

## Pantheon Report

Generated at 2017-12-06 02:34:30 (UTC).

Data path: AWS California 2 Ethernet (*local*) → Mexico Ethernet (*remote*).

Repeated the test of 14 congestion control schemes 10 times.

Each test lasted for 30 seconds running 3 flows with 10-second interval between two flows.

Increased UDP receive buffer to 16 MB (default) and 32 MB (max).

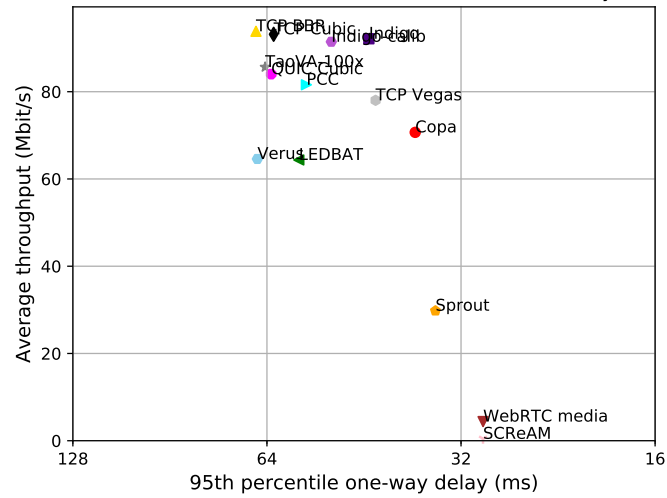
Tested BBR with qdisc of Fair Queuing (**fq**), and other schemes with the default Linux qdisc (**pfifo\_fast**).

NTP offsets were measured against `time.stanford.edu` and have been applied to correct the timestamps in logs.

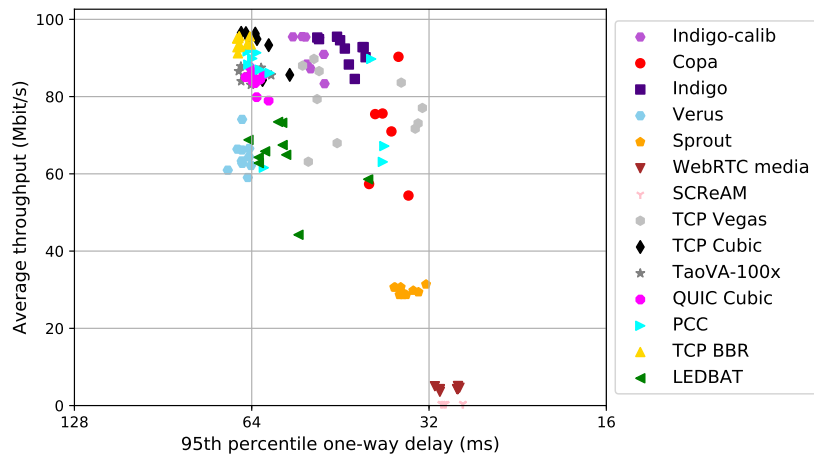
Git summary:

```
branch: indigos @ e3a57ad5ac5cfcaca0e3f983c8dd4cc3509e0262
third_party/calibrated_koho @ 3cb73c0d1c0322cdfae446ea37a522e53227db50
  M datagrump/sender.cc
third_party/genericCC @ b5b7c38e8391001927dc41c6cfa2627d03dde737
third_party/indigo @ b19f3730105f9aa95452552af924e3719b03cc55
third_party/indigo-cellular @ aee99e8eb842cb053f8c9a80e28cd256a930bbc2
third_party/indigo-no-calib @ 7224f2202e8a044d8306fa0b983ad84360c53d89
third_party/indigo-no-cwnd @ 3e58442c04028a11d7b02456e137604633ba2d6c
third_party/indigo-no-delivery-rate @ 57caa40858b964906edff4876d5a7e5bfff666c5
third_party/indigo-no-queuing-delay @ 03455460fd1a8ffbdad86fabb936fdca204b80db
third_party/indigo-no-send-rate @ b39dfa6b2c5f19cb7cd89626cb4f5bb81f9fecda
third_party/koho_cc @ f0f2e693303aee82ea808e6928eac4f1083a6681
  M datagrump/sender.cc
third_party/libutp @ b3465b942e2826f2b179eaab4a906ce6bb7cf3cf
third_party/pantheon-tunnel @ baf443516dea3eeddeccaf9b916cc313273ca4f4
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/proto-quic @ 77961f1a82733a86b42f1bc8143ebc978f3cff42
third_party/scream @ c3370fd7bd17265a79aeb34e4016ad23f5965885
third_party/sourdough @ f1a14bffe749737437f61b1eae30b267cde681
third_party/sprout @ 6f2efe6e088d91066a9f023df375eee2665089ce
  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/webrtc @ a488197ddd041ace68a42849b2540ad834825f42
```

test from AWS California 2 Ethernet to Mexico Ethernet, 10 runs of 30s each per scheme  
3 flows with 10s interval between flows (mean of all runs by scheme)



test from AWS California 2 Ethernet to Mexico Ethernet, 10 runs of 30s each per scheme  
3 flows with 10s interval between flows





