s
95th percentile per-packet one-way delay: 147.584 ms
Loss rate: 0.71%
-- Flow 2:
Average throughput: 45.62 Mbit/s
95th percentile per-packet one-way delay: 182.511 ms
Loss rate: 0.58%
-- Flow 3:
Average throughput: 27.21 Mbit/s
95th percentile per-packet one-way delay: 289.106 ms
Loss rate: 2.07%
```

### Run 3: Report of Copa — Data Link

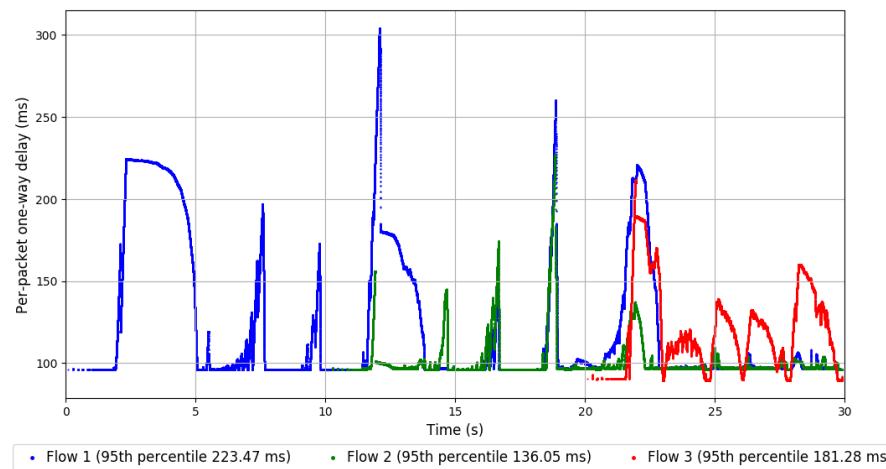
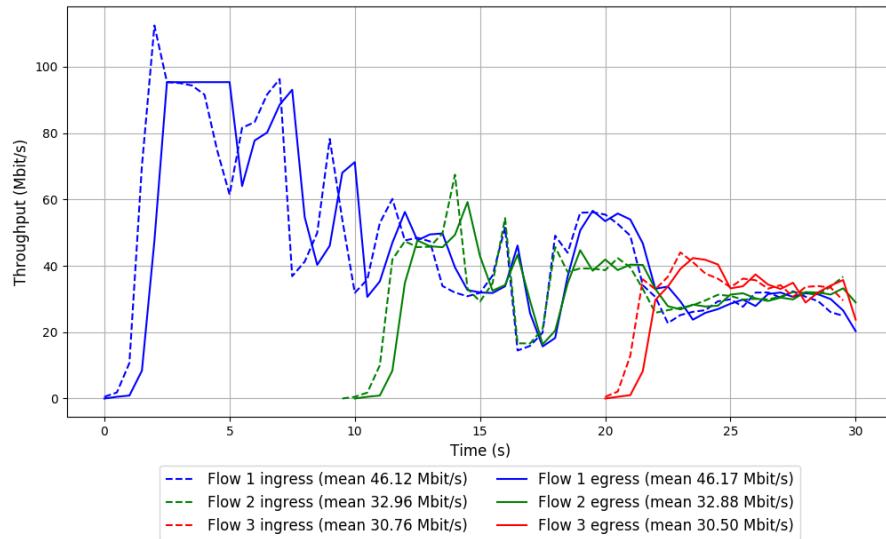


Run 4: Statistics of Copa

```
Start at: 2019-03-27 13:35:00
End at: 2019-03-27 13:35:30
Local clock offset: -3.6 ms
Remote clock offset: 4.243 ms

# Below is generated by plot.py at 2019-03-27 14:17:35
# Datalink statistics
-- Total of 3 flows:
Average throughput: 78.06 Mbit/s
95th percentile per-packet one-way delay: 222.337 ms
Loss rate: 0.93%
-- Flow 1:
Average throughput: 46.17 Mbit/s
95th percentile per-packet one-way delay: 223.475 ms
Loss rate: 0.49%
-- Flow 2:
Average throughput: 32.88 Mbit/s
95th percentile per-packet one-way delay: 136.046 ms
Loss rate: 1.11%
-- Flow 3:
Average throughput: 30.50 Mbit/s
95th percentile per-packet one-way delay: 181.285 ms
Loss rate: 2.55%
```

Run 4: Report of Copa — Data Link

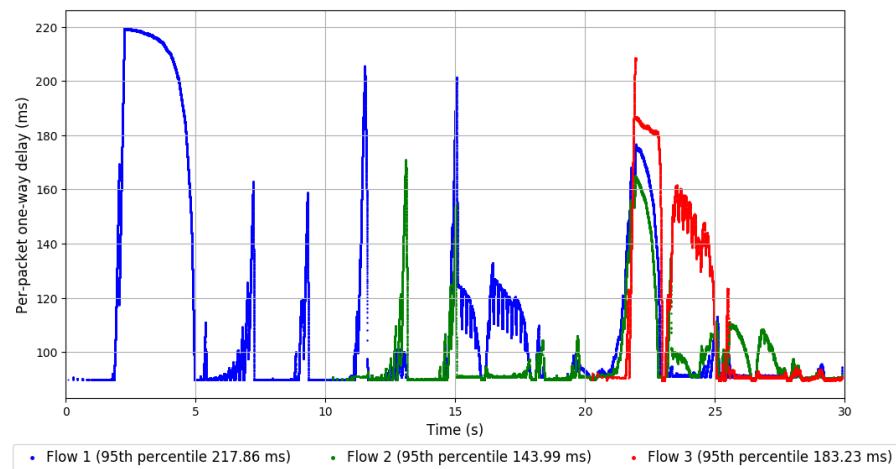
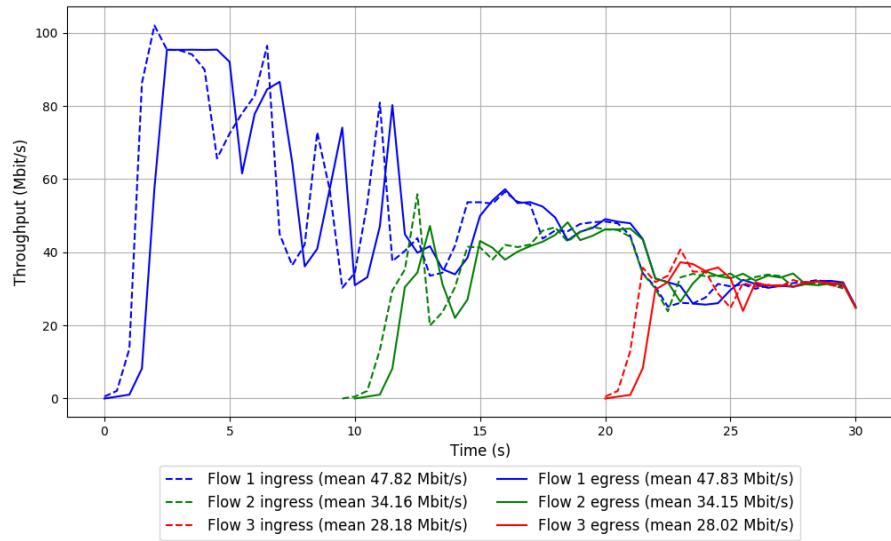


Run 5: Statistics of Copa

```
Start at: 2019-03-27 14:02:02
End at: 2019-03-27 14:02:32
Local clock offset: -4.647 ms
Remote clock offset: 5.285 ms

# Below is generated by plot.py at 2019-03-27 14:17:37
# Datalink statistics
-- Total of 3 flows:
Average throughput: 79.73 Mbit/s
95th percentile per-packet one-way delay: 215.806 ms
Loss rate: 0.85%
-- Flow 1:
Average throughput: 47.83 Mbit/s
95th percentile per-packet one-way delay: 217.857 ms
Loss rate: 0.55%
-- Flow 2:
Average throughput: 34.15 Mbit/s
95th percentile per-packet one-way delay: 143.987 ms
Loss rate: 0.88%
-- Flow 3:
Average throughput: 28.02 Mbit/s
95th percentile per-packet one-way delay: 183.226 ms
Loss rate: 2.31%
```

### Run 5: Report of Copa — Data Link

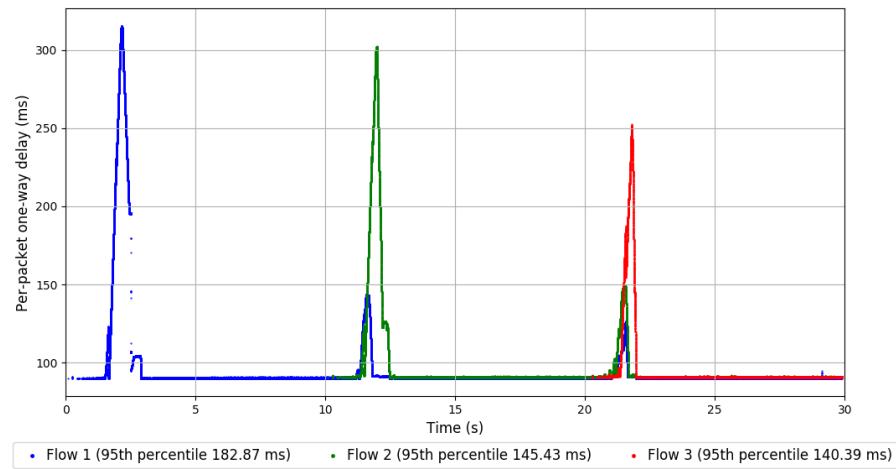
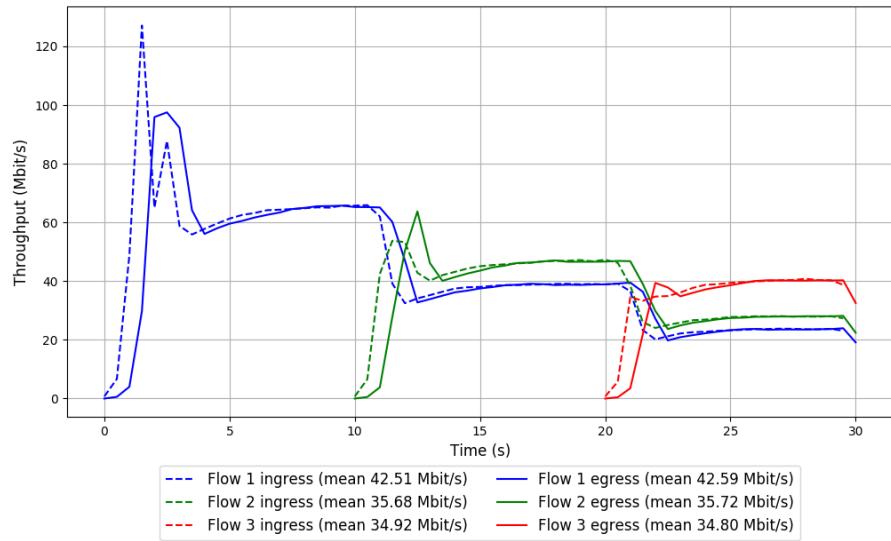


Run 1: Statistics of TCP Cubic

```
Start at: 2019-03-27 12:20:24
End at: 2019-03-27 12:20:54
Local clock offset: -3.61 ms
Remote clock offset: 6.778 ms

# Below is generated by plot.py at 2019-03-27 14:17:37
# Datalink statistics
-- Total of 3 flows:
Average throughput: 77.75 Mbit/s
95th percentile per-packet one-way delay: 149.697 ms
Loss rate: 0.74%
-- Flow 1:
Average throughput: 42.59 Mbit/s
95th percentile per-packet one-way delay: 182.872 ms
Loss rate: 0.37%
-- Flow 2:
Average throughput: 35.72 Mbit/s
95th percentile per-packet one-way delay: 145.427 ms
Loss rate: 0.75%
-- Flow 3:
Average throughput: 34.80 Mbit/s
95th percentile per-packet one-way delay: 140.394 ms
Loss rate: 2.05%
```

Run 1: Report of TCP Cubic — Data Link

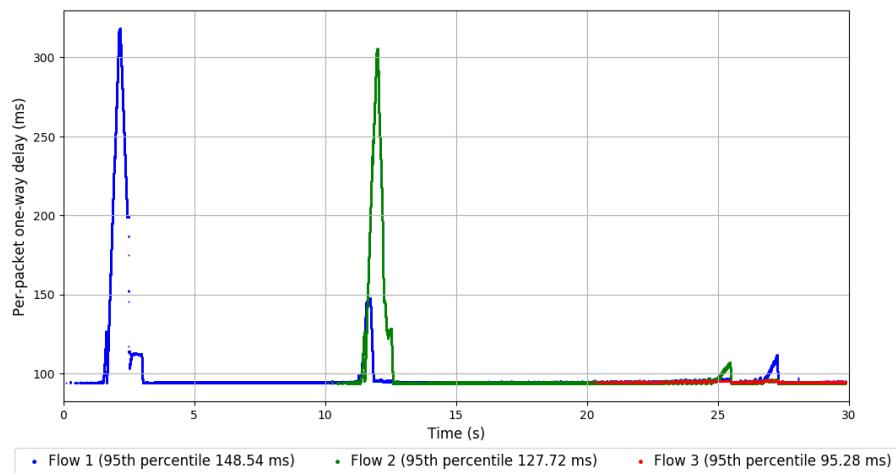
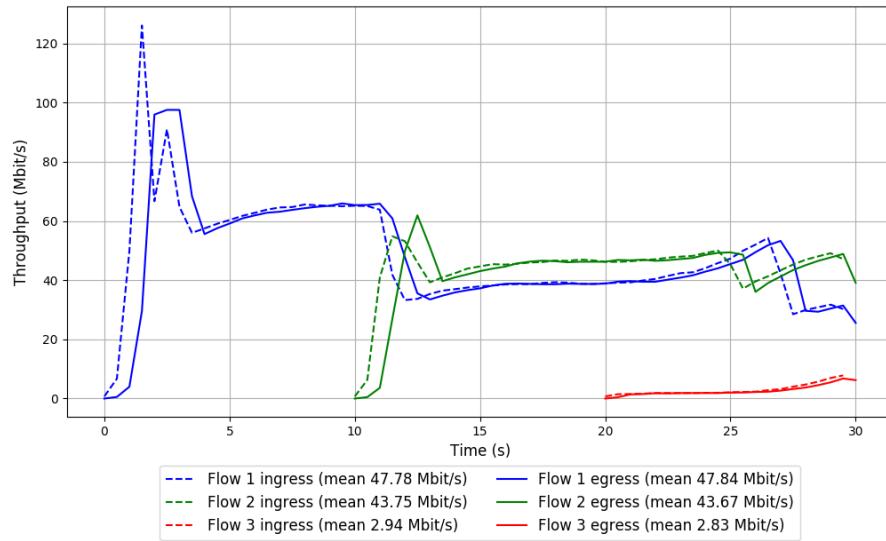


Run 2: Statistics of TCP Cubic

```
Start at: 2019-03-27 12:47:23
End at: 2019-03-27 12:47:53
Local clock offset: -5.556 ms
Remote clock offset: -1.309 ms

# Below is generated by plot.py at 2019-03-27 14:17:37
# Datalink statistics
-- Total of 3 flows:
Average throughput: 77.77 Mbit/s
95th percentile per-packet one-way delay: 143.999 ms
Loss rate: 0.72%
-- Flow 1:
Average throughput: 47.84 Mbit/s
95th percentile per-packet one-way delay: 148.536 ms
Loss rate: 0.44%
-- Flow 2:
Average throughput: 43.67 Mbit/s
95th percentile per-packet one-way delay: 127.722 ms
Loss rate: 1.04%
-- Flow 3:
Average throughput: 2.83 Mbit/s
95th percentile per-packet one-way delay: 95.282 ms
Loss rate: 5.29%
```

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

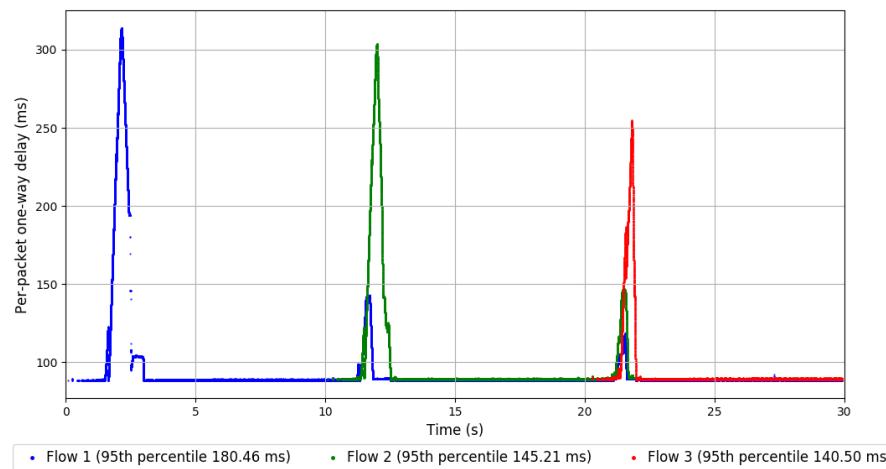
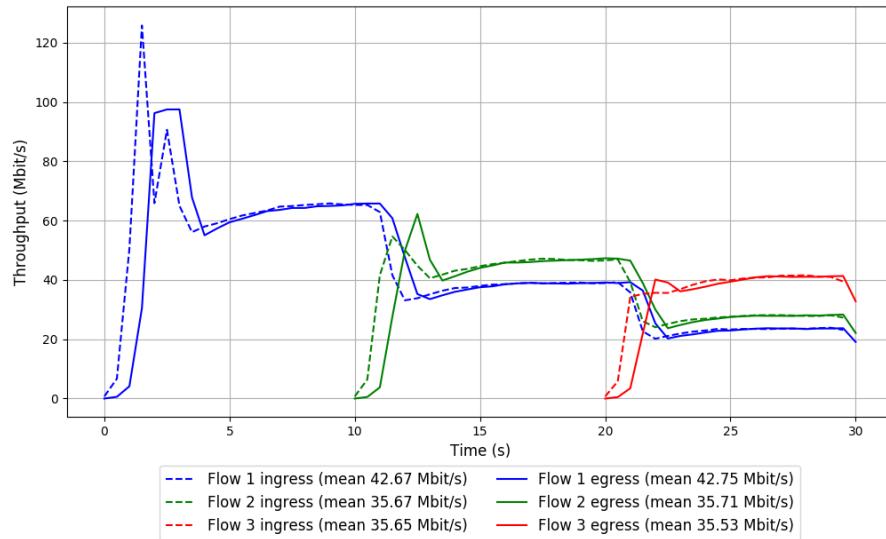


Run 3: Statistics of TCP Cubic

```
Start at: 2019-03-27 13:14:32
End at: 2019-03-27 13:15:02
Local clock offset: -4.237 ms
Remote clock offset: 5.008 ms

# Below is generated by plot.py at 2019-03-27 14:17:37
# Datalink statistics
-- Total of 3 flows:
Average throughput: 78.13 Mbit/s
95th percentile per-packet one-way delay: 151.487 ms
Loss rate: 0.75%
-- Flow 1:
Average throughput: 42.75 Mbit/s
95th percentile per-packet one-way delay: 180.459 ms
Loss rate: 0.38%
-- Flow 2:
Average throughput: 35.71 Mbit/s
95th percentile per-packet one-way delay: 145.211 ms
Loss rate: 0.75%
-- Flow 3:
Average throughput: 35.53 Mbit/s
95th percentile per-packet one-way delay: 140.499 ms
Loss rate: 2.05%
```

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

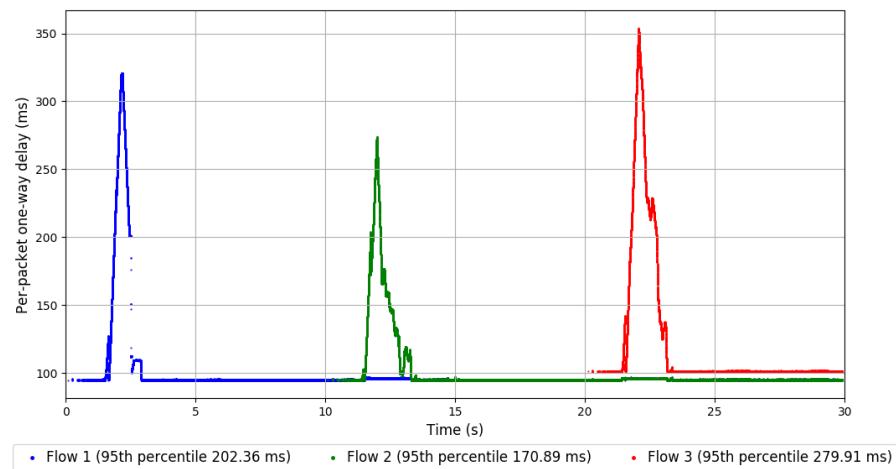
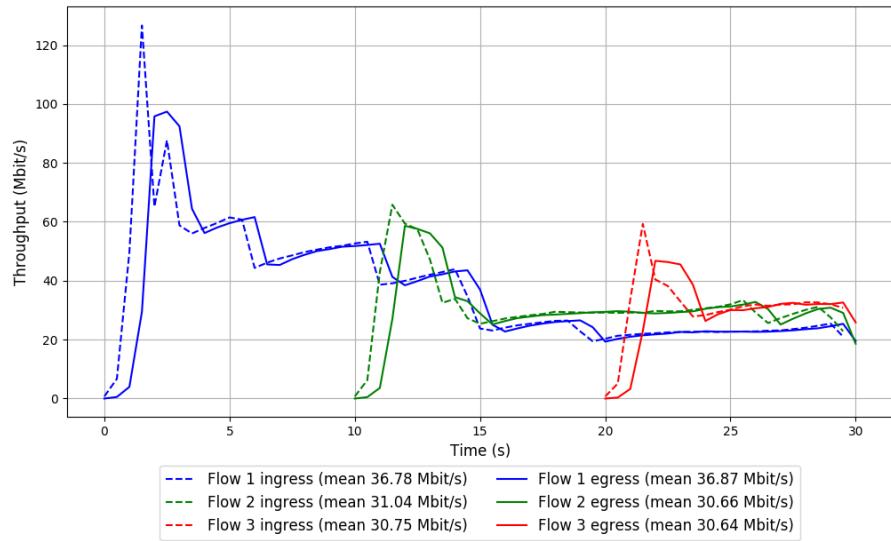


Run 4: Statistics of TCP Cubic

```
Start at: 2019-03-27 13:41:32
End at: 2019-03-27 13:42:02
Local clock offset: -3.41 ms
Remote clock offset: -0.356 ms

# Below is generated by plot.py at 2019-03-27 14:17:37
# Datalink statistics
-- Total of 3 flows:
Average throughput: 67.28 Mbit/s
95th percentile per-packet one-way delay: 216.209 ms
Loss rate: 1.14%
-- Flow 1:
Average throughput: 36.87 Mbit/s
95th percentile per-packet one-way delay: 202.359 ms
Loss rate: 0.34%
-- Flow 2:
Average throughput: 30.66 Mbit/s
95th percentile per-packet one-way delay: 170.889 ms
Loss rate: 2.07%
-- Flow 3:
Average throughput: 30.64 Mbit/s
95th percentile per-packet one-way delay: 279.910 ms
Loss rate: 2.15%
```

Run 4: Report of TCP Cubic — Data Link

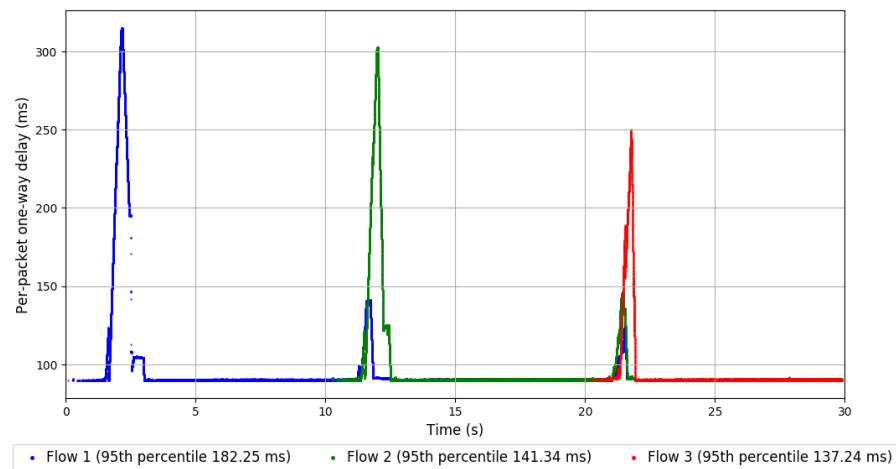
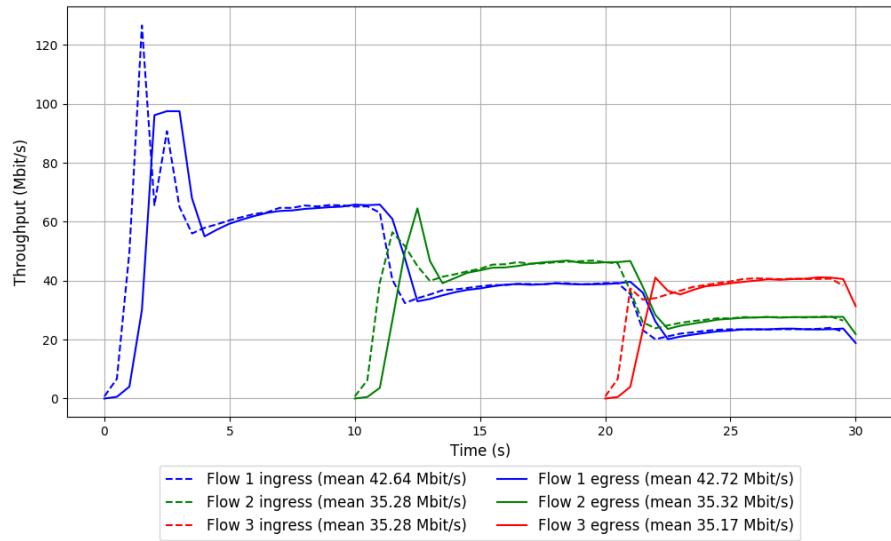


Run 5: Statistics of TCP Cubic

```
Start at: 2019-03-27 14:08:33
End at: 2019-03-27 14:09:03
Local clock offset: -5.622 ms
Remote clock offset: 4.536 ms

# Below is generated by plot.py at 2019-03-27 14:17:37
# Datalink statistics
-- Total of 3 flows:
Average throughput: 77.74 Mbit/s
95th percentile per-packet one-way delay: 150.641 ms
Loss rate: 0.74%
-- Flow 1:
Average throughput: 42.72 Mbit/s
95th percentile per-packet one-way delay: 182.254 ms
Loss rate: 0.38%
-- Flow 2:
Average throughput: 35.32 Mbit/s
95th percentile per-packet one-way delay: 141.339 ms
Loss rate: 0.74%
-- Flow 3:
Average throughput: 35.17 Mbit/s
95th percentile per-packet one-way delay: 137.244 ms
Loss rate: 2.03%
```

Run 5: Report of TCP Cubic — Data Link

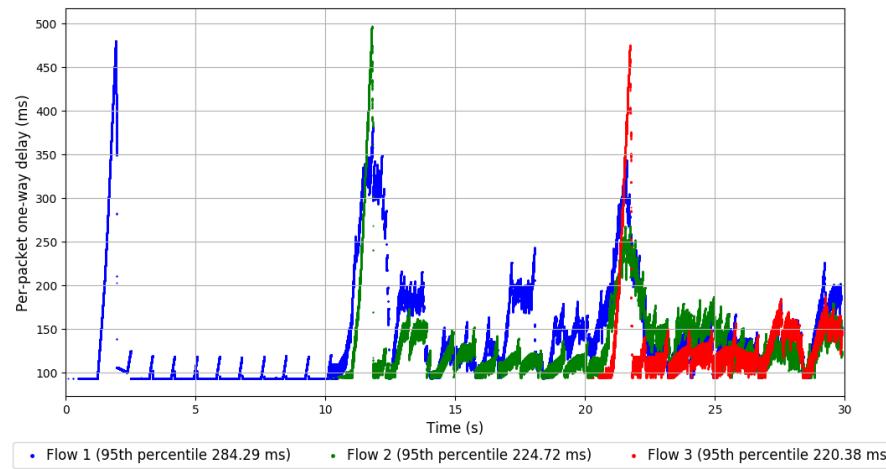
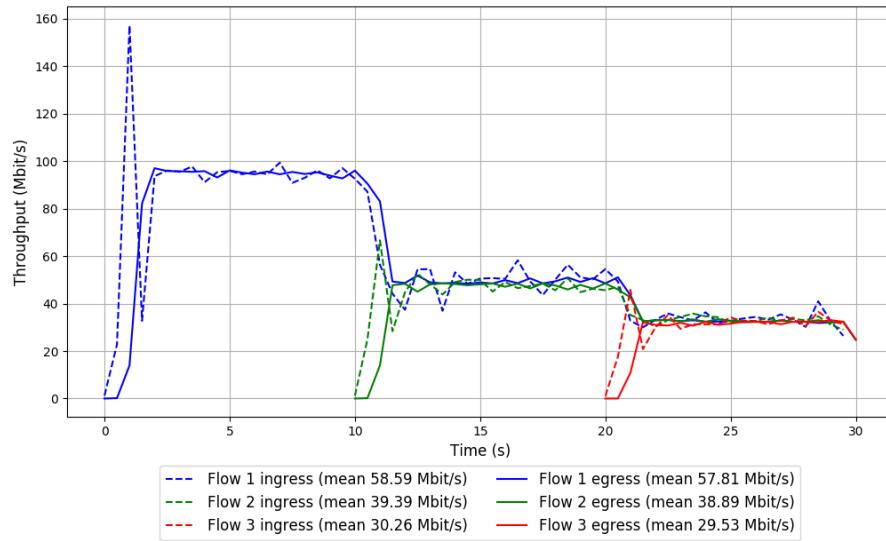


```
Run 1: Statistics of FillP

Start at: 2019-03-27 12:02:20
End at: 2019-03-27 12:02:50
Local clock offset: -2.863 ms
Remote clock offset: 2.332 ms

# Below is generated by plot.py at 2019-03-27 14:18:05
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.33 Mbit/s
95th percentile per-packet one-way delay: 255.661 ms
Loss rate: 2.17%
-- Flow 1:
Average throughput: 57.81 Mbit/s
95th percentile per-packet one-way delay: 284.287 ms
Loss rate: 1.88%
-- Flow 2:
Average throughput: 38.89 Mbit/s
95th percentile per-packet one-way delay: 224.716 ms
Loss rate: 2.07%
-- Flow 3:
Average throughput: 29.53 Mbit/s
95th percentile per-packet one-way delay: 220.381 ms
Loss rate: 4.10%
```

Run 1: Report of FillP — Data Link

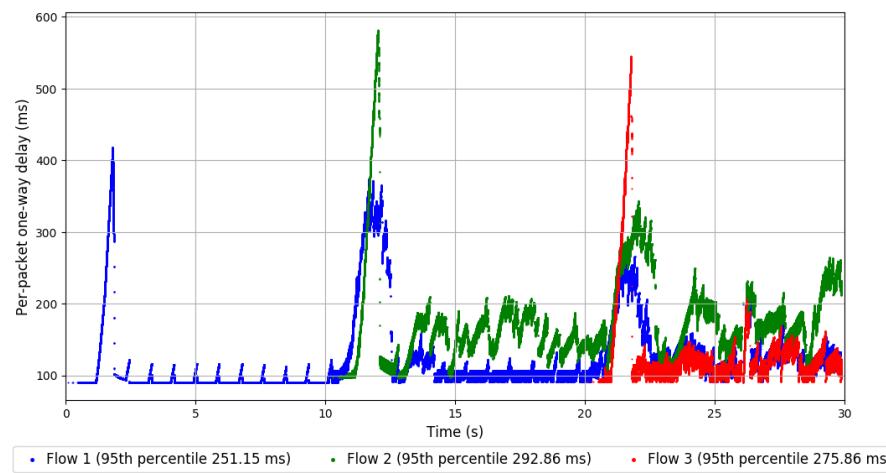
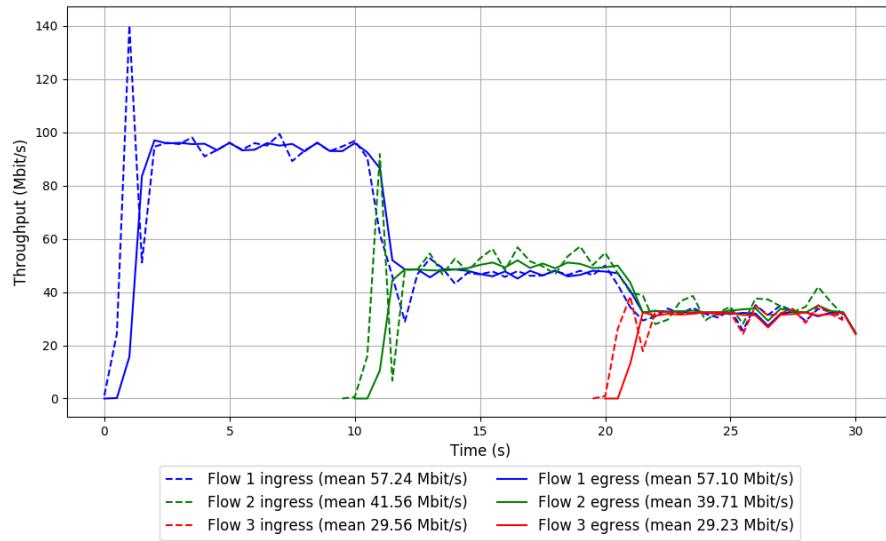


Run 2: Statistics of FillP

```
Start at: 2019-03-27 12:29:20
End at: 2019-03-27 12:29:50
Local clock offset: -5.134 ms
Remote clock offset: 5.913 ms

# Below is generated by plot.py at 2019-03-27 14:18:06
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.09 Mbit/s
95th percentile per-packet one-way delay: 275.217 ms
Loss rate: 2.33%
-- Flow 1:
Average throughput: 57.10 Mbit/s
95th percentile per-packet one-way delay: 251.149 ms
Loss rate: 0.82%
-- Flow 2:
Average throughput: 39.71 Mbit/s
95th percentile per-packet one-way delay: 292.860 ms
Loss rate: 5.26%
-- Flow 3:
Average throughput: 29.23 Mbit/s
95th percentile per-packet one-way delay: 275.859 ms
Loss rate: 2.81%
```

## Run 2: Report of FillP — Data Link

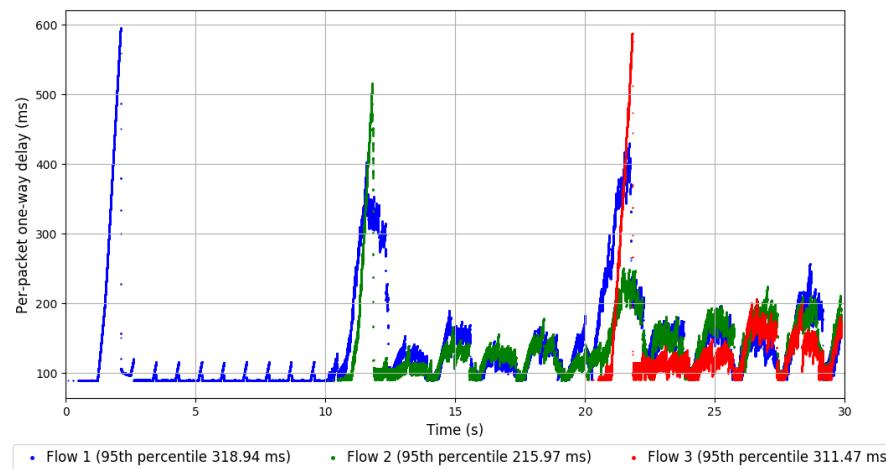
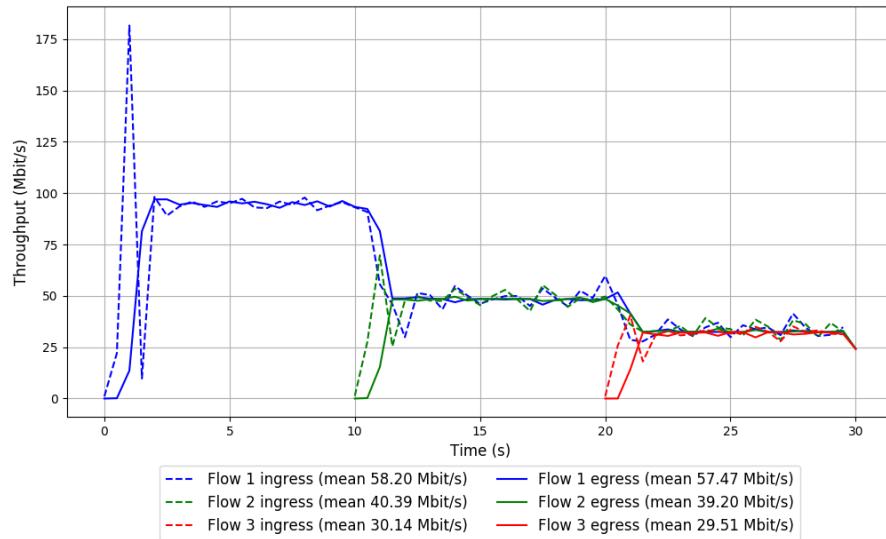


Run 3: Statistics of FillP

```
Start at: 2019-03-27 12:56:24
End at: 2019-03-27 12:56:54
Local clock offset: -4.24 ms
Remote clock offset: 3.334 ms

# Below is generated by plot.py at 2019-03-27 14:18:07
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.18 Mbit/s
95th percentile per-packet one-way delay: 297.332 ms
Loss rate: 2.55%
-- Flow 1:
Average throughput: 57.47 Mbit/s
95th percentile per-packet one-way delay: 318.938 ms
Loss rate: 1.78%
-- Flow 2:
Average throughput: 39.20 Mbit/s
95th percentile per-packet one-way delay: 215.966 ms
Loss rate: 3.75%
-- Flow 3:
Average throughput: 29.51 Mbit/s
95th percentile per-packet one-way delay: 311.473 ms
Loss rate: 3.81%
```

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

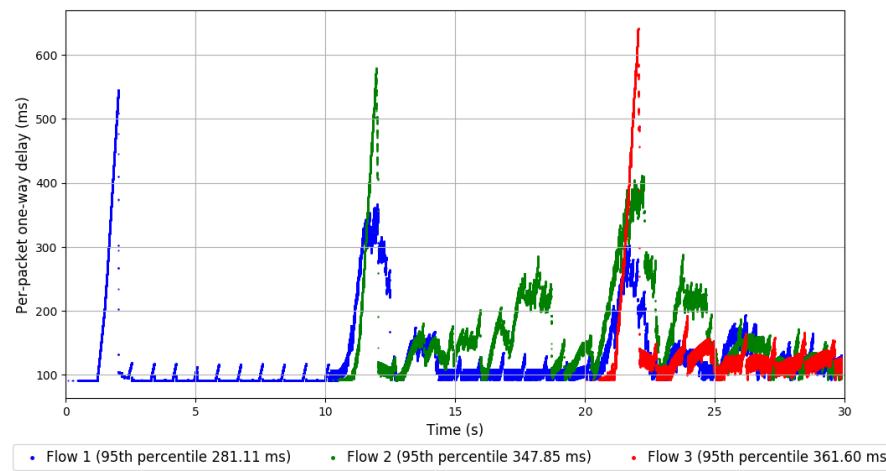
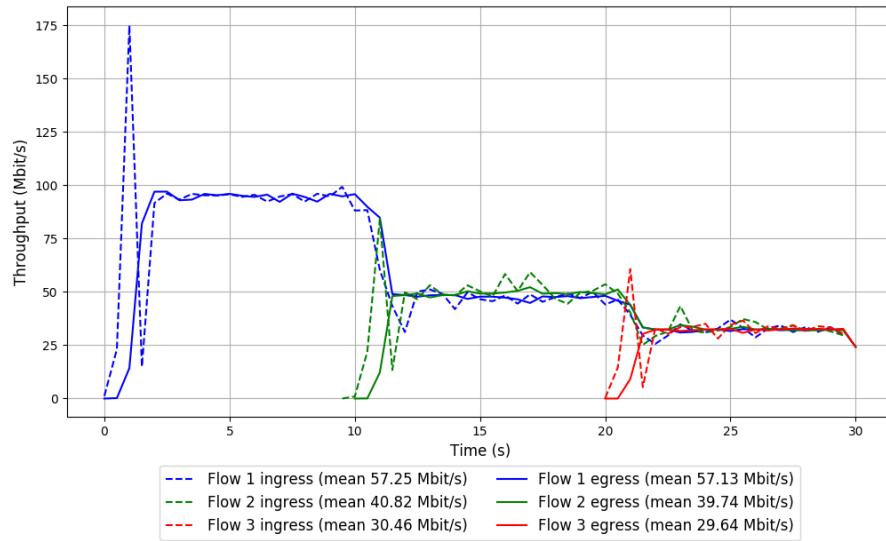


Run 4: Statistics of FillP

```
Start at: 2019-03-27 13:23:29
End at: 2019-03-27 13:23:59
Local clock offset: -3.893 ms
Remote clock offset: 2.913 ms

# Below is generated by plot.py at 2019-03-27 14:18:09
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.27 Mbit/s
95th percentile per-packet one-way delay: 301.339 ms
Loss rate: 1.90%
-- Flow 1:
Average throughput: 57.13 Mbit/s
95th percentile per-packet one-way delay: 281.106 ms
Loss rate: 0.72%
-- Flow 2:
Average throughput: 39.74 Mbit/s
95th percentile per-packet one-way delay: 347.846 ms
Loss rate: 3.46%
-- Flow 3:
Average throughput: 29.64 Mbit/s
95th percentile per-packet one-way delay: 361.604 ms
Loss rate: 4.36%
```

## Run 4: Report of FillP — Data Link

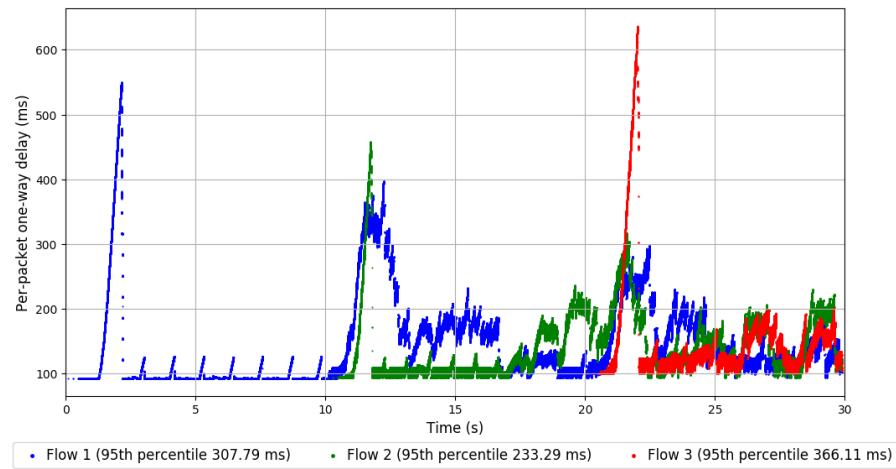
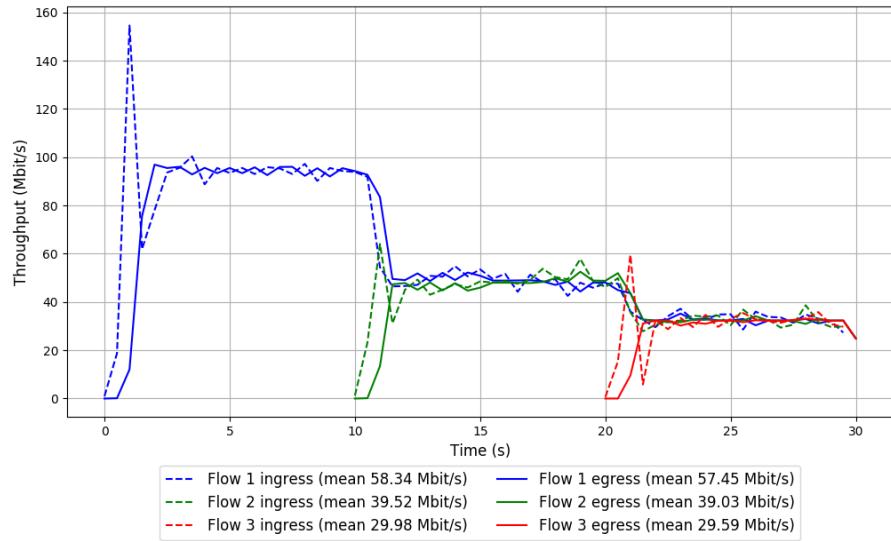


Run 5: Statistics of FillP

```
Start at: 2019-03-27 13:50:29
End at: 2019-03-27 13:50:59
Local clock offset: -4.775 ms
Remote clock offset: 1.092 ms