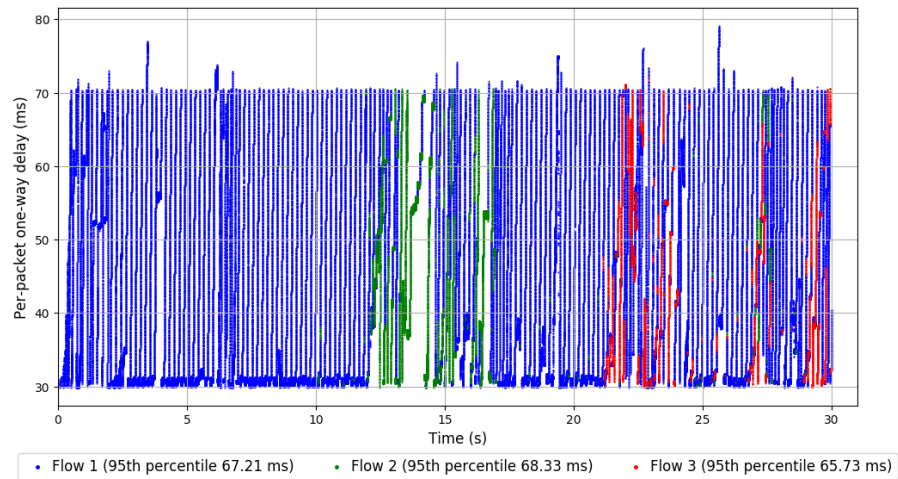
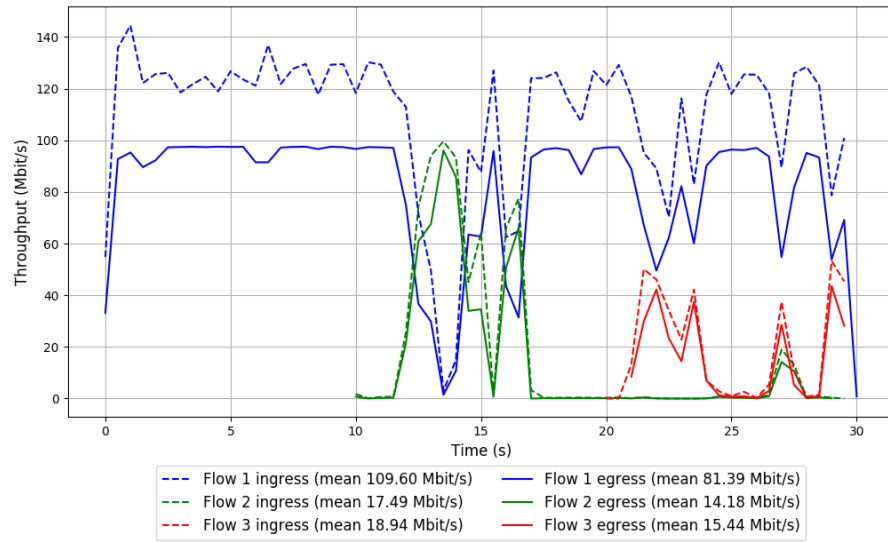
scheme	# runs	mean avg tput (Mbit/s)			mean 95th-%ile delay (ms)			mean loss rate (%)		
		flow 1	flow 2	flow 3	flow 1	flow 2	flow 3	flow 1	flow 2	flow 3
TCP BBR	10	83.24	13.39	6.06	66.50	66.01	66.75	23.57	28.89	32.30
TCP Cubic	9	59.97	36.24	27.38	62.20	61.45	61.43	0.51	0.53	0.81
LEDBAT	10	38.82	26.77	23.32	56.67	57.86	53.18	0.16	0.24	0.17
PCC	10	63.59	20.99	12.25	54.57	56.67	55.54	2.30	3.23	5.41
QUIC Cubic	10	54.75	32.19	23.98	62.28	63.31	63.13	1.37	0.94	1.05
SCReAM	10	0.22	0.22	0.22	29.59	29.58	29.56	0.00	0.00	0.00
WebRTC media	9	2.28	1.53	0.63	29.54	29.56	29.80	0.01	0.00	0.00
Sprout	10	15.11	14.87	14.52	34.49	35.31	36.10	0.02	0.02	0.01
TaoVA-100x	10	53.08	39.67	25.81	62.23	65.31	65.83	14.11	25.61	18.88
TCP Vegas	10	45.13	36.86	25.21	41.93	40.37	37.66	0.52	0.17	0.30
Verus	10	40.52	29.85	14.86	66.00	66.19	63.86	35.27	38.68	35.34
Copa	6	46.77	28.24	20.37	37.74	39.31	37.70	0.14	0.17	0.05
Indigo	10	61.29	32.24	28.91	41.48	46.95	51.88	0.18	0.25	0.39
Indigo-calib	8	57.95	32.75	32.43	46.88	52.43	54.94	0.21	0.43	0.34

Run 1: Statistics of TCP BBR

Start at: 2017-12-05 22:29:47  
End at: 2017-12-05 22:30:17  
Local clock offset: -0.368 ms  
Remote clock offset: -1.751 ms