# Below is generated by plot.py at 2019-03-27 14:18:40
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.09 Mbit/s
95th percentile per-packet one-way delay: 285.315 ms
Loss rate: 2.16%
-- Flow 1:
Average throughput: 57.45 Mbit/s
95th percentile per-packet one-way delay: 307.792 ms
Loss rate: 2.03%
-- Flow 2:
Average throughput: 39.03 Mbit/s
95th percentile per-packet one-way delay: 233.286 ms
Loss rate: 2.10%
-- Flow 3:
Average throughput: 29.59 Mbit/s
95th percentile per-packet one-way delay: 366.113 ms
Loss rate: 3.02%
```

## Run 5: Report of FillP — Data Link

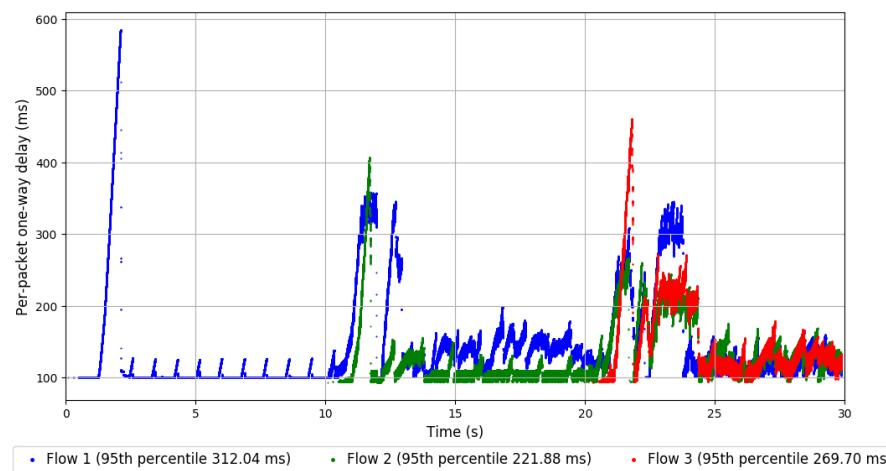
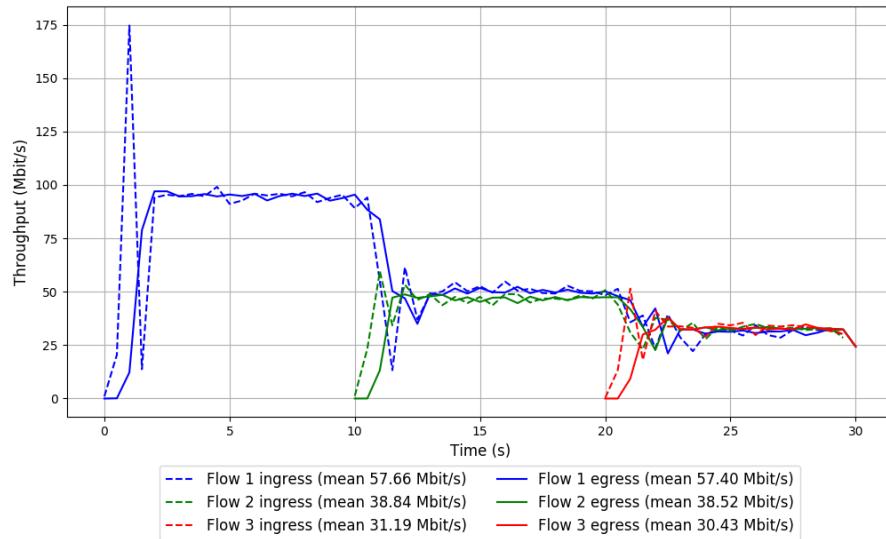


Run 1: Statistics of FillP-Sheep

```
Start at: 2019-03-27 12:10:06
End at: 2019-03-27 12:10:36
Local clock offset: -2.888 ms
Remote clock offset: 2.731 ms

# Below is generated by plot.py at 2019-03-27 14:18:45
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.97 Mbit/s
95th percentile per-packet one-way delay: 288.372 ms
Loss rate: 1.50%
-- Flow 1:
Average throughput: 57.40 Mbit/s
95th percentile per-packet one-way delay: 312.040 ms
Loss rate: 1.03%
-- Flow 2:
Average throughput: 38.52 Mbit/s
95th percentile per-packet one-way delay: 221.875 ms
Loss rate: 1.57%
-- Flow 3:
Average throughput: 30.43 Mbit/s
95th percentile per-packet one-way delay: 269.703 ms
Loss rate: 3.92%
```

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

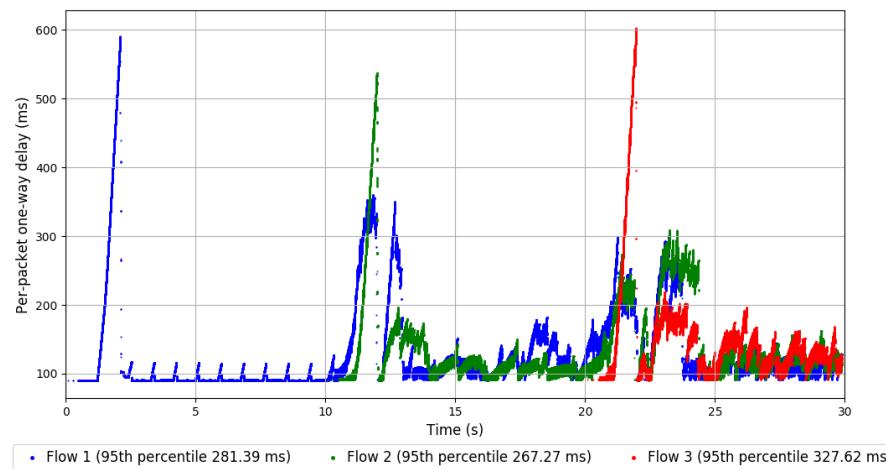
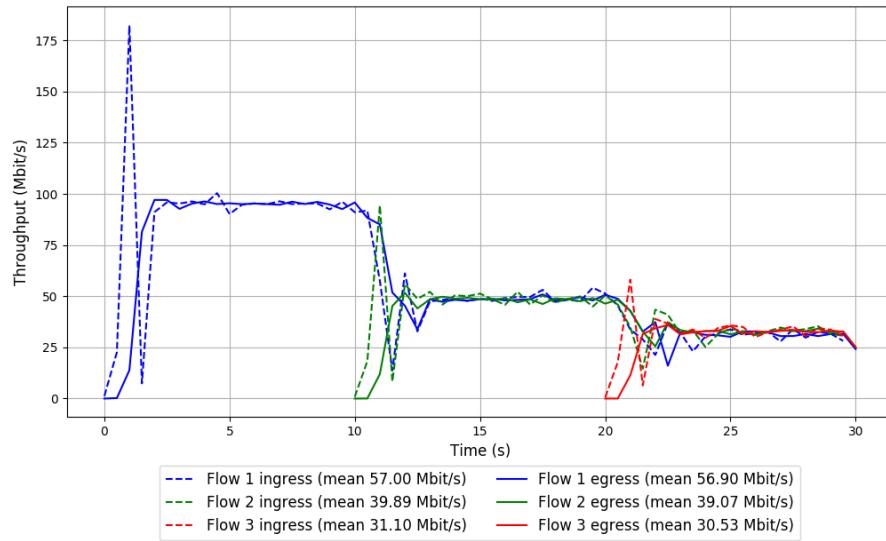


Run 2: Statistics of FillP-Sheep

```
Start at: 2019-03-27 12:37:06
End at: 2019-03-27 12:37:36
Local clock offset: -5.483 ms
Remote clock offset: 3.8 ms

# Below is generated by plot.py at 2019-03-27 14:18:54
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.88 Mbit/s
95th percentile per-packet one-way delay: 276.296 ms
Loss rate: 1.64%
-- Flow 1:
Average throughput: 56.90 Mbit/s
95th percentile per-packet one-way delay: 281.394 ms
Loss rate: 0.76%
-- Flow 2:
Average throughput: 39.07 Mbit/s
95th percentile per-packet one-way delay: 267.269 ms
Loss rate: 2.82%
-- Flow 3:
Average throughput: 30.53 Mbit/s
95th percentile per-packet one-way delay: 327.615 ms
Loss rate: 3.46%
```

Run 2: Report of FillP-Sheep — Data Link

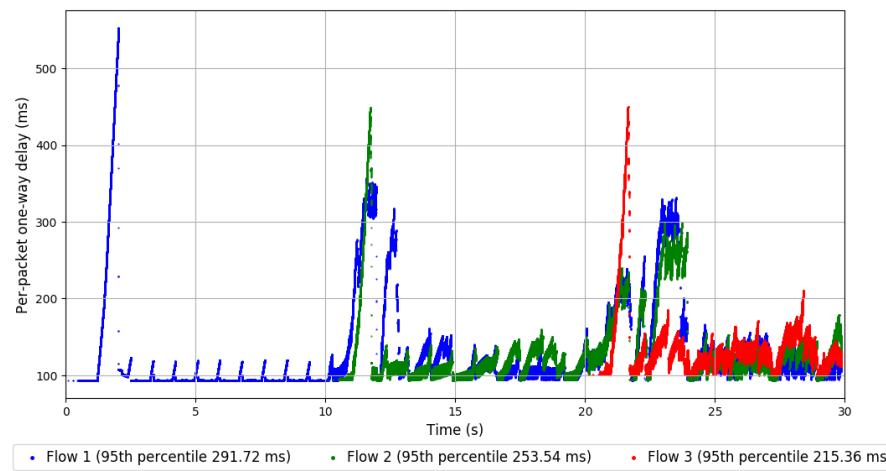
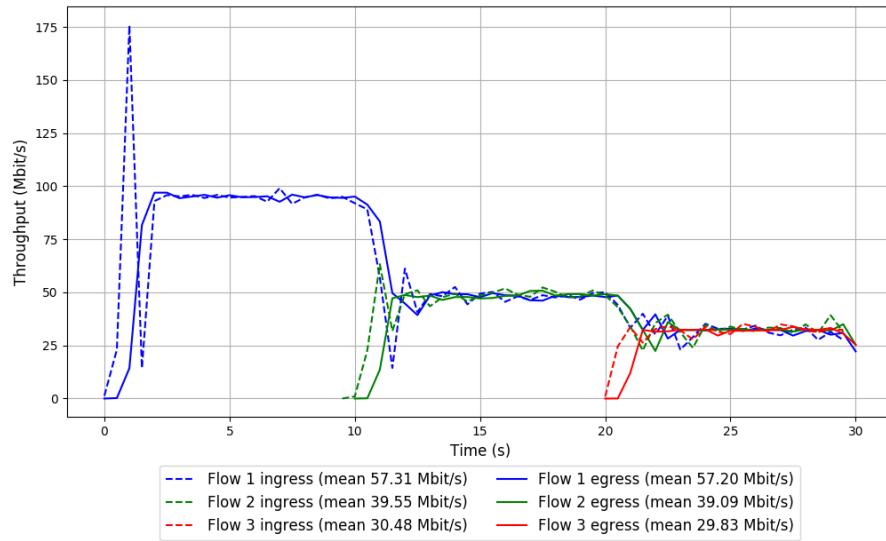


Run 3: Statistics of FillP-Sheep

```
Start at: 2019-03-27 13:04:13
End at: 2019-03-27 13:04:43
Local clock offset: -4.137 ms
Remote clock offset: -1.002 ms

# Below is generated by plot.py at 2019-03-27 14:18:56
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.95 Mbit/s
95th percentile per-packet one-way delay: 271.402 ms
Loss rate: 1.43%
-- Flow 1:
Average throughput: 57.20 Mbit/s
95th percentile per-packet one-way delay: 291.719 ms
Loss rate: 0.75%
-- Flow 2:
Average throughput: 39.09 Mbit/s
95th percentile per-packet one-way delay: 253.539 ms
Loss rate: 2.02%
-- Flow 3:
Average throughput: 29.83 Mbit/s
95th percentile per-packet one-way delay: 215.360 ms
Loss rate: 3.74%
```

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

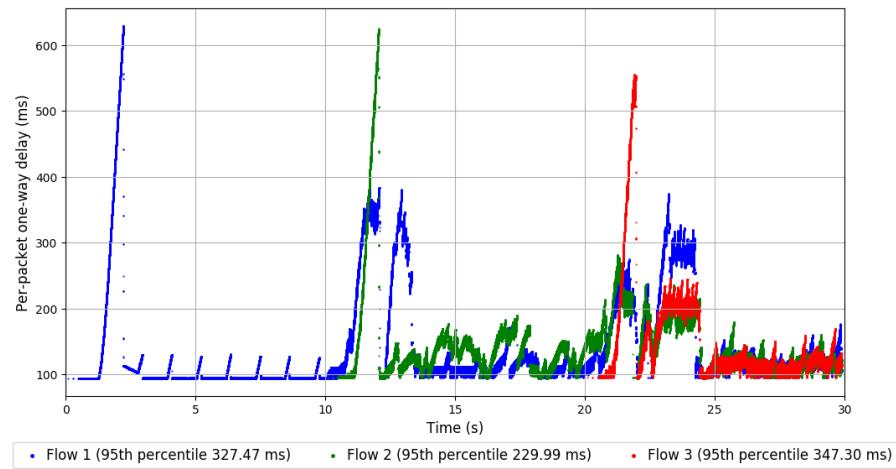
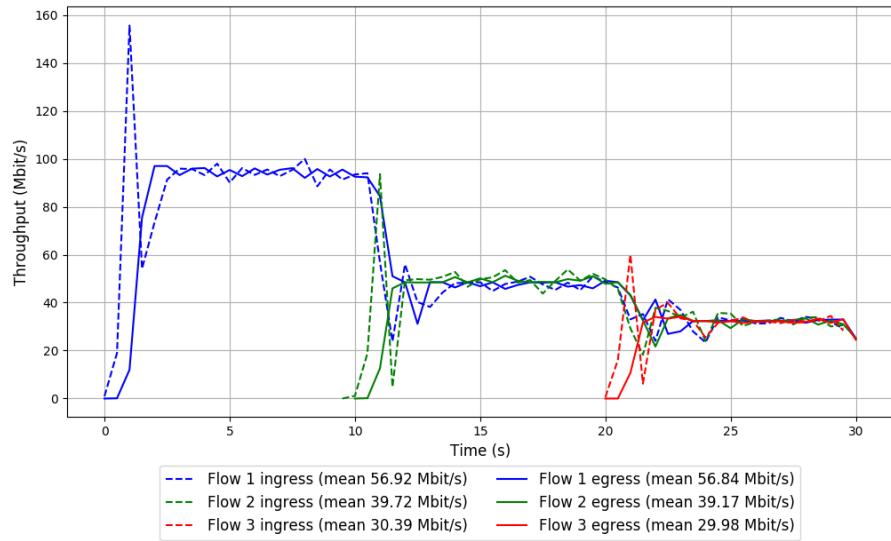


Run 4: Statistics of FillP-Sheep

```
Start at: 2019-03-27 13:31:15
End at: 2019-03-27 13:31:45
Local clock offset: -3.686 ms
Remote clock offset: -0.79 ms

# Below is generated by plot.py at 2019-03-27 14:19:21
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.72 Mbit/s
95th percentile per-packet one-way delay: 315.619 ms
Loss rate: 1.37%
-- Flow 1:
Average throughput: 56.84 Mbit/s
95th percentile per-packet one-way delay: 327.470 ms
Loss rate: 0.70%
-- Flow 2:
Average throughput: 39.17 Mbit/s
95th percentile per-packet one-way delay: 229.994 ms
Loss rate: 2.22%
-- Flow 3:
Average throughput: 29.98 Mbit/s
95th percentile per-packet one-way delay: 347.304 ms
Loss rate: 2.86%
```

Run 4: Report of FillP-Sheep — Data Link

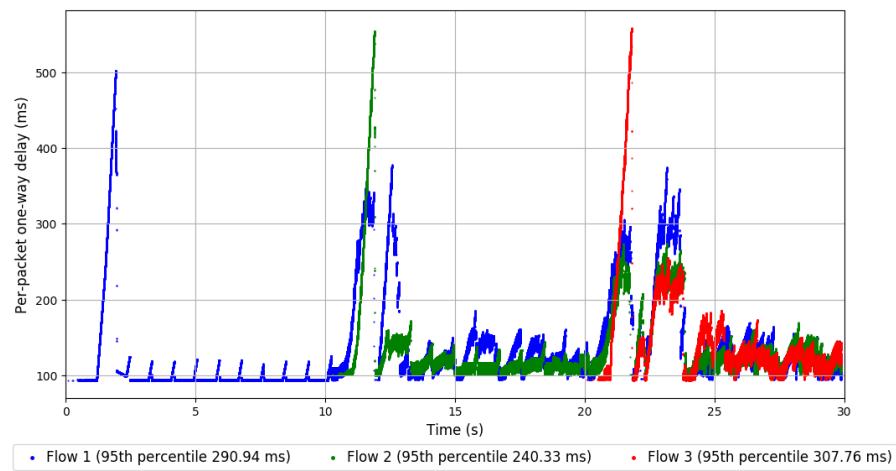
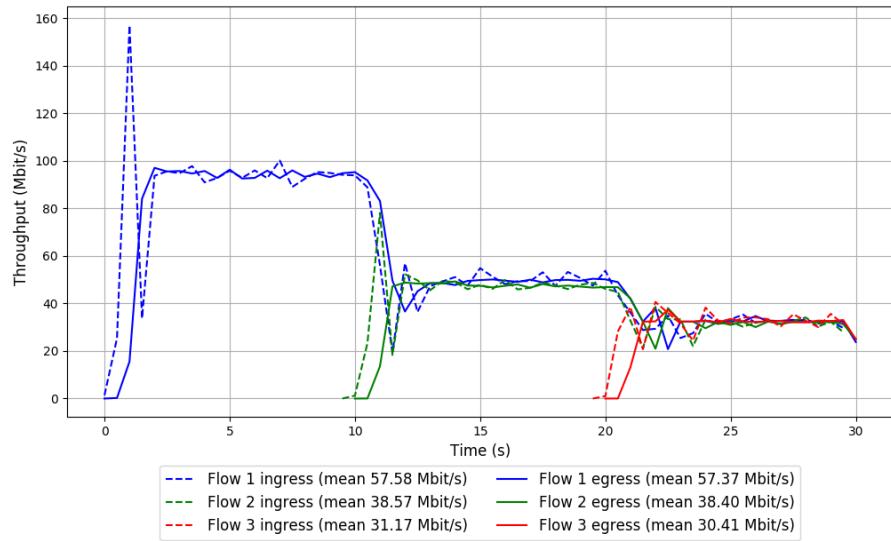


Run 5: Statistics of FillP-Sheep

```
Start at: 2019-03-27 13:58:16
End at: 2019-03-27 13:58:46
Local clock offset: -4.516 ms
Remote clock offset: 1.259 ms

# Below is generated by plot.py at 2019-03-27 14:19:23
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.86 Mbit/s
95th percentile per-packet one-way delay: 281.380 ms
Loss rate: 1.37%
-- Flow 1:
Average throughput: 57.37 Mbit/s
95th percentile per-packet one-way delay: 290.935 ms
Loss rate: 0.91%
-- Flow 2:
Average throughput: 38.40 Mbit/s
95th percentile per-packet one-way delay: 240.330 ms
Loss rate: 1.32%
-- Flow 3:
Average throughput: 30.41 Mbit/s
95th percentile per-packet one-way delay: 307.763 ms
Loss rate: 4.04%
```

Run 5: Report of FillP-Sheep — Data Link

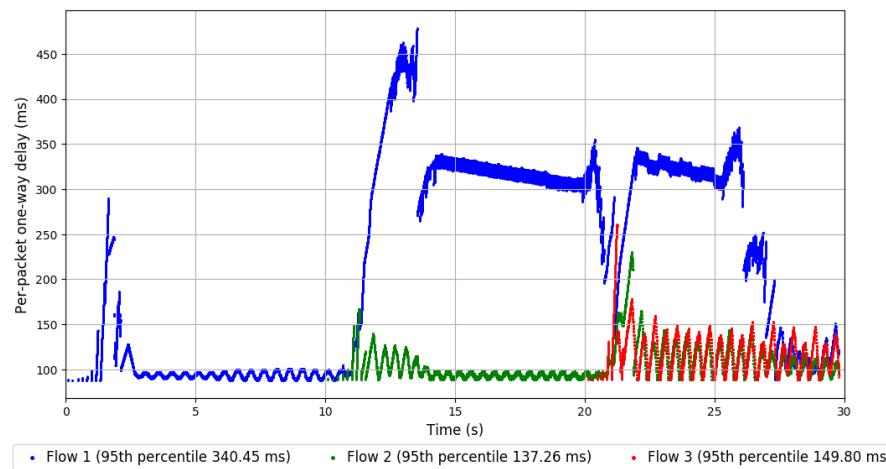
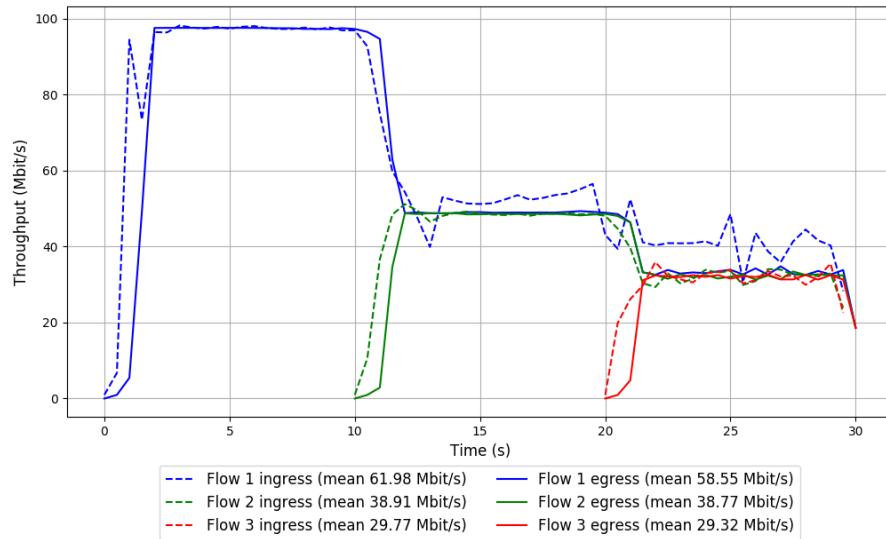


Run 1: Statistics of Indigo

```
Start at: 2019-03-27 12:24:11
End at: 2019-03-27 12:24:41
Local clock offset: -4.779 ms
Remote clock offset: 8.185 ms

# Below is generated by plot.py at 2019-03-27 14:19:23
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.80 Mbit/s
95th percentile per-packet one-way delay: 332.139 ms
Loss rate: 4.50%
-- Flow 1:
Average throughput: 58.55 Mbit/s
95th percentile per-packet one-way delay: 340.448 ms
Loss rate: 6.07%
-- Flow 2:
Average throughput: 38.77 Mbit/s
95th percentile per-packet one-way delay: 137.256 ms
Loss rate: 1.24%
-- Flow 3:
Average throughput: 29.32 Mbit/s
95th percentile per-packet one-way delay: 149.799 ms
Loss rate: 3.21%
```

Run 1: Report of Indigo — Data Link

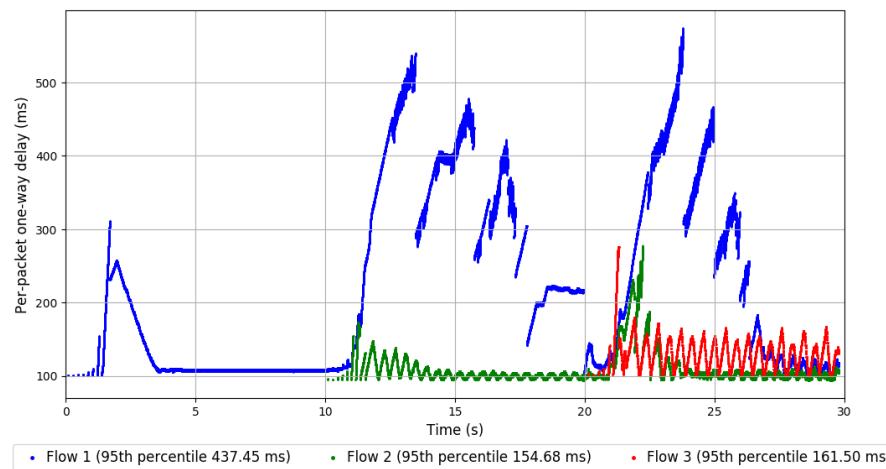
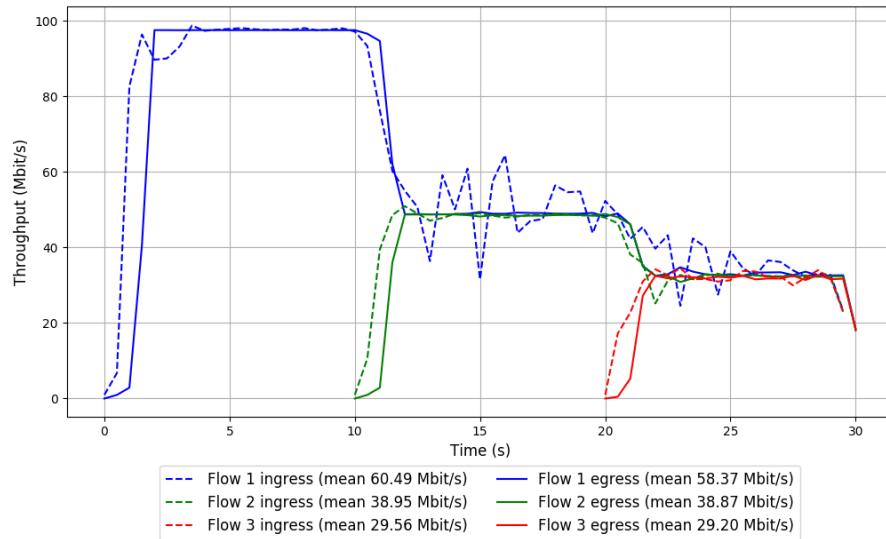


Run 2: Statistics of Indigo

```
Start at: 2019-03-27 12:51:11
End at: 2019-03-27 12:51:41
Local clock offset: -5.323 ms
Remote clock offset: -1.618 ms

# Below is generated by plot.py at 2019-03-27 14:19:23
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.64 Mbit/s
95th percentile per-packet one-way delay: 407.990 ms
Loss rate: 3.15%
-- Flow 1:
Average throughput: 58.37 Mbit/s
95th percentile per-packet one-way delay: 437.451 ms
Loss rate: 4.07%
-- Flow 2:
Average throughput: 38.87 Mbit/s
95th percentile per-packet one-way delay: 154.680 ms
Loss rate: 1.06%
-- Flow 3:
Average throughput: 29.20 Mbit/s
95th percentile per-packet one-way delay: 161.504 ms
Loss rate: 3.01%
```

## Run 2: Report of Indigo — Data Link

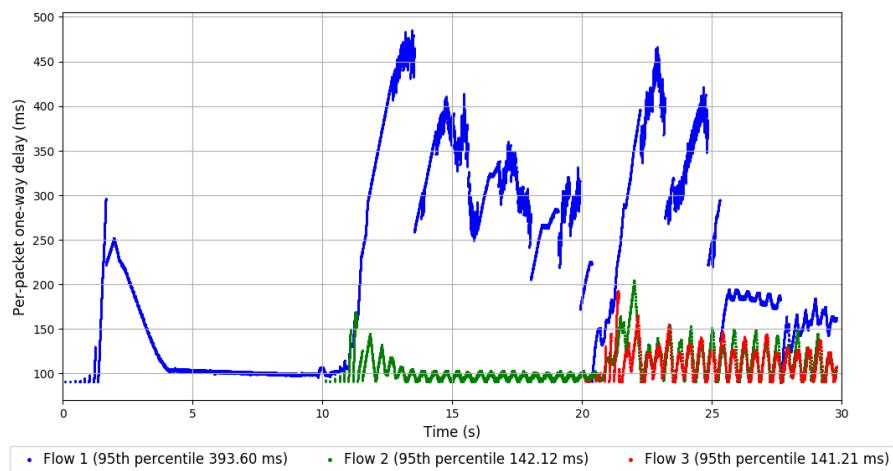
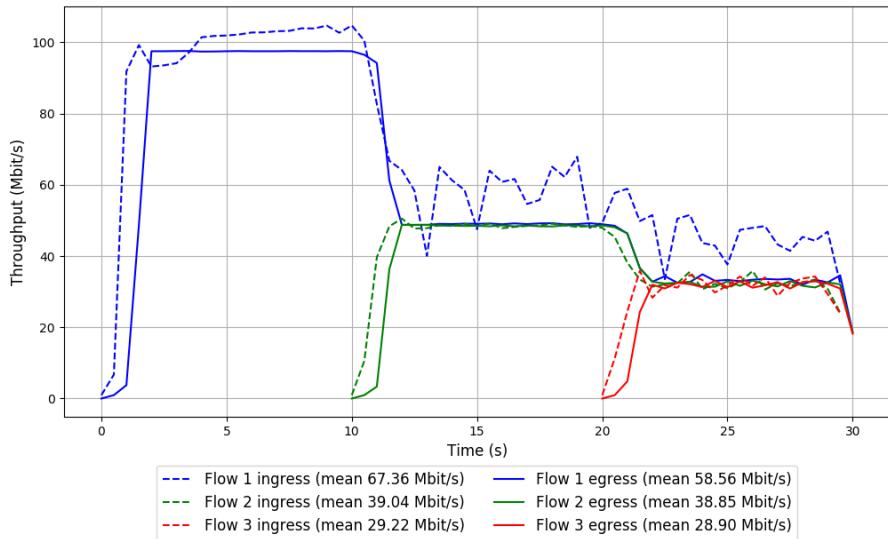


Run 3: Statistics of Indigo

```
Start at: 2019-03-27 13:18:20
End at: 2019-03-27 13:18:50
Local clock offset: -4.084 ms
Remote clock offset: 3.727 ms

# Below is generated by plot.py at 2019-03-27 14:19:46
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.73 Mbit/s
95th percentile per-packet one-way delay: 371.337 ms
Loss rate: 9.48%
-- Flow 1:
Average throughput: 58.56 Mbit/s
95th percentile per-packet one-way delay: 393.596 ms
Loss rate: 13.57%
-- Flow 2:
Average throughput: 38.85 Mbit/s
95th percentile per-packet one-way delay: 142.115 ms
Loss rate: 1.34%
-- Flow 3:
Average throughput: 28.90 Mbit/s
95th percentile per-packet one-way delay: 141.212 ms
Loss rate: 2.82%
```

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

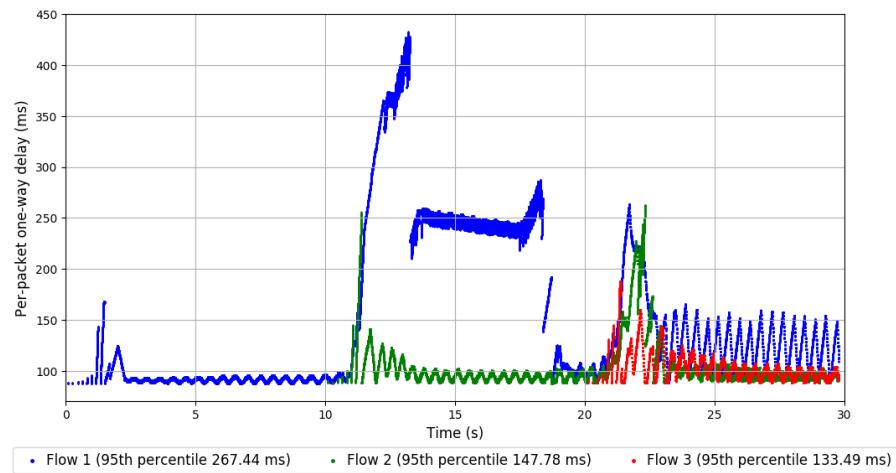
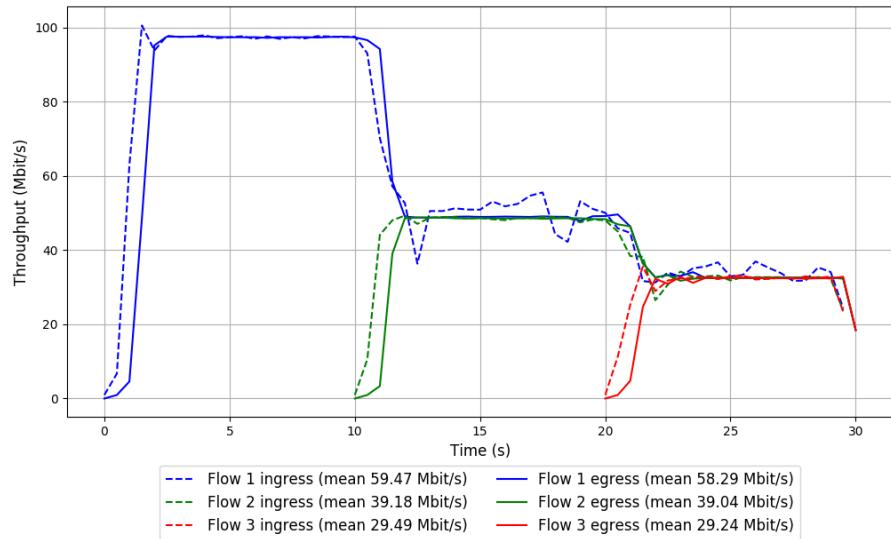


Run 4: Statistics of Indigo

```
Start at: 2019-03-27 13:45:20
End at: 2019-03-27 13:45:50
Local clock offset: -4.133 ms
Remote clock offset: 5.986 ms

# Below is generated by plot.py at 2019-03-27 14:19:49
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.69 Mbit/s
95th percentile per-packet one-way delay: 252.951 ms
Loss rate: 2.17%
-- Flow 1:
Average throughput: 58.29 Mbit/s
95th percentile per-packet one-way delay: 267.438 ms
Loss rate: 2.54%
-- Flow 2:
Average throughput: 39.04 Mbit/s
95th percentile per-packet one-way delay: 147.782 ms
Loss rate: 1.18%
-- Flow 3:
Average throughput: 29.24 Mbit/s
95th percentile per-packet one-way delay: 133.487 ms
Loss rate: 2.60%
```

## Run 4: Report of Indigo — Data Link

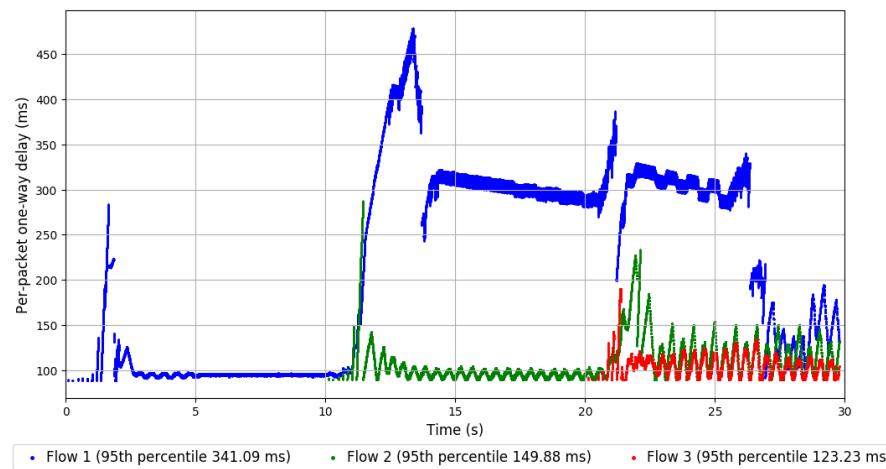
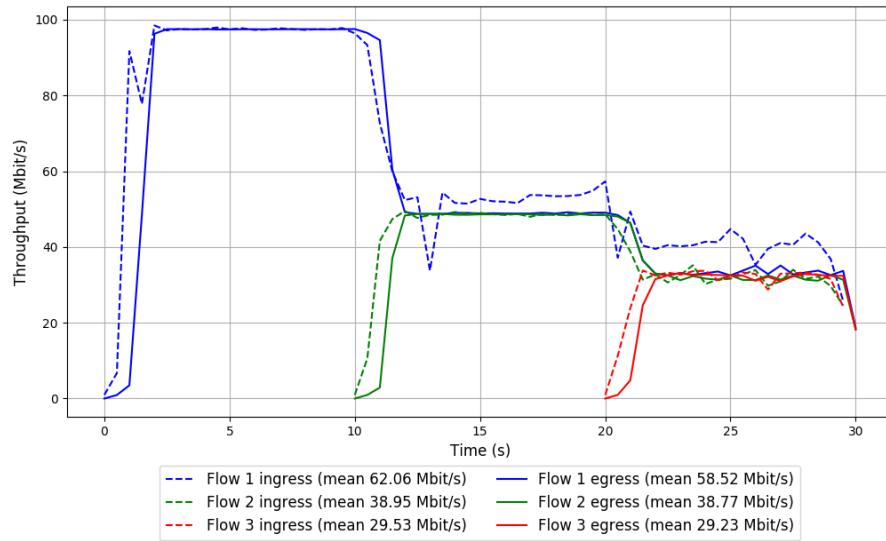


Run 5: Statistics of Indigo

```
Start at: 2019-03-27 14:12:21
End at: 2019-03-27 14:12:51
Local clock offset: -4.88 ms
Remote clock offset: 6.631 ms

# Below is generated by plot.py at 2019-03-27 14:19:59
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.72 Mbit/s
95th percentile per-packet one-way delay: 318.802 ms
Loss rate: 4.59%
-- Flow 1:
Average throughput: 58.52 Mbit/s
95th percentile per-packet one-way delay: 341.087 ms
Loss rate: 6.25%
-- Flow 2:
Average throughput: 38.77 Mbit/s
95th percentile per-packet one-way delay: 149.875 ms
Loss rate: 1.32%
-- Flow 3:
Average throughput: 29.23 Mbit/s
95th percentile per-packet one-way delay: 123.233 ms
Loss rate: 2.75%
```

## Run 5: Report of Indigo — Data Link

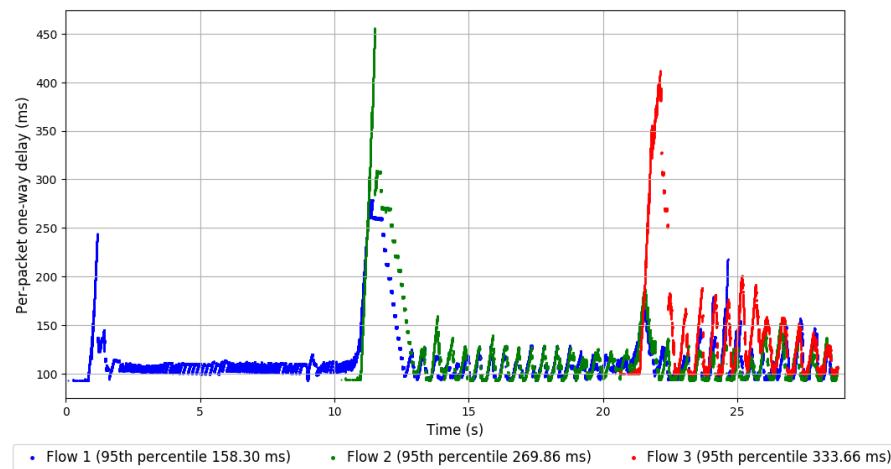
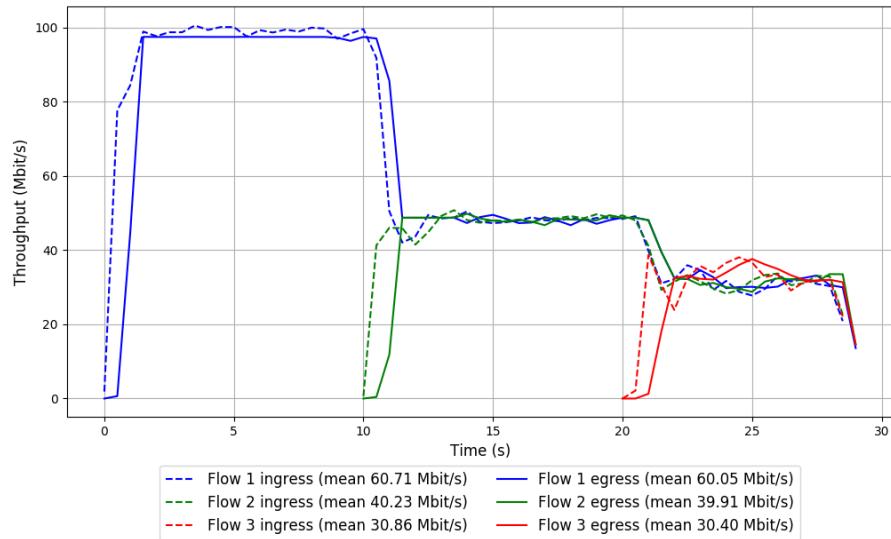


Run 1: Statistics of Indigo-MusesC3

```
Start at: 2019-03-27 12:22:54
End at: 2019-03-27 12:23:24
Local clock offset: -4.644 ms
Remote clock offset: 3.083 ms

# Below is generated by plot.py at 2019-03-27 14:20:01
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.59 Mbit/s
95th percentile per-packet one-way delay: 208.813 ms
Loss rate: 1.86%
-- Flow 1:
Average throughput: 60.05 Mbit/s
95th percentile per-packet one-way delay: 158.296 ms
Loss rate: 1.68%
-- Flow 2:
Average throughput: 39.91 Mbit/s
95th percentile per-packet one-way delay: 269.860 ms
Loss rate: 1.70%
-- Flow 3:
Average throughput: 30.40 Mbit/s
95th percentile per-packet one-way delay: 333.663 ms
Loss rate: 3.57%
```

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

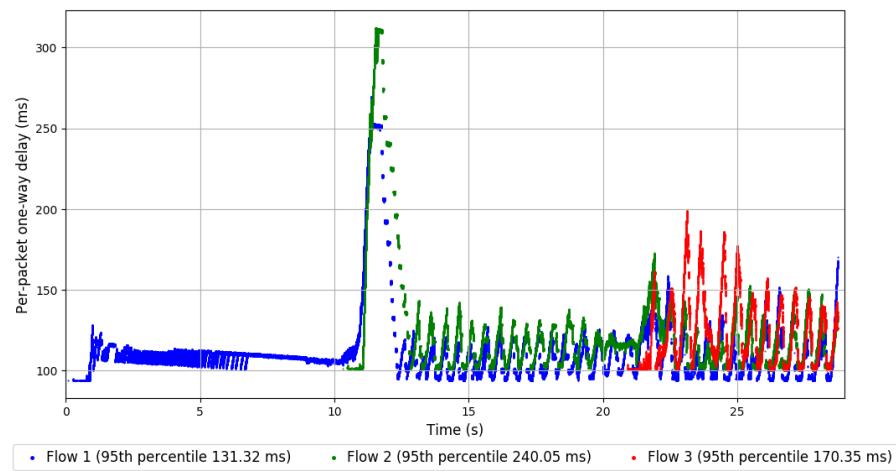
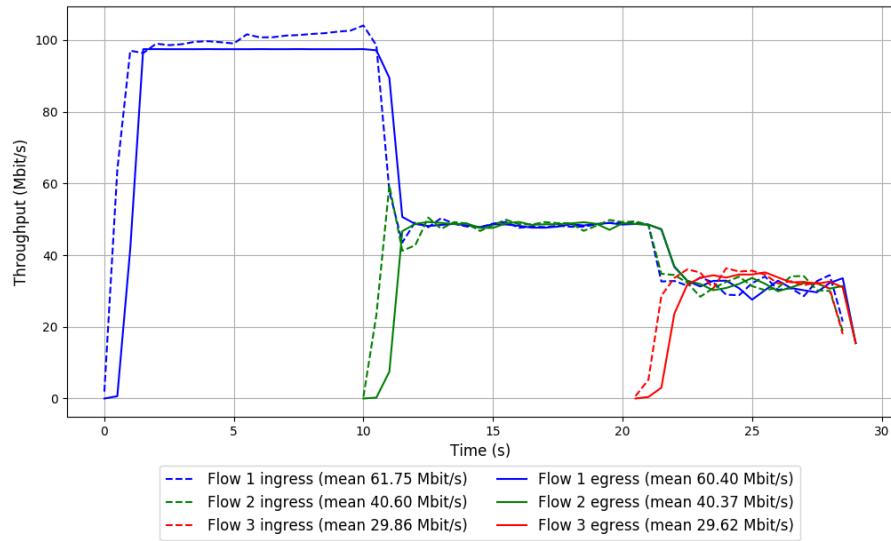


Run 2: Statistics of Indigo-MusesC3

```
Start at: 2019-03-27 12:49:53
End at: 2019-03-27 12:50:23
Local clock offset: -5.336 ms
Remote clock offset: -1.569 ms

# Below is generated by plot.py at 2019-03-27 14:20:15
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.67 Mbit/s
95th percentile per-packet one-way delay: 161.721 ms
Loss rate: 2.45%
-- Flow 1:
Average throughput: 60.40 Mbit/s
95th percentile per-packet one-way delay: 131.317 ms
Loss rate: 2.77%
-- Flow 2:
Average throughput: 40.37 Mbit/s
95th percentile per-packet one-way delay: 240.054 ms
Loss rate: 1.54%
-- Flow 3:
Average throughput: 29.62 Mbit/s
95th percentile per-packet one-way delay: 170.349 ms
Loss rate: 2.99%
```

Run 2: Report of Indigo-MusesC3 — Data Link

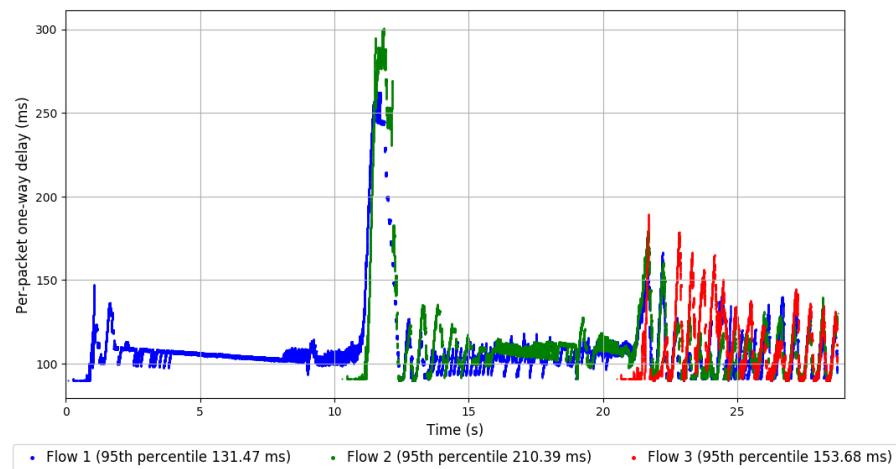
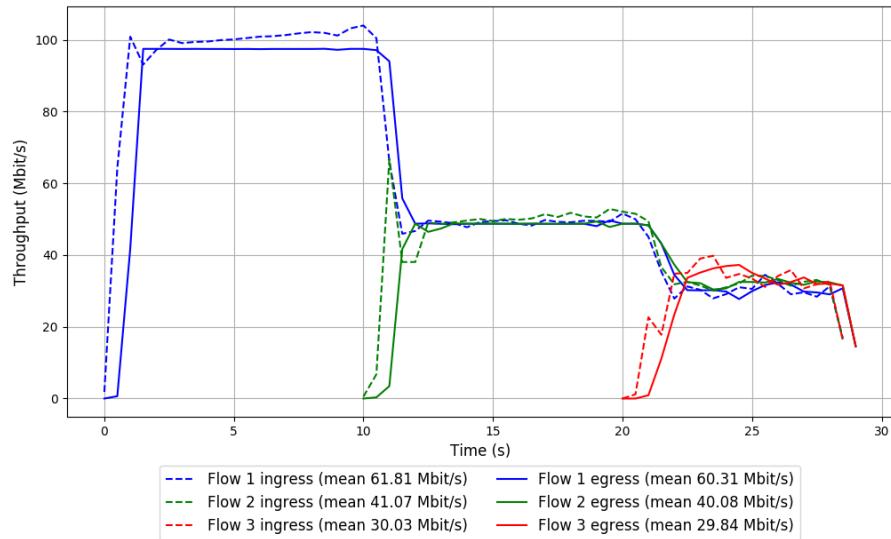


Run 3: Statistics of Indigo-MusesC3

```
Start at: 2019-03-27 13:17:02
End at: 2019-03-27 13:17:32
Local clock offset: -4.086 ms
Remote clock offset: 3.688 ms

# Below is generated by plot.py at 2019-03-27 14:20:16
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.69 Mbit/s
95th percentile per-packet one-way delay: 148.305 ms
Loss rate: 3.06%
-- Flow 1:
Average throughput: 60.31 Mbit/s
95th percentile per-packet one-way delay: 131.465 ms
Loss rate: 3.01%
-- Flow 2:
Average throughput: 40.08 Mbit/s
95th percentile per-packet one-way delay: 210.386 ms
Loss rate: 3.29%
-- Flow 3:
Average throughput: 29.84 Mbit/s
95th percentile per-packet one-way delay: 153.681 ms
Loss rate: 2.69%
```

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

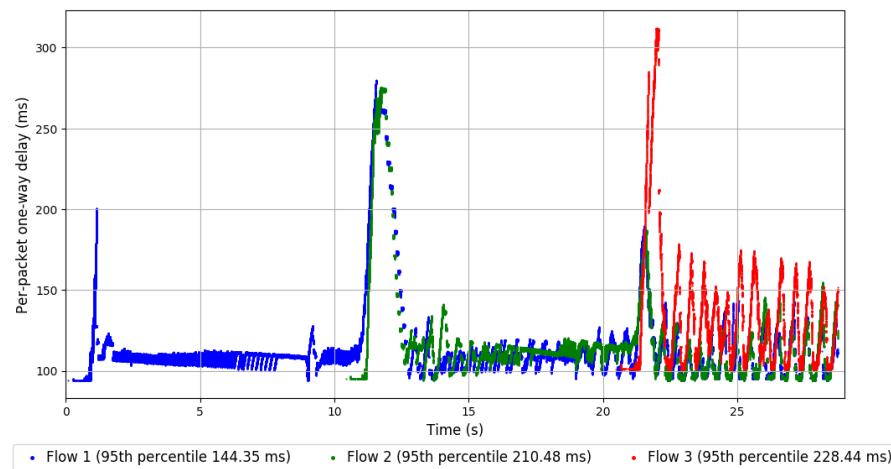
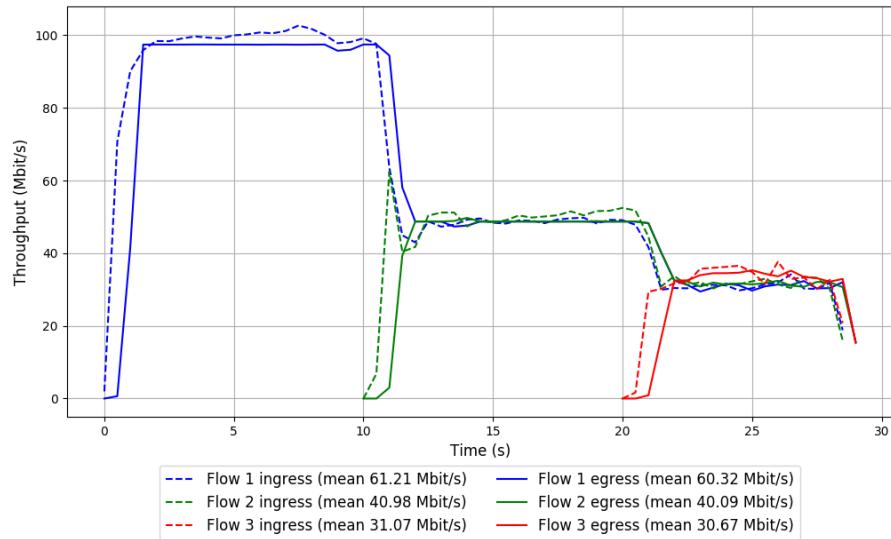


Run 4: Statistics of Indigo-MusesC3

```
Start at: 2019-03-27 13:44:02
End at: 2019-03-27 13:44:32
Local clock offset: -4.192 ms
Remote clock offset: -0.443 ms

# Below is generated by plot.py at 2019-03-27 14:20:25
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.76 Mbit/s
95th percentile per-packet one-way delay: 172.831 ms
Loss rate: 2.44%
-- Flow 1:
Average throughput: 60.32 Mbit/s
95th percentile per-packet one-way delay: 144.355 ms
Loss rate: 2.03%
-- Flow 2:
Average throughput: 40.09 Mbit/s
95th percentile per-packet one-way delay: 210.476 ms
Loss rate: 3.10%
-- Flow 3:
Average throughput: 30.67 Mbit/s
95th percentile per-packet one-way delay: 228.439 ms
Loss rate: 3.34%
```

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

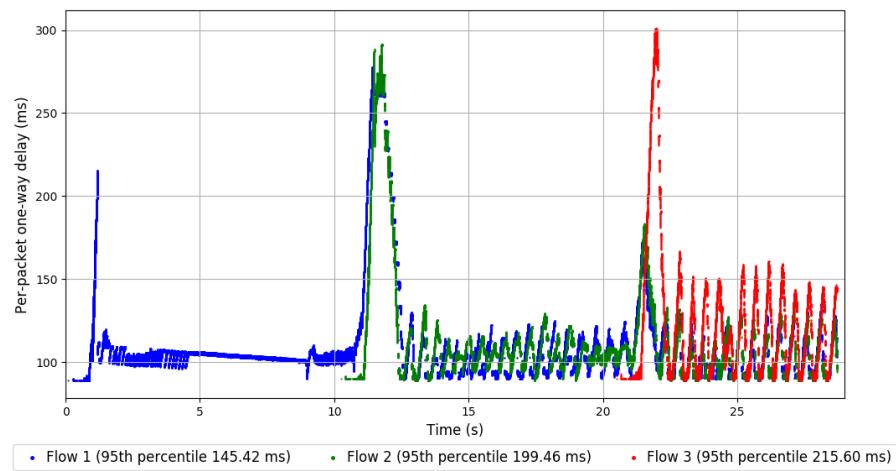
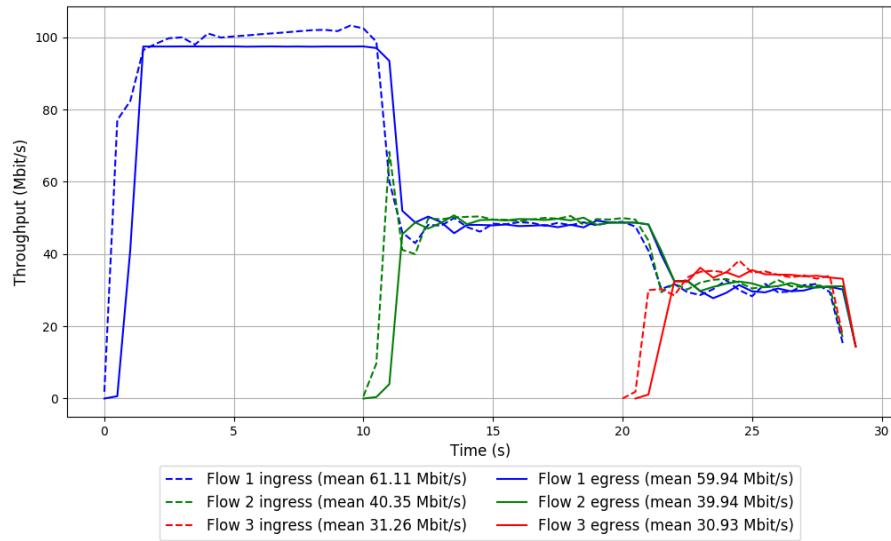


Run 5: Statistics of Indigo-MusesC3

```
Start at: 2019-03-27 14:11:03
End at: 2019-03-27 14:11:33
Local clock offset: -5.713 ms
Remote clock offset: 5.441 ms

# Below is generated by plot.py at 2019-03-27 14:20:26
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.59 Mbit/s
95th percentile per-packet one-way delay: 168.422 ms
Loss rate: 2.40%
-- Flow 1:
Average throughput: 59.94 Mbit/s
95th percentile per-packet one-way delay: 145.416 ms
Loss rate: 2.50%
-- Flow 2:
Average throughput: 39.94 Mbit/s
95th percentile per-packet one-way delay: 199.462 ms
Loss rate: 1.91%
-- Flow 3:
Average throughput: 30.93 Mbit/s
95th percentile per-packet one-way delay: 215.599 ms
Loss rate: 3.07%
```

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

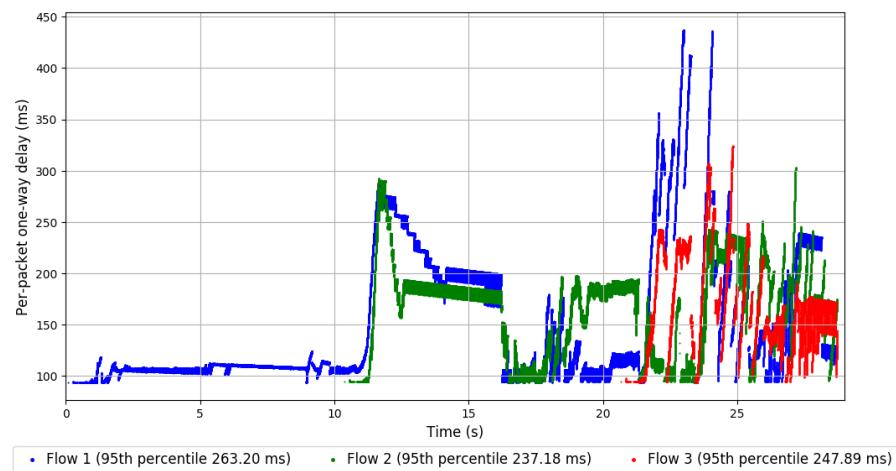
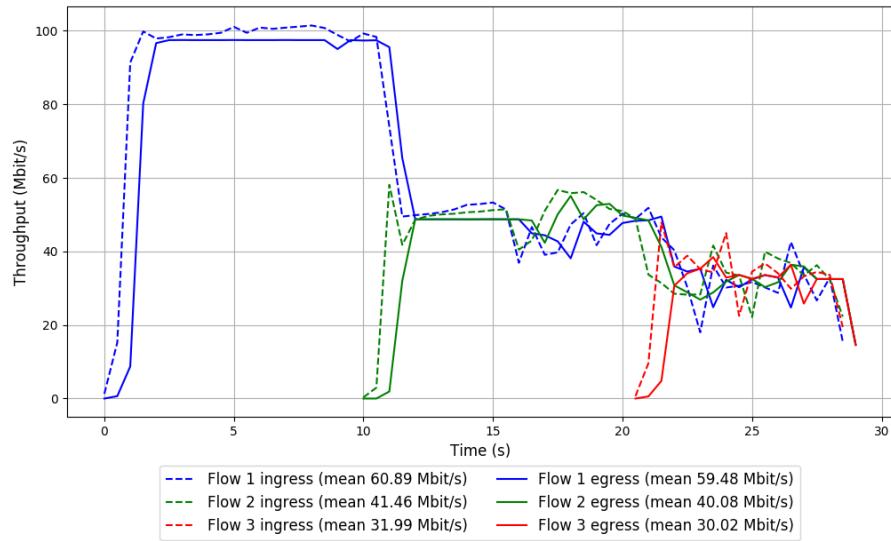


Run 1: Statistics of Indigo-MusesC5

```
Start at: 2019-03-27 12:17:48
End at: 2019-03-27 12:18:18
Local clock offset: -3.276 ms
Remote clock offset: 2.89 ms

# Below is generated by plot.py at 2019-03-27 14:20:49
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.61 Mbit/s
95th percentile per-packet one-way delay: 255.577 ms
Loss rate: 3.73%
-- Flow 1:
Average throughput: 59.48 Mbit/s
95th percentile per-packet one-way delay: 263.202 ms
Loss rate: 2.88%
-- Flow 2:
Average throughput: 40.08 Mbit/s
95th percentile per-packet one-way delay: 237.181 ms
Loss rate: 4.21%
-- Flow 3:
Average throughput: 30.02 Mbit/s
95th percentile per-packet one-way delay: 247.893 ms
Loss rate: 7.95%
```

Run 1: Report of Indigo-MusesC5 — Data Link

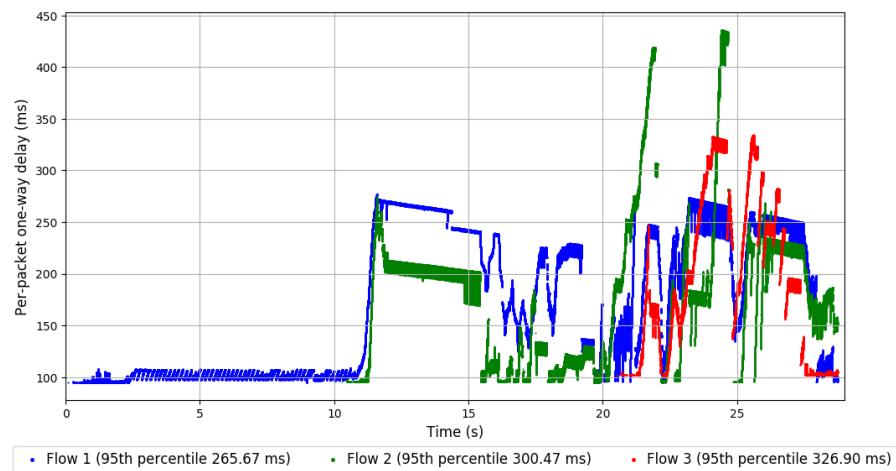
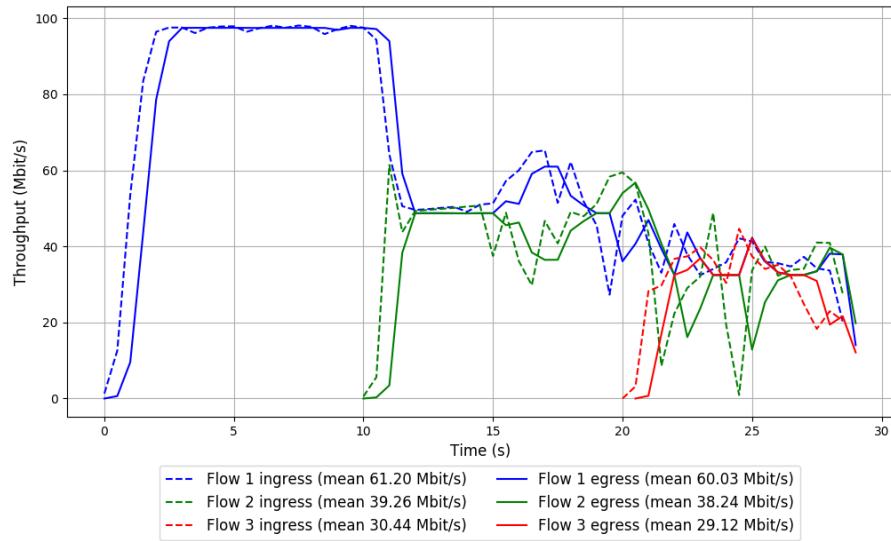


Run 2: Statistics of Indigo-MusesC5

```
Start at: 2019-03-27 12:44:48
End at: 2019-03-27 12:45:18
Local clock offset: -4.966 ms
Remote clock offset: -1.341 ms

# Below is generated by plot.py at 2019-03-27 14:20:51
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.01 Mbit/s
95th percentile per-packet one-way delay: 269.293 ms
Loss rate: 3.13%
-- Flow 1:
Average throughput: 60.03 Mbit/s
95th percentile per-packet one-way delay: 265.669 ms
Loss rate: 2.50%
-- Flow 2:
Average throughput: 38.24 Mbit/s
95th percentile per-packet one-way delay: 300.466 ms
Loss rate: 3.49%
-- Flow 3:
Average throughput: 29.12 Mbit/s
95th percentile per-packet one-way delay: 326.898 ms
Loss rate: 6.42%
```

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

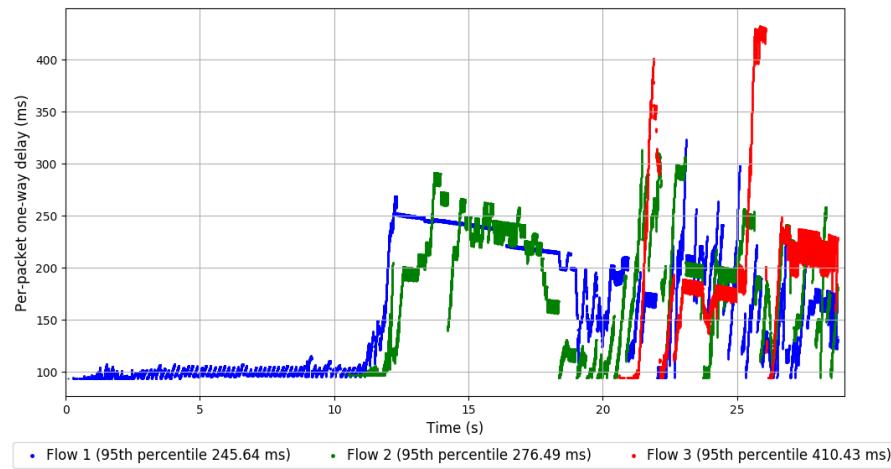
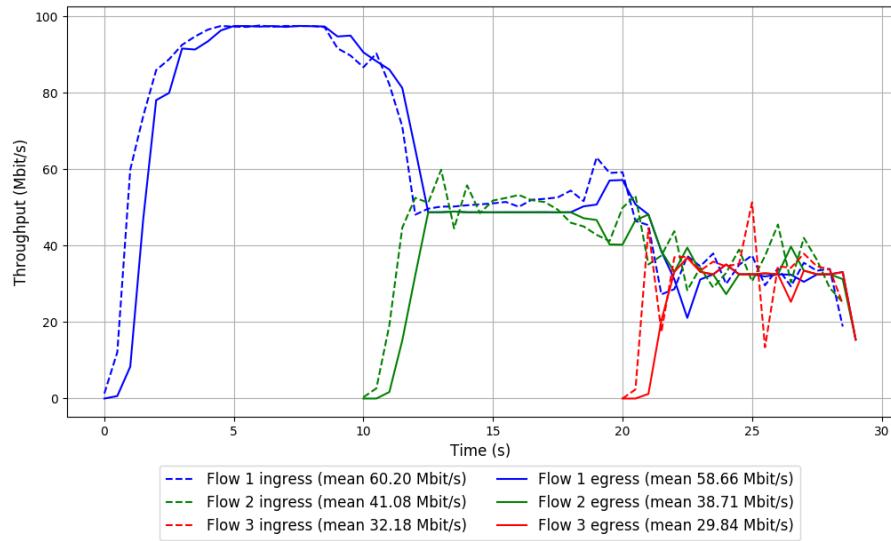


Run 3: Statistics of Indigo-MusesC5

```
Start at: 2019-03-27 13:11:57
End at: 2019-03-27 13:12:27
Local clock offset: -4.131 ms
Remote clock offset: -0.218 ms

# Below is generated by plot.py at 2019-03-27 14:21:01
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.12 Mbit/s
95th percentile per-packet one-way delay: 253.646 ms
Loss rate: 4.56%
-- Flow 1:
Average throughput: 58.66 Mbit/s
95th percentile per-packet one-way delay: 245.644 ms
Loss rate: 3.00%
-- Flow 2:
Average throughput: 38.71 Mbit/s
95th percentile per-packet one-way delay: 276.489 ms
Loss rate: 6.63%
-- Flow 3:
Average throughput: 29.84 Mbit/s
95th percentile per-packet one-way delay: 410.434 ms
Loss rate: 8.69%
```

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

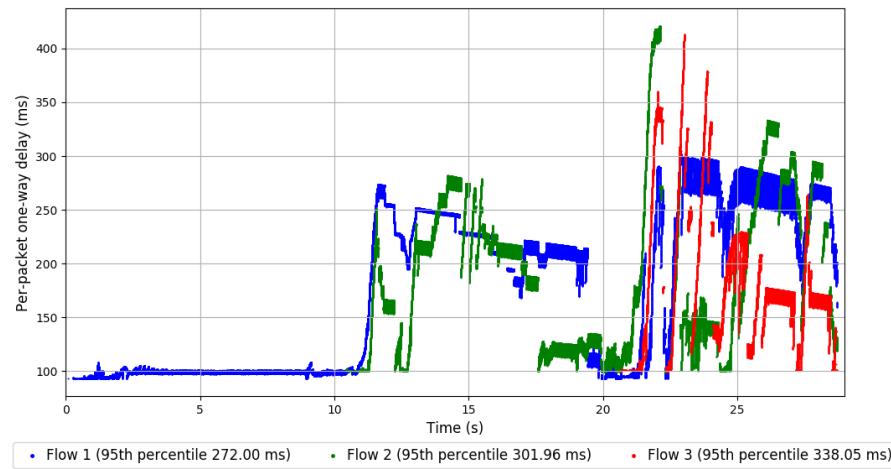
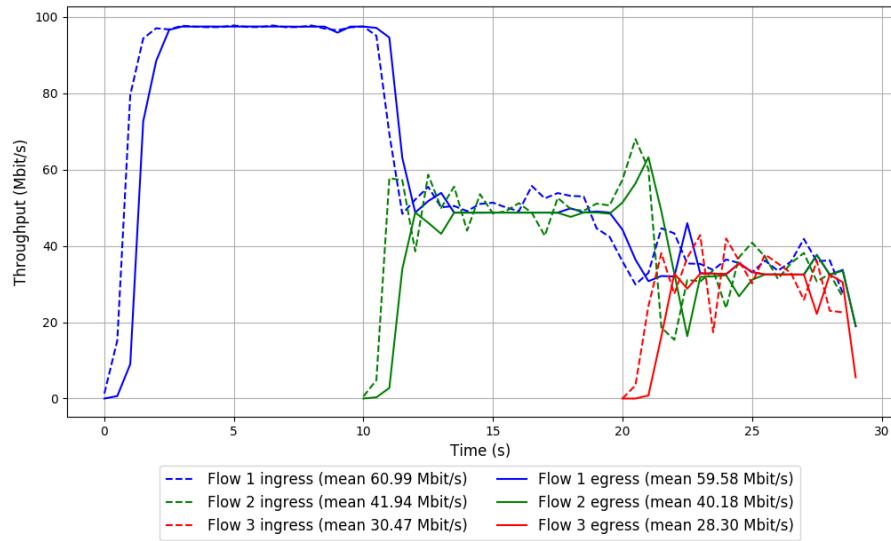


Run 4: Statistics of Indigo-MusesC5

```
Start at: 2019-03-27 13:38:57
End at: 2019-03-27 13:39:27
Local clock offset: -4.214 ms
Remote clock offset: 0.227 ms

# Below is generated by plot.py at 2019-03-27 14:21:03
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.60 Mbit/s
95th percentile per-packet one-way delay: 283.407 ms
Loss rate: 4.07%
-- Flow 1:
Average throughput: 59.58 Mbit/s
95th percentile per-packet one-way delay: 271.996 ms
Loss rate: 2.89%
-- Flow 2:
Average throughput: 40.18 Mbit/s
95th percentile per-packet one-way delay: 301.961 ms
Loss rate: 5.07%
-- Flow 3:
Average throughput: 28.30 Mbit/s
95th percentile per-packet one-way delay: 338.051 ms
Loss rate: 9.03%
```

Run 4: Report of Indigo-MusesC5 — Data Link

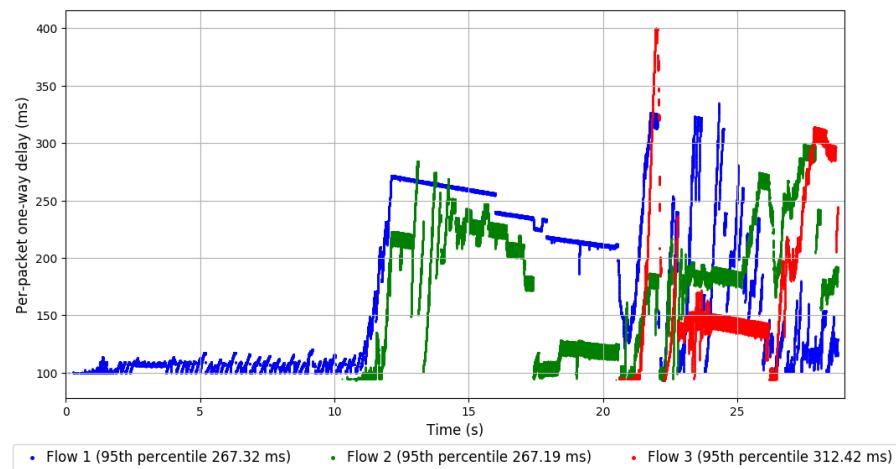
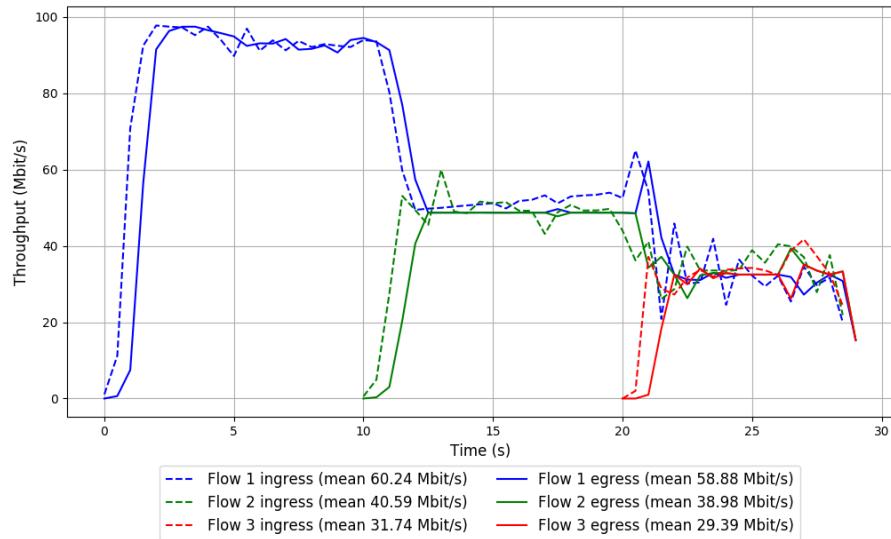


Run 5: Statistics of Indigo-MusesC5

```
Start at: 2019-03-27 14:05:58
End at: 2019-03-27 14:06:28
Local clock offset: -4.765 ms
Remote clock offset: 1.598 ms

# Below is generated by plot.py at 2019-03-27 14:21:18
# Datalink statistics
-- Total of 3 flows:
Average throughput: 92.50 Mbit/s
95th percentile per-packet one-way delay: 269.940 ms
Loss rate: 4.00%
-- Flow 1:
Average throughput: 58.88 Mbit/s
95th percentile per-packet one-way delay: 267.321 ms
Loss rate: 2.84%
-- Flow 2:
Average throughput: 38.98 Mbit/s
95th percentile per-packet one-way delay: 267.188 ms
Loss rate: 4.82%
-- Flow 3:
Average throughput: 29.39 Mbit/s
95th percentile per-packet one-way delay: 312.416 ms
Loss rate: 9.21%
```

Run 5: Report of Indigo-MusesC5 — Data Link

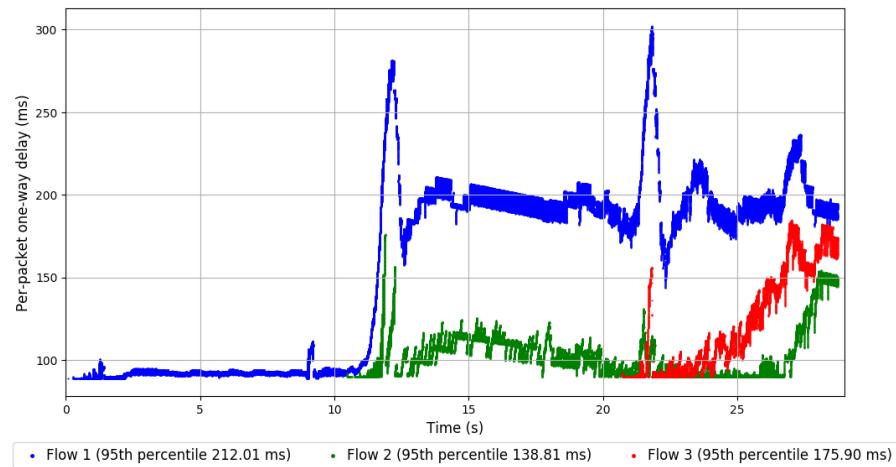
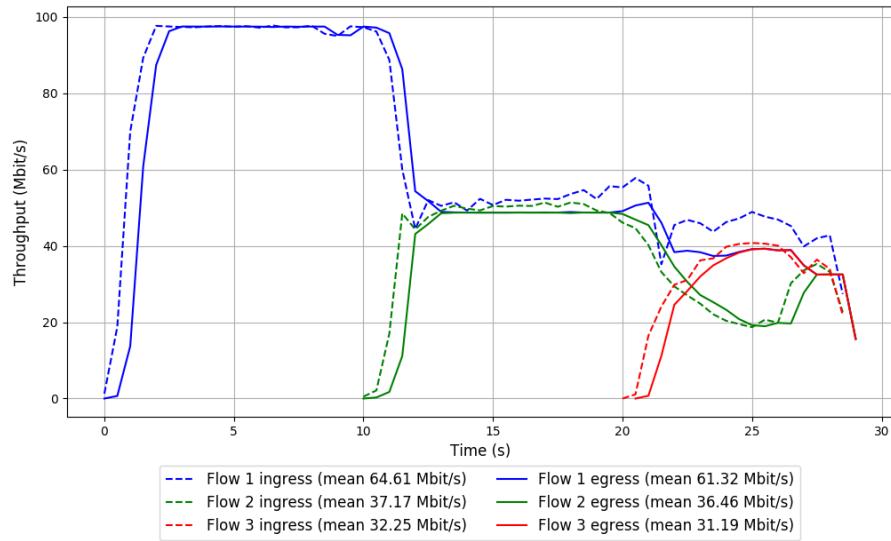


Run 1: Statistics of Indigo-MusesD

```
Start at: 2019-03-27 12:08:48
End at: 2019-03-27 12:09:18
Local clock offset: -3.661 ms
Remote clock offset: 6.451 ms

# Below is generated by plot.py at 2019-03-27 14:21:19
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.69 Mbit/s
95th percentile per-packet one-way delay: 205.459 ms
Loss rate: 4.92%
-- Flow 1:
Average throughput: 61.32 Mbit/s
95th percentile per-packet one-way delay: 212.015 ms
Loss rate: 5.64%
-- Flow 2:
Average throughput: 36.46 Mbit/s
95th percentile per-packet one-way delay: 138.809 ms
Loss rate: 2.82%
-- Flow 3:
Average throughput: 31.19 Mbit/s
95th percentile per-packet one-way delay: 175.902 ms
Loss rate: 5.32%
```

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

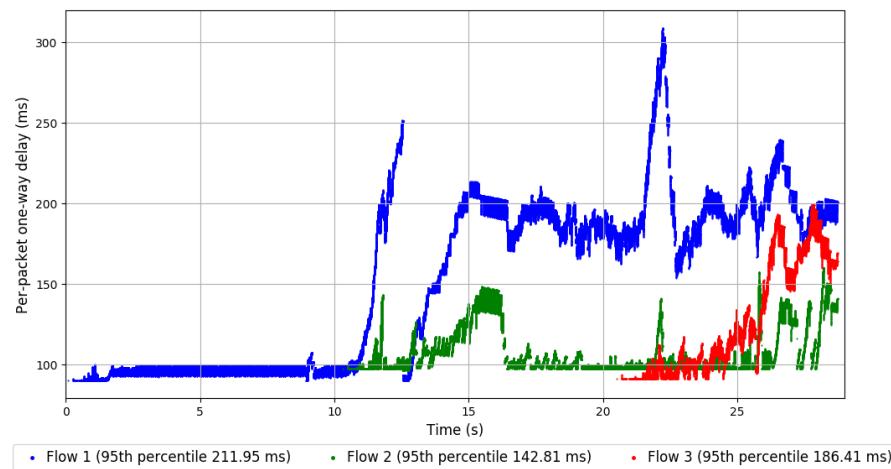
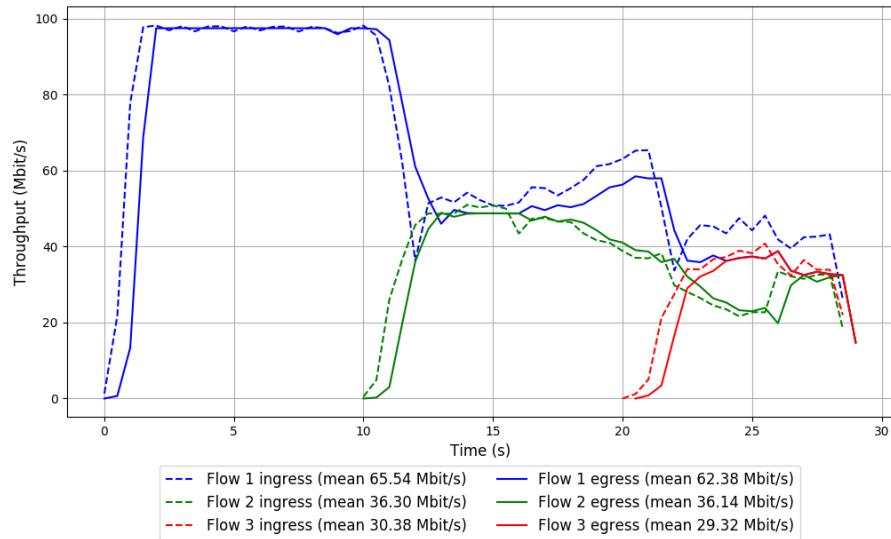


Run 2: Statistics of Indigo-MusesD

```
Start at: 2019-03-27 12:35:48
End at: 2019-03-27 12:36:18
Local clock offset: -5.444 ms
Remote clock offset: 3.985 ms

# Below is generated by plot.py at 2019-03-27 14:21:28
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.03 Mbit/s
95th percentile per-packet one-way delay: 205.770 ms
Loss rate: 4.44%
-- Flow 1:
Average throughput: 62.38 Mbit/s
95th percentile per-packet one-way delay: 211.949 ms
Loss rate: 5.39%
-- Flow 2:
Average throughput: 36.14 Mbit/s
95th percentile per-packet one-way delay: 142.807 ms
Loss rate: 1.40%
-- Flow 3:
Average throughput: 29.32 Mbit/s
95th percentile per-packet one-way delay: 186.405 ms
Loss rate: 5.43%
```

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

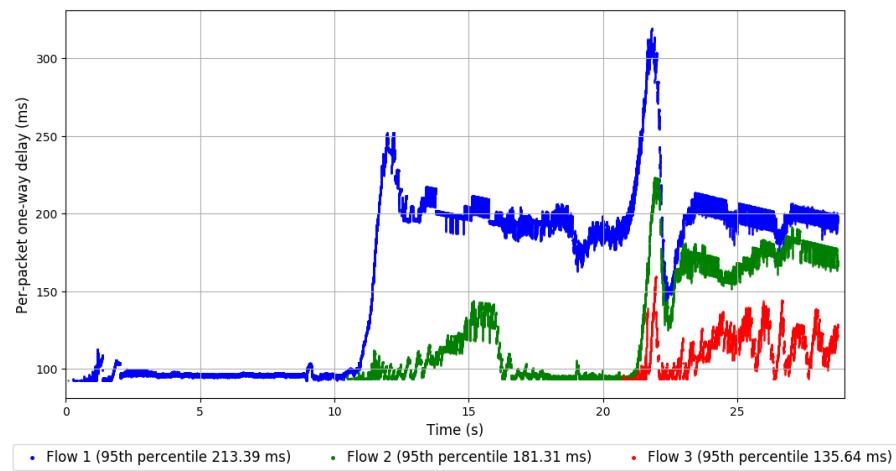
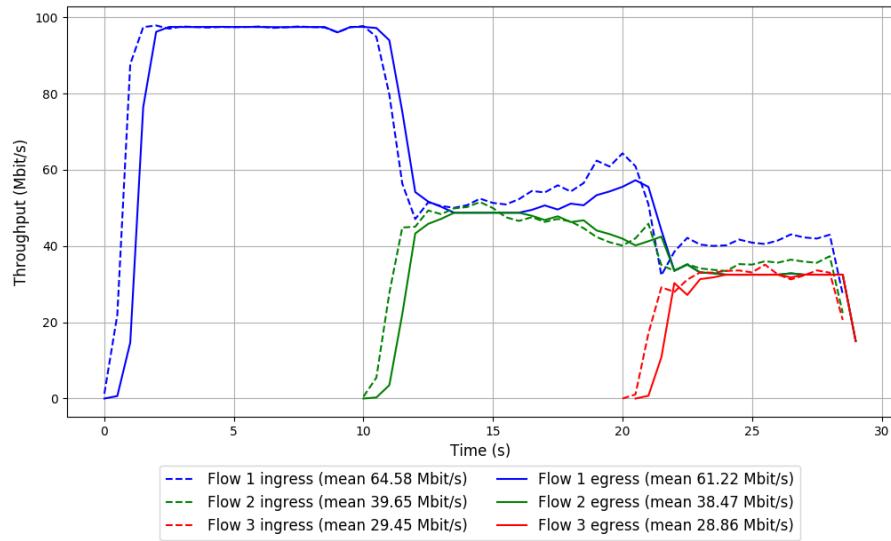


Run 3: Statistics of Indigo-MusesD

```
Start at: 2019-03-27 13:02:55
End at: 2019-03-27 13:03:25
Local clock offset: -4.907 ms
Remote clock offset: -0.956 ms

# Below is generated by plot.py at 2019-03-27 14:21:30
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.20 Mbit/s
95th percentile per-packet one-way delay: 209.300 ms
Loss rate: 5.12%
-- Flow 1:
Average throughput: 61.22 Mbit/s
95th percentile per-packet one-way delay: 213.390 ms
Loss rate: 5.76%
-- Flow 2:
Average throughput: 38.47 Mbit/s
95th percentile per-packet one-way delay: 181.311 ms
Loss rate: 3.87%
-- Flow 3:
Average throughput: 28.86 Mbit/s
95th percentile per-packet one-way delay: 135.640 ms
Loss rate: 4.03%
```

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

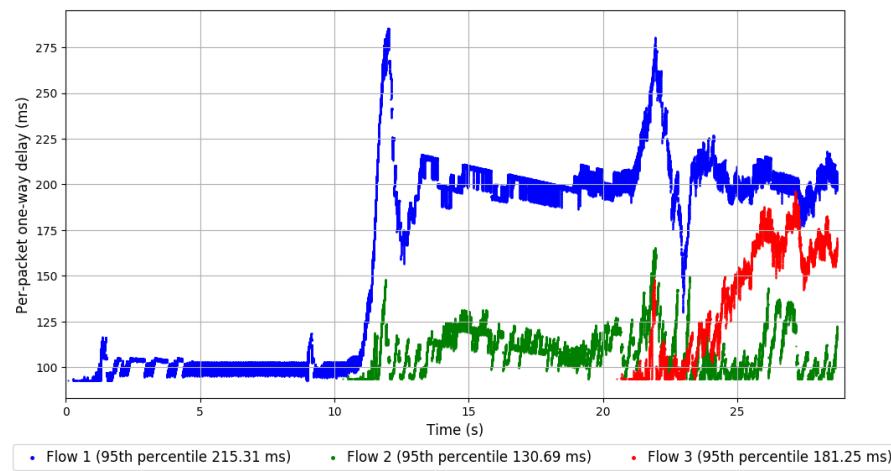
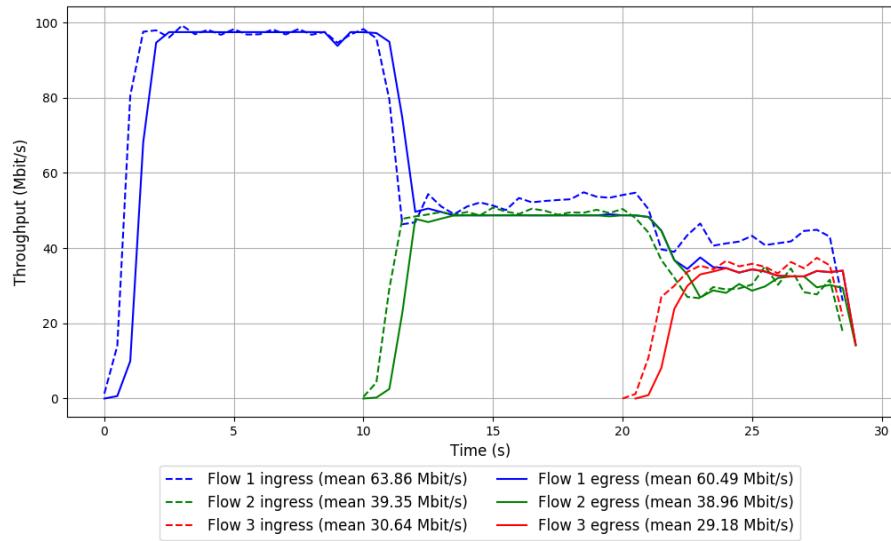


Run 4: Statistics of Indigo-MusesD

```
Start at: 2019-03-27 13:29:58
End at: 2019-03-27 13:30:28
Local clock offset: -4.423 ms
Remote clock offset: 0.441 ms