# Below is generated by plot.py at 2017-12-06 02:15:31  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.12 Mbit/s  
95th percentile per-packet one-way delay: 67.402 ms  
Loss rate: 25.29%  
-- Flow 1:  
Average throughput: 81.39 Mbit/s  
95th percentile per-packet one-way delay: 67.212 ms  
Loss rate: 25.71%  
-- Flow 2:  
Average throughput: 14.18 Mbit/s  
95th percentile per-packet one-way delay: 68.328 ms  
Loss rate: 20.32%  
-- Flow 3:  
Average throughput: 15.44 Mbit/s  
95th percentile per-packet one-way delay: 65.735 ms  
Loss rate: 26.87%

# Run 1: Report of TCP BBR — Data Link

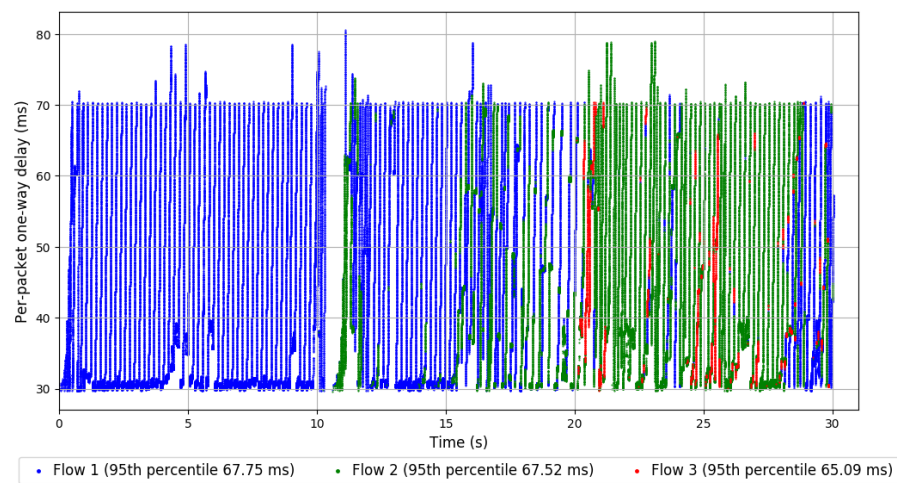
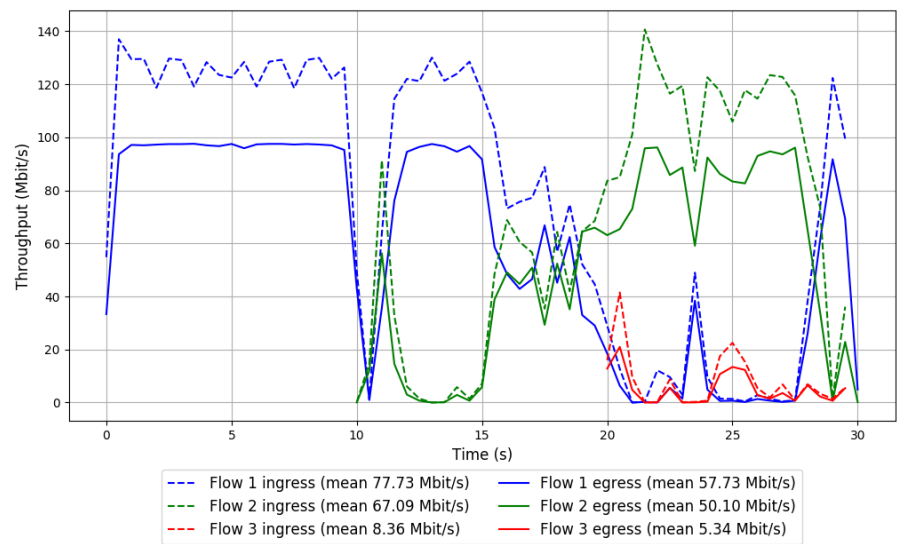


Run 2: Statistics of TCP BBR

Start at: 2017-12-05 22:49:56  
End at: 2017-12-05 22:50:26  
Local clock offset: -0.239 ms  
Remote clock offset: -1.646 ms

# Below is generated by plot.py at 2017-12-06 02:15:31  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 92.77 Mbit/s  
95th percentile per-packet one-way delay: 67.689 ms  
Loss rate: 25.78%  
-- Flow 1:  
Average throughput: 57.73 Mbit/s  
95th percentile per-packet one-way delay: 67.752 ms  
Loss rate: 25.67%  
-- Flow 2:  
Average throughput: 50.10 Mbit/s  
95th percentile per-packet one-way delay: 67.520 ms  
Loss rate: 25.29%  
-- Flow 3:  
Average throughput: 5.34 Mbit/s  
95th percentile per-packet one-way delay: 65.095 ms  
Loss rate: 36.68%