# Below is generated by plot.py at 2019-03-27 14:21:53
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.92 Mbit/s
95th percentile per-packet one-way delay: 210.749 ms
Loss rate: 4.90%
-- Flow 1:
Average throughput: 60.49 Mbit/s
95th percentile per-packet one-way delay: 215.312 ms
Loss rate: 5.84%
-- Flow 2:
Average throughput: 38.96 Mbit/s
95th percentile per-packet one-way delay: 130.691 ms
Loss rate: 1.90%
-- Flow 3:
Average throughput: 29.18 Mbit/s
95th percentile per-packet one-way delay: 181.252 ms
Loss rate: 6.72%
```

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

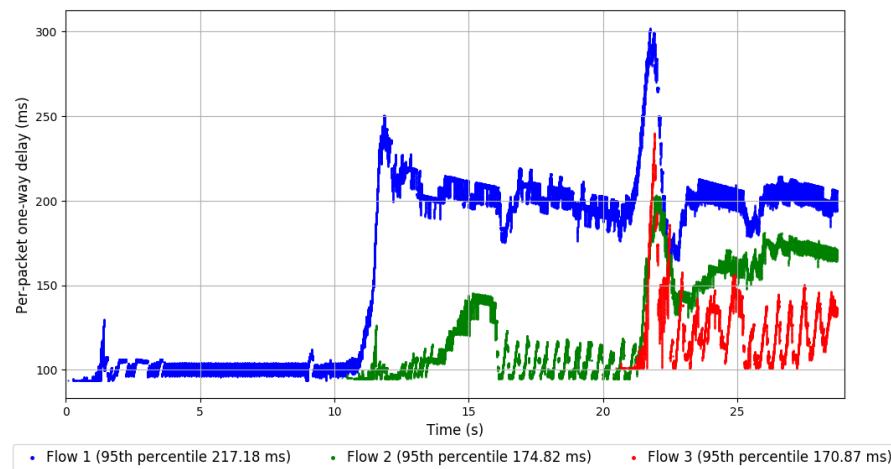
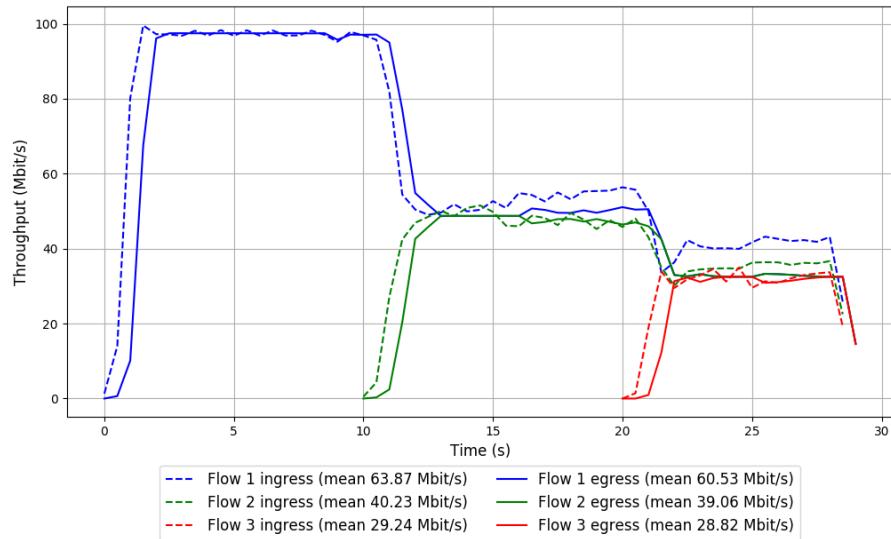


Run 5: Statistics of Indigo-MusesD

```
Start at: 2019-03-27 13:56:58
End at: 2019-03-27 13:57:28
Local clock offset: -5.244 ms
Remote clock offset: 0.174 ms

# Below is generated by plot.py at 2019-03-27 14:21:56
# Datalink statistics
-- Total of 3 flows:
Average throughput: 93.96 Mbit/s
95th percentile per-packet one-way delay: 212.309 ms
Loss rate: 5.06%
-- Flow 1:
Average throughput: 60.53 Mbit/s
95th percentile per-packet one-way delay: 217.182 ms
Loss rate: 5.78%
-- Flow 2:
Average throughput: 39.06 Mbit/s
95th percentile per-packet one-way delay: 174.818 ms
Loss rate: 3.80%
-- Flow 3:
Average throughput: 28.82 Mbit/s
95th percentile per-packet one-way delay: 170.874 ms
Loss rate: 3.54%
```

Run 5: Report of Indigo-MusesD — Data Link

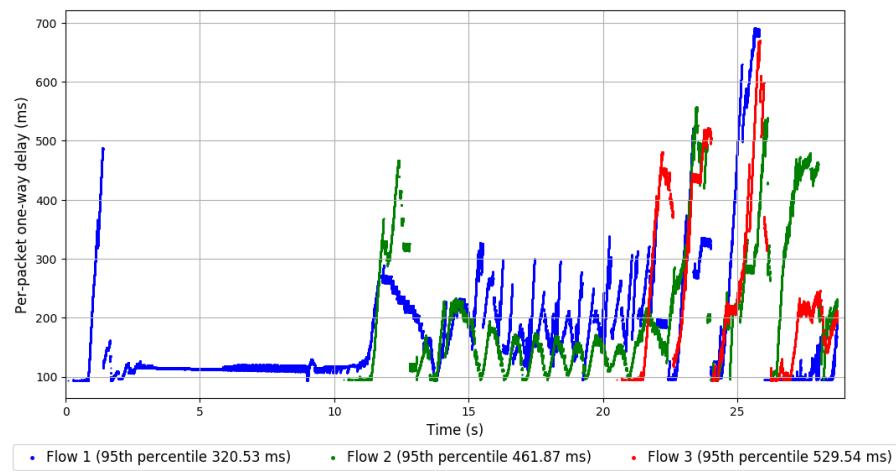
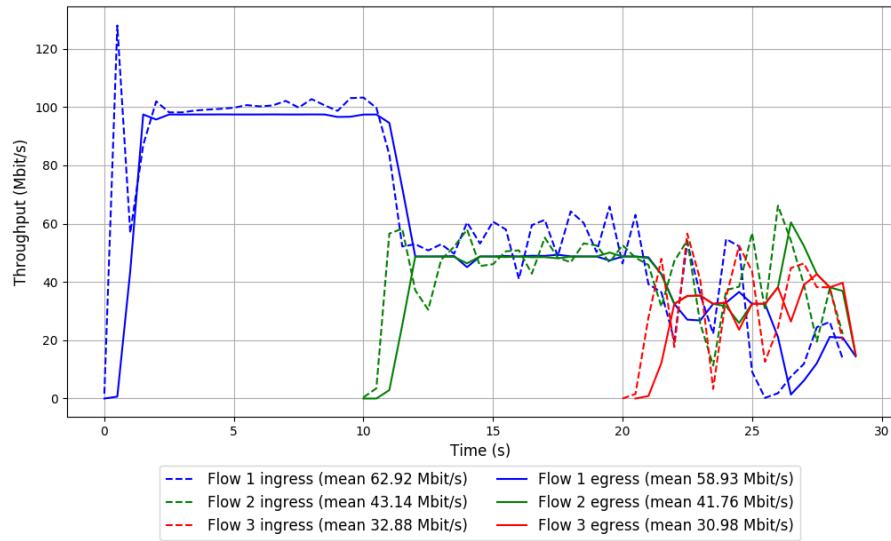


Run 1: Statistics of Indigo-MusesT

```
Start at: 2019-03-27 12:15:12
End at: 2019-03-27 12:15:42
Local clock offset: -3.59 ms
Remote clock offset: 1.65 ms

# Below is generated by plot.py at 2019-03-27 14:22:09
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.63 Mbit/s
95th percentile per-packet one-way delay: 444.230 ms
Loss rate: 6.19%
-- Flow 1:
Average throughput: 58.93 Mbit/s
95th percentile per-packet one-way delay: 320.529 ms
Loss rate: 6.89%
-- Flow 2:
Average throughput: 41.76 Mbit/s
95th percentile per-packet one-way delay: 461.869 ms
Loss rate: 4.10%
-- Flow 3:
Average throughput: 30.98 Mbit/s
95th percentile per-packet one-way delay: 529.543 ms
Loss rate: 7.60%
```

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

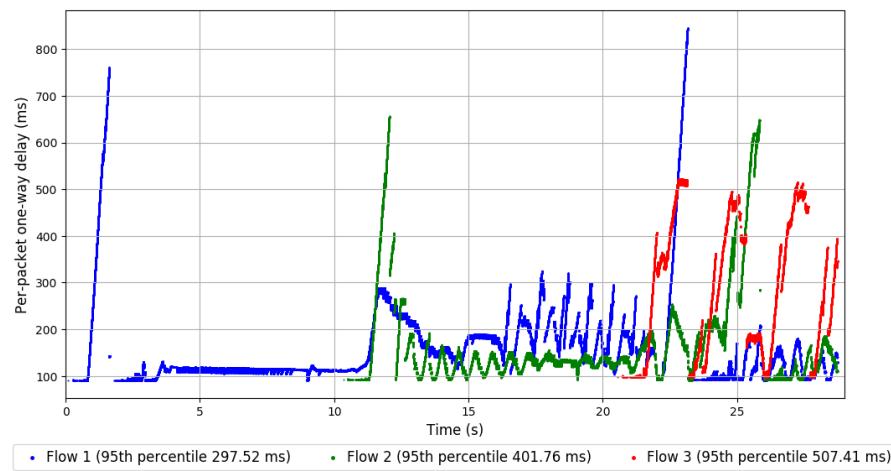
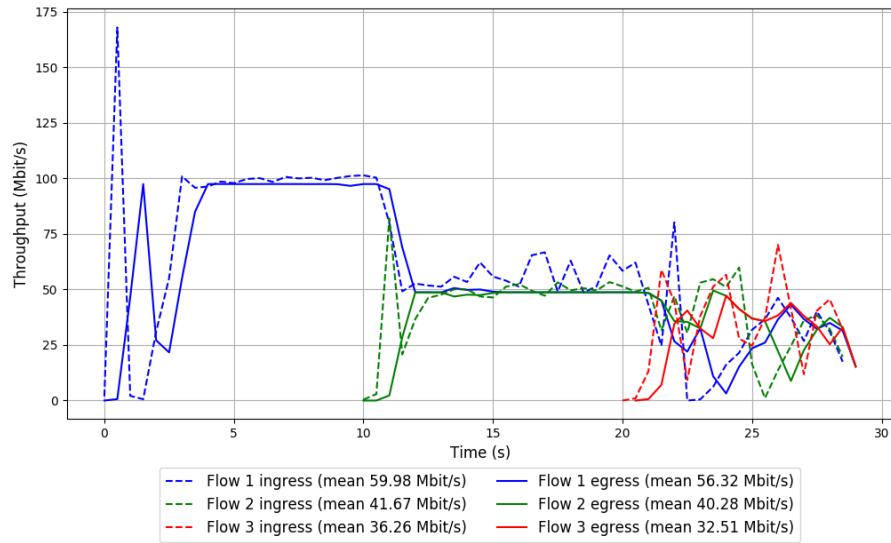


Run 2: Statistics of Indigo-MusesT

```
Start at: 2019-03-27 12:42:11
End at: 2019-03-27 12:42:41
Local clock offset: -4.864 ms
Remote clock offset: 3.051 ms

# Below is generated by plot.py at 2019-03-27 14:22:09
# Datalink statistics
-- Total of 3 flows:
Average throughput: 91.47 Mbit/s
95th percentile per-packet one-way delay: 455.519 ms
Loss rate: 6.55%
-- Flow 1:
Average throughput: 56.32 Mbit/s
95th percentile per-packet one-way delay: 297.520 ms
Loss rate: 6.66%
-- Flow 2:
Average throughput: 40.28 Mbit/s
95th percentile per-packet one-way delay: 401.762 ms
Loss rate: 4.23%
-- Flow 3:
Average throughput: 32.51 Mbit/s
95th percentile per-packet one-way delay: 507.407 ms
Loss rate: 11.91%
```

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

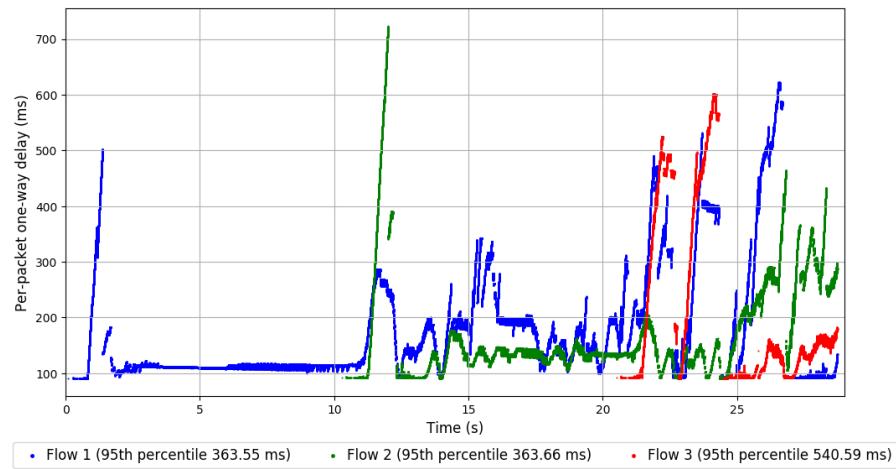
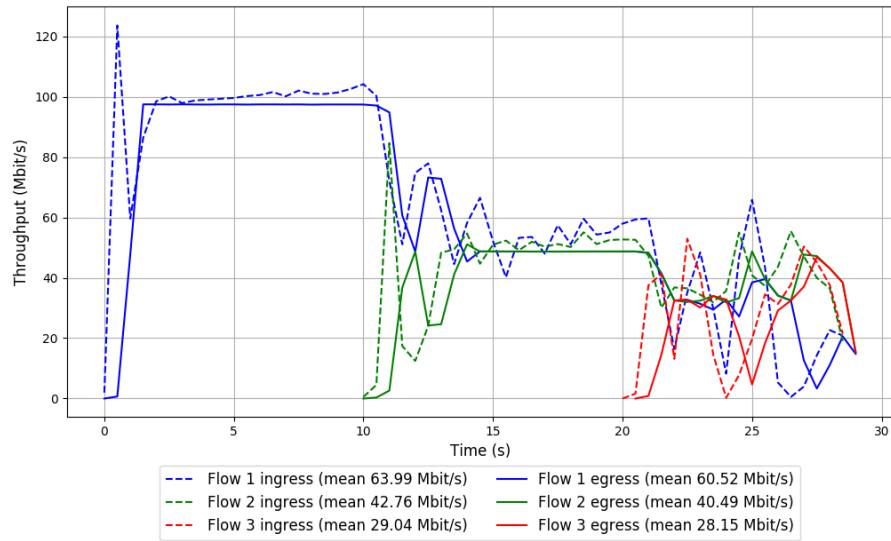


Run 3: Statistics of Indigo-MusesT

```
Start at: 2019-03-27 13:09:21
End at: 2019-03-27 13:09:51
Local clock offset: -4.212 ms
Remote clock offset: 2.046 ms

# Below is generated by plot.py at 2019-03-27 14:22:25
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.70 Mbit/s
95th percentile per-packet one-way delay: 404.907 ms
Loss rate: 5.88%
-- Flow 1:
Average throughput: 60.52 Mbit/s
95th percentile per-packet one-way delay: 363.545 ms
Loss rate: 5.99%
-- Flow 2:
Average throughput: 40.49 Mbit/s
95th percentile per-packet one-way delay: 363.664 ms
Loss rate: 5.88%
-- Flow 3:
Average throughput: 28.15 Mbit/s
95th percentile per-packet one-way delay: 540.586 ms
Loss rate: 5.03%
```

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

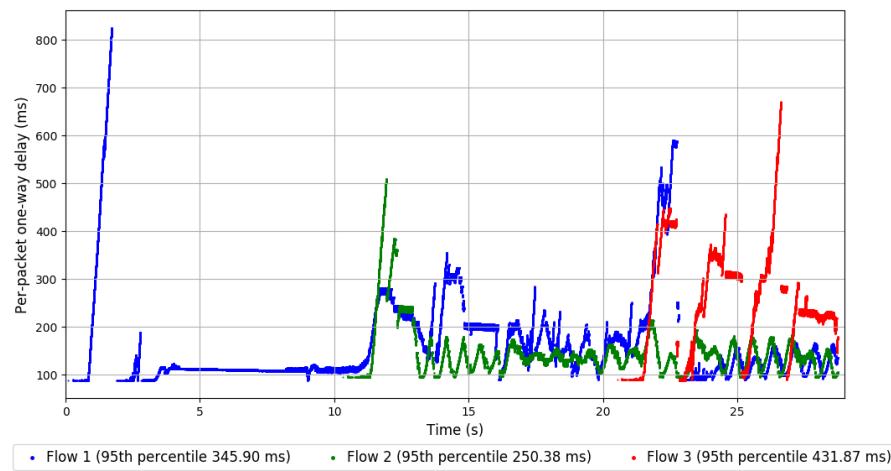
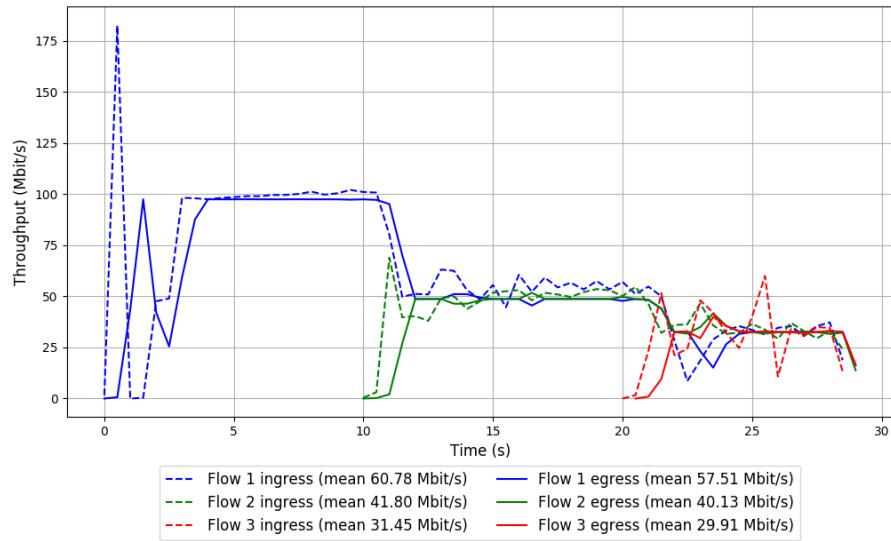


Run 4: Statistics of Indigo-MusesT

```
Start at: 2019-03-27 13:36:21
End at: 2019-03-27 13:36:51
Local clock offset: -3.514 ms
Remote clock offset: 5.341 ms

# Below is generated by plot.py at 2019-03-27 14:22:25
# Datalink statistics
-- Total of 3 flows:
Average throughput: 91.87 Mbit/s
95th percentile per-packet one-way delay: 364.129 ms
Loss rate: 5.75%
-- Flow 1:
Average throughput: 57.51 Mbit/s
95th percentile per-packet one-way delay: 345.897 ms
Loss rate: 5.96%
-- Flow 2:
Average throughput: 40.13 Mbit/s
95th percentile per-packet one-way delay: 250.381 ms
Loss rate: 4.91%
-- Flow 3:
Average throughput: 29.91 Mbit/s
95th percentile per-packet one-way delay: 431.866 ms
Loss rate: 6.85%
```

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

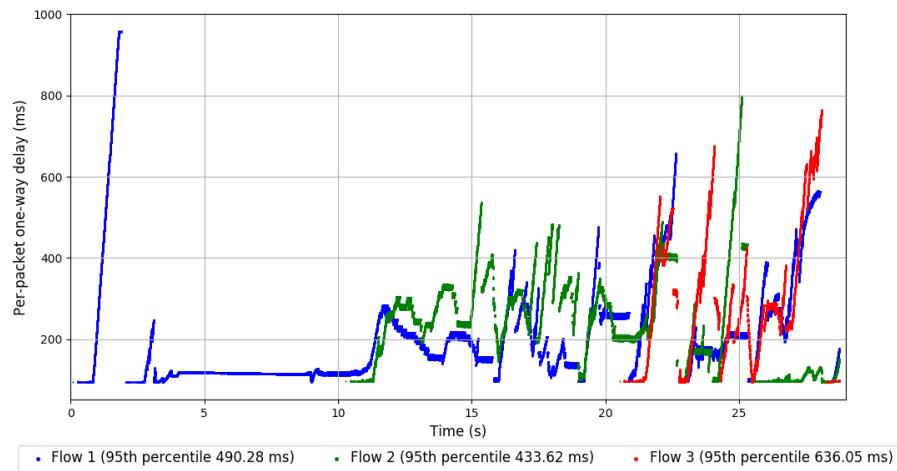
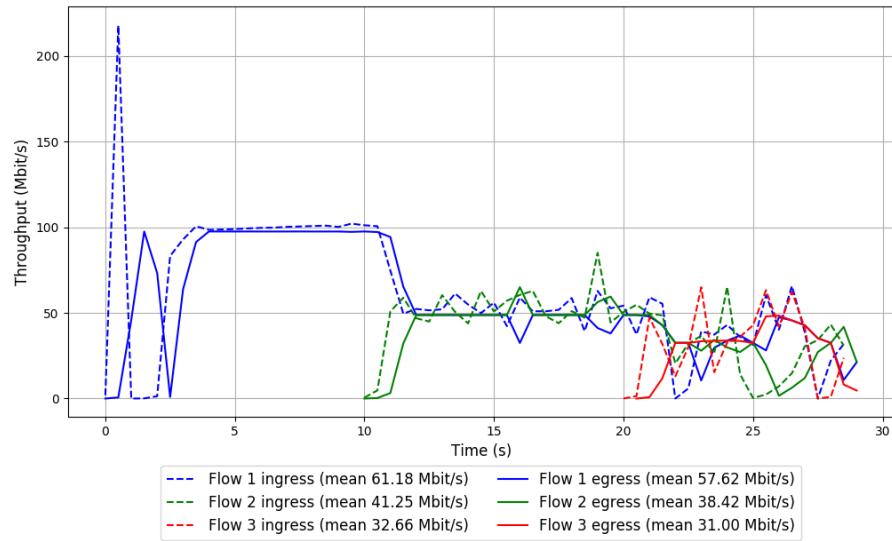


Run 5: Statistics of Indigo-MusesT

```
Start at: 2019-03-27 14:03:22
End at: 2019-03-27 14:03:52
Local clock offset: -4.749 ms
Remote clock offset: 0.361 ms

# Below is generated by plot.py at 2019-03-27 14:22:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 91.26 Mbit/s
95th percentile per-packet one-way delay: 503.762 ms
Loss rate: 6.78%
-- Flow 1:
Average throughput: 57.62 Mbit/s
95th percentile per-packet one-way delay: 490.278 ms
Loss rate: 6.34%
-- Flow 2:
Average throughput: 38.42 Mbit/s
95th percentile per-packet one-way delay: 433.621 ms
Loss rate: 7.71%
-- Flow 3:
Average throughput: 31.00 Mbit/s
95th percentile per-packet one-way delay: 636.047 ms
Loss rate: 6.98%
```

Run 5: Report of Indigo-MusesT — Data Link

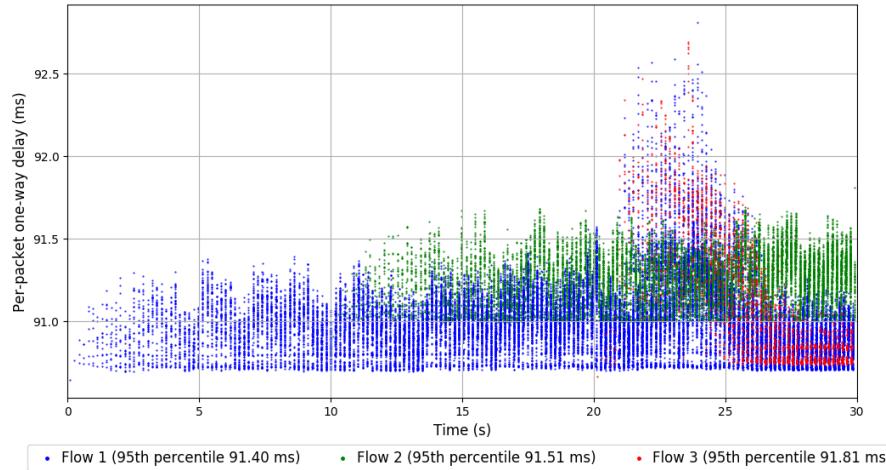
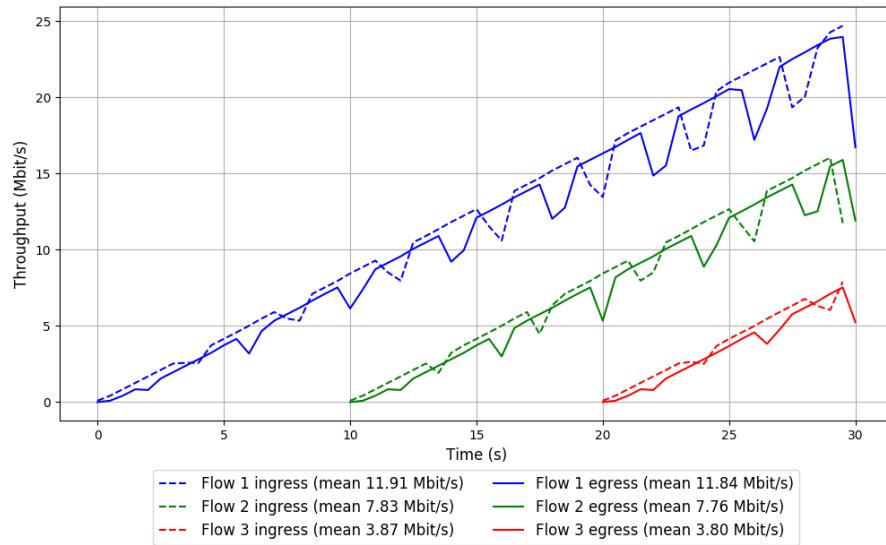


Run 1: Statistics of LEDBAT

```
Start at: 2019-03-27 11:59:47
End at: 2019-03-27 12:00:17
Local clock offset: -2.894 ms
Remote clock offset: 5.092 ms

# Below is generated by plot.py at 2019-03-27 14:22:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 18.20 Mbit/s
95th percentile per-packet one-way delay: 91.494 ms
Loss rate: 1.47%
-- Flow 1:
Average throughput: 11.84 Mbit/s
95th percentile per-packet one-way delay: 91.401 ms
Loss rate: 1.16%
-- Flow 2:
Average throughput: 7.76 Mbit/s
95th percentile per-packet one-way delay: 91.508 ms
Loss rate: 1.67%
-- Flow 3:
Average throughput: 3.80 Mbit/s
95th percentile per-packet one-way delay: 91.807 ms
Loss rate: 3.54%
```

Run 1: Report of LEDBAT — Data Link

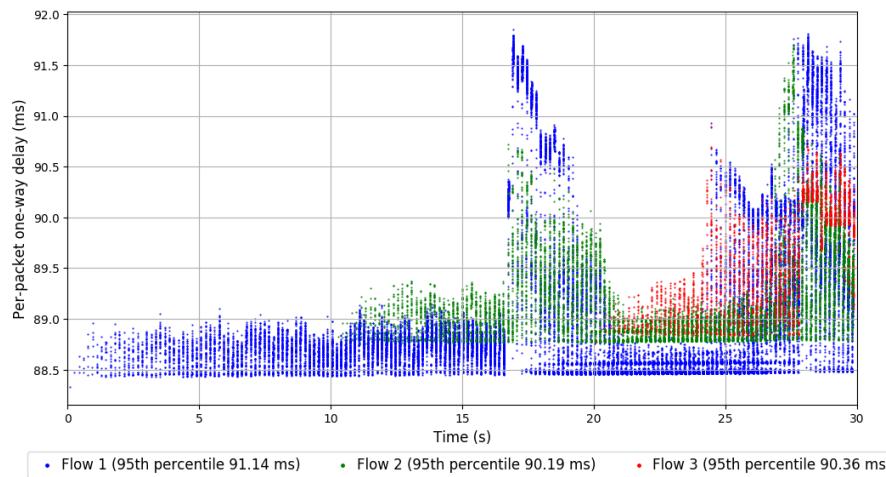
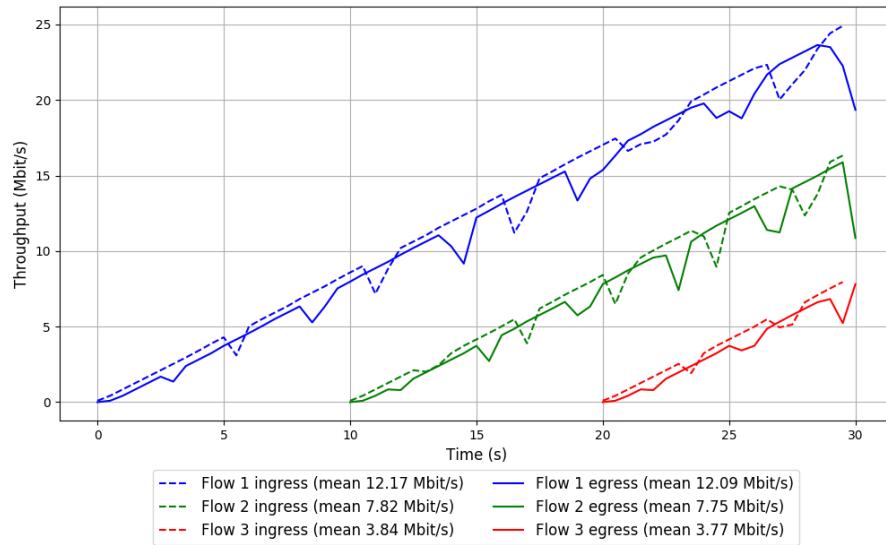


Run 2: Statistics of LEDBAT

```
Start at: 2019-03-27 12:26:47
End at: 2019-03-27 12:27:17
Local clock offset: -4.201 ms
Remote clock offset: 8.252 ms

# Below is generated by plot.py at 2019-03-27 14:22:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 18.47 Mbit/s
95th percentile per-packet one-way delay: 90.781 ms
Loss rate: 1.48%
-- Flow 1:
Average throughput: 12.09 Mbit/s
95th percentile per-packet one-way delay: 91.137 ms
Loss rate: 1.15%
-- Flow 2:
Average throughput: 7.75 Mbit/s
95th percentile per-packet one-way delay: 90.195 ms
Loss rate: 1.76%
-- Flow 3:
Average throughput: 3.77 Mbit/s
95th percentile per-packet one-way delay: 90.360 ms
Loss rate: 3.53%
```

## Run 2: Report of LEDBAT — Data Link

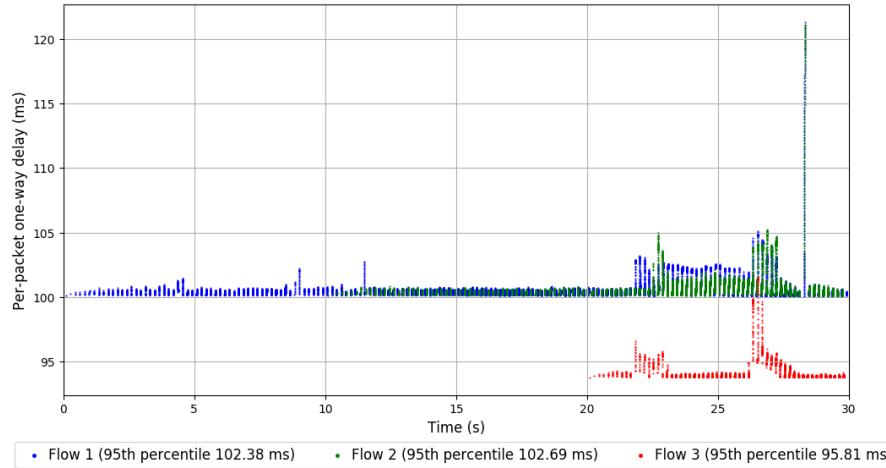
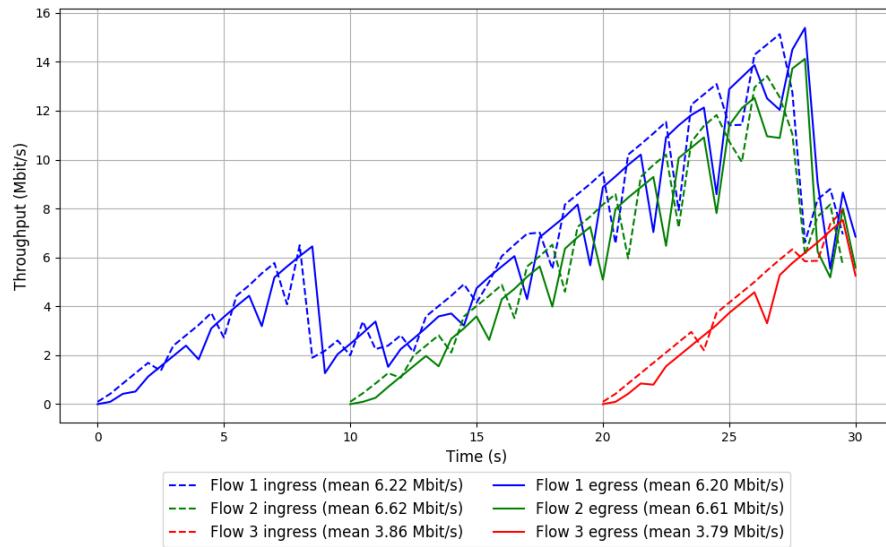


Run 3: Statistics of LEDBAT

```
Start at: 2019-03-27 12:53:49
End at: 2019-03-27 12:54:19
Local clock offset: -5.121 ms
Remote clock offset: -1.778 ms

# Below is generated by plot.py at 2019-03-27 14:22:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 11.80 Mbit/s
95th percentile per-packet one-way delay: 102.335 ms
Loss rate: 1.23%
-- Flow 1:
Average throughput: 6.20 Mbit/s
95th percentile per-packet one-way delay: 102.379 ms
Loss rate: 0.85%
-- Flow 2:
Average throughput: 6.61 Mbit/s
95th percentile per-packet one-way delay: 102.687 ms
Loss rate: 1.10%
-- Flow 3:
Average throughput: 3.79 Mbit/s
95th percentile per-packet one-way delay: 95.812 ms
Loss rate: 3.54%
```

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

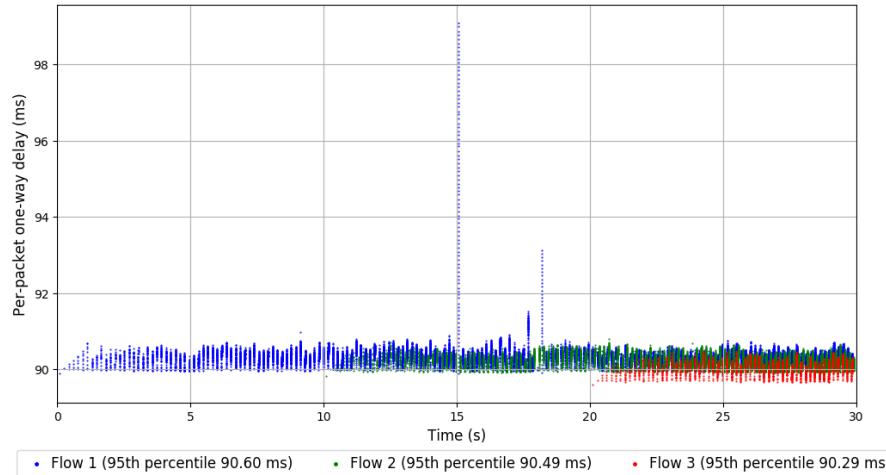
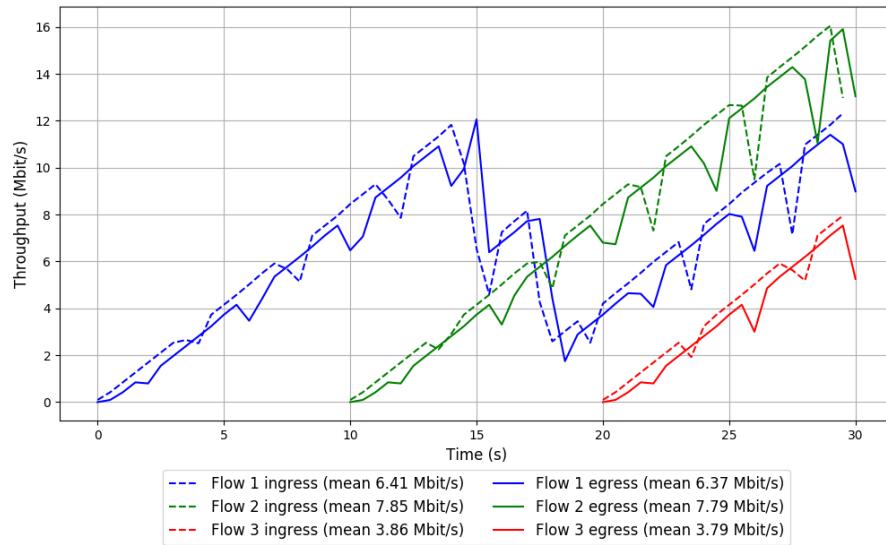


Run 4: Statistics of LEDBAT

```
Start at: 2019-03-27 13:20:56
End at: 2019-03-27 13:21:26
Local clock offset: -3.906 ms
Remote clock offset: 3.943 ms

# Below is generated by plot.py at 2019-03-27 14:22:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 12.77 Mbit/s
95th percentile per-packet one-way delay: 90.554 ms
Loss rate: 1.59%
-- Flow 1:
Average throughput: 6.37 Mbit/s
95th percentile per-packet one-way delay: 90.603 ms
Loss rate: 1.12%
-- Flow 2:
Average throughput: 7.79 Mbit/s
95th percentile per-packet one-way delay: 90.489 ms
Loss rate: 1.70%
-- Flow 3:
Average throughput: 3.79 Mbit/s
95th percentile per-packet one-way delay: 90.294 ms
Loss rate: 3.53%
```

Run 4: Report of LEDBAT — Data Link

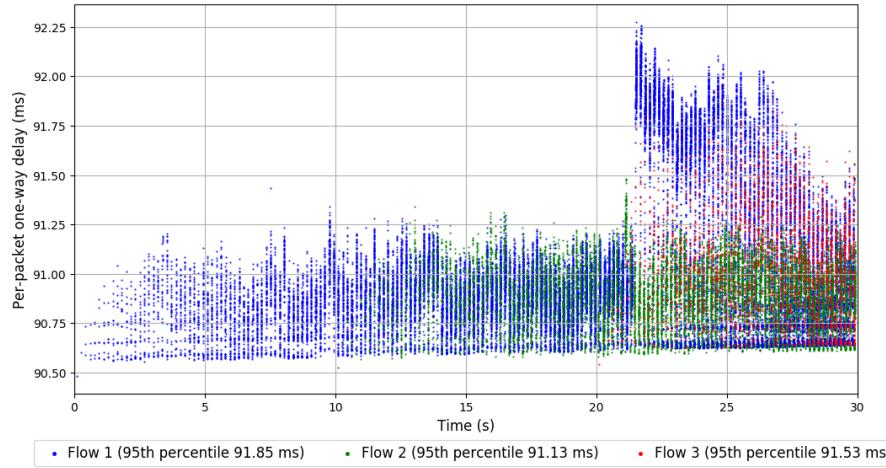
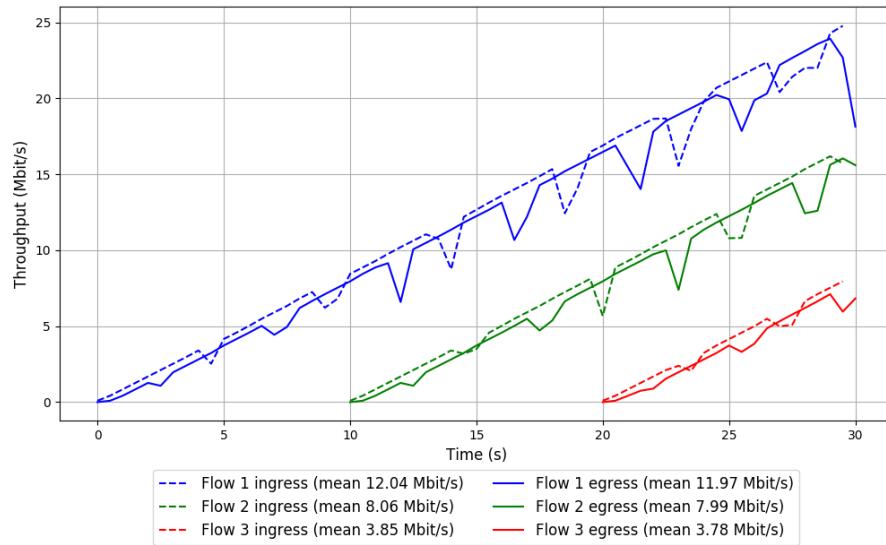


Run 5: Statistics of LEDBAT

```
Start at: 2019-03-27 13:47:56
End at: 2019-03-27 13:48:26
Local clock offset: -4.422 ms
Remote clock offset: 3.52 ms

# Below is generated by plot.py at 2019-03-27 14:22:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 18.49 Mbit/s
95th percentile per-packet one-way delay: 91.783 ms
Loss rate: 1.48%
-- Flow 1:
Average throughput: 11.97 Mbit/s
95th percentile per-packet one-way delay: 91.852 ms
Loss rate: 1.15%
-- Flow 2:
Average throughput: 7.99 Mbit/s
95th percentile per-packet one-way delay: 91.131 ms
Loss rate: 1.73%
-- Flow 3:
Average throughput: 3.78 Mbit/s
95th percentile per-packet one-way delay: 91.530 ms
Loss rate: 3.53%
```

Run 5: Report of LEDBAT — Data Link

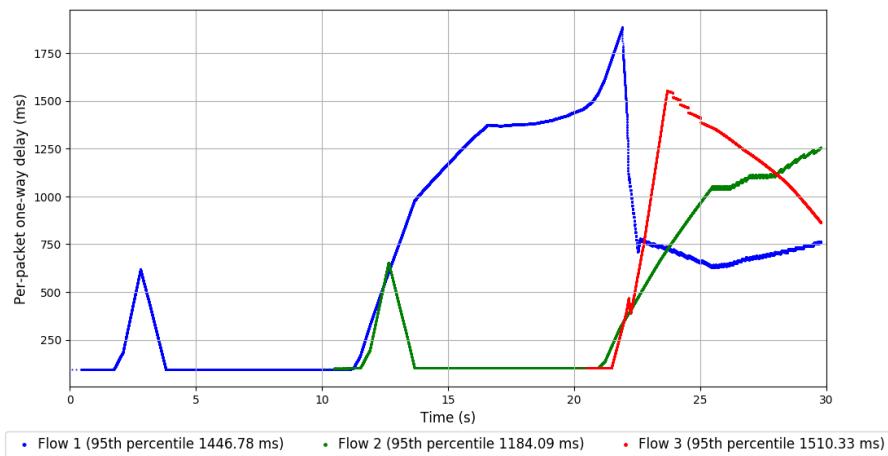
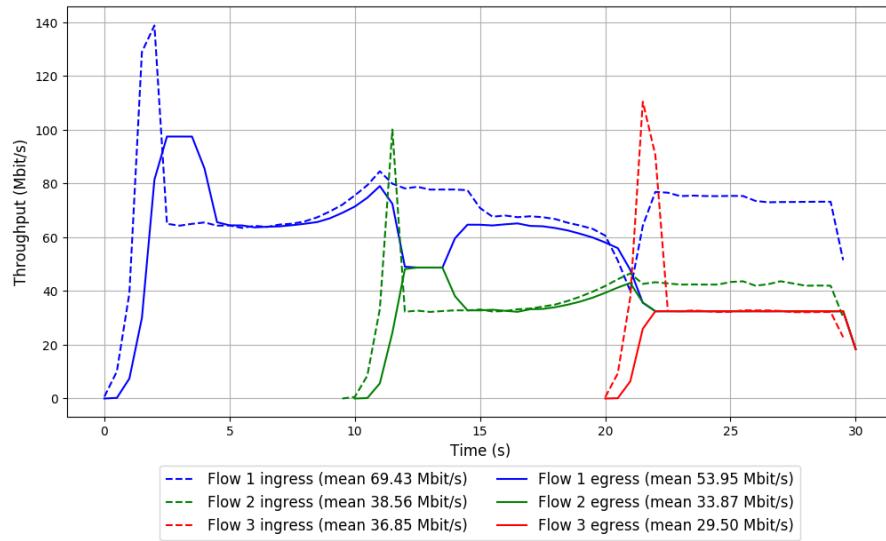


Run 1: Statistics of PCC-Allegro

```
Start at: 2019-03-27 11:58:31
End at: 2019-03-27 11:59:01
Local clock offset: -2.842 ms
Remote clock offset: 1.347 ms

# Below is generated by plot.py at 2019-03-27 14:23:06
# Datalink statistics
-- Total of 3 flows:
Average throughput: 86.01 Mbit/s
95th percentile per-packet one-way delay: 1435.013 ms
Loss rate: 20.25%
-- Flow 1:
Average throughput: 53.95 Mbit/s
95th percentile per-packet one-way delay: 1446.781 ms
Loss rate: 22.75%
-- Flow 2:
Average throughput: 33.87 Mbit/s
95th percentile per-packet one-way delay: 1184.087 ms
Loss rate: 12.95%
-- Flow 3:
Average throughput: 29.50 Mbit/s
95th percentile per-packet one-way delay: 1510.327 ms
Loss rate: 21.38%
```

## Run 1: Report of PCC-Allegro — Data Link

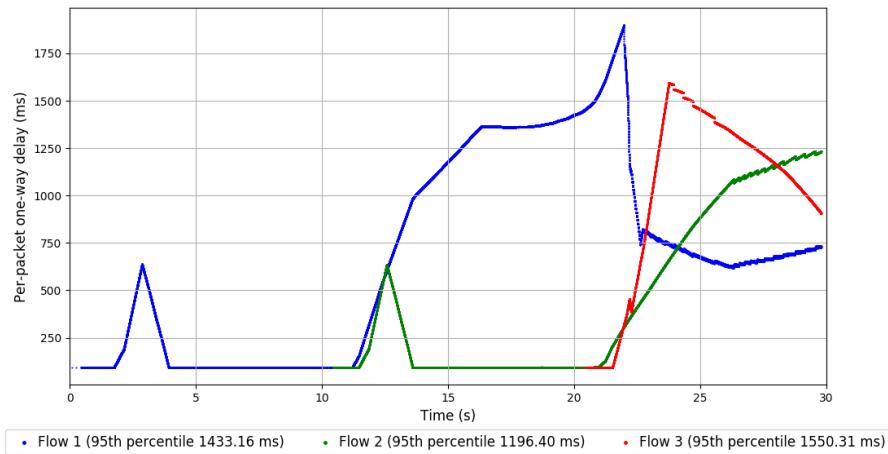
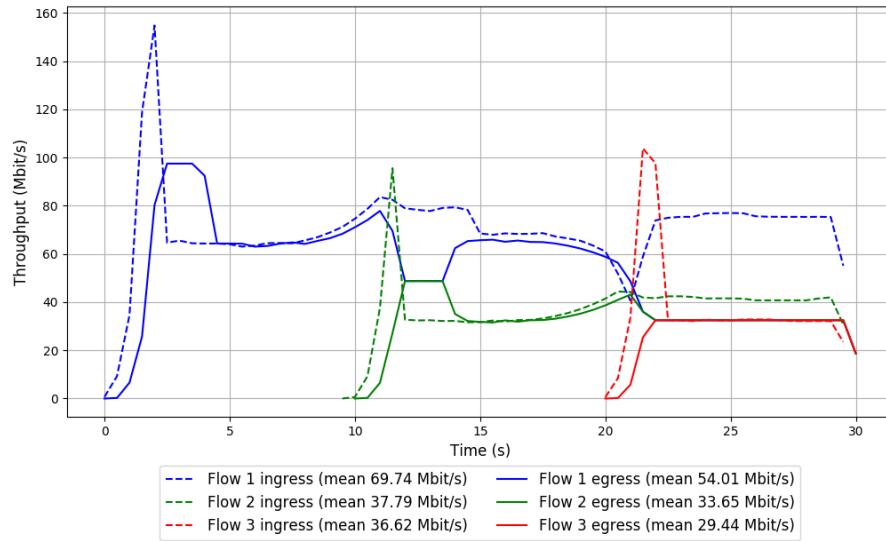


Run 2: Statistics of PCC-Allegro

```
Start at: 2019-03-27 12:25:30
End at: 2019-03-27 12:26:00
Local clock offset: -4.895 ms
Remote clock offset: 1.96 ms

# Below is generated by plot.py at 2019-03-27 14:23:08
# Datalink statistics
-- Total of 3 flows:
Average throughput: 85.93 Mbit/s
95th percentile per-packet one-way delay: 1437.394 ms
Loss rate: 20.13%
-- Flow 1:
Average throughput: 54.01 Mbit/s
95th percentile per-packet one-way delay: 1433.161 ms
Loss rate: 23.00%
-- Flow 2:
Average throughput: 33.65 Mbit/s
95th percentile per-packet one-way delay: 1196.396 ms
Loss rate: 11.73%
-- Flow 3:
Average throughput: 29.44 Mbit/s
95th percentile per-packet one-way delay: 1550.309 ms
Loss rate: 21.03%
```

## Run 2: Report of PCC-Allegro — Data Link

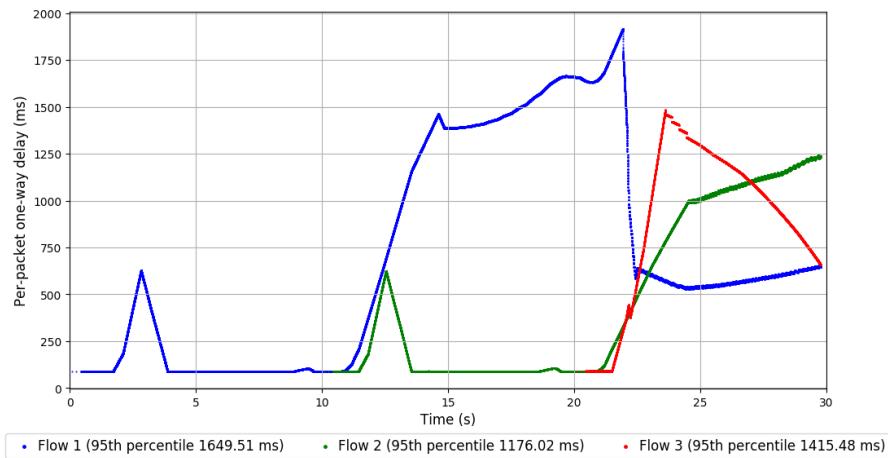
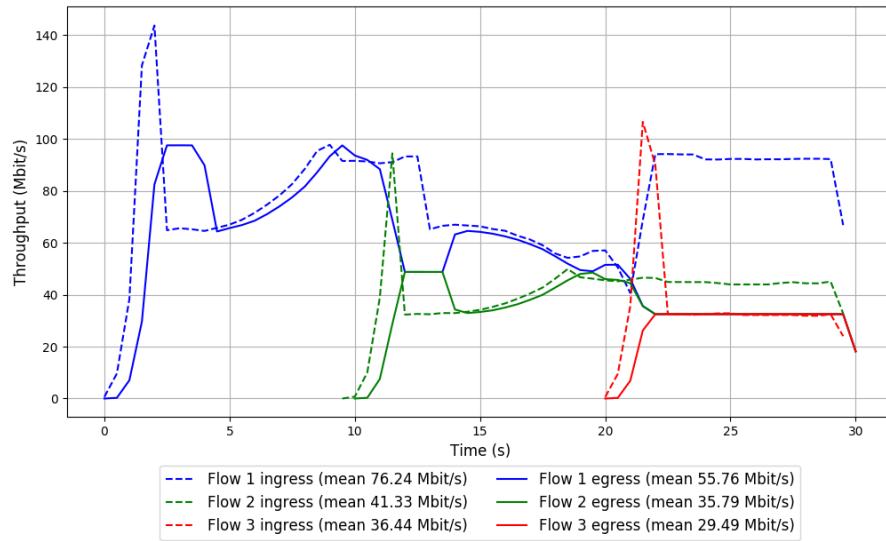


Run 3: Statistics of PCC-Allegro

```
Start at: 2019-03-27 12:52:30
End at: 2019-03-27 12:53:00
Local clock offset: -4.47 ms
Remote clock offset: 3.268 ms

# Below is generated by plot.py at 2019-03-27 14:23:12
# Datalink statistics
-- Total of 3 flows:
Average throughput: 89.12 Mbit/s
95th percentile per-packet one-way delay: 1615.242 ms
Loss rate: 23.46%
-- Flow 1:
Average throughput: 55.76 Mbit/s
95th percentile per-packet one-way delay: 1649.505 ms
Loss rate: 27.29%
-- Flow 2:
Average throughput: 35.79 Mbit/s
95th percentile per-packet one-way delay: 1176.022 ms
Loss rate: 14.15%
-- Flow 3:
Average throughput: 29.49 Mbit/s
95th percentile per-packet one-way delay: 1415.482 ms
Loss rate: 20.46%
```

### Run 3: Report of PCC-Allegro — Data Link

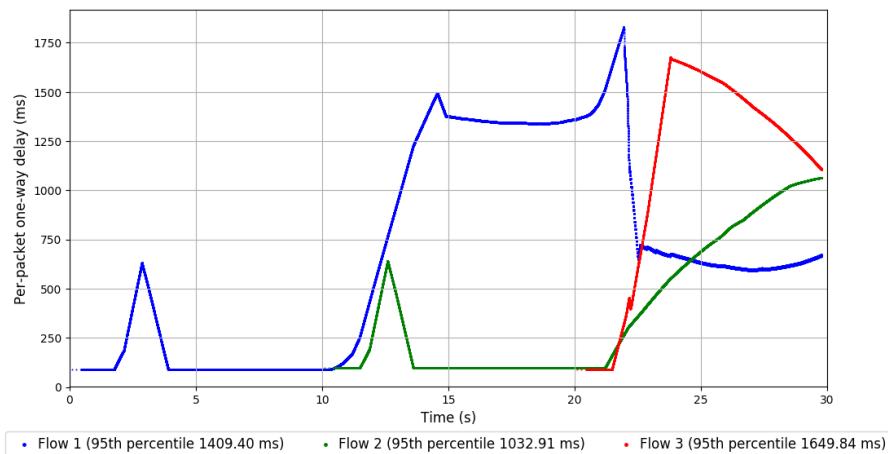
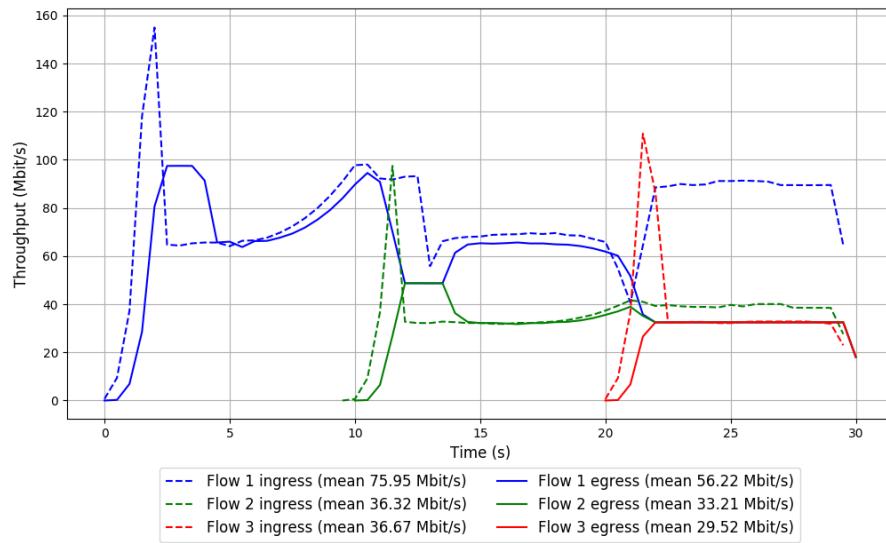


Run 4: Statistics of PCC-Allegro

```
Start at: 2019-03-27 13:19:39
End at: 2019-03-27 13:20:09
Local clock offset: -4.027 ms
Remote clock offset: 3.946 ms

# Below is generated by plot.py at 2019-03-27 14:23:12
# Datalink statistics
-- Total of 3 flows:
Average throughput: 87.86 Mbit/s
95th percentile per-packet one-way delay: 1484.546 ms
Loss rate: 22.15%
-- Flow 1:
Average throughput: 56.22 Mbit/s
95th percentile per-packet one-way delay: 1409.403 ms
Loss rate: 26.41%
-- Flow 2:
Average throughput: 33.21 Mbit/s
95th percentile per-packet one-way delay: 1032.915 ms
Loss rate: 9.38%
-- Flow 3:
Average throughput: 29.52 Mbit/s
95th percentile per-packet one-way delay: 1649.838 ms
Loss rate: 20.91%
```

Run 4: Report of PCC-Allegro — Data Link

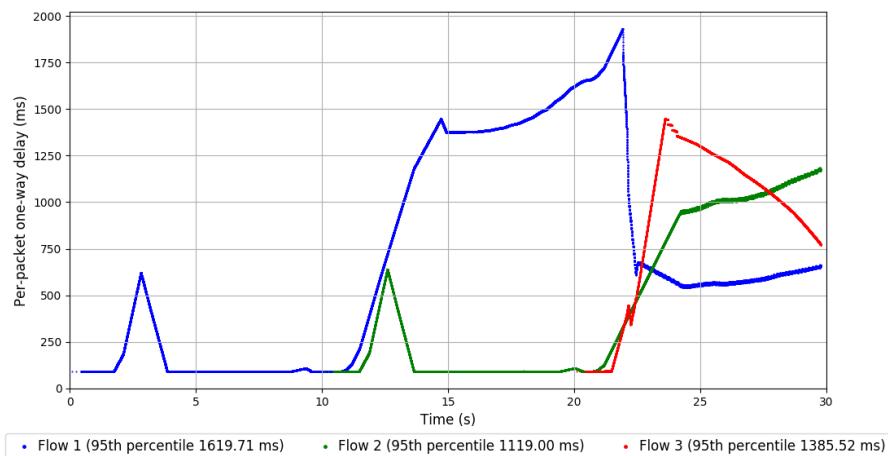
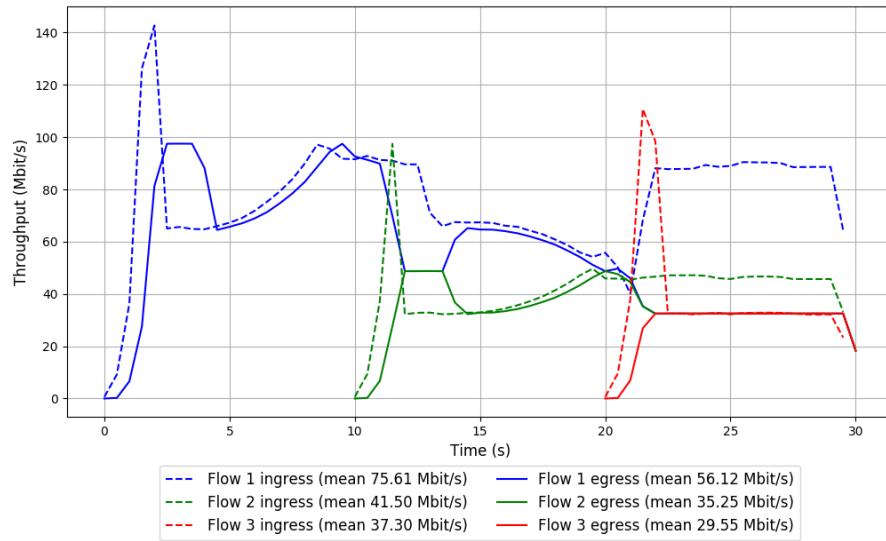


Run 5: Statistics of PCC-Allegro

```
Start at: 2019-03-27 13:46:39
End at: 2019-03-27 13:47:09
Local clock offset: -3.448 ms
Remote clock offset: 3.579 ms

# Below is generated by plot.py at 2019-03-27 14:23:18
# Datalink statistics
-- Total of 3 flows:
Average throughput: 89.14 Mbit/s
95th percentile per-packet one-way delay: 1509.694 ms
Loss rate: 23.28%
-- Flow 1:
Average throughput: 56.12 Mbit/s
95th percentile per-packet one-way delay: 1619.712 ms
Loss rate: 26.20%
-- Flow 2:
Average throughput: 35.25 Mbit/s
95th percentile per-packet one-way delay: 1119.003 ms
Loss rate: 15.79%
-- Flow 3:
Average throughput: 29.55 Mbit/s
95th percentile per-packet one-way delay: 1385.524 ms
Loss rate: 22.16%
```

Run 5: Report of PCC-Allegro — Data Link

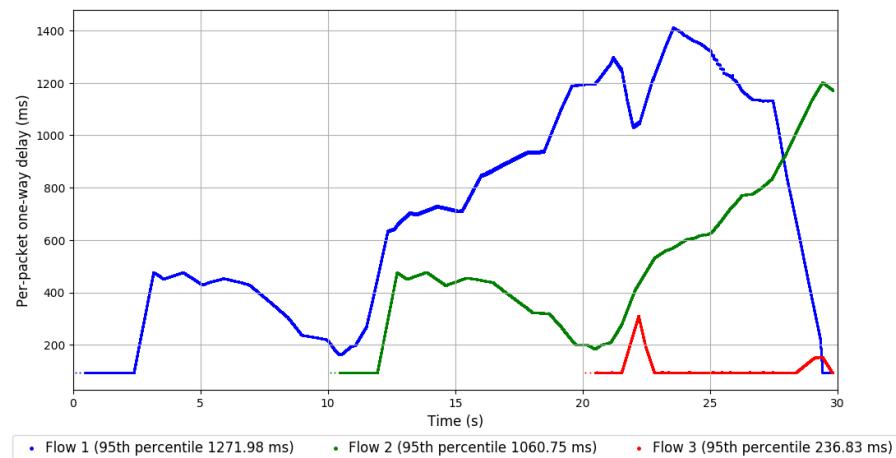
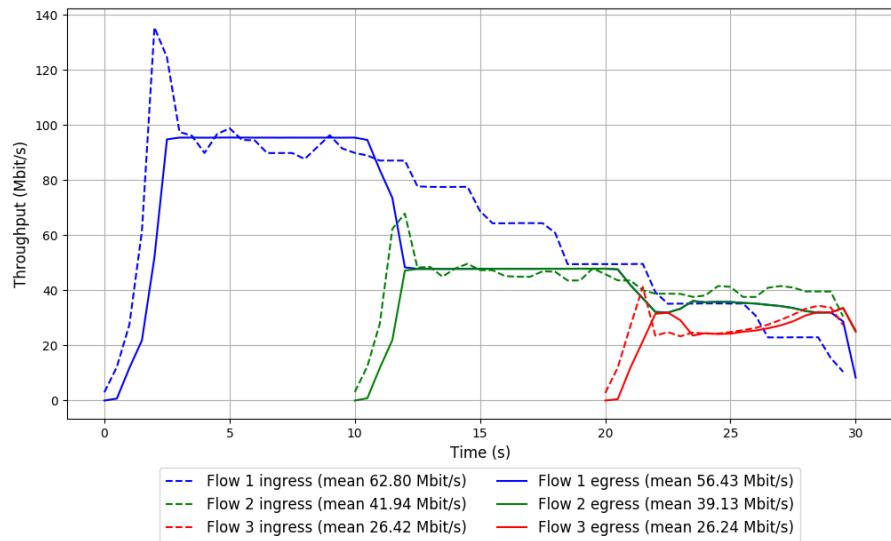


```
Run 1: Statistics of PCC-Expr
```

```
Start at: 2019-03-27 12:03:37
End at: 2019-03-27 12:04:07
Local clock offset: -3.639 ms
Remote clock offset: 1.391 ms

# Below is generated by plot.py at 2019-03-27 14:24:16
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.95 Mbit/s
95th percentile per-packet one-way delay: 1213.232 ms
Loss rate: 9.05%
-- Flow 1:
Average throughput: 56.43 Mbit/s
95th percentile per-packet one-way delay: 1271.977 ms
Loss rate: 10.66%
-- Flow 2:
Average throughput: 39.13 Mbit/s
95th percentile per-packet one-way delay: 1060.747 ms
Loss rate: 7.50%
-- Flow 3:
Average throughput: 26.24 Mbit/s
95th percentile per-packet one-way delay: 236.827 ms
Loss rate: 2.42%
```

Run 1: Report of PCC-Expr — Data Link

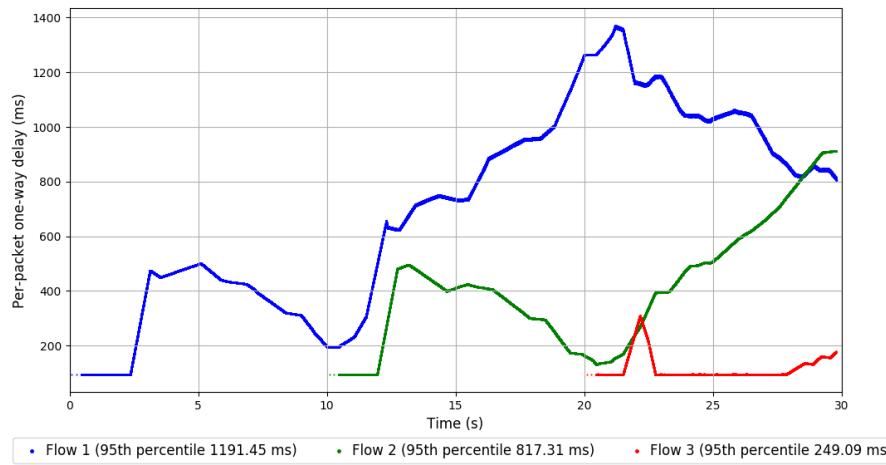
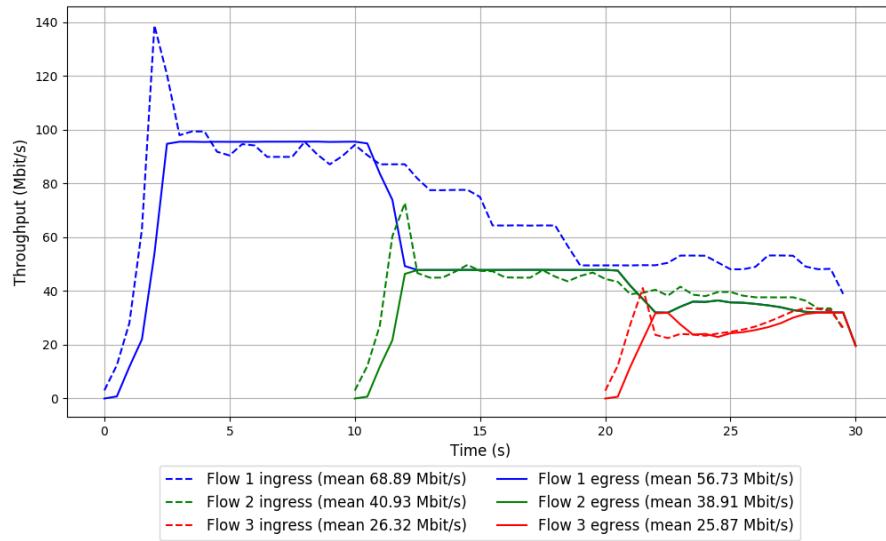


Run 2: Statistics of PCC-Expr

```
Start at: 2019-03-27 12:30:37
End at: 2019-03-27 12:31:07
Local clock offset: -4.444 ms
Remote clock offset: 1.381 ms

# Below is generated by plot.py at 2019-03-27 14:24:22
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.99 Mbit/s
95th percentile per-packet one-way delay: 1140.679 ms
Loss rate: 13.69%
-- Flow 1:
Average throughput: 56.73 Mbit/s
95th percentile per-packet one-way delay: 1191.450 ms
Loss rate: 18.12%
-- Flow 2:
Average throughput: 38.91 Mbit/s
95th percentile per-packet one-way delay: 817.310 ms
Loss rate: 5.75%
-- Flow 3:
Average throughput: 25.87 Mbit/s
95th percentile per-packet one-way delay: 249.090 ms
Loss rate: 3.45%
```

## Run 2: Report of PCC-Expr — Data Link

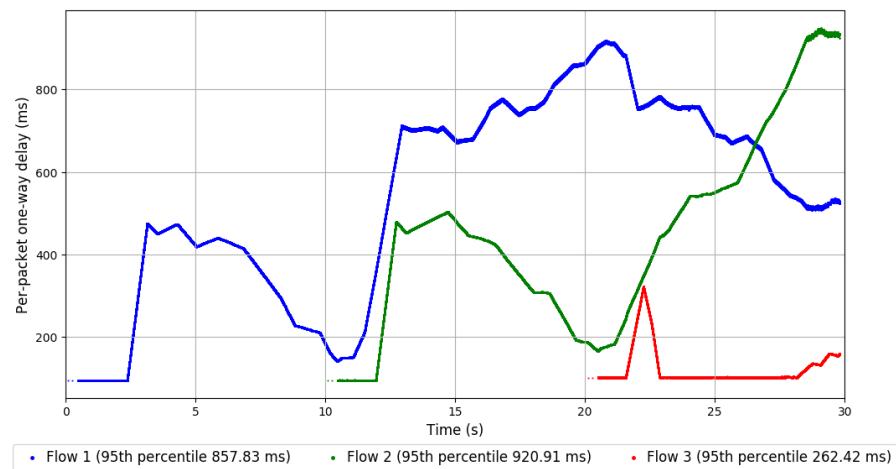
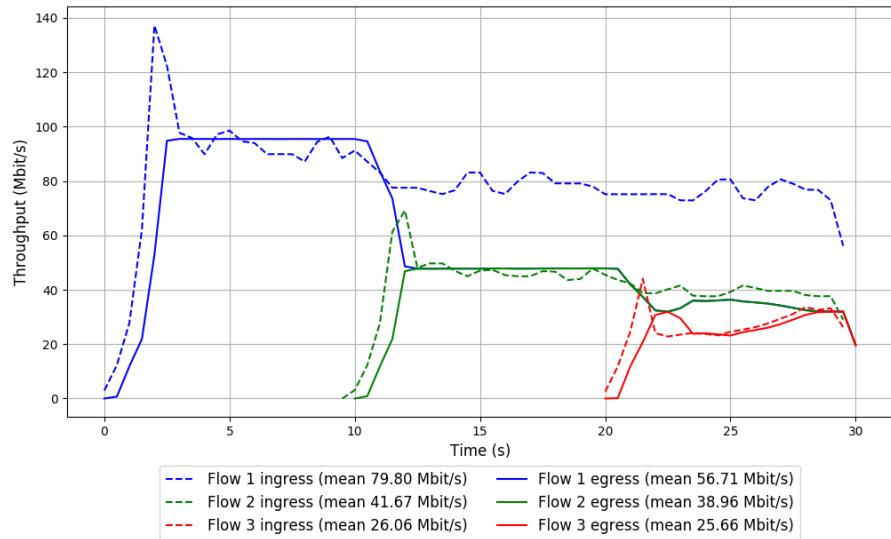


Run 3: Statistics of PCC-Expr

```
Start at: 2019-03-27 12:57:42
End at: 2019-03-27 12:58:12
Local clock offset: -5.063 ms
Remote clock offset: -2.059 ms

# Below is generated by plot.py at 2019-03-27 14:24:38
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.93 Mbit/s
95th percentile per-packet one-way delay: 857.670 ms
Loss rate: 22.15%
-- Flow 1:
Average throughput: 56.71 Mbit/s
95th percentile per-packet one-way delay: 857.830 ms
Loss rate: 29.34%
-- Flow 2:
Average throughput: 38.96 Mbit/s
95th percentile per-packet one-way delay: 920.907 ms
Loss rate: 7.32%
-- Flow 3:
Average throughput: 25.66 Mbit/s
95th percentile per-packet one-way delay: 262.419 ms
Loss rate: 3.32%
```

Run 3: Report of PCC-Expr — Data Link

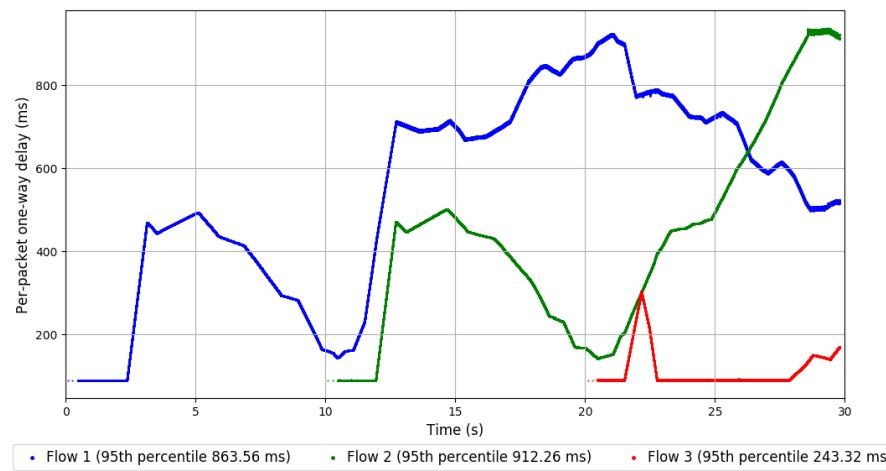
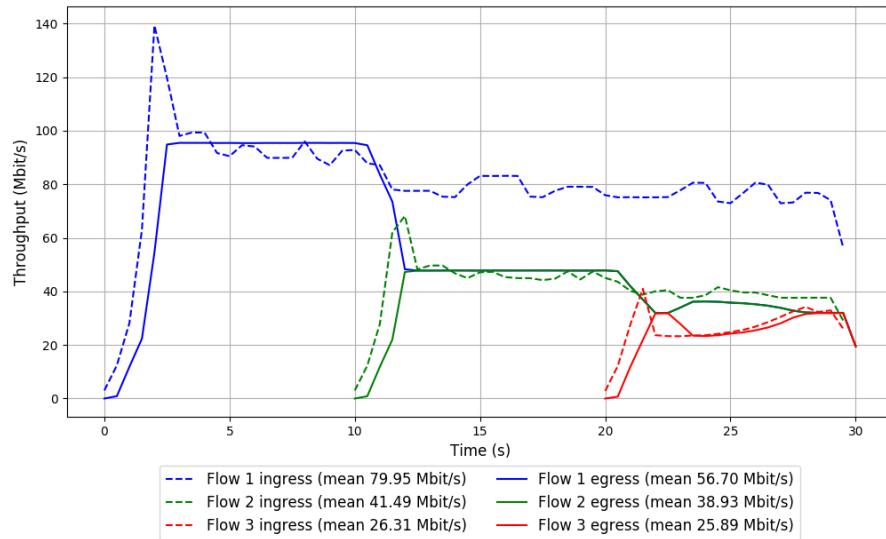


Run 4: Statistics of PCC-Expr

```
Start at: 2019-03-27 13:24:46
End at: 2019-03-27 13:25:16
Local clock offset: -3.781 ms
Remote clock offset: 4.061 ms

# Below is generated by plot.py at 2019-03-27 14:25:09
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.97 Mbit/s
95th percentile per-packet one-way delay: 863.363 ms
Loss rate: 22.19%
-- Flow 1:
Average throughput: 56.70 Mbit/s
95th percentile per-packet one-way delay: 863.560 ms
Loss rate: 29.49%
-- Flow 2:
Average throughput: 38.93 Mbit/s
95th percentile per-packet one-way delay: 912.264 ms
Loss rate: 6.99%
-- Flow 3:
Average throughput: 25.89 Mbit/s
95th percentile per-packet one-way delay: 243.316 ms
Loss rate: 3.32%
```

Run 4: Report of PCC-Expr — Data Link

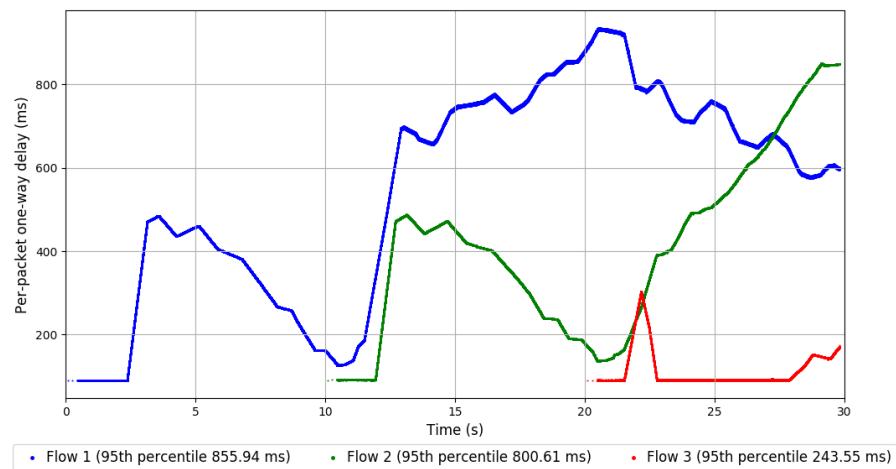
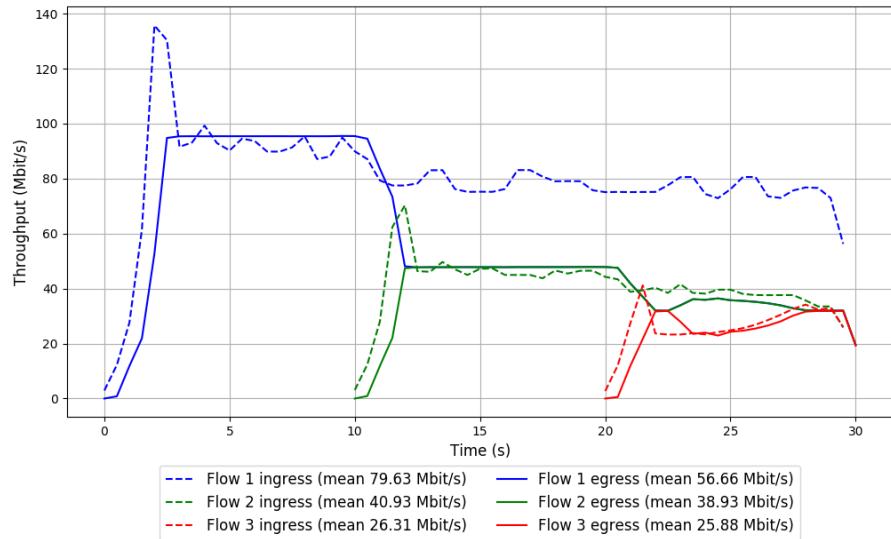


Run 5: Statistics of PCC-Expr

```
Start at: 2019-03-27 13:51:46
End at: 2019-03-27 13:52:16
Local clock offset: -4.137 ms
Remote clock offset: 4.982 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 90.91 Mbit/s
95th percentile per-packet one-way delay: 841.558 ms
Loss rate: 21.76%
-- Flow 1:
Average throughput: 56.66 Mbit/s
95th percentile per-packet one-way delay: 855.938 ms
Loss rate: 29.26%
-- Flow 2:
Average throughput: 38.93 Mbit/s
95th percentile per-packet one-way delay: 800.613 ms
Loss rate: 5.71%
-- Flow 3:
Average throughput: 25.88 Mbit/s
95th percentile per-packet one-way delay: 243.553 ms
Loss rate: 3.31%
```

Run 5: Report of PCC-Expr — Data Link

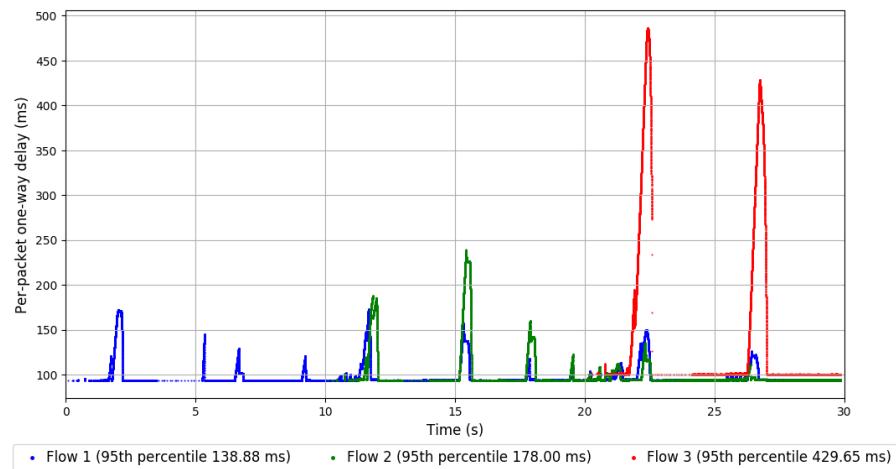
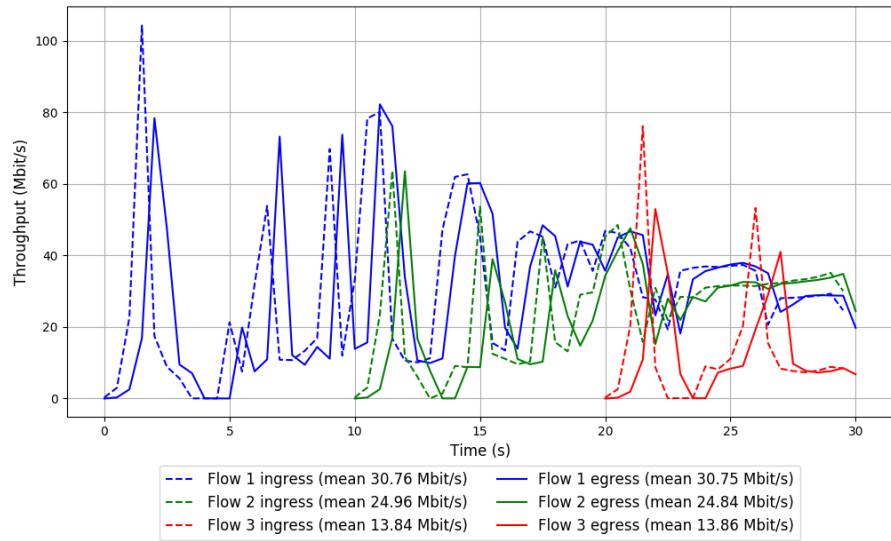


```
Run 1: Statistics of QUIC Cubic

Start at: 2019-03-27 12:04:59
End at: 2019-03-27 12:05:29
Local clock offset: -2.888 ms
Remote clock offset: 2.562 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 51.77 Mbit/s
95th percentile per-packet one-way delay: 175.369 ms
Loss rate: 0.93%
-- Flow 1:
Average throughput: 30.75 Mbit/s
95th percentile per-packet one-way delay: 138.876 ms
Loss rate: 0.60%
-- Flow 2:
Average throughput: 24.84 Mbit/s
95th percentile per-packet one-way delay: 177.999 ms
Loss rate: 1.33%
-- Flow 3:
Average throughput: 13.86 Mbit/s
95th percentile per-packet one-way delay: 429.647 ms
Loss rate: 1.63%
```

Run 1: Report of QUIC Cubic — Data Link

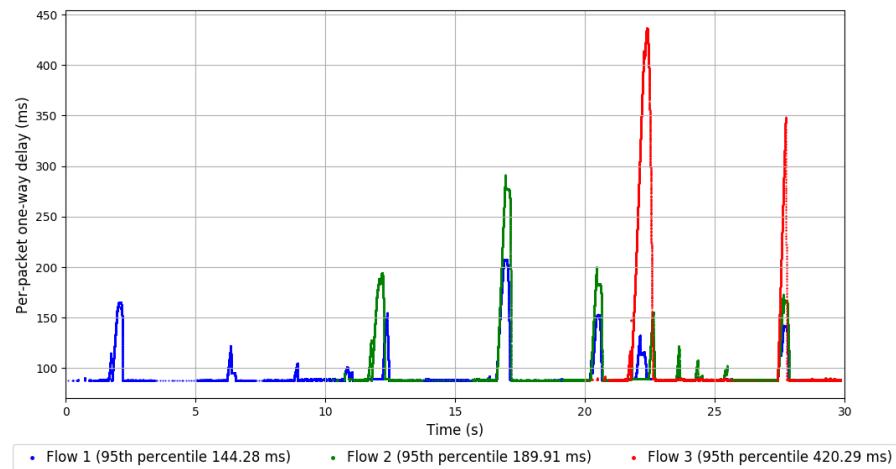
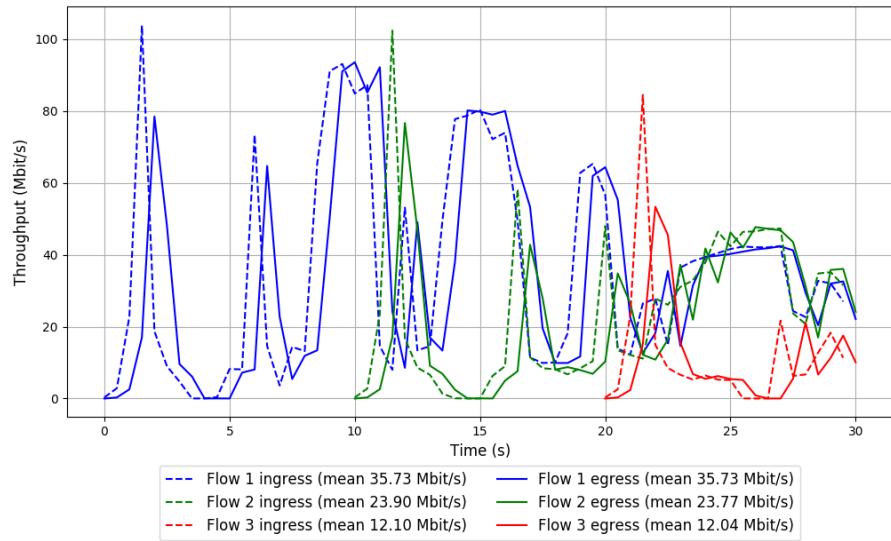


Run 2: Statistics of QUIC Cubic

```
Start at: 2019-03-27 12:31:59
End at: 2019-03-27 12:32:29
Local clock offset: -5.304 ms
Remote clock offset: 7.489 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 55.44 Mbit/s
95th percentile per-packet one-way delay: 183.855 ms
Loss rate: 0.92%
-- Flow 1:
Average throughput: 35.73 Mbit/s
95th percentile per-packet one-way delay: 144.282 ms
Loss rate: 0.57%
-- Flow 2:
Average throughput: 23.77 Mbit/s
95th percentile per-packet one-way delay: 189.907 ms
Loss rate: 1.39%
-- Flow 3:
Average throughput: 12.04 Mbit/s
95th percentile per-packet one-way delay: 420.293 ms
Loss rate: 2.21%
```

Run 2: Report of QUIC Cubic — Data Link

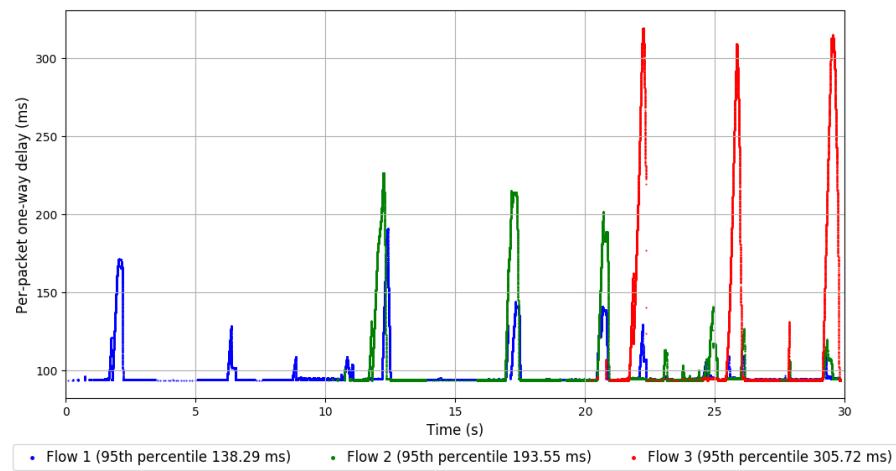
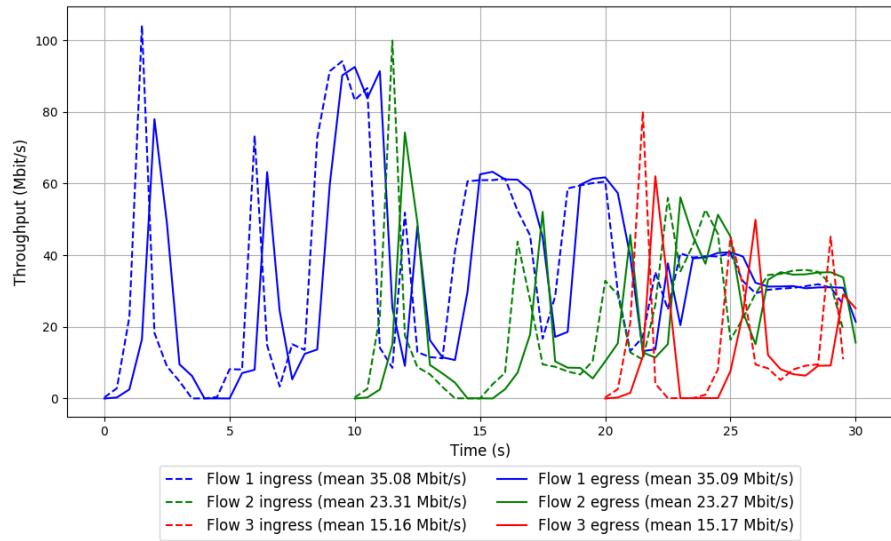


Run 3: Statistics of QUIC Cubic