Run 2: Report of TCP BBR — Data Link

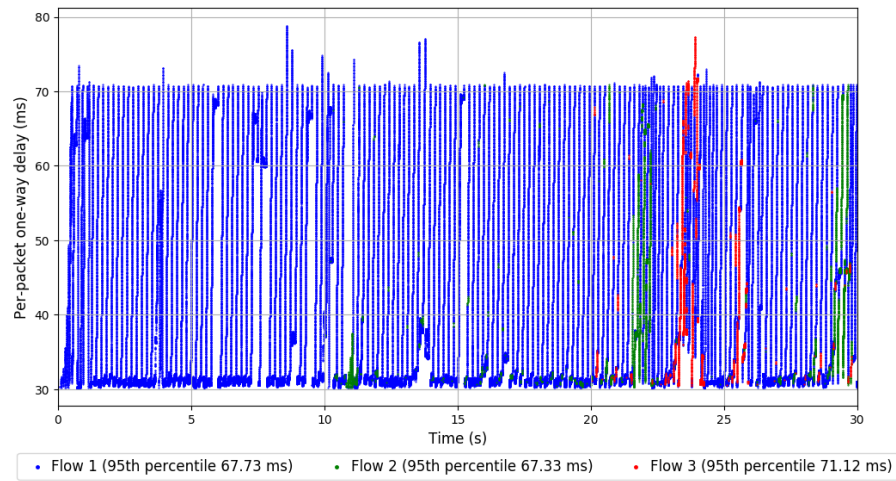
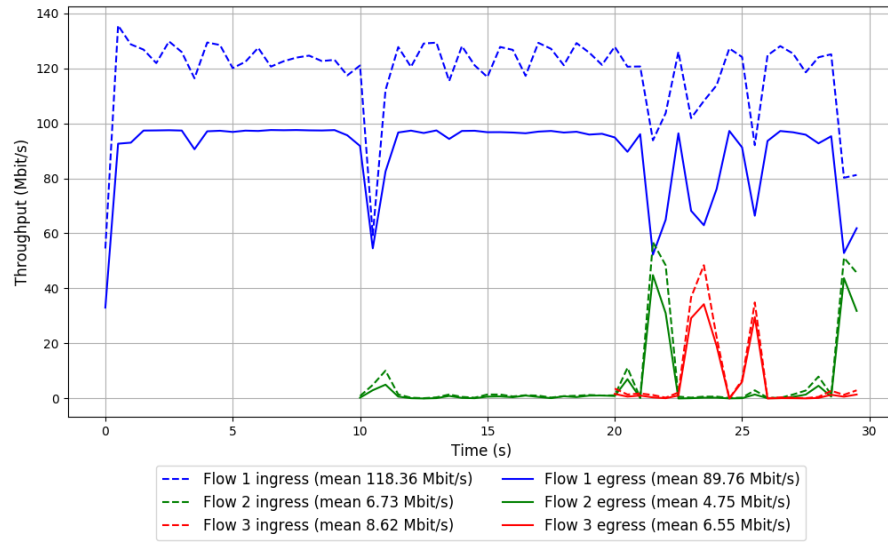


Run 3: Statistics of TCP BBR

Start at: 2017-12-05 23:09:52  
End at: 2017-12-05 23:10:22  
Local clock offset: -0.242 ms  
Remote clock offset: -1.298 ms

# Below is generated by plot.py at 2017-12-06 02:15:31  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.02 Mbit/s  
95th percentile per-packet one-way delay: 67.773 ms  
Loss rate: 24.36%  
-- Flow 1:  
Average throughput: 89.76 Mbit/s  
95th percentile per-packet one-way delay: 67.735 ms  
Loss rate: 24.16%  
-- Flow 2:  
Average throughput: 4.75 Mbit/s  
95th percentile per-packet one-way delay: 67.329 ms  
Loss rate: 29.58%  
-- Flow 3:  
Average throughput: 6.55 Mbit/s  
95th percentile per-packet one-way delay: 71.119 ms  
Loss rate: 24.45%

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



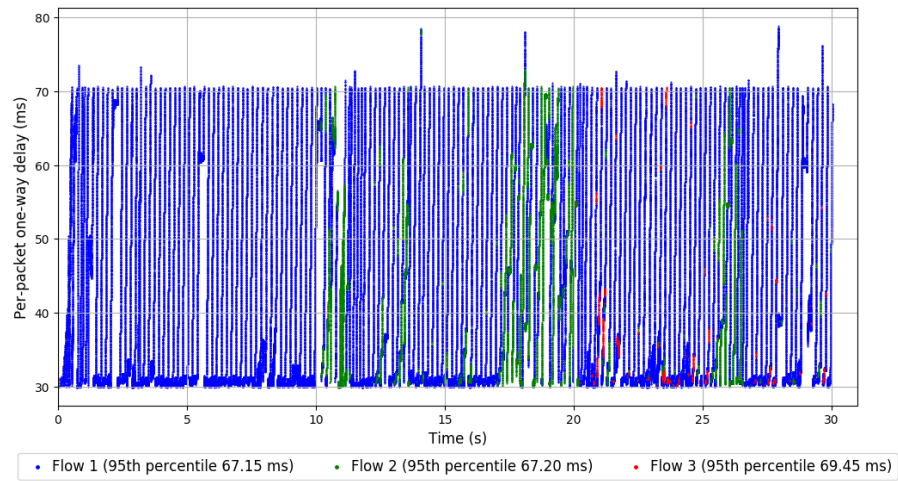
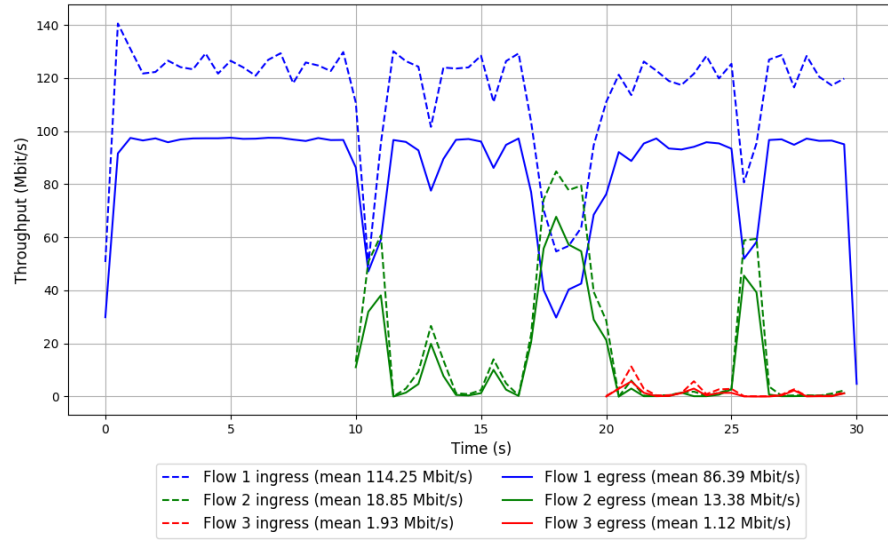
Run 4: Statistics of TCP BBR