```
Start at: 2019-03-27 12:59:05
End at: 2019-03-27 12:59:35
Local clock offset: -4.198 ms
Remote clock offset: -0.954 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 55.48 Mbit/s
95th percentile per-packet one-way delay: 187.229 ms
Loss rate: 0.79%
-- Flow 1:
Average throughput: 35.09 Mbit/s
95th percentile per-packet one-way delay: 138.286 ms
Loss rate: 0.56%
-- Flow 2:
Average throughput: 23.27 Mbit/s
95th percentile per-packet one-way delay: 193.548 ms
Loss rate: 1.05%
-- Flow 3:
Average throughput: 15.17 Mbit/s
95th percentile per-packet one-way delay: 305.723 ms
Loss rate: 1.65%
```

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

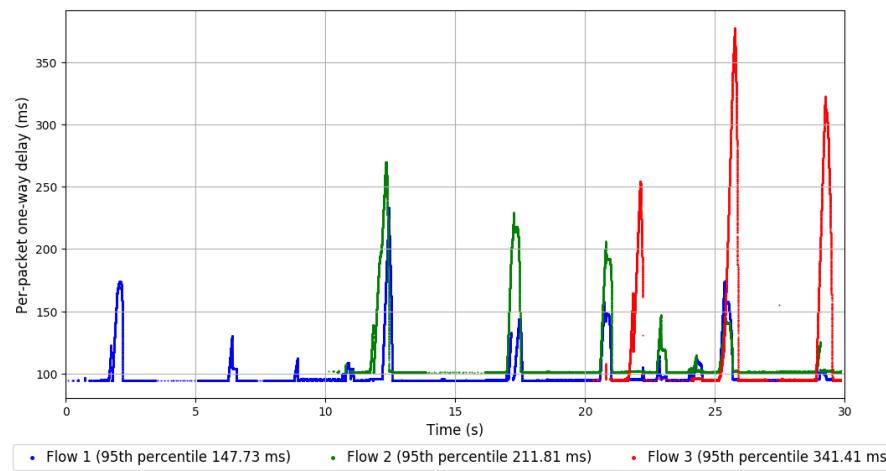
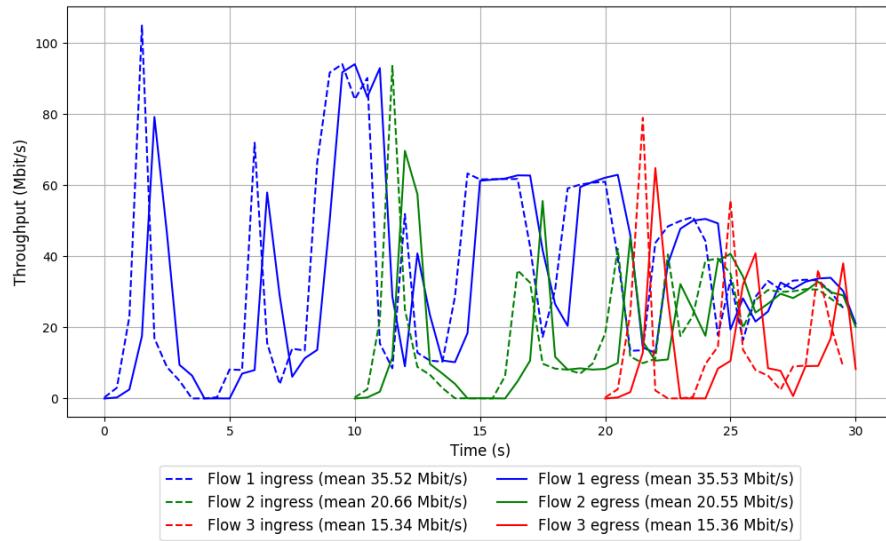


Run 4: Statistics of QUIC Cubic

```
Start at: 2019-03-27 13:26:08
End at: 2019-03-27 13:26:38
Local clock offset: -3.752 ms
Remote clock offset: -0.764 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 54.17 Mbit/s
95th percentile per-packet one-way delay: 200.578 ms
Loss rate: 0.87%
-- Flow 1:
Average throughput: 35.53 Mbit/s
95th percentile per-packet one-way delay: 147.728 ms
Loss rate: 0.55%
-- Flow 2:
Average throughput: 20.55 Mbit/s
95th percentile per-packet one-way delay: 211.813 ms
Loss rate: 1.42%
-- Flow 3:
Average throughput: 15.36 Mbit/s
95th percentile per-packet one-way delay: 341.413 ms
Loss rate: 1.61%
```

Run 4: Report of QUIC Cubic — Data Link

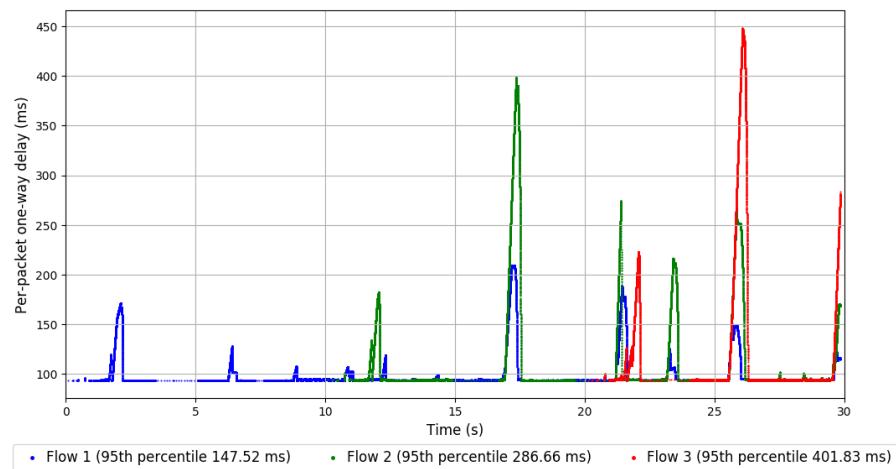
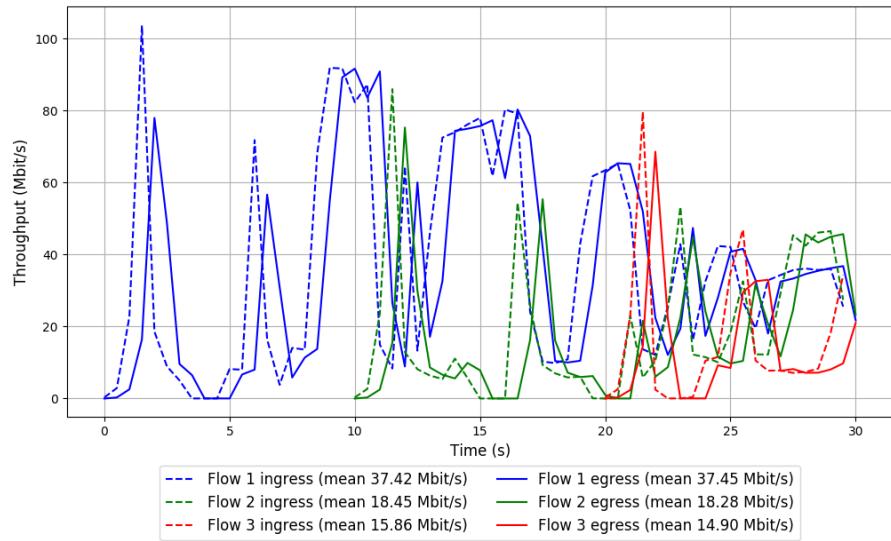


Run 5: Statistics of QUIC Cubic

```
Start at: 2019-03-27 13:53:08
End at: 2019-03-27 13:53:38
Local clock offset: -4.245 ms
Remote clock offset: 1.191 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 54.44 Mbit/s
95th percentile per-packet one-way delay: 208.026 ms
Loss rate: 1.48%
-- Flow 1:
Average throughput: 37.45 Mbit/s
95th percentile per-packet one-way delay: 147.524 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 18.28 Mbit/s
95th percentile per-packet one-way delay: 286.663 ms
Loss rate: 1.79%
-- Flow 3:
Average throughput: 14.90 Mbit/s
95th percentile per-packet one-way delay: 401.829 ms
Loss rate: 7.65%
```

Run 5: Report of QUIC Cubic — Data Link

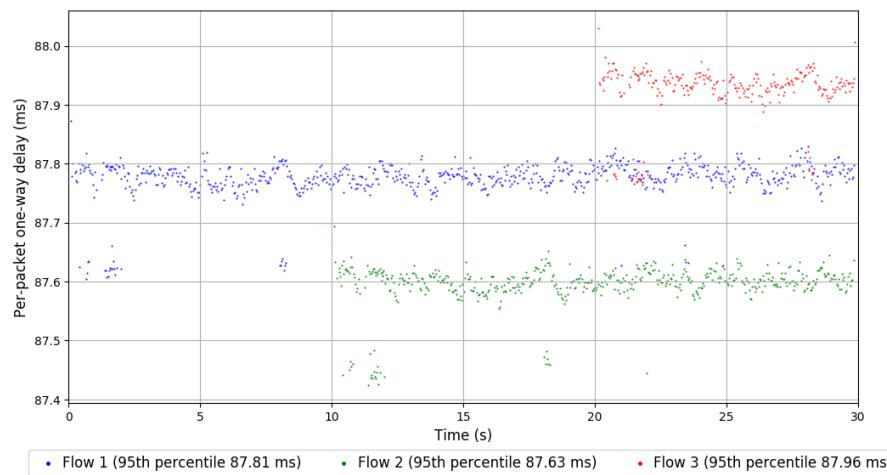
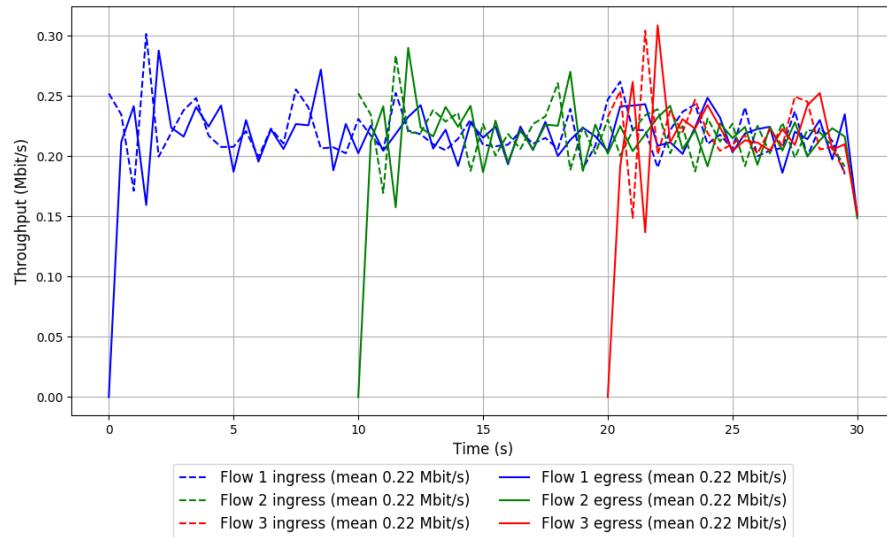


```
Run 1: Statistics of SCReAM

Start at: 2019-03-27 12:11:23
End at: 2019-03-27 12:11:53
Local clock offset: -3.629 ms
Remote clock offset: 7.76 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 0.44 Mbit/s
95th percentile per-packet one-way delay: 87.945 ms
Loss rate: 0.78%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 87.807 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 87.629 ms
Loss rate: 0.82%
-- Flow 3:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 87.963 ms
Loss rate: 1.50%
```

## Run 1: Report of SCReAM — Data Link

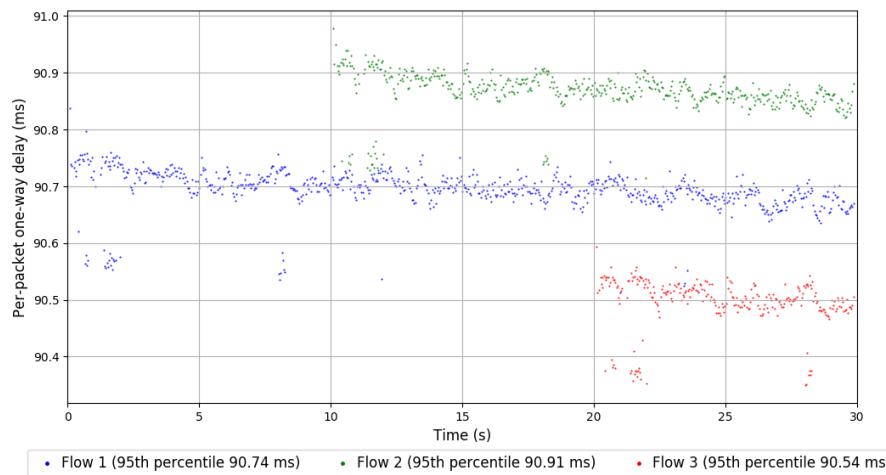
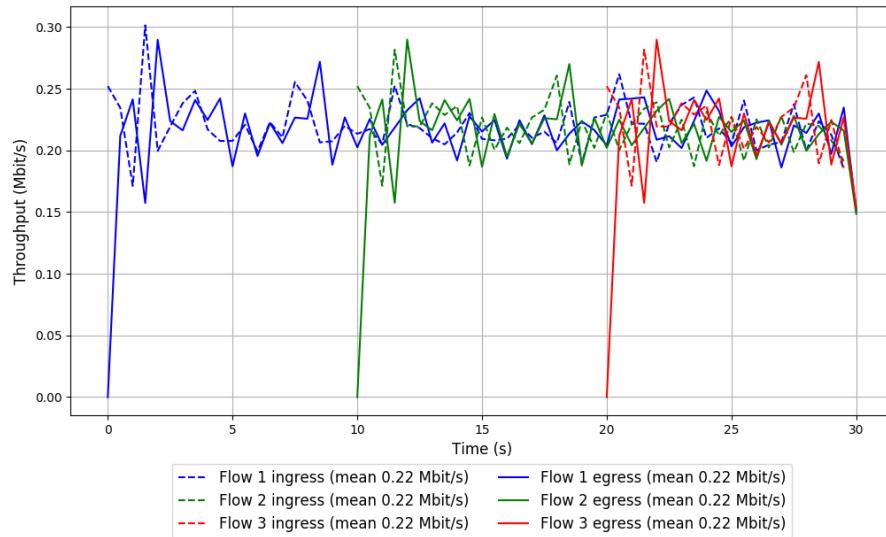


Run 2: Statistics of SCReAM

```
Start at: 2019-03-27 12:38:23
End at: 2019-03-27 12:38:53
Local clock offset: -4.742 ms
Remote clock offset: 3.656 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 0.44 Mbit/s
95th percentile per-packet one-way delay: 90.897 ms
Loss rate: 0.77%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 90.738 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 90.911 ms
Loss rate: 0.82%
-- Flow 3:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 90.539 ms
Loss rate: 1.46%
```

## Run 2: Report of SCReAM — Data Link

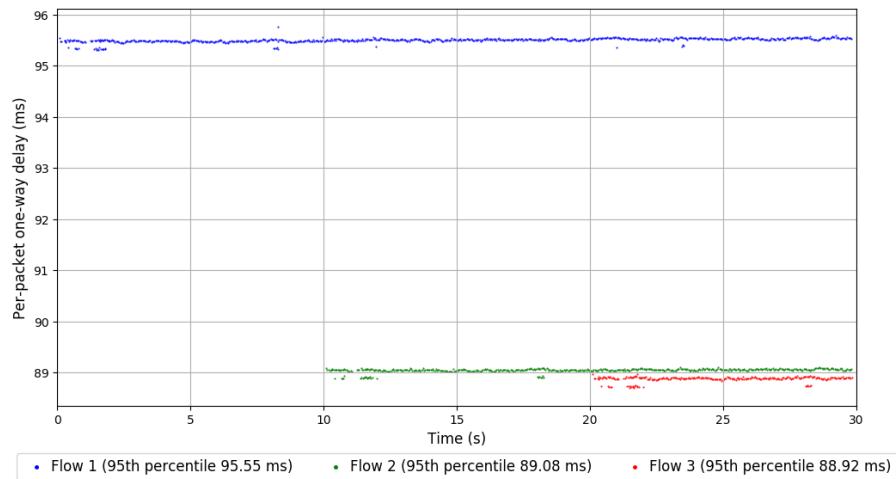
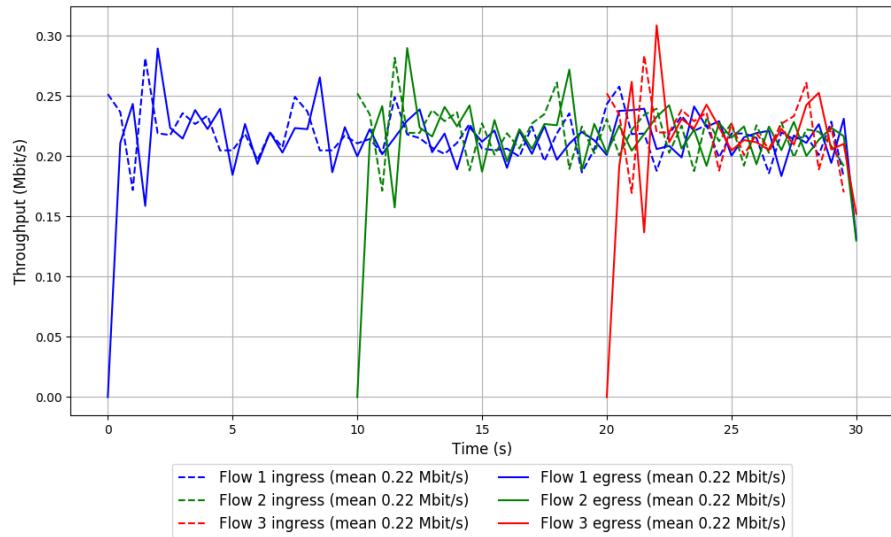


Run 3: Statistics of SCReAM

```
Start at: 2019-03-27 13:05:30
End at: 2019-03-27 13:06:00
Local clock offset: -4.896 ms
Remote clock offset: 3.011 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 0.44 Mbit/s
95th percentile per-packet one-way delay: 95.542 ms
Loss rate: 0.92%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 95.551 ms
Loss rate: 0.64%
-- Flow 2:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 89.085 ms
Loss rate: 1.04%
-- Flow 3:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 88.923 ms
Loss rate: 1.50%
```

Run 3: Report of SCReAM — Data Link

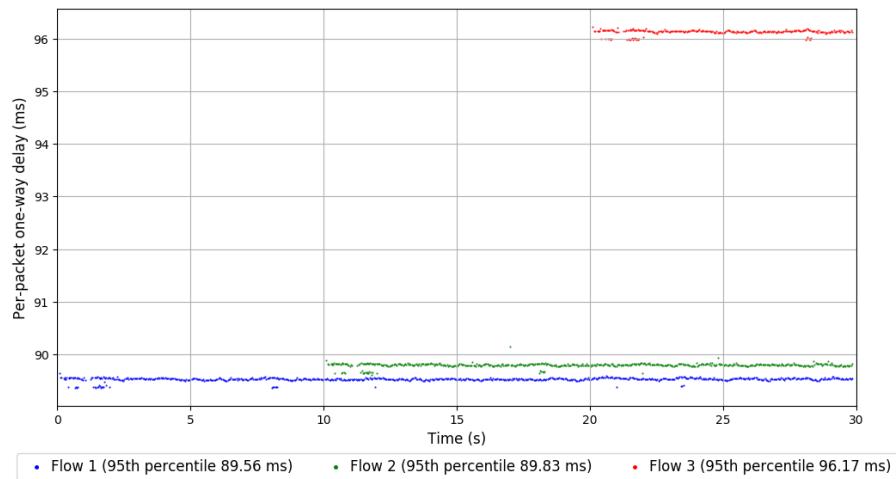
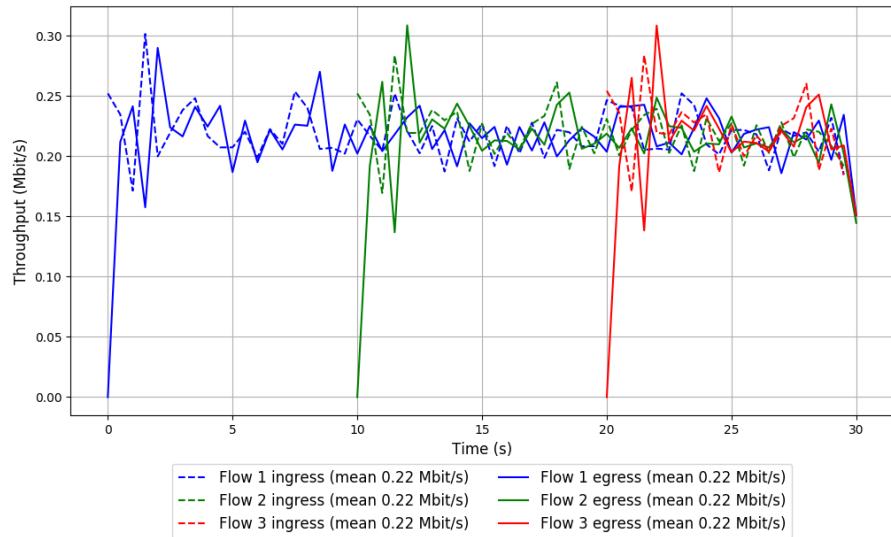


Run 4: Statistics of SCReAM

```
Start at: 2019-03-27 13:32:32
End at: 2019-03-27 13:33:02
Local clock offset: -3.611 ms
Remote clock offset: 4.242 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 0.44 Mbit/s
95th percentile per-packet one-way delay: 96.149 ms
Loss rate: 0.91%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 89.562 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 89.830 ms
Loss rate: 1.04%
-- Flow 3:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 96.170 ms
Loss rate: 1.84%
```

## Run 4: Report of SCReAM — Data Link

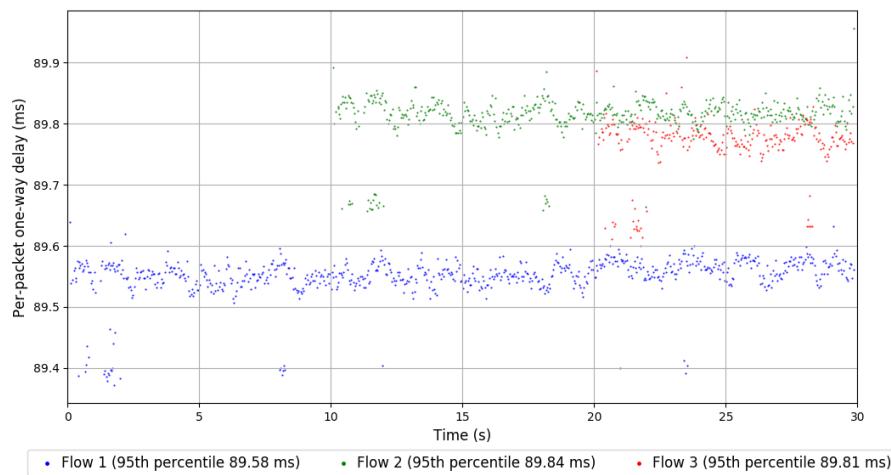
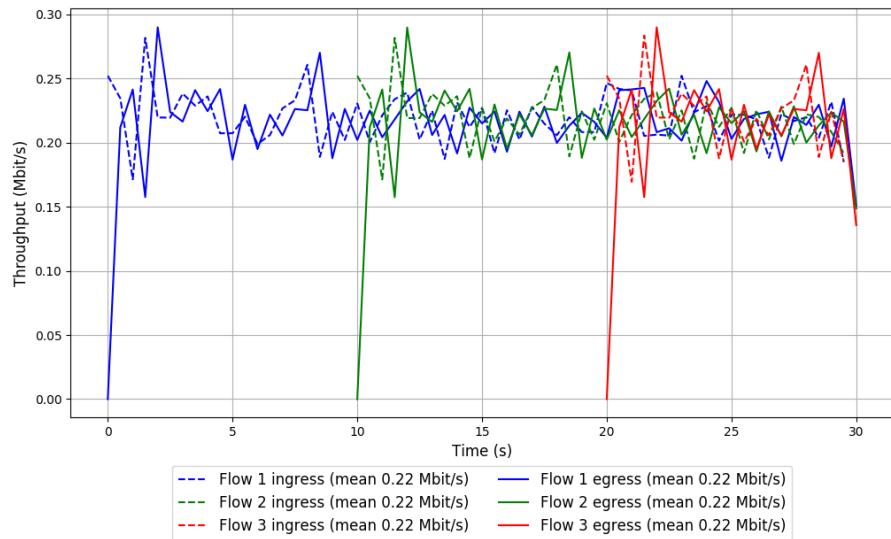


Run 5: Statistics of SCReAM

```
Start at: 2019-03-27 13:59:33
End at: 2019-03-27 14:00:03
Local clock offset: -4.565 ms
Remote clock offset: 5.353 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 0.44 Mbit/s
95th percentile per-packet one-way delay: 89.836 ms
Loss rate: 0.84%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 89.583 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 89.845 ms
Loss rate: 0.82%
-- Flow 3:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 89.809 ms
Loss rate: 1.85%
```

Run 5: Report of SCReAM — Data Link

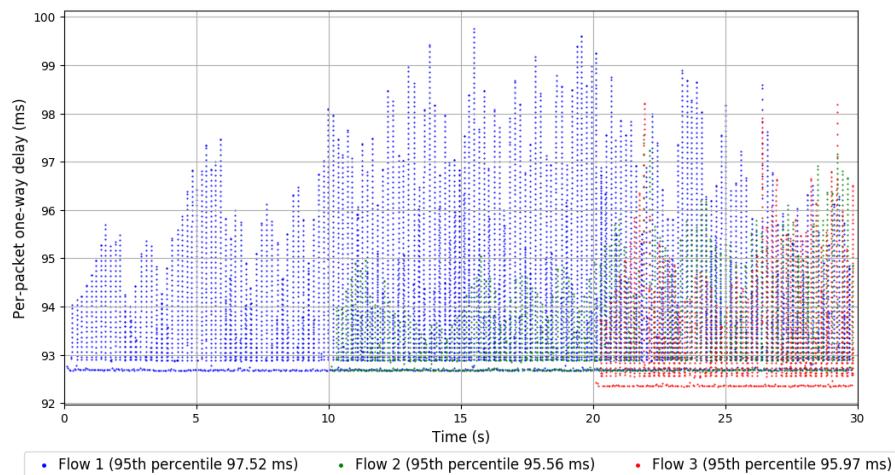
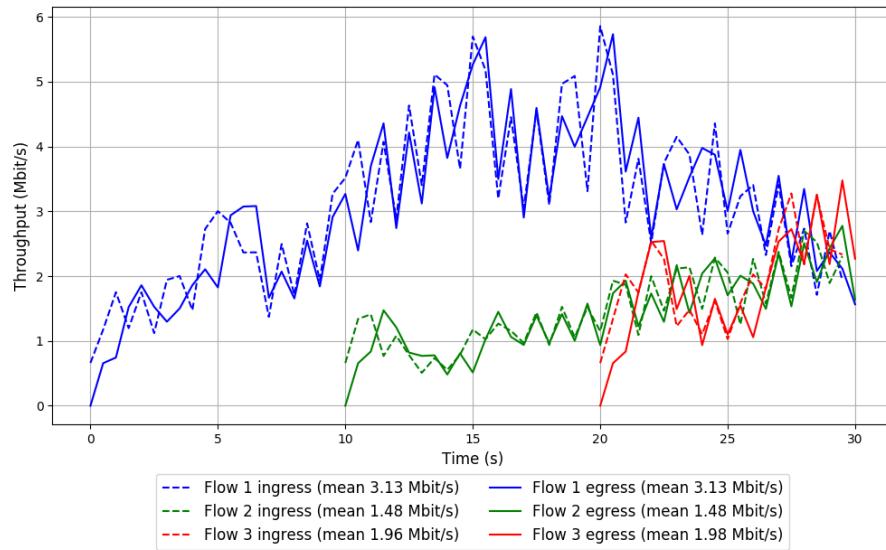


Run 1: Statistics of Sprout

```
Start at: 2019-03-27 12:06:15
End at: 2019-03-27 12:06:45
Local clock offset: -3.654 ms
Remote clock offset: 2.671 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 4.75 Mbit/s
95th percentile per-packet one-way delay: 97.134 ms
Loss rate: 0.60%
-- Flow 1:
Average throughput: 3.13 Mbit/s
95th percentile per-packet one-way delay: 97.520 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 1.48 Mbit/s
95th percentile per-packet one-way delay: 95.563 ms
Loss rate: 1.15%
-- Flow 3:
Average throughput: 1.98 Mbit/s
95th percentile per-packet one-way delay: 95.971 ms
Loss rate: 0.18%
```

## Run 1: Report of Sprout — Data Link

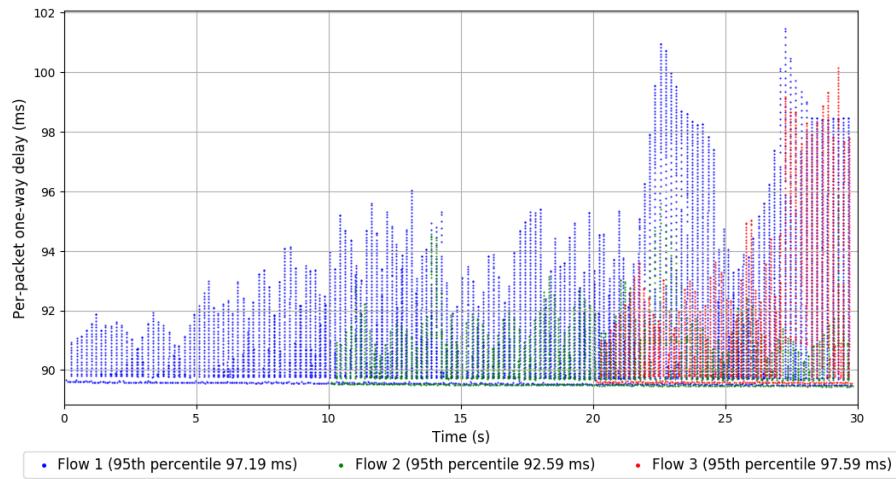
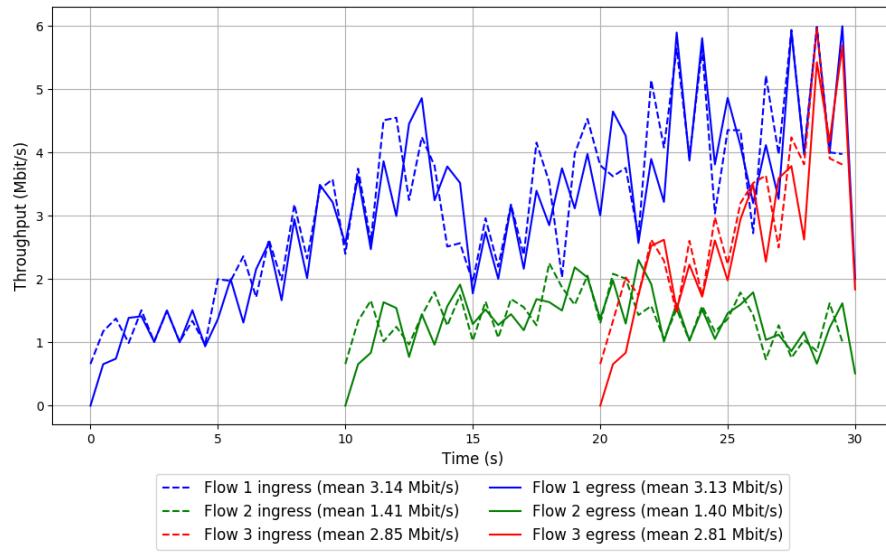


Run 2: Statistics of Sprout

```
Start at: 2019-03-27 12:33:14
End at: 2019-03-27 12:33:44
Local clock offset: -5.393 ms
Remote clock offset: 4.95 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 4.97 Mbit/s
95th percentile per-packet one-way delay: 96.928 ms
Loss rate: 1.49%
-- Flow 1:
Average throughput: 3.13 Mbit/s
95th percentile per-packet one-way delay: 97.185 ms
Loss rate: 1.05%
-- Flow 2:
Average throughput: 1.40 Mbit/s
95th percentile per-packet one-way delay: 92.588 ms
Loss rate: 0.90%
-- Flow 3:
Average throughput: 2.81 Mbit/s
95th percentile per-packet one-way delay: 97.586 ms
Loss rate: 3.51%
```

Run 2: Report of Sprout — Data Link

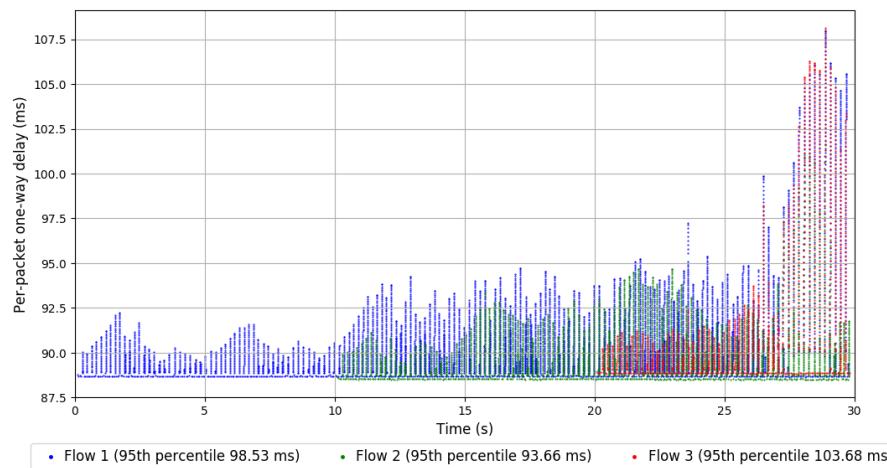
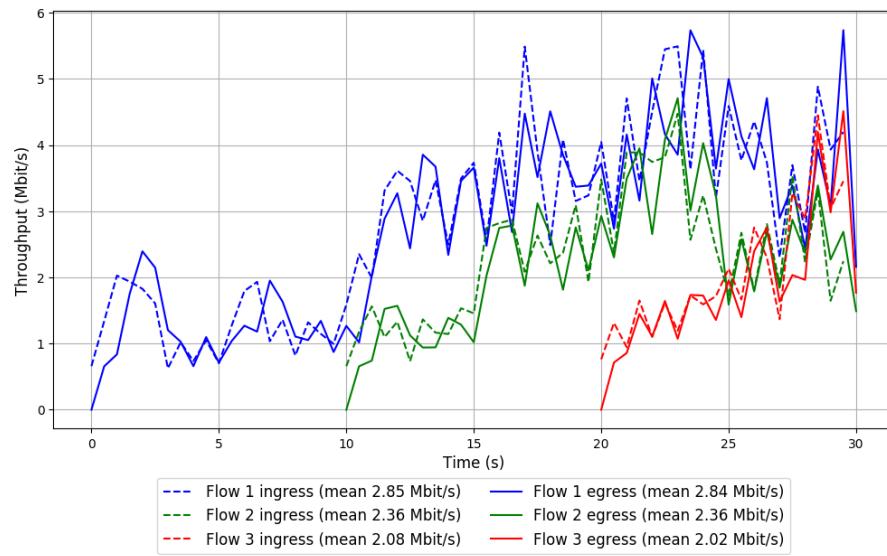


Run 3: Statistics of Sprout

```
Start at: 2019-03-27 13:00:21
End at: 2019-03-27 13:00:51
Local clock offset: -4.16 ms
Remote clock offset: 3.822 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 5.06 Mbit/s
95th percentile per-packet one-way delay: 98.798 ms
Loss rate: 1.47%
-- Flow 1:
Average throughput: 2.84 Mbit/s
95th percentile per-packet one-way delay: 98.527 ms
Loss rate: 1.20%
-- Flow 2:
Average throughput: 2.36 Mbit/s
95th percentile per-packet one-way delay: 93.656 ms
Loss rate: 0.81%
-- Flow 3:
Average throughput: 2.02 Mbit/s
95th percentile per-packet one-way delay: 103.681 ms
Loss rate: 4.13%
```

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

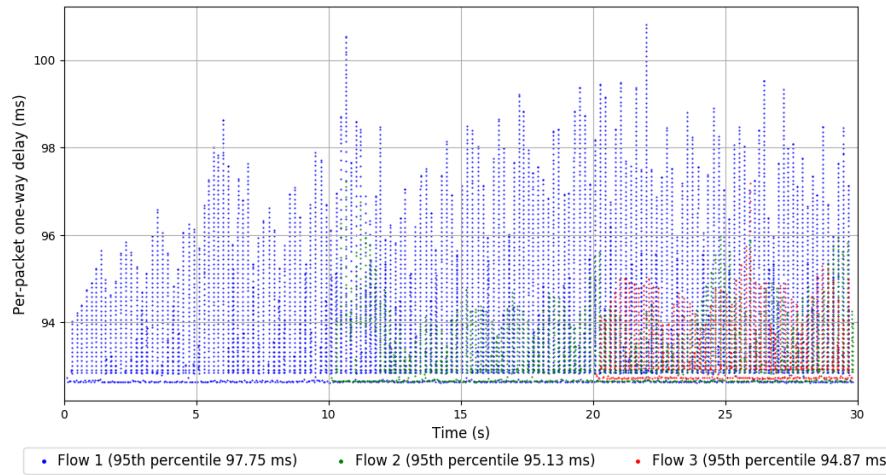
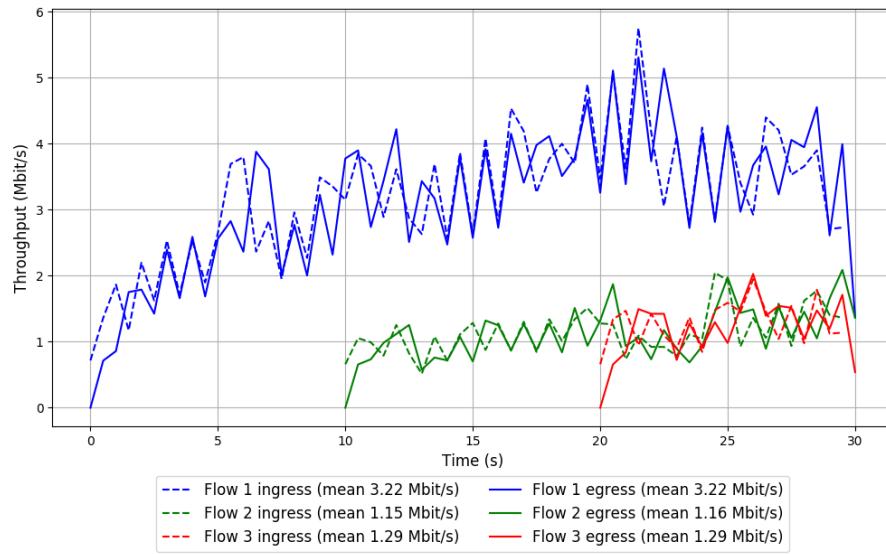


Run 4: Statistics of Sprout

```
Start at: 2019-03-27 13:27:24
End at: 2019-03-27 13:27:54
Local clock offset: -4.47 ms
Remote clock offset: 0.423 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 4.41 Mbit/s
95th percentile per-packet one-way delay: 97.437 ms
Loss rate: 0.75%
-- Flow 1:
Average throughput: 3.22 Mbit/s
95th percentile per-packet one-way delay: 97.749 ms
Loss rate: 0.71%
-- Flow 2:
Average throughput: 1.16 Mbit/s
95th percentile per-packet one-way delay: 95.128 ms
Loss rate: 0.01%
-- Flow 3:
Average throughput: 1.29 Mbit/s
95th percentile per-packet one-way delay: 94.870 ms
Loss rate: 2.35%
```

## Run 4: Report of Sprout — Data Link

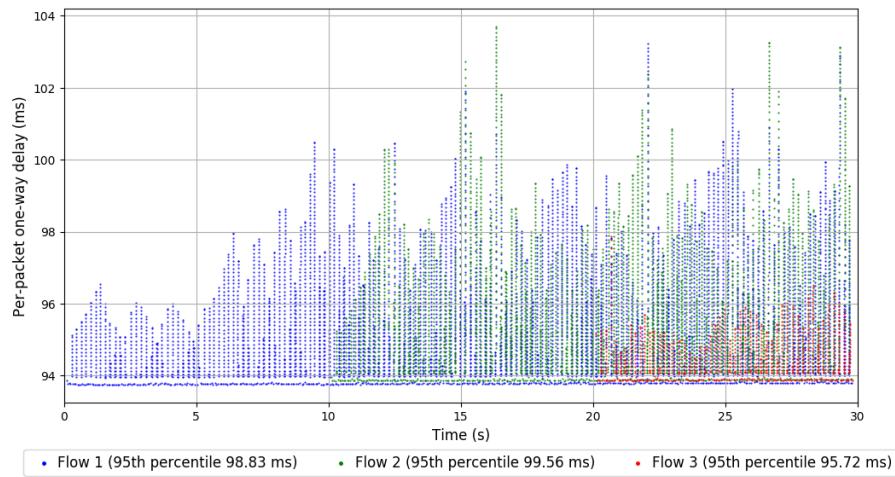
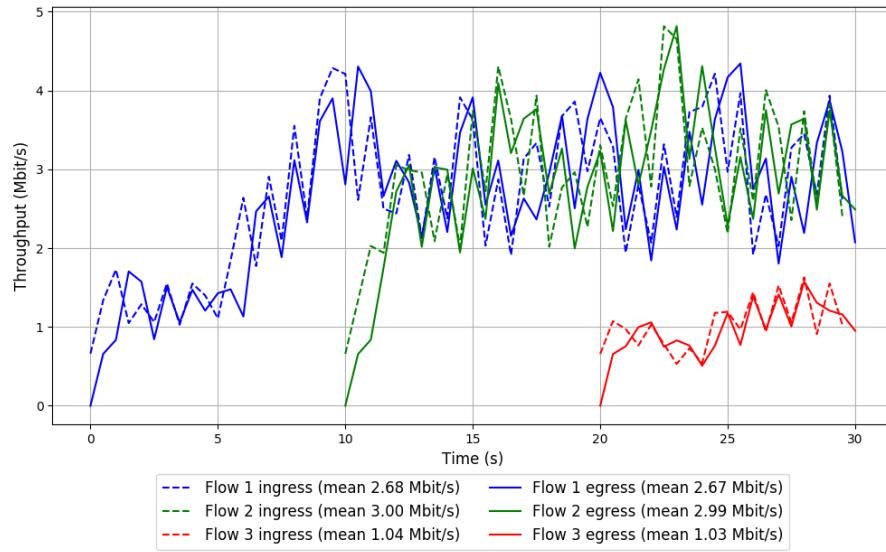


Run 5: Statistics of Sprout

```
Start at: 2019-03-27 13:54:24
End at: 2019-03-27 13:54:54
Local clock offset: -5.17 ms
Remote clock offset: 0.125 ms

# Below is generated by plot.py at 2019-03-27 14:25:10
# Datalink statistics
-- Total of 3 flows:
Average throughput: 4.99 Mbit/s
95th percentile per-packet one-way delay: 99.038 ms
Loss rate: 0.97%
-- Flow 1:
Average throughput: 2.67 Mbit/s
95th percentile per-packet one-way delay: 98.834 ms
Loss rate: 0.78%
-- Flow 2:
Average throughput: 2.99 Mbit/s
95th percentile per-packet one-way delay: 99.562 ms
Loss rate: 0.98%
-- Flow 3:
Average throughput: 1.03 Mbit/s
95th percentile per-packet one-way delay: 95.724 ms
Loss rate: 2.44%
```

## Run 5: Report of Sprout — Data Link

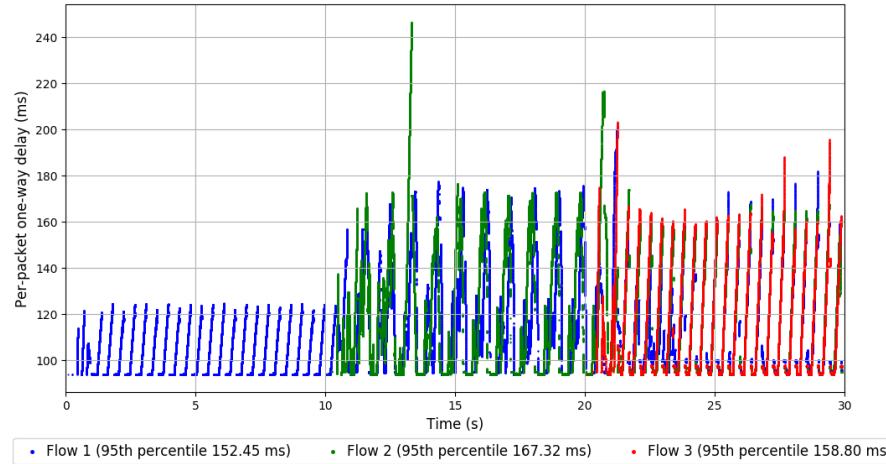
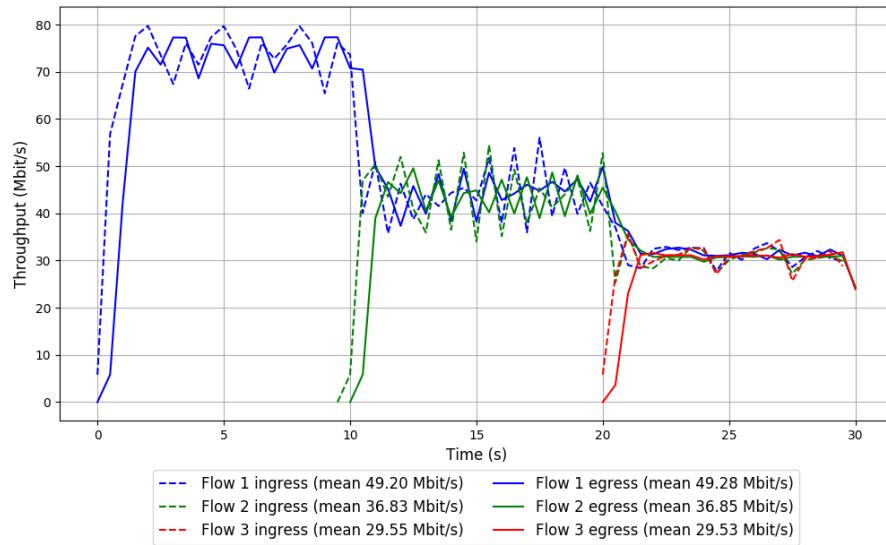


Run 1: Statistics of TaoVA-100x

```
Start at: 2019-03-27 12:07:28
End at: 2019-03-27 12:07:58
Local clock offset: -2.866 ms
Remote clock offset: 2.423 ms

# Below is generated by plot.py at 2019-03-27 14:26:11
# Datalink statistics
-- Total of 3 flows:
Average throughput: 83.48 Mbit/s
95th percentile per-packet one-way delay: 159.470 ms
Loss rate: 0.70%
-- Flow 1:
Average throughput: 49.28 Mbit/s
95th percentile per-packet one-way delay: 152.448 ms
Loss rate: 0.42%
-- Flow 2:
Average throughput: 36.85 Mbit/s
95th percentile per-packet one-way delay: 167.318 ms
Loss rate: 0.82%
-- Flow 3:
Average throughput: 29.53 Mbit/s
95th percentile per-packet one-way delay: 158.804 ms
Loss rate: 1.81%
```

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

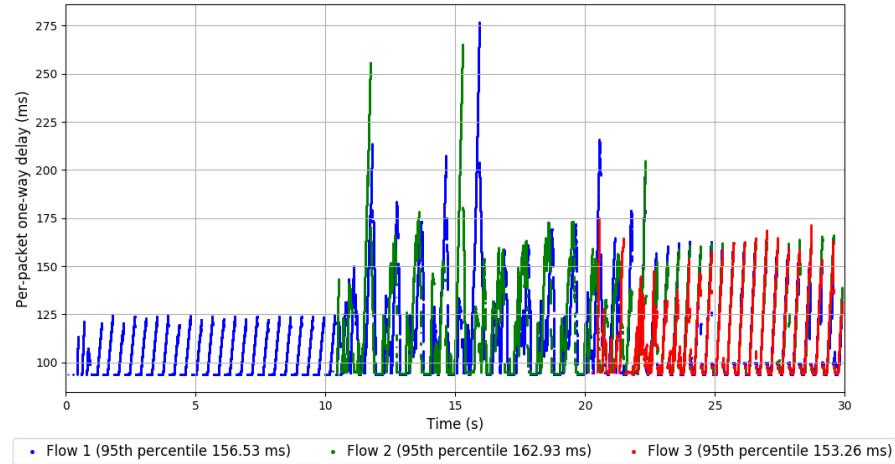
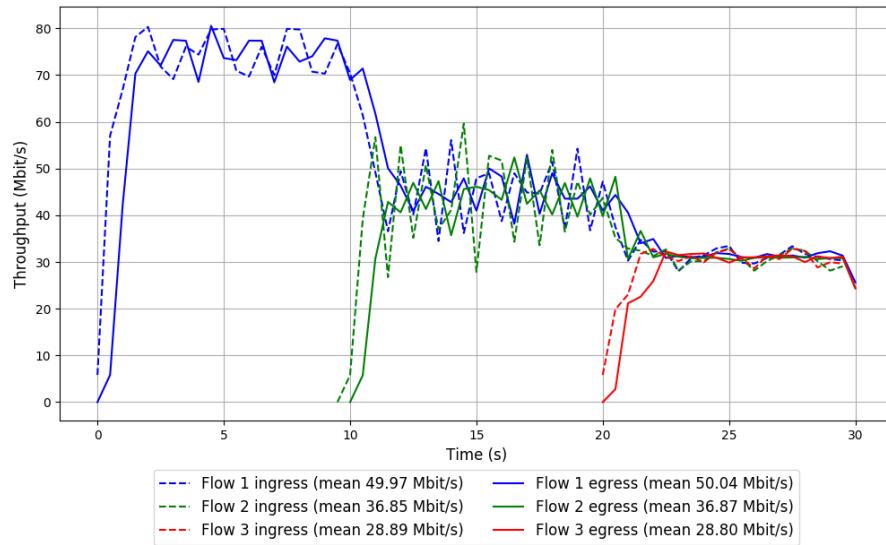


Run 2: Statistics of TaoVA-100x

```
Start at: 2019-03-27 12:34:27
End at: 2019-03-27 12:34:57
Local clock offset: -5.383 ms
Remote clock offset: 0.464 ms

# Below is generated by plot.py at 2019-03-27 14:26:13
# Datalink statistics
-- Total of 3 flows:
Average throughput: 84.00 Mbit/s
95th percentile per-packet one-way delay: 158.637 ms
Loss rate: 0.72%
-- Flow 1:
Average throughput: 50.04 Mbit/s
95th percentile per-packet one-way delay: 156.527 ms
Loss rate: 0.43%
-- Flow 2:
Average throughput: 36.87 Mbit/s
95th percentile per-packet one-way delay: 162.927 ms
Loss rate: 0.79%
-- Flow 3:
Average throughput: 28.80 Mbit/s
95th percentile per-packet one-way delay: 153.261 ms
Loss rate: 2.03%
```

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

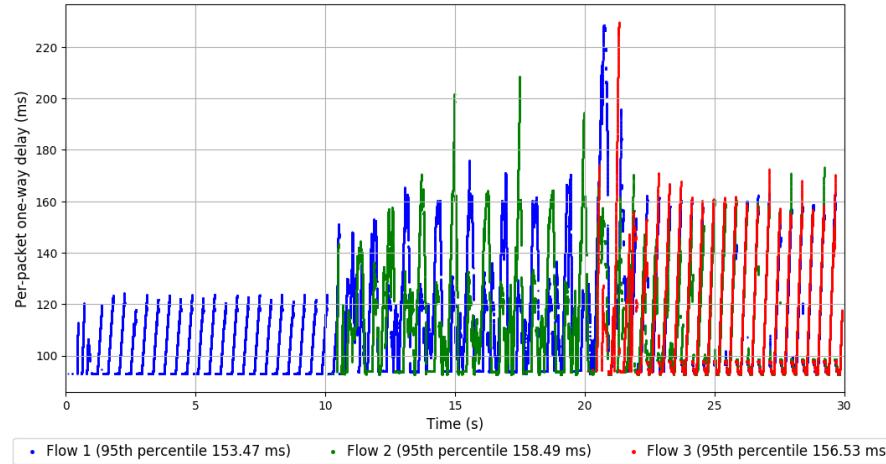
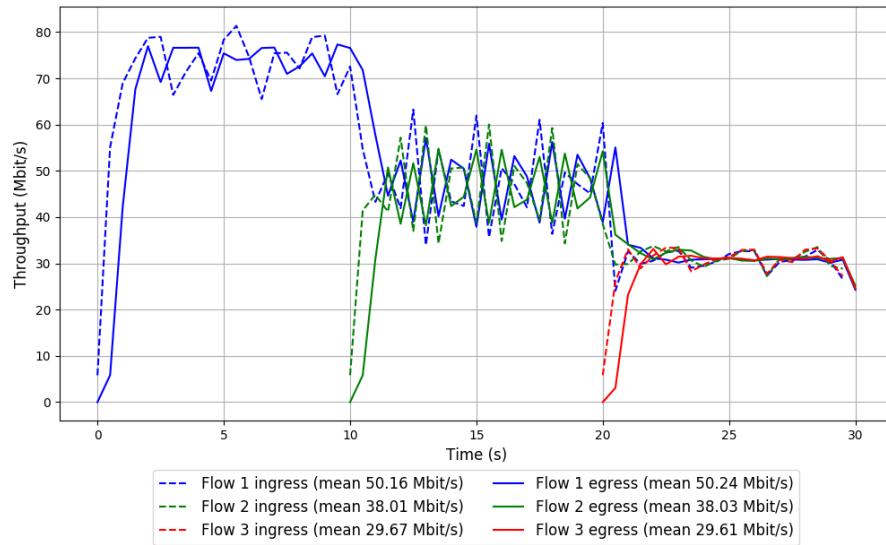


Run 3: Statistics of TaoVA-100x

```
Start at: 2019-03-27 13:01:34
End at: 2019-03-27 13:02:04
Local clock offset: -4.932 ms
Remote clock offset: -0.941 ms

# Below is generated by plot.py at 2019-03-27 14:26:17
# Datalink statistics
-- Total of 3 flows:
Average throughput: 85.23 Mbit/s
95th percentile per-packet one-way delay: 155.498 ms
Loss rate: 0.71%
-- Flow 1:
Average throughput: 50.24 Mbit/s
95th percentile per-packet one-way delay: 153.474 ms
Loss rate: 0.42%
-- Flow 2:
Average throughput: 38.03 Mbit/s
95th percentile per-packet one-way delay: 158.488 ms
Loss rate: 0.81%
-- Flow 3:
Average throughput: 29.61 Mbit/s
95th percentile per-packet one-way delay: 156.534 ms
Loss rate: 1.93%
```

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

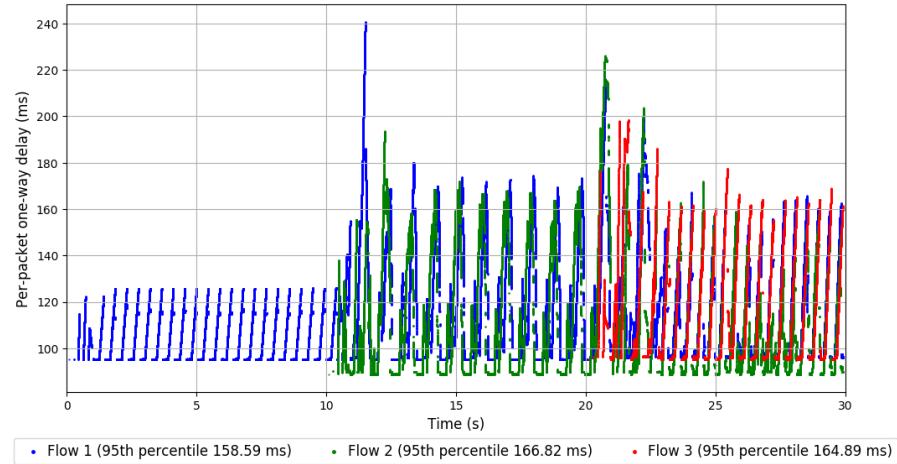
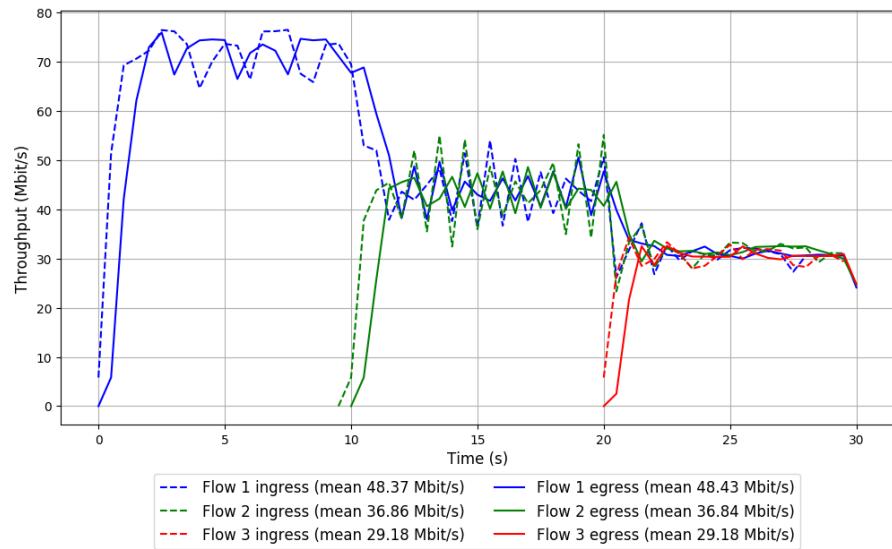


Run 4: Statistics of TaoVA-100x

```
Start at: 2019-03-27 13:28:37
End at: 2019-03-27 13:29:07
Local clock offset: -4.446 ms
Remote clock offset: 4.188 ms

# Below is generated by plot.py at 2019-03-27 14:26:19
# Datalink statistics
-- Total of 3 flows:
Average throughput: 82.51 Mbit/s
95th percentile per-packet one-way delay: 162.568 ms
Loss rate: 0.76%
-- Flow 1:
Average throughput: 48.43 Mbit/s
95th percentile per-packet one-way delay: 158.587 ms
Loss rate: 0.47%
-- Flow 2:
Average throughput: 36.84 Mbit/s
95th percentile per-packet one-way delay: 166.825 ms
Loss rate: 0.92%
-- Flow 3:
Average throughput: 29.18 Mbit/s
95th percentile per-packet one-way delay: 164.887 ms
Loss rate: 1.79%
```

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

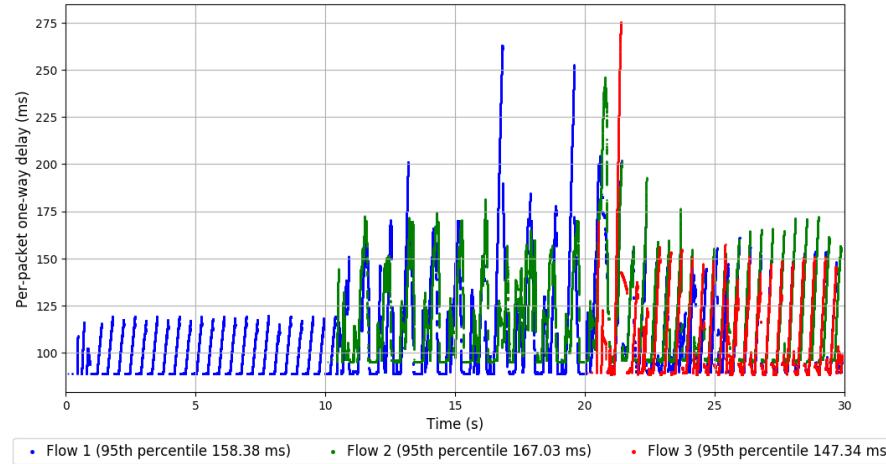
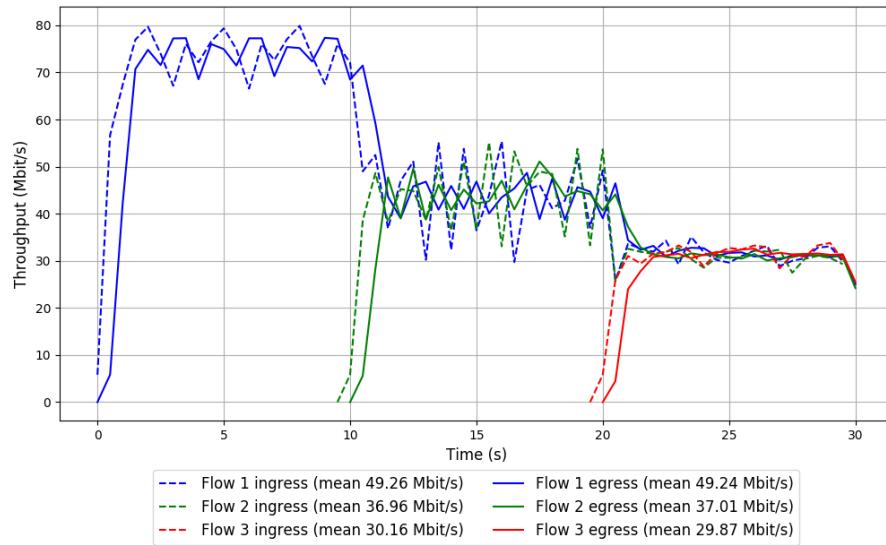


Run 5: Statistics of TaoVA-100x

```
Start at: 2019-03-27 13:55:38
End at: 2019-03-27 13:56:08
Local clock offset: -4.4 ms
Remote clock offset: 6.189 ms

# Below is generated by plot.py at 2019-03-27 14:26:26
# Datalink statistics
-- Total of 3 flows:
Average throughput: 83.67 Mbit/s
95th percentile per-packet one-way delay: 161.438 ms
Loss rate: 0.81%
-- Flow 1:
Average throughput: 49.24 Mbit/s
95th percentile per-packet one-way delay: 158.384 ms
Loss rate: 0.51%
-- Flow 2:
Average throughput: 37.01 Mbit/s
95th percentile per-packet one-way delay: 167.034 ms
Loss rate: 0.78%
-- Flow 3:
Average throughput: 29.87 Mbit/s
95th percentile per-packet one-way delay: 147.342 ms
Loss rate: 2.38%
```

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

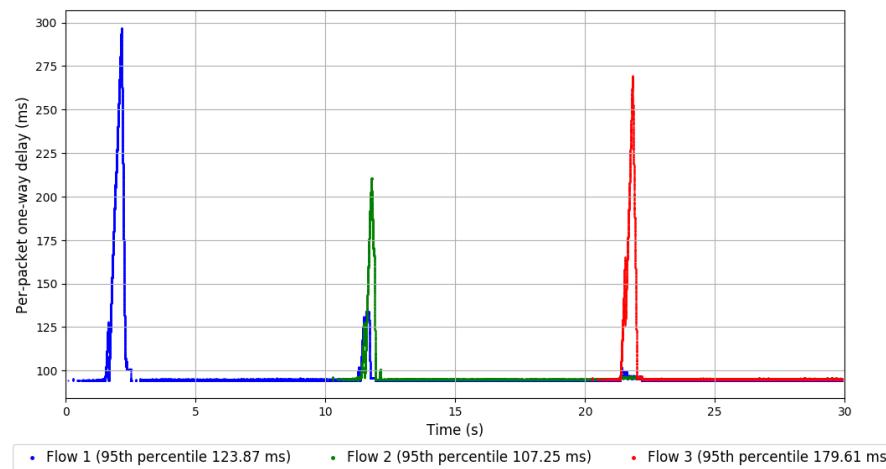
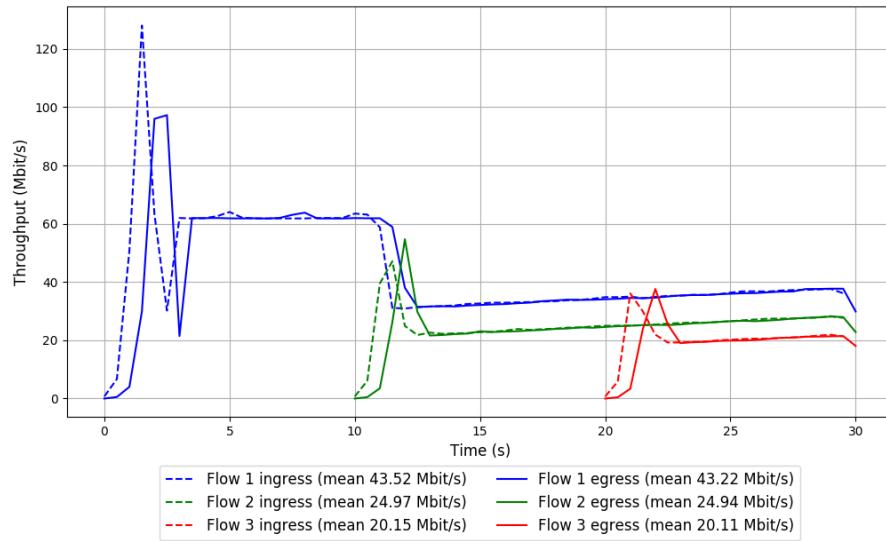


Run 1: Statistics of TCP Vegas

```
Start at: 2019-03-27 12:12:35
End at: 2019-03-27 12:13:05
Local clock offset: -2.925 ms
Remote clock offset: 1.675 ms

# Below is generated by plot.py at 2019-03-27 14:26:26
# Datalink statistics
-- Total of 3 flows:
Average throughput: 66.38 Mbit/s
95th percentile per-packet one-way delay: 127.710 ms
Loss rate: 1.28%
-- Flow 1:
Average throughput: 43.22 Mbit/s
95th percentile per-packet one-way delay: 123.867 ms
Loss rate: 1.27%
-- Flow 2:
Average throughput: 24.94 Mbit/s
95th percentile per-packet one-way delay: 107.252 ms
Loss rate: 1.01%
-- Flow 3:
Average throughput: 20.11 Mbit/s
95th percentile per-packet one-way delay: 179.606 ms
Loss rate: 1.96%
```

Run 1: Report of TCP Vegas — Data Link

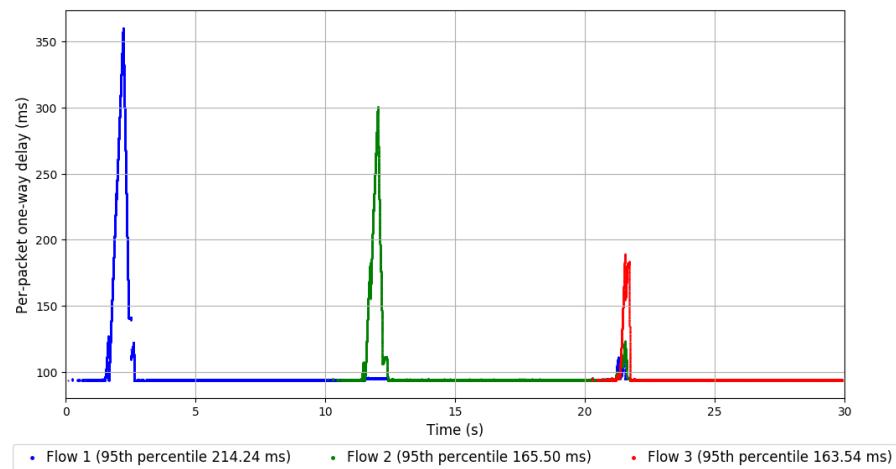
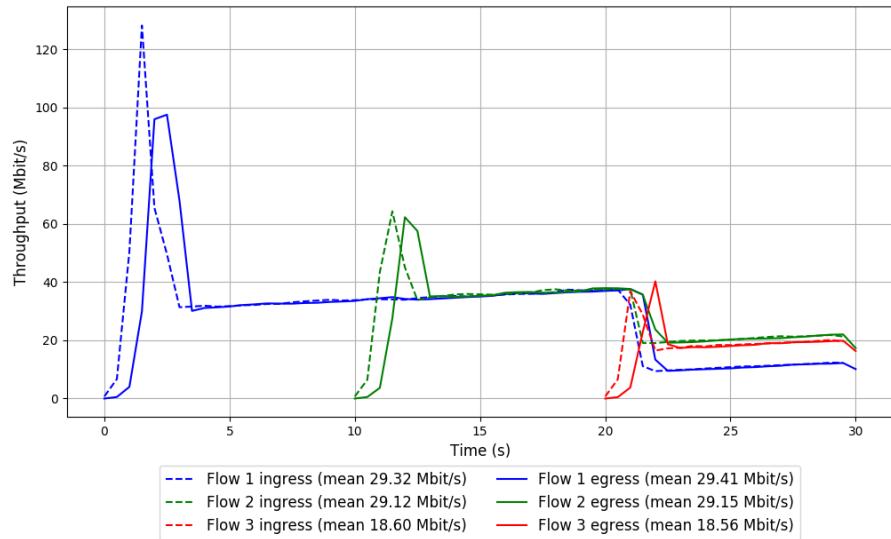


Run 2: Statistics of TCP Vegas

```
Start at: 2019-03-27 12:39:35
End at: 2019-03-27 12:40:05
Local clock offset: -4.798 ms
Remote clock offset: 0.572 ms

# Below is generated by plot.py at 2019-03-27 14:26:26
# Datalink statistics
-- Total of 3 flows:
Average throughput: 54.88 Mbit/s
95th percentile per-packet one-way delay: 180.402 ms
Loss rate: 0.63%
-- Flow 1:
Average throughput: 29.41 Mbit/s
95th percentile per-packet one-way delay: 214.238 ms
Loss rate: 0.29%
-- Flow 2:
Average throughput: 29.15 Mbit/s
95th percentile per-packet one-way delay: 165.504 ms
Loss rate: 0.74%
-- Flow 3:
Average throughput: 18.56 Mbit/s
95th percentile per-packet one-way delay: 163.542 ms
Loss rate: 1.95%
```

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

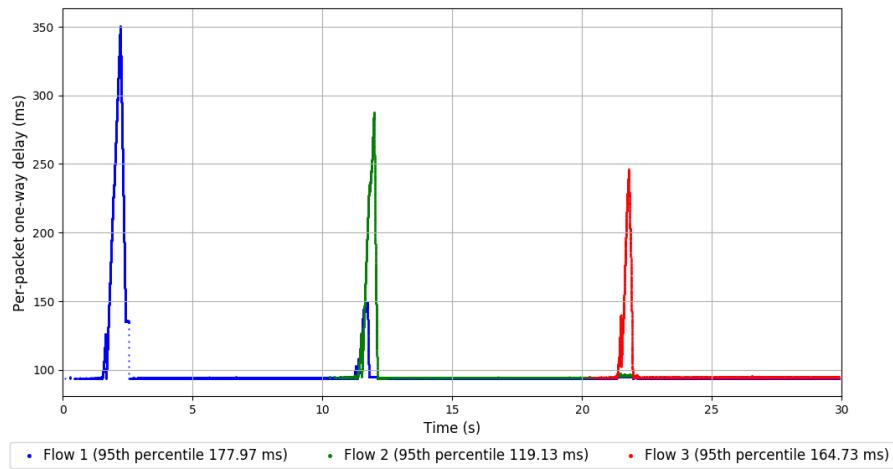
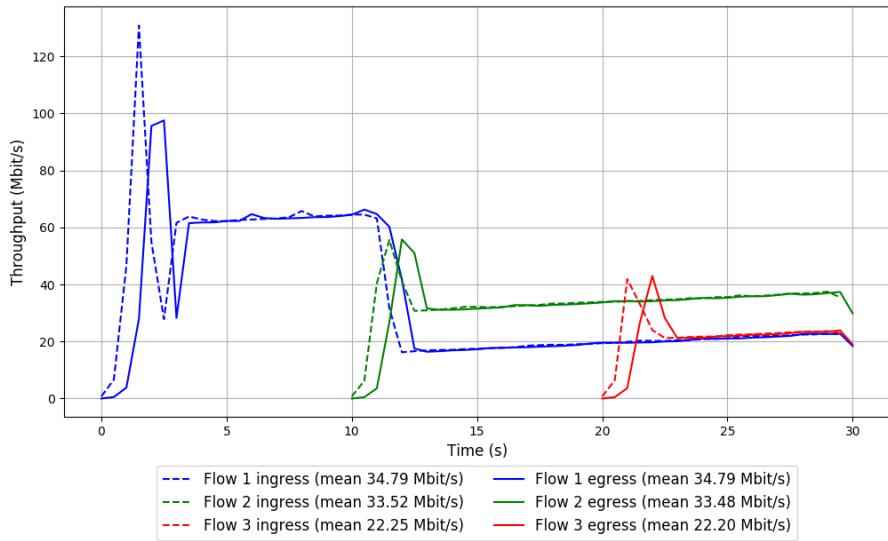


Run 3: Statistics of TCP Vegas

```
Start at: 2019-03-27 13:06:43
End at: 2019-03-27 13:07:13
Local clock offset: -4.966 ms
Remote clock offset: -1.786 ms

# Below is generated by plot.py at 2019-03-27 14:26:26
# Datalink statistics
-- Total of 3 flows:
Average throughput: 64.32 Mbit/s
95th percentile per-packet one-way delay: 156.531 ms
Loss rate: 0.87%
-- Flow 1:
Average throughput: 34.79 Mbit/s
95th percentile per-packet one-way delay: 177.969 ms
Loss rate: 0.56%
-- Flow 2:
Average throughput: 33.48 Mbit/s
95th percentile per-packet one-way delay: 119.127 ms
Loss rate: 0.99%
-- Flow 3:
Average throughput: 22.20 Mbit/s
95th percentile per-packet one-way delay: 164.733 ms
Loss rate: 1.93%
```

Run 3: Report of TCP Vegas — Data Link

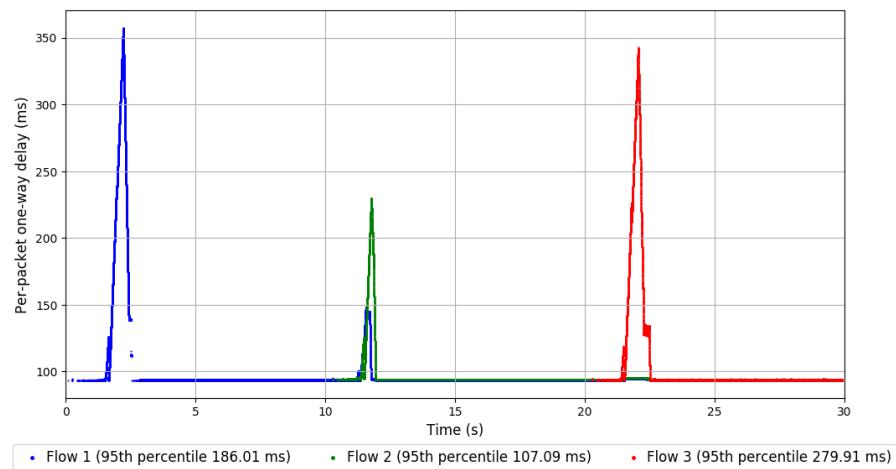
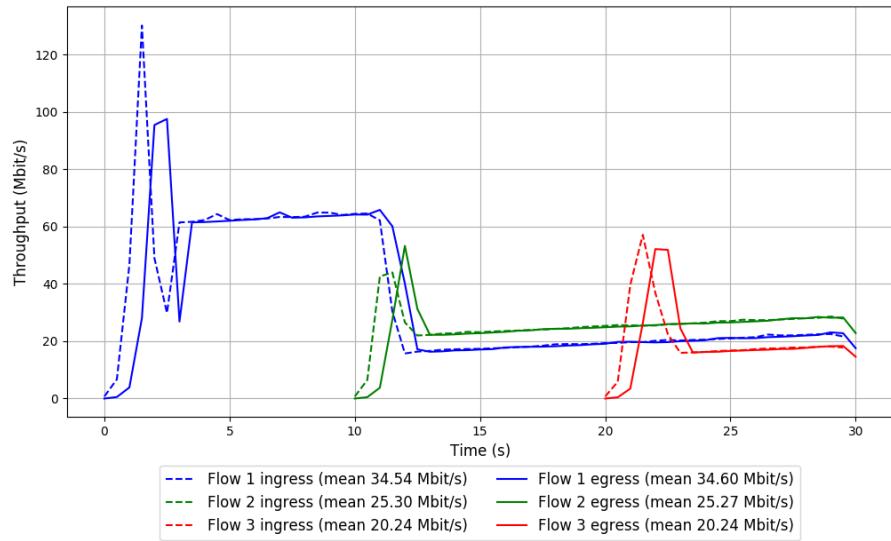


Run 4: Statistics of TCP Vegas

```
Start at: 2019-03-27 13:33:45
End at: 2019-03-27 13:34:15
Local clock offset: -3.601 ms
Remote clock offset: 0.343 ms

# Below is generated by plot.py at 2019-03-27 14:26:26
# Datalink statistics
-- Total of 3 flows:
Average throughput: 58.02 Mbit/s
95th percentile per-packet one-way delay: 187.953 ms
Loss rate: 0.73%
-- Flow 1:
Average throughput: 34.60 Mbit/s
95th percentile per-packet one-way delay: 186.007 ms
Loss rate: 0.41%
-- Flow 2:
Average throughput: 25.27 Mbit/s
95th percentile per-packet one-way delay: 107.092 ms
Loss rate: 1.00%
-- Flow 3:
Average throughput: 20.24 Mbit/s
95th percentile per-packet one-way delay: 279.914 ms
Loss rate: 1.73%
```

Run 4: Report of TCP Vegas — Data Link

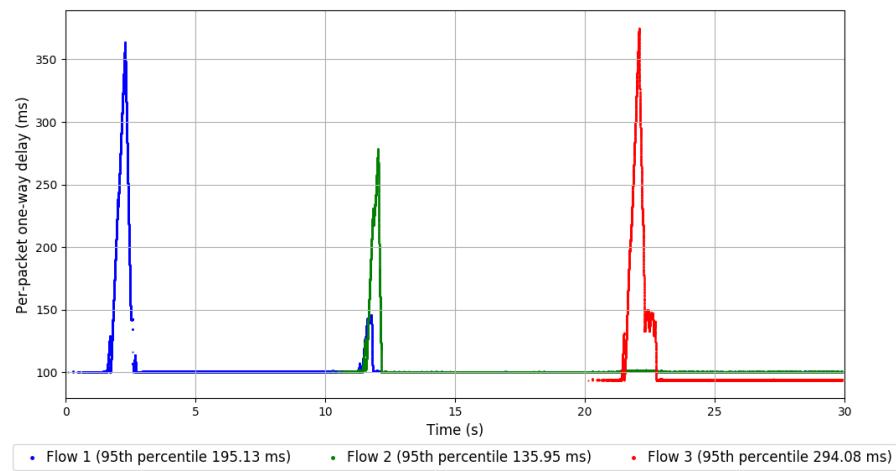
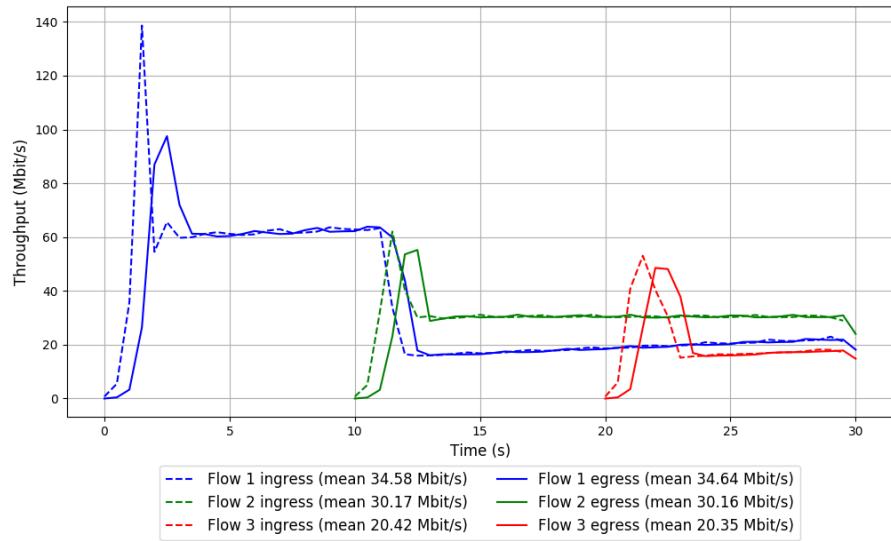


Run 5: Statistics of TCP Vegas

```
Start at: 2019-03-27 14:00:45
End at: 2019-03-27 14:01:15
Local clock offset: -4.618 ms
Remote clock offset: 1.468 ms

# Below is generated by plot.py at 2019-03-27 14:26:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 61.35 Mbit/s
95th percentile per-packet one-way delay: 204.851 ms
Loss rate: 0.77%
-- Flow 1:
Average throughput: 34.64 Mbit/s
95th percentile per-packet one-way delay: 195.129 ms
Loss rate: 0.42%
-- Flow 2:
Average throughput: 30.16 Mbit/s
95th percentile per-packet one-way delay: 135.949 ms
Loss rate: 0.93%
-- Flow 3:
Average throughput: 20.35 Mbit/s
95th percentile per-packet one-way delay: 294.076 ms
Loss rate: 2.08%
```

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

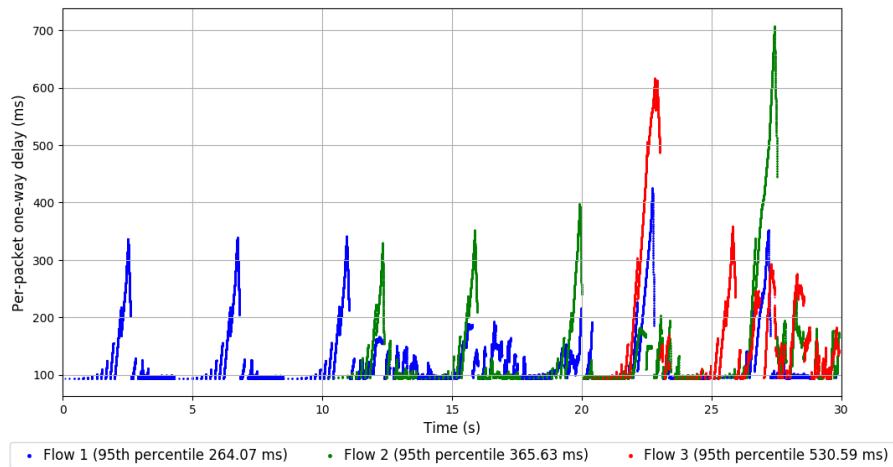
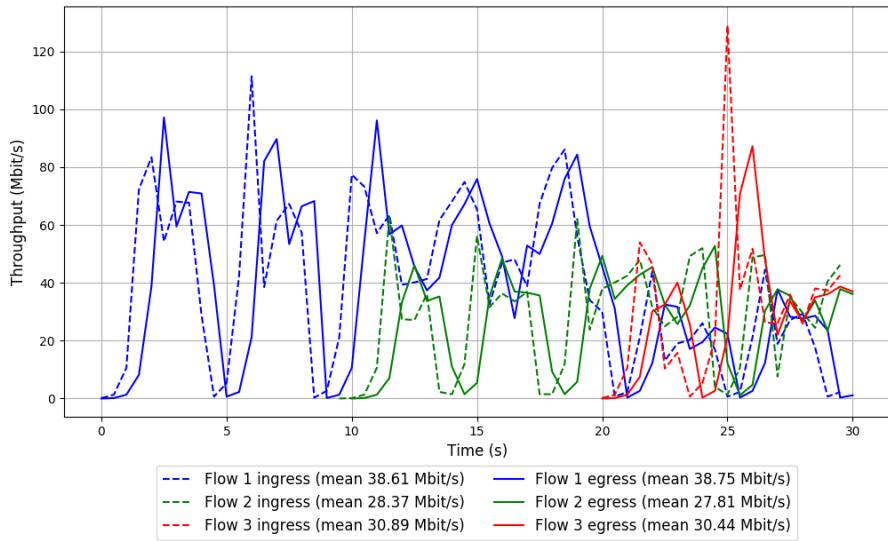


Run 1: Statistics of Verus

```
Start at: 2019-03-27 12:19:06
End at: 2019-03-27 12:19:36
Local clock offset: -3.404 ms
Remote clock offset: 2.973 ms

# Below is generated by plot.py at 2019-03-27 14:26:45
# Datalink statistics
-- Total of 3 flows:
Average throughput: 67.09 Mbit/s
95th percentile per-packet one-way delay: 314.866 ms
Loss rate: 1.28%
-- Flow 1:
Average throughput: 38.75 Mbit/s
95th percentile per-packet one-way delay: 264.072 ms
Loss rate: 0.21%
-- Flow 2:
Average throughput: 27.81 Mbit/s
95th percentile per-packet one-way delay: 365.631 ms
Loss rate: 2.46%
-- Flow 3:
Average throughput: 30.44 Mbit/s
95th percentile per-packet one-way delay: 530.593 ms
Loss rate: 3.11%
```

Run 1: Report of Verus — Data Link

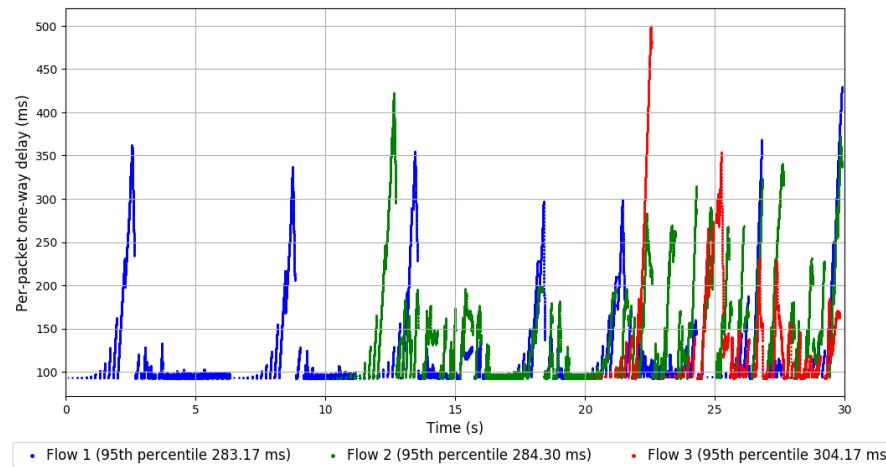
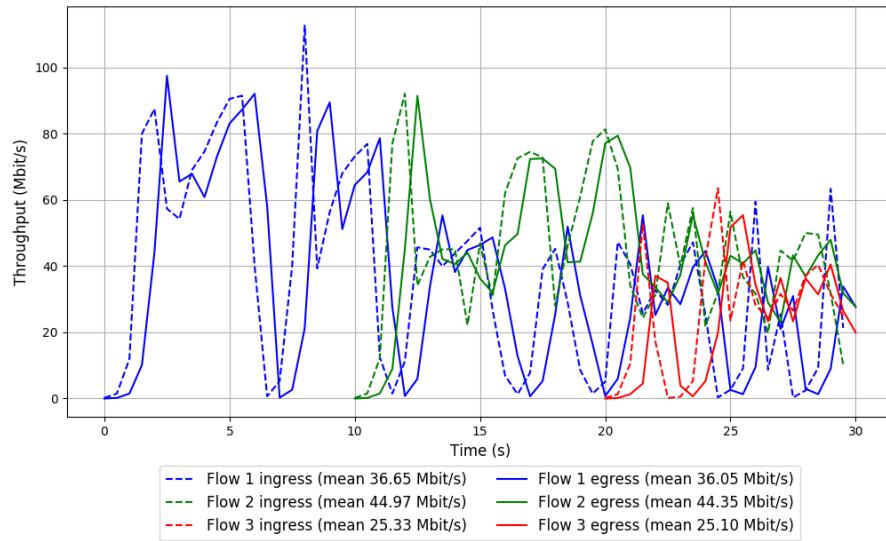


Run 2: Statistics of Verus

```
Start at: 2019-03-27 12:46:06
End at: 2019-03-27 12:46:36
Local clock offset: -5.692 ms
Remote clock offset: -0.019 ms

# Below is generated by plot.py at 2019-03-27 14:26:58
# Datalink statistics
-- Total of 3 flows:
Average throughput: 73.69 Mbit/s
95th percentile per-packet one-way delay: 287.127 ms
Loss rate: 1.29%
-- Flow 1:
Average throughput: 36.05 Mbit/s
95th percentile per-packet one-way delay: 283.167 ms
Loss rate: 1.24%
-- Flow 2:
Average throughput: 44.35 Mbit/s
95th percentile per-packet one-way delay: 284.295 ms
Loss rate: 0.76%
-- Flow 3:
Average throughput: 25.10 Mbit/s
95th percentile per-packet one-way delay: 304.169 ms
Loss rate: 3.38%
```

Run 2: Report of Verus — Data Link

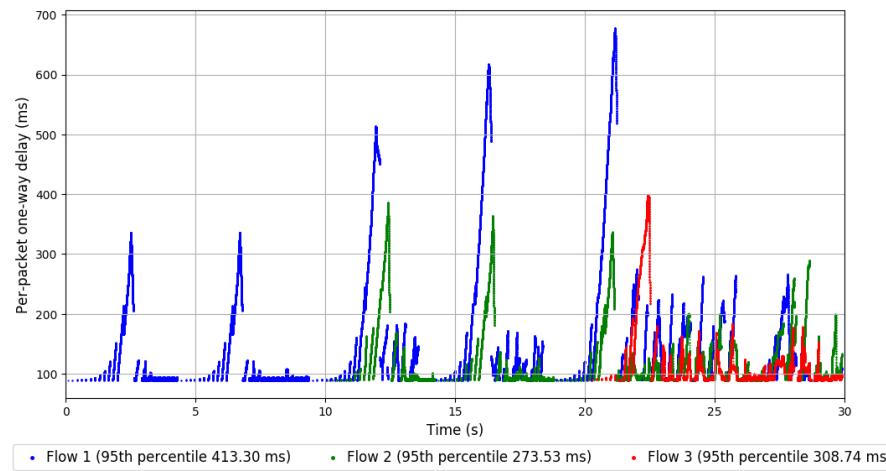
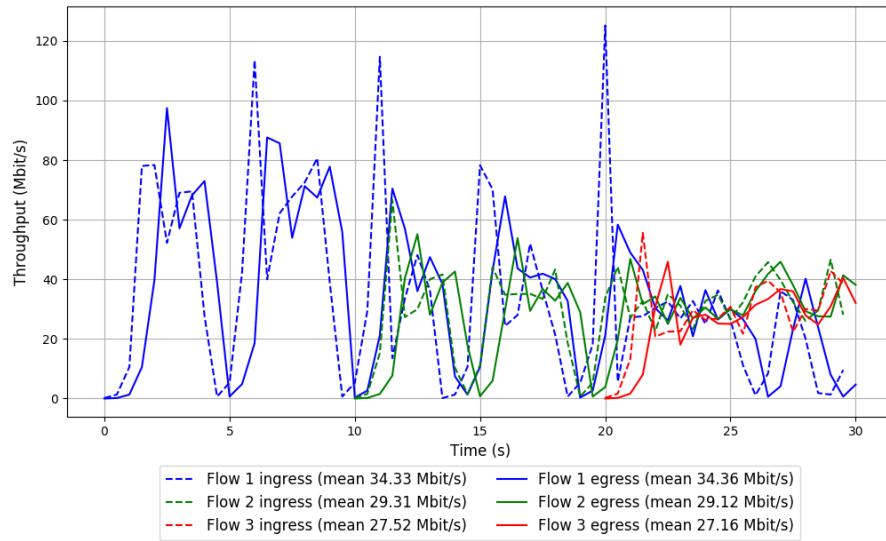


Run 3: Statistics of Verus