Start at: 2017-12-05 23:30:22  
End at: 2017-12-05 23:30:52  
Local clock offset: -0.359 ms  
Remote clock offset: -2.396 ms

# Below is generated by plot.py at 2017-12-06 02:15:32  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.64 Mbit/s  
95th percentile per-packet one-way delay: 67.199 ms  
Loss rate: 24.88%  
-- Flow 1:  
Average throughput: 86.39 Mbit/s  
95th percentile per-packet one-way delay: 67.151 ms  
Loss rate: 24.33%  
-- Flow 2:  
Average throughput: 13.38 Mbit/s  
95th percentile per-packet one-way delay: 67.202 ms  
Loss rate: 29.05%  
-- Flow 3:  
Average throughput: 1.12 Mbit/s  
95th percentile per-packet one-way delay: 69.453 ms  
Loss rate: 41.88%



# Run 4: Report of TCP BBR — Data Link

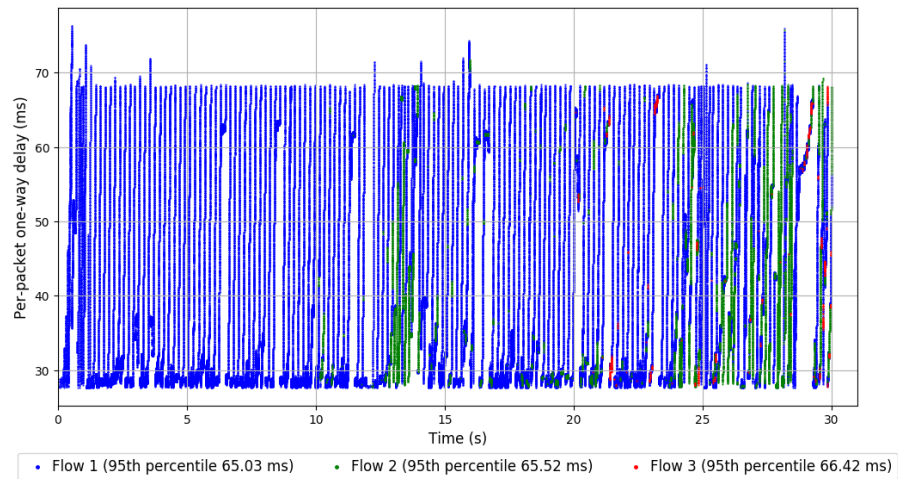
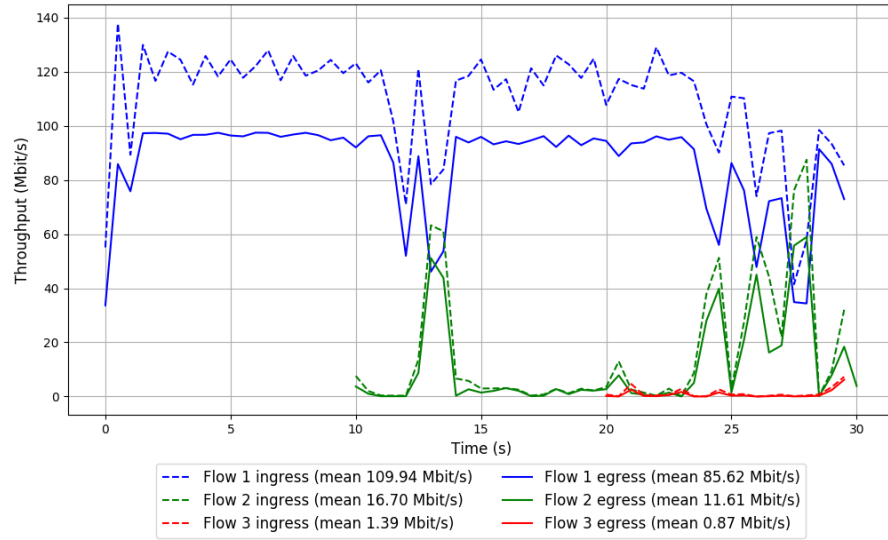


Run 5: Statistics of TCP BBR

Start at: 2017-12-05 23:52:06  
End at: 2017-12-05 23:52:36  
Local clock offset: -0.397 ms  
Remote clock offset: -4.696 ms

# Below is generated by plot.py at 2017-12-06 02:15:32  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 93.57 Mbit/s  
95th percentile per-packet one-way delay: 65.131 ms  
Loss rate: 22.94%  
-- Flow 1:  
Average throughput: 85.62 Mbit/s  
95th percentile per-packet one-way delay: 65.033 ms  
Loss rate: 22.13%  
-- Flow 2:  
Average throughput: 11.61 Mbit/s  
95th percentile per-packet one-way delay: 65.516 ms  
Loss rate: 30.35%  
-- Flow 3:  
Average throughput: 0.87 Mbit/s  
95th percentile per-packet one-way delay: 66.421 ms  
Loss rate: 37.58%

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

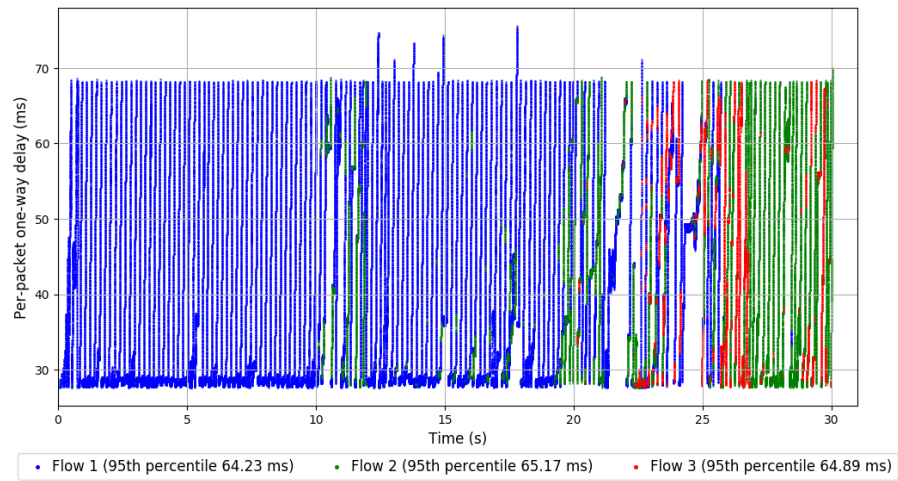
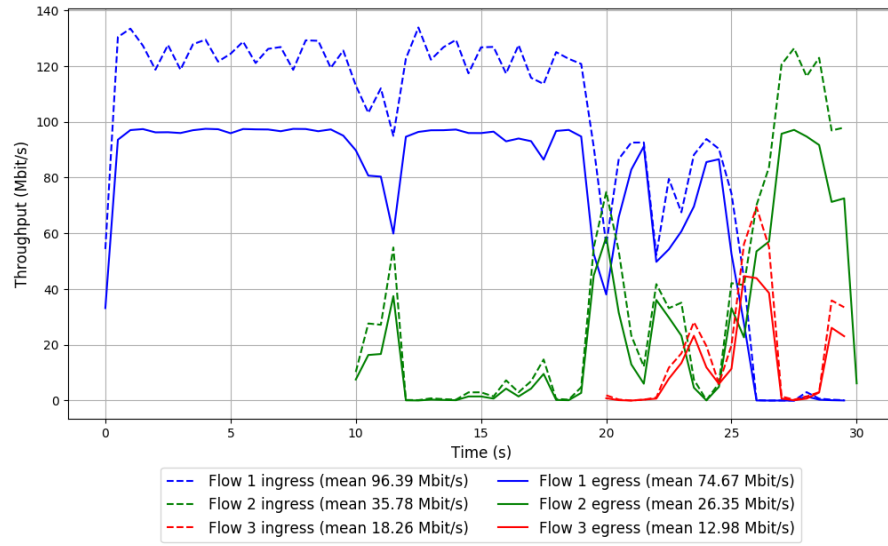


Run 6: Statistics of TCP BBR

Start at: 2017-12-06 00:14:22  
End at: 2017-12-06 00:14:52  
Local clock offset: -0.478 ms  
Remote clock offset: -4.231 ms

# Below is generated by plot.py at 2017-12-06 02:15:32  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.60 Mbit/s  
95th percentile per-packet one-way delay: 64.470 ms  
Loss rate: 23.67%  
-- Flow 1:  
Average throughput: 74.67 Mbit/s  
95th percentile per-packet one-way delay: 64.227 ms  
Loss rate: 22.68%  
-- Flow 2:  
Average throughput: 26.35 Mbit/s  
95th percentile per-packet one-way delay: 65.174 ms  
Loss rate: 26.23%  
-- Flow 3:  
Average throughput: 12.98 Mbit/s  
95th percentile per-packet one-way delay: 64.895 ms  
Loss rate: 29.19%