```
Start at: 2019-03-27 13:13:15
End at: 2019-03-27 13:13:45
Local clock offset: -4.915 ms
Remote clock offset: 3.633 ms

# Below is generated by plot.py at 2019-03-27 14:26:58
# Datalink statistics
-- Total of 3 flows:
Average throughput: 62.61 Mbit/s
95th percentile per-packet one-way delay: 324.249 ms
Loss rate: 0.95%
-- Flow 1:
Average throughput: 34.36 Mbit/s
95th percentile per-packet one-way delay: 413.295 ms
Loss rate: 0.50%
-- Flow 2:
Average throughput: 29.12 Mbit/s
95th percentile per-packet one-way delay: 273.526 ms
Loss rate: 0.76%
-- Flow 3:
Average throughput: 27.16 Mbit/s
95th percentile per-packet one-way delay: 308.738 ms
Loss rate: 3.01%
```

Run 3: Report of Verus — Data Link

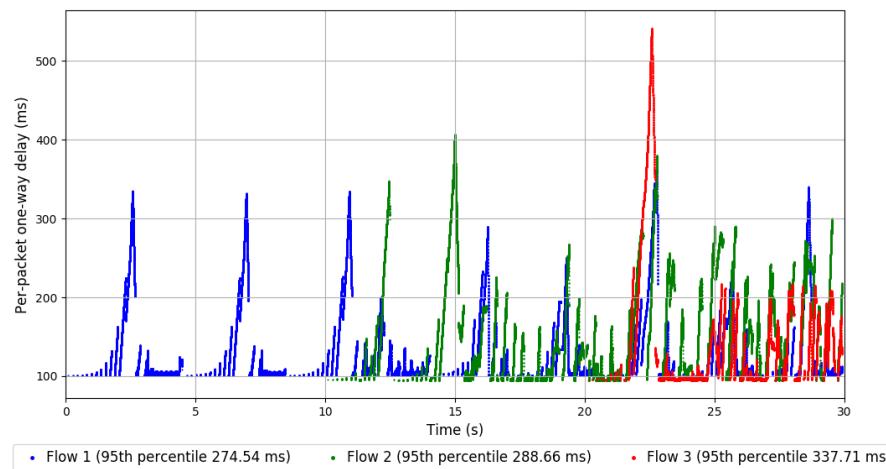
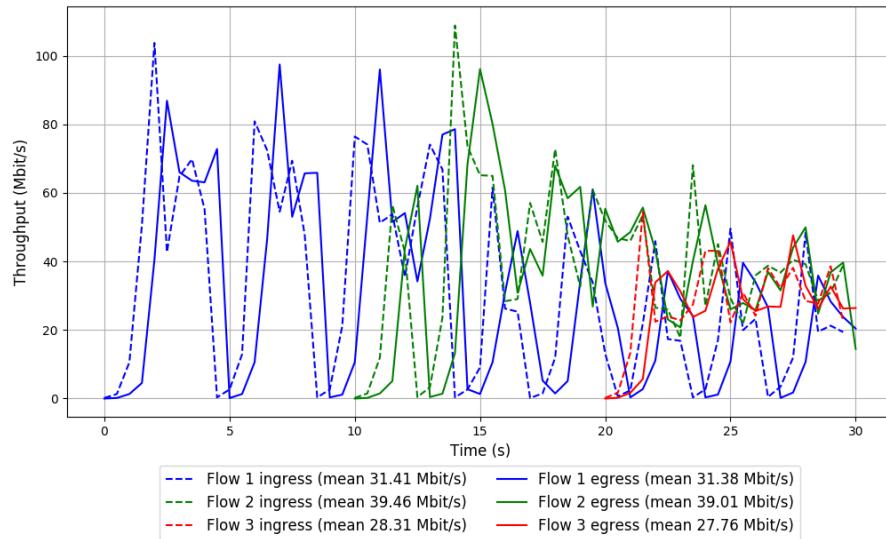


Run 4: Statistics of Verus

```
Start at: 2019-03-27 13:40:15
End at: 2019-03-27 13:40:45
Local clock offset: -4.206 ms
Remote clock offset: -0.797 ms

# Below is generated by plot.py at 2019-03-27 14:26:58
# Datalink statistics
-- Total of 3 flows:
Average throughput: 66.41 Mbit/s
95th percentile per-packet one-way delay: 284.891 ms
Loss rate: 1.24%
-- Flow 1:
Average throughput: 31.38 Mbit/s
95th percentile per-packet one-way delay: 274.538 ms
Loss rate: 0.31%
-- Flow 2:
Average throughput: 39.01 Mbit/s
95th percentile per-packet one-way delay: 288.660 ms
Loss rate: 2.00%
-- Flow 3:
Average throughput: 27.76 Mbit/s
95th percentile per-packet one-way delay: 337.710 ms
Loss rate: 2.23%
```

Run 4: Report of Verus — Data Link

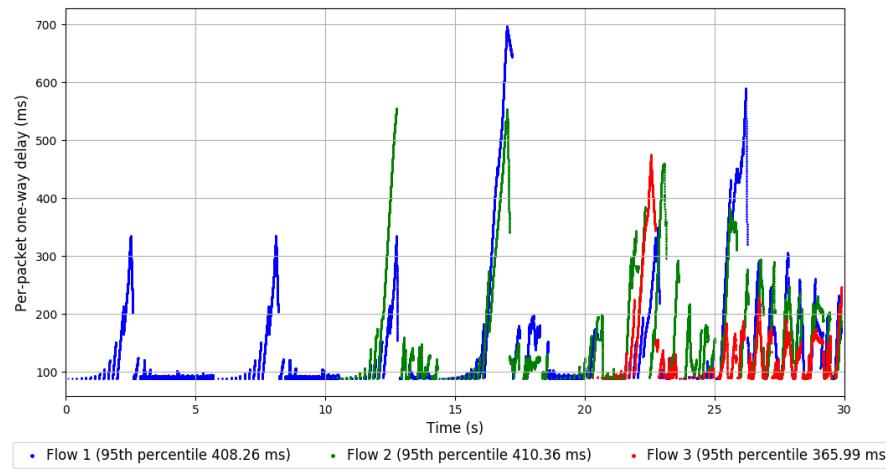
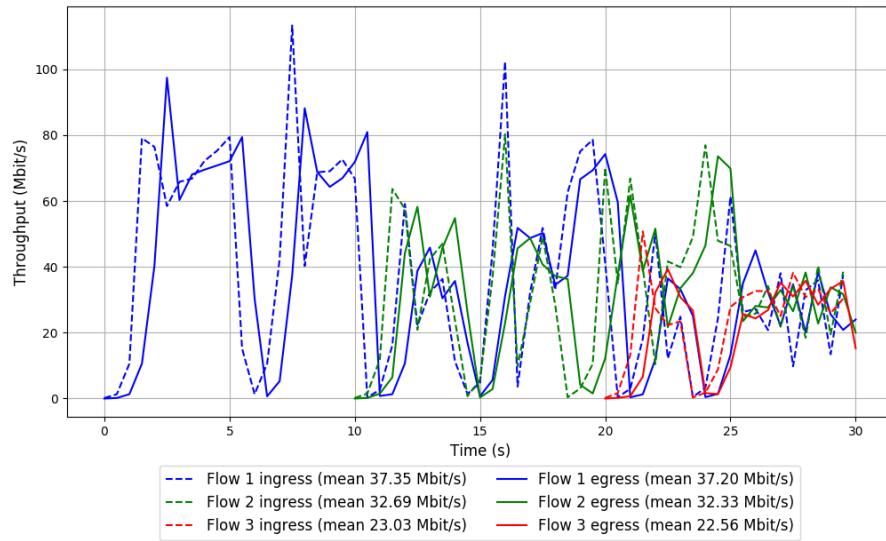


Run 5: Statistics of Verus

```
Start at: 2019-03-27 14:07:16
End at: 2019-03-27 14:07:46
Local clock offset: -5.553 ms
Remote clock offset: 5.363 ms

# Below is generated by plot.py at 2019-03-27 14:27:03
# Datalink statistics
-- Total of 3 flows:
Average throughput: 66.06 Mbit/s
95th percentile per-packet one-way delay: 401.022 ms
Loss rate: 1.58%
-- Flow 1:
Average throughput: 37.20 Mbit/s
95th percentile per-packet one-way delay: 408.256 ms
Loss rate: 0.94%
-- Flow 2:
Average throughput: 32.33 Mbit/s
95th percentile per-packet one-way delay: 410.363 ms
Loss rate: 1.93%
-- Flow 3:
Average throughput: 22.56 Mbit/s
95th percentile per-packet one-way delay: 365.992 ms
Loss rate: 3.68%
```

Run 5: Report of Verus — Data Link

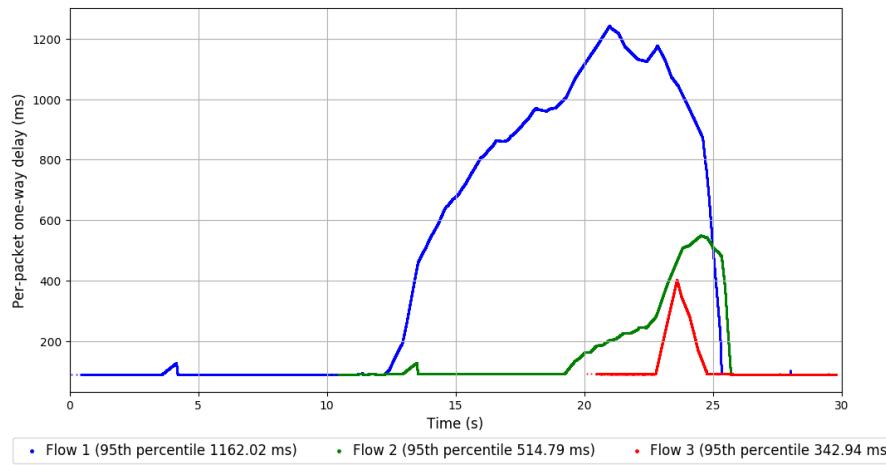
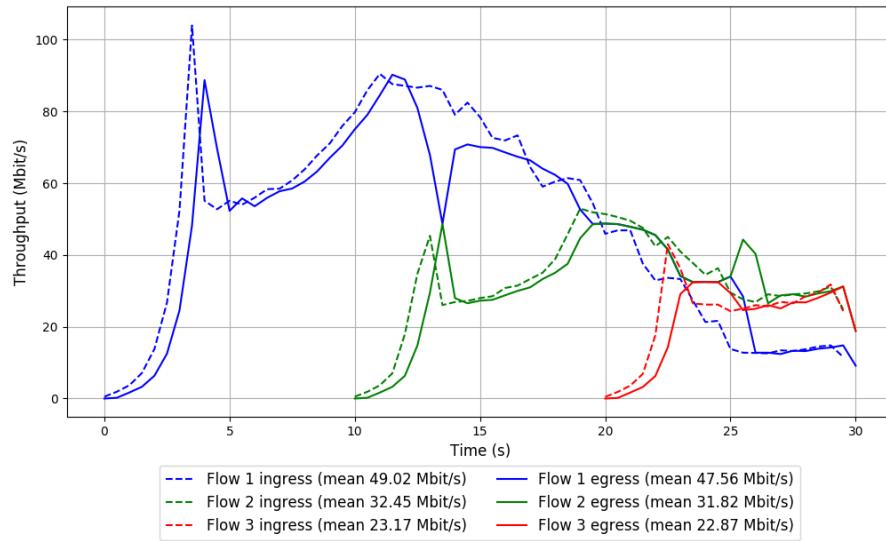


```
Run 1: Statistics of PCC-Vivace
```

```
Start at: 2019-03-27 12:01:01
End at: 2019-03-27 12:01:31
Local clock offset: -2.856 ms
Remote clock offset: 6.366 ms

# Below is generated by plot.py at 2019-03-27 14:27:15
# Datalink statistics
-- Total of 3 flows:
Average throughput: 76.13 Mbit/s
95th percentile per-packet one-way delay: 1132.466 ms
Loss rate: 3.27%
-- Flow 1:
Average throughput: 47.56 Mbit/s
95th percentile per-packet one-way delay: 1162.017 ms
Loss rate: 3.54%
-- Flow 2:
Average throughput: 31.82 Mbit/s
95th percentile per-packet one-way delay: 514.792 ms
Loss rate: 2.78%
-- Flow 3:
Average throughput: 22.87 Mbit/s
95th percentile per-packet one-way delay: 342.938 ms
Loss rate: 2.98%
```

Run 1: Report of PCC-Vivace — Data Link

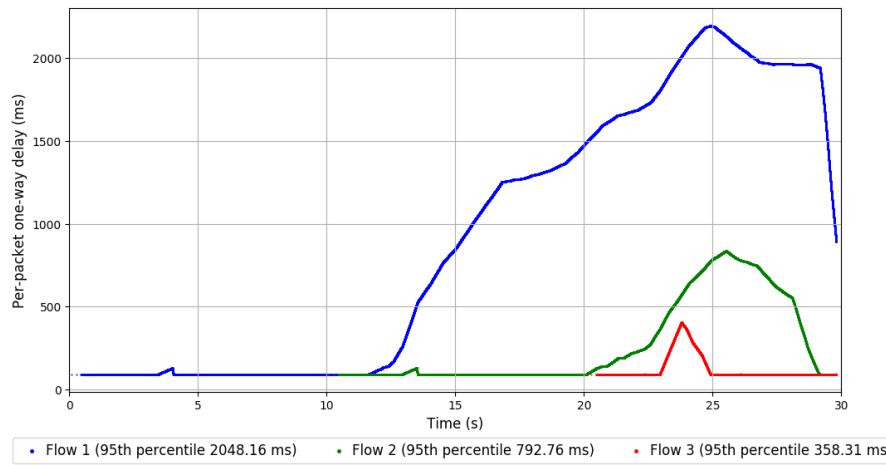
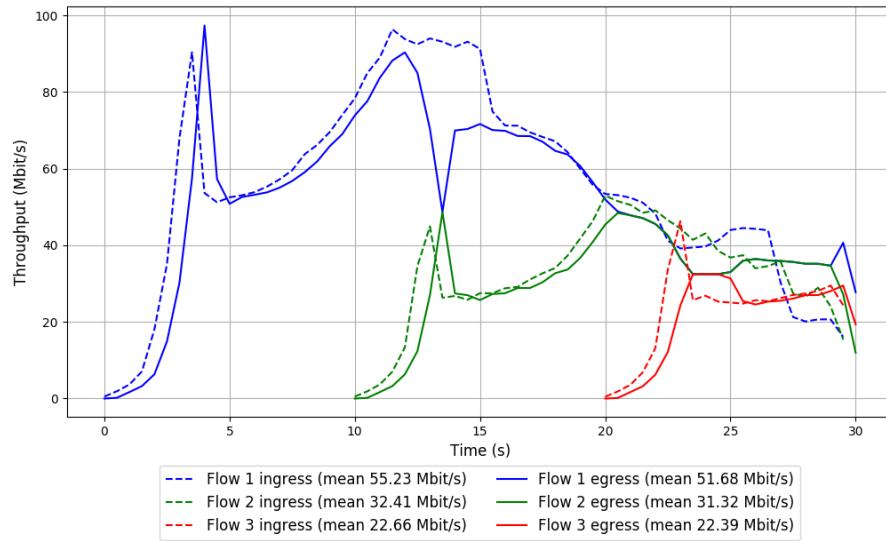


Run 2: Statistics of PCC-Vivace

```
Start at: 2019-03-27 12:28:01
End at: 2019-03-27 12:28:31
Local clock offset: -5.139 ms
Remote clock offset: 3.3 ms

# Below is generated by plot.py at 2019-03-27 14:27:21
# Datalink statistics
-- Total of 3 flows:
Average throughput: 79.76 Mbit/s
95th percentile per-packet one-way delay: 1970.992 ms
Loss rate: 5.89%
-- Flow 1:
Average throughput: 51.68 Mbit/s
95th percentile per-packet one-way delay: 2048.156 ms
Loss rate: 6.96%
-- Flow 2:
Average throughput: 31.32 Mbit/s
95th percentile per-packet one-way delay: 792.759 ms
Loss rate: 4.20%
-- Flow 3:
Average throughput: 22.39 Mbit/s
95th percentile per-packet one-way delay: 358.305 ms
Loss rate: 2.91%
```

## Run 2: Report of PCC-Vivace — Data Link

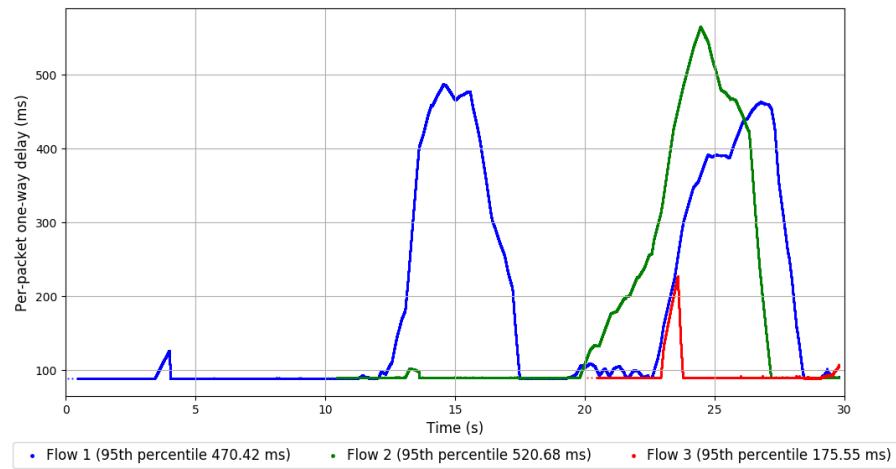
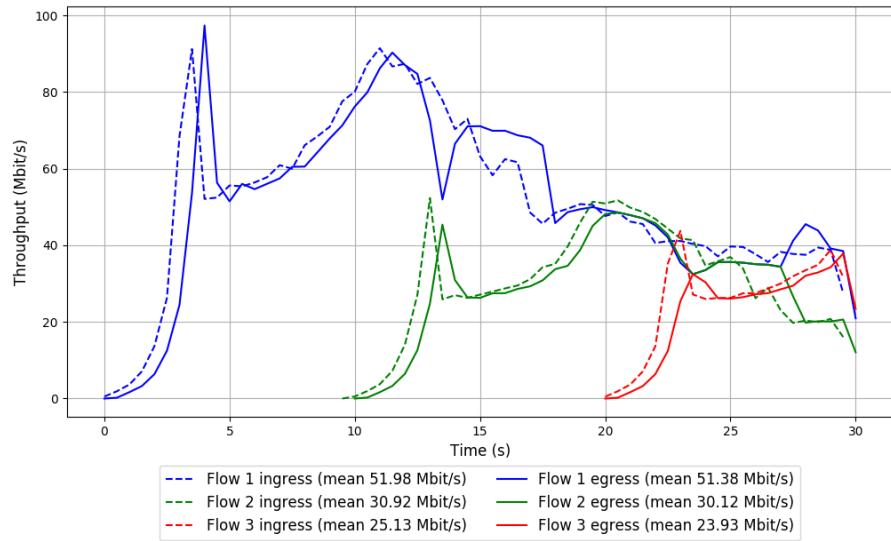


Run 3: Statistics of PCC-Vivace

```
Start at: 2019-03-27 12:55:03
End at: 2019-03-27 12:55:33
Local clock offset: -5.082 ms
Remote clock offset: 3.126 ms

# Below is generated by plot.py at 2019-03-27 14:27:25
# Datalink statistics
-- Total of 3 flows:
Average throughput: 79.17 Mbit/s
95th percentile per-packet one-way delay: 473.149 ms
Loss rate: 2.64%
-- Flow 1:
Average throughput: 51.38 Mbit/s
95th percentile per-packet one-way delay: 470.420 ms
Loss rate: 1.73%
-- Flow 2:
Average throughput: 30.12 Mbit/s
95th percentile per-packet one-way delay: 520.681 ms
Loss rate: 3.41%
-- Flow 3:
Average throughput: 23.93 Mbit/s
95th percentile per-packet one-way delay: 175.547 ms
Loss rate: 6.44%
```

### Run 3: Report of PCC-Vivace — Data Link

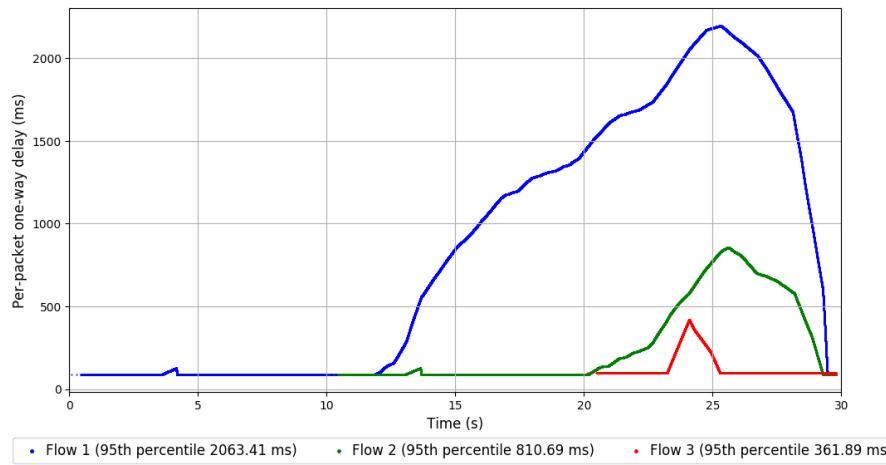
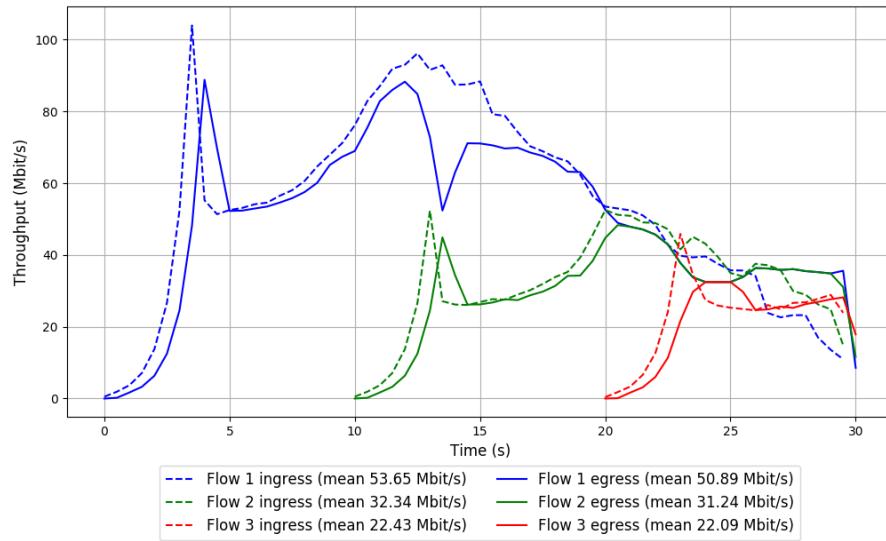


Run 4: Statistics of PCC-Vivace

```
Start at: 2019-03-27 13:22:10
End at: 2019-03-27 13:22:40
Local clock offset: -4.63 ms
Remote clock offset: 3.986 ms

# Below is generated by plot.py at 2019-03-27 14:27:28
# Datalink statistics
-- Total of 3 flows:
Average throughput: 78.81 Mbit/s
95th percentile per-packet one-way delay: 1941.812 ms
Loss rate: 5.09%
-- Flow 1:
Average throughput: 50.89 Mbit/s
95th percentile per-packet one-way delay: 2063.407 ms
Loss rate: 5.68%
-- Flow 2:
Average throughput: 31.24 Mbit/s
95th percentile per-packet one-way delay: 810.691 ms
Loss rate: 4.24%
-- Flow 3:
Average throughput: 22.09 Mbit/s
95th percentile per-packet one-way delay: 361.893 ms
Loss rate: 3.27%
```

Run 4: Report of PCC-Vivace — Data Link

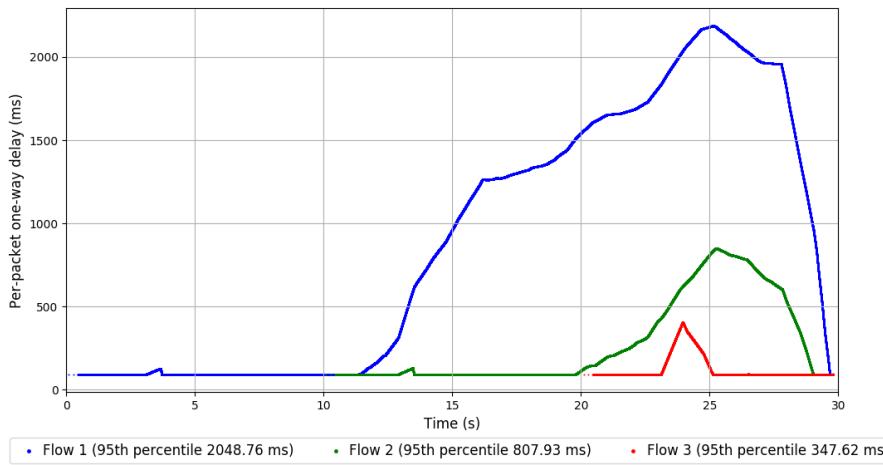
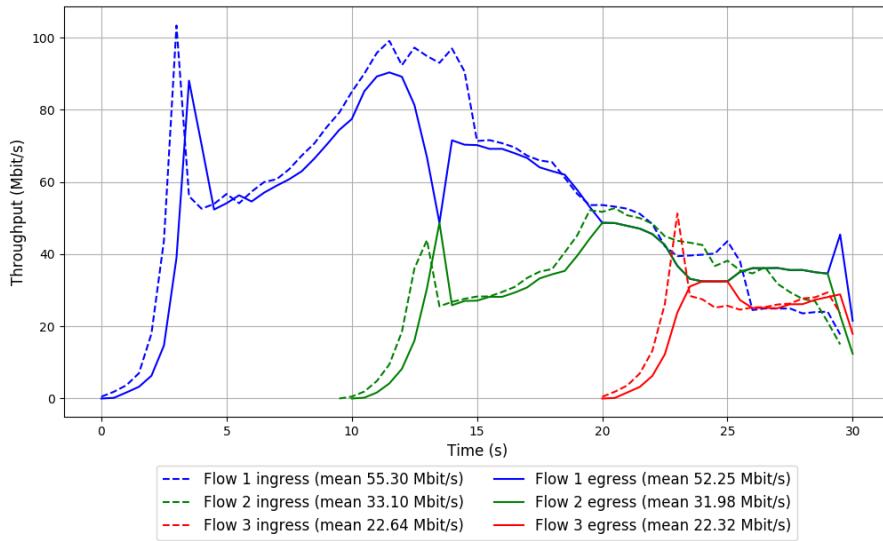


Run 5: Statistics of PCC-Vivace

```
Start at: 2019-03-27 13:49:11
End at: 2019-03-27 13:49:41
Local clock offset: -4.602 ms
Remote clock offset: 1.059 ms

# Below is generated by plot.py at 2019-03-27 14:27:29
# Datalink statistics
-- Total of 3 flows:
Average throughput: 80.75 Mbit/s
95th percentile per-packet one-way delay: 1963.863 ms
Loss rate: 5.33%
-- Flow 1:
Average throughput: 52.25 Mbit/s
95th percentile per-packet one-way delay: 2048.756 ms
Loss rate: 6.06%
-- Flow 2:
Average throughput: 31.98 Mbit/s
95th percentile per-packet one-way delay: 807.926 ms
Loss rate: 4.23%
-- Flow 3:
Average throughput: 22.32 Mbit/s
95th percentile per-packet one-way delay: 347.620 ms
Loss rate: 3.11%
```

## Run 5: Report of PCC-Vivace — Data Link

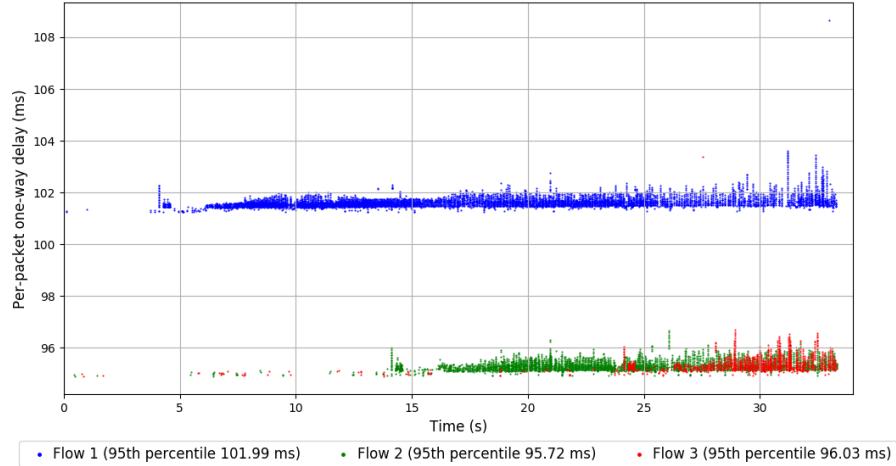
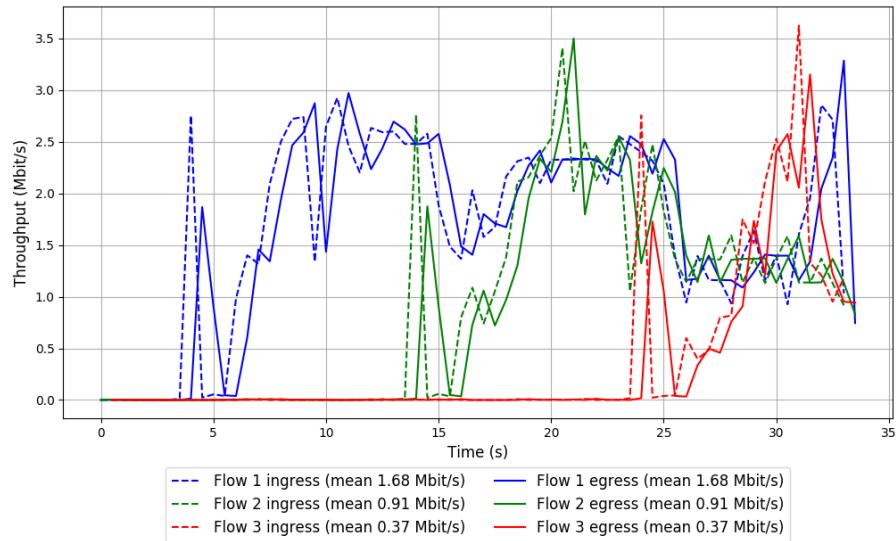


```
Run 1: Statistics of WebRTC media

Start at: 2019-03-27 12:21:41
End at: 2019-03-27 12:22:11
Local clock offset: -3.745 ms
Remote clock offset: 1.681 ms

# Below is generated by plot.py at 2019-03-27 14:27:29
# Datalink statistics
-- Total of 3 flows:
Average throughput: 2.93 Mbit/s
95th percentile per-packet one-way delay: 101.890 ms
Loss rate: 0.61%
-- Flow 1:
Average throughput: 1.68 Mbit/s
95th percentile per-packet one-way delay: 101.989 ms
Loss rate: 0.36%
-- Flow 2:
Average throughput: 0.91 Mbit/s
95th percentile per-packet one-way delay: 95.715 ms
Loss rate: 0.52%
-- Flow 3:
Average throughput: 0.37 Mbit/s
95th percentile per-packet one-way delay: 96.027 ms
Loss rate: 1.94%
```

Run 1: Report of WebRTC media — Data Link

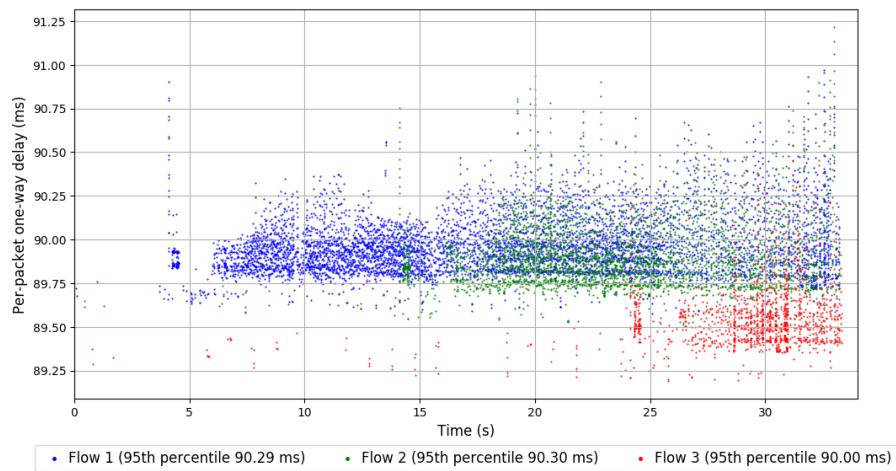
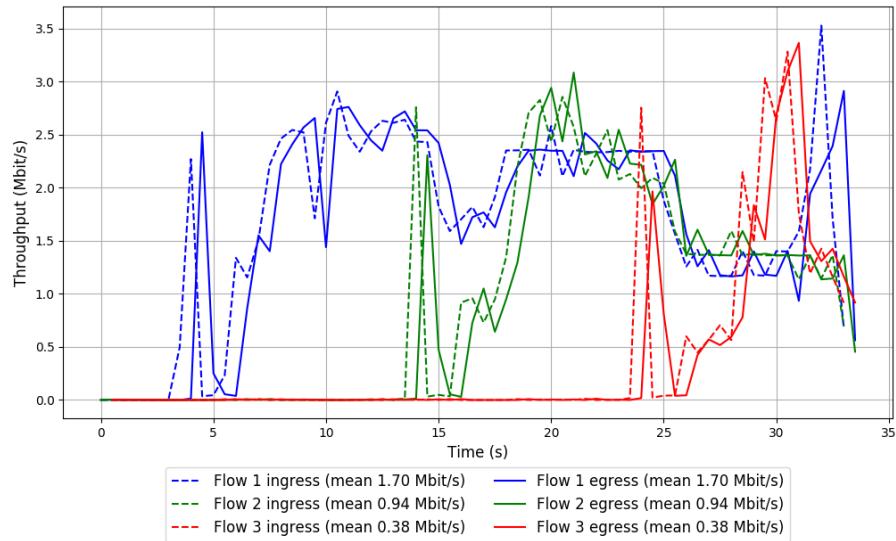


Run 2: Statistics of WebRTC media

```
Start at: 2019-03-27 12:48:40
End at: 2019-03-27 12:49:10
Local clock offset: -4.643 ms
Remote clock offset: 3.601 ms

# Below is generated by plot.py at 2019-03-27 14:27:29
# Datalink statistics
-- Total of 3 flows:
Average throughput: 3.00 Mbit/s
95th percentile per-packet one-way delay: 90.278 ms
Loss rate: 0.55%
-- Flow 1:
Average throughput: 1.70 Mbit/s
95th percentile per-packet one-way delay: 90.288 ms
Loss rate: 0.35%
-- Flow 2:
Average throughput: 0.94 Mbit/s
95th percentile per-packet one-way delay: 90.302 ms
Loss rate: 0.75%
-- Flow 3:
Average throughput: 0.38 Mbit/s
95th percentile per-packet one-way delay: 89.996 ms
Loss rate: 0.92%
```

Run 2: Report of WebRTC media — Data Link

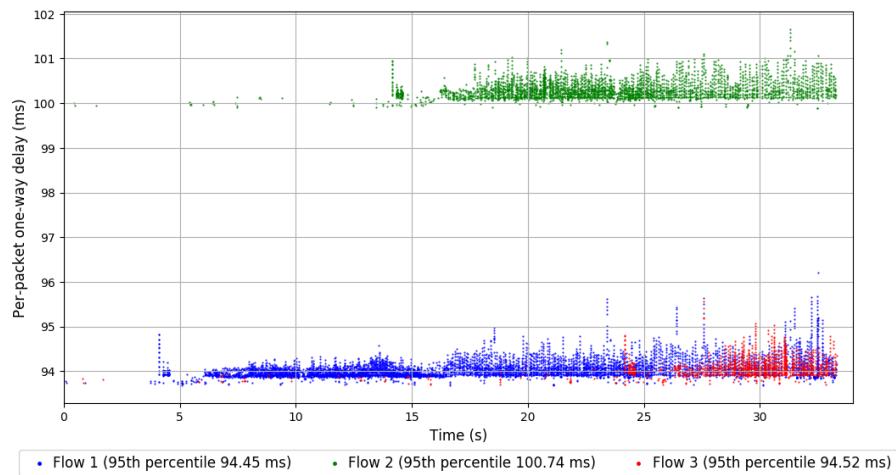
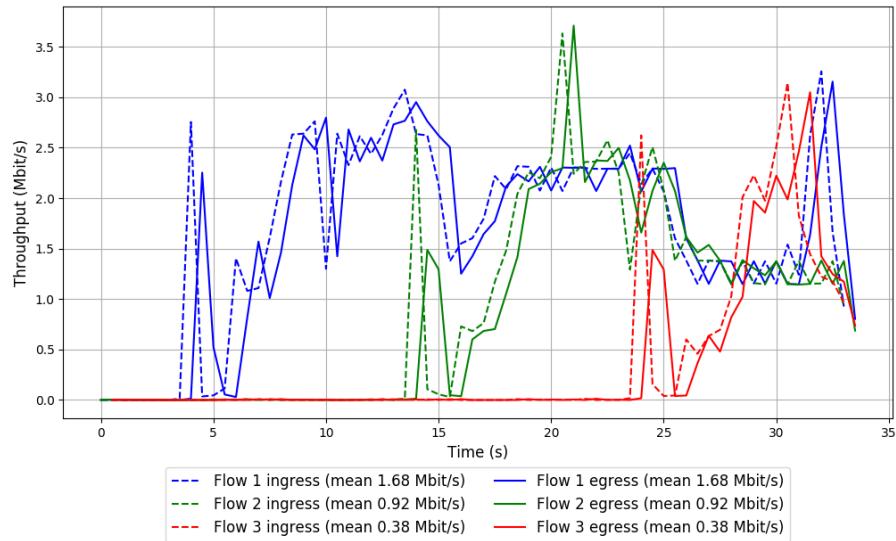


Run 3: Statistics of WebRTC media

```
Start at: 2019-03-27 13:15:49
End at: 2019-03-27 13:16:19
Local clock offset: -4.945 ms
Remote clock offset: -1.089 ms

# Below is generated by plot.py at 2019-03-27 14:27:29
# Datalink statistics
-- Total of 3 flows:
Average throughput: 2.95 Mbit/s
95th percentile per-packet one-way delay: 100.511 ms
Loss rate: 0.67%
-- Flow 1:
Average throughput: 1.68 Mbit/s
95th percentile per-packet one-way delay: 94.447 ms
Loss rate: 0.35%
-- Flow 2:
Average throughput: 0.92 Mbit/s
95th percentile per-packet one-way delay: 100.741 ms
Loss rate: 0.77%
-- Flow 3:
Average throughput: 0.38 Mbit/s
95th percentile per-packet one-way delay: 94.515 ms
Loss rate: 1.87%
```

Run 3: Report of WebRTC media — Data Link

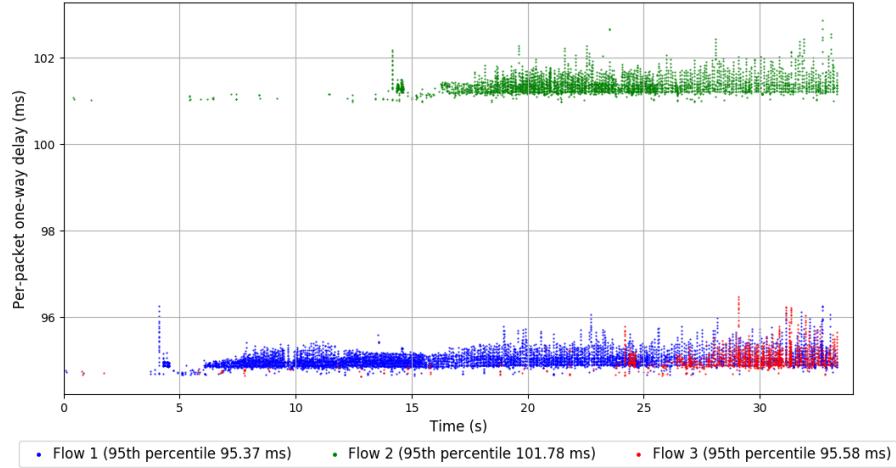
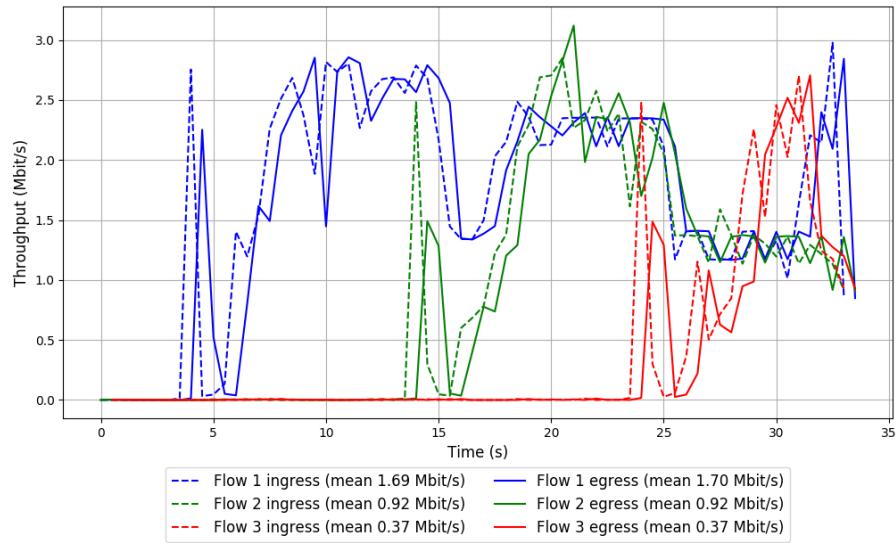


Run 4: Statistics of WebRTC media

```
Start at: 2019-03-27 13:42:49
End at: 2019-03-27 13:43:19
Local clock offset: -3.37 ms
Remote clock offset: -0.427 ms

# Below is generated by plot.py at 2019-03-27 14:27:29
# Datalink statistics
-- Total of 3 flows:
Average throughput: 2.97 Mbit/s
95th percentile per-packet one-way delay: 101.571 ms
Loss rate: 0.38%
-- Flow 1:
Average throughput: 1.70 Mbit/s
95th percentile per-packet one-way delay: 95.373 ms
Loss rate: 0.25%
-- Flow 2:
Average throughput: 0.92 Mbit/s
95th percentile per-packet one-way delay: 101.776 ms
Loss rate: 0.39%
-- Flow 3:
Average throughput: 0.37 Mbit/s
95th percentile per-packet one-way delay: 95.575 ms
Loss rate: 0.97%
```

Run 4: Report of WebRTC media — Data Link



Run 5: Statistics of WebRTC media

```
Start at: 2019-03-27 14:09:50
End at: 2019-03-27 14:10:20
Local clock offset: -4.912 ms
Remote clock offset: 1.654 ms

# Below is generated by plot.py at 2019-03-27 14:27:29
# Datalink statistics
-- Total of 3 flows:
Average throughput: 2.99 Mbit/s
95th percentile per-packet one-way delay: 99.929 ms
Loss rate: 0.80%
-- Flow 1:
Average throughput: 1.70 Mbit/s
95th percentile per-packet one-way delay: 94.145 ms
Loss rate: 0.37%
-- Flow 2:
Average throughput: 0.94 Mbit/s
95th percentile per-packet one-way delay: 94.295 ms
Loss rate: 0.75%
-- Flow 3:
Average throughput: 0.36 Mbit/s
95th percentile per-packet one-way delay: 100.526 ms
Loss rate: 2.92%
```

Run 5: Report of WebRTC media — Data Link