## Run 6: Report of TCP BBR — Data Link

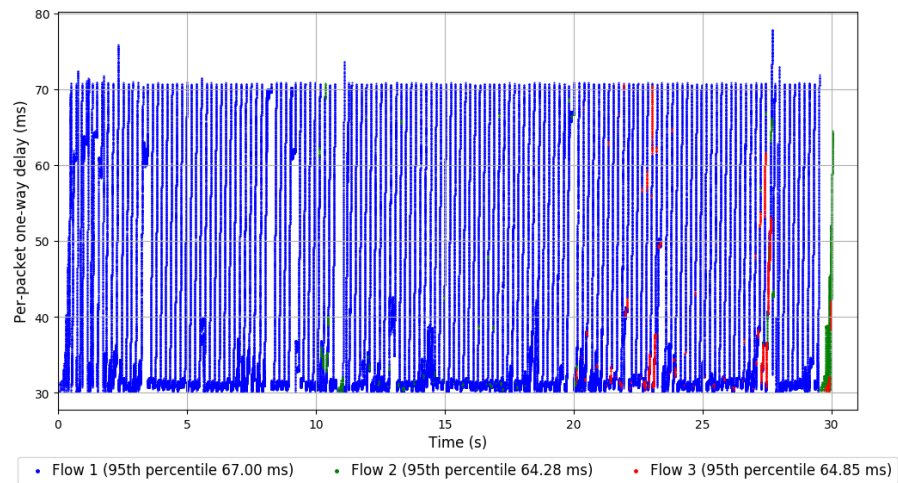
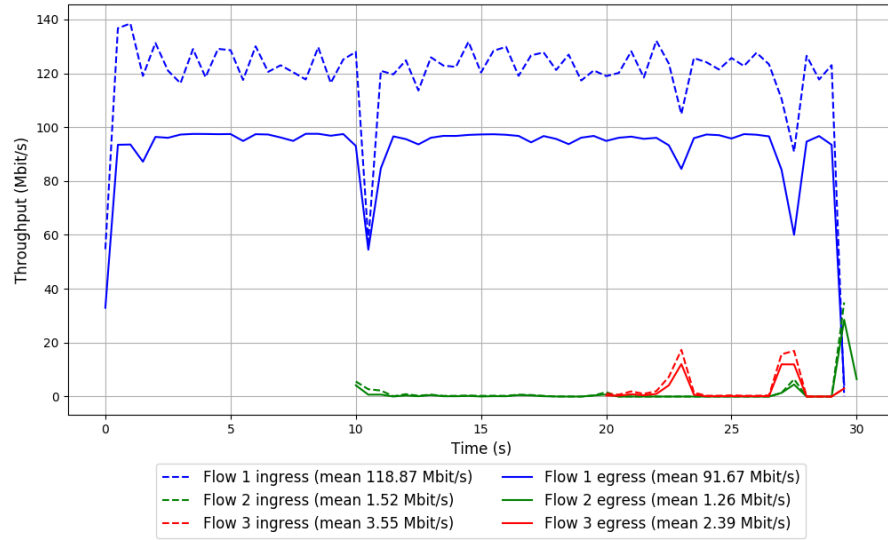


Run 7: Statistics of TCP BBR

Start at: 2017-12-06 00:35:47  
End at: 2017-12-06 00:36:17  
Local clock offset: -0.487 ms  
Remote clock offset: -0.792 ms

# Below is generated by plot.py at 2017-12-06 02:15:32  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 93.14 Mbit/s  
95th percentile per-packet one-way delay: 66.991 ms  
Loss rate: 22.87%  
-- Flow 1:  
Average throughput: 91.67 Mbit/s  
95th percentile per-packet one-way delay: 67.005 ms  
Loss rate: 22.82%  
-- Flow 2:  
Average throughput: 1.26 Mbit/s  
95th percentile per-packet one-way delay: 64.282 ms  
Loss rate: 16.82%  
-- Flow 3:  
Average throughput: 2.39 Mbit/s  
95th percentile per-packet one-way delay: 64.850 ms  
Loss rate: 32.62%

## Run 7: Report of TCP BBR — Data Link



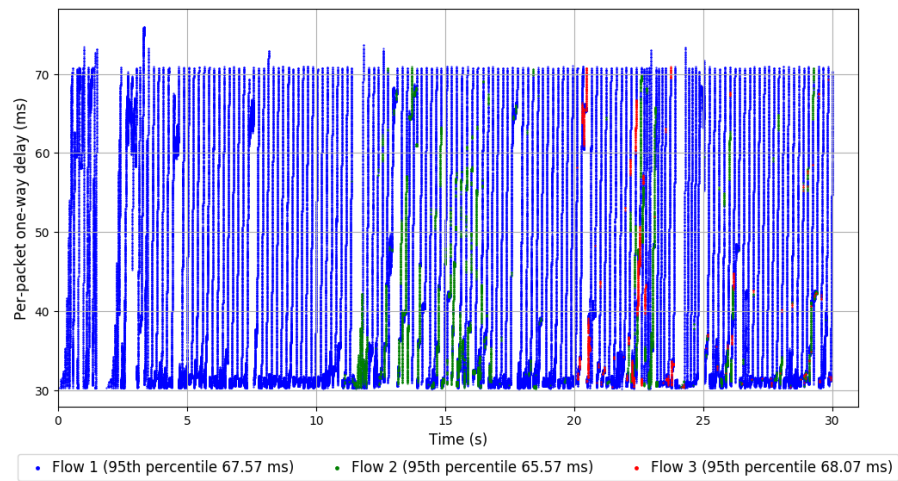
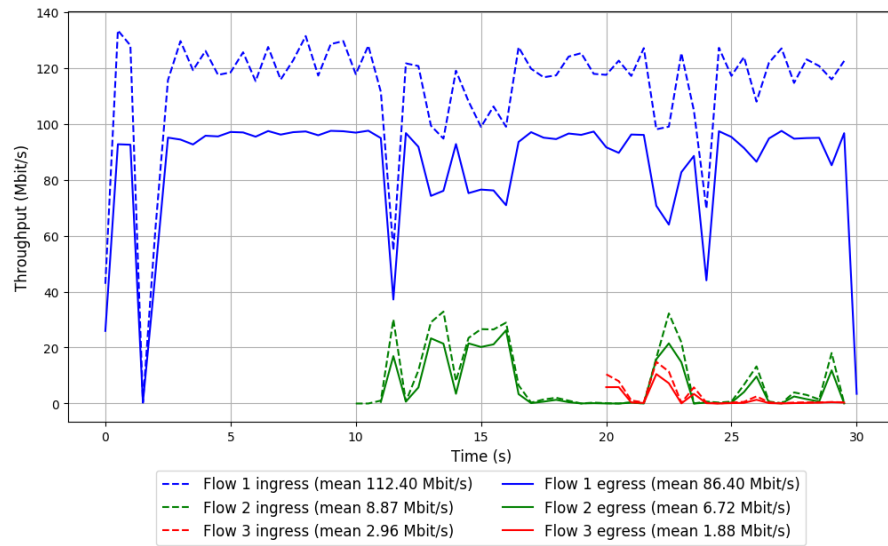
Run 8: Statistics of TCP BBR

Start at: 2017-12-06 00:56:56  
End at: 2017-12-06 00:57:27  
Local clock offset: -0.619 ms  
Remote clock offset: -0.296 ms

# Below is generated by plot.py at 2017-12-06 02:15:32  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 91.21 Mbit/s  
95th percentile per-packet one-way delay: 67.552 ms  
Loss rate: 23.45%  
-- Flow 1:  
Average throughput: 86.40 Mbit/s  
95th percentile per-packet one-way delay: 67.570 ms  
Loss rate: 23.08%  
-- Flow 2:  
Average throughput: 6.72 Mbit/s  
95th percentile per-packet one-way delay: 65.568 ms  
Loss rate: 28.40%  
-- Flow 3:  
Average throughput: 1.88 Mbit/s  
95th percentile per-packet one-way delay: 68.066 ms  
Loss rate: 36.96%



## Run 8: Report of TCP BBR — Data Link



Run 9: Statistics of TCP BBR

Start at: 2017-12-06 01:21:42

End at: 2017-12-06 01:22:13

Local clock offset: -0.832 ms

Remote clock offset: -2.91 ms

# Below is generated by plot.py at 2017-12-06 02:17:01

# Datalink statistics

-- Total of 3 flows:

Average throughput: 93.50 Mbit/s

95th percentile per-packet one-way delay: 64.245 ms

Loss rate: 23.46%

-- Flow 1:

Average throughput: 87.83 Mbit/s

95th percentile per-packet one-way delay: 64.244 ms

Loss rate: 23.13%

-- Flow 2:

Average throughput: 5.20 Mbit/s

95th percentile per-packet one-way delay: 64.763 ms

Loss rate: 28.27%

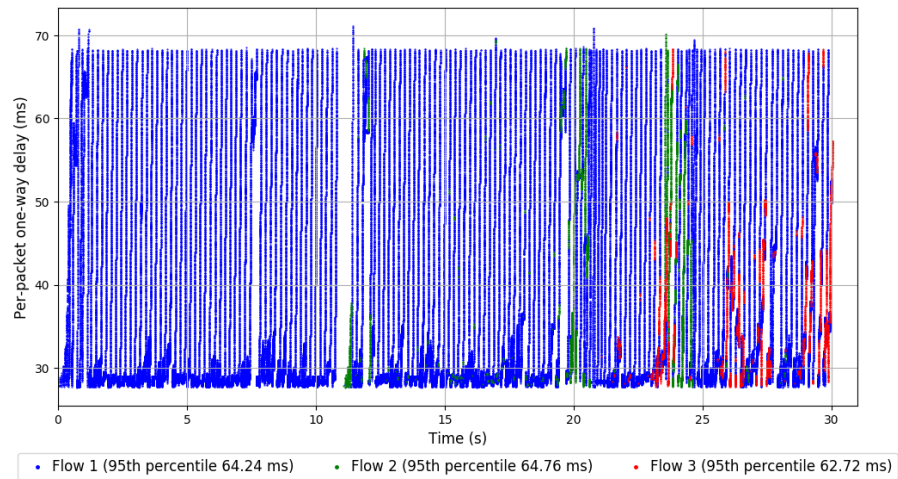
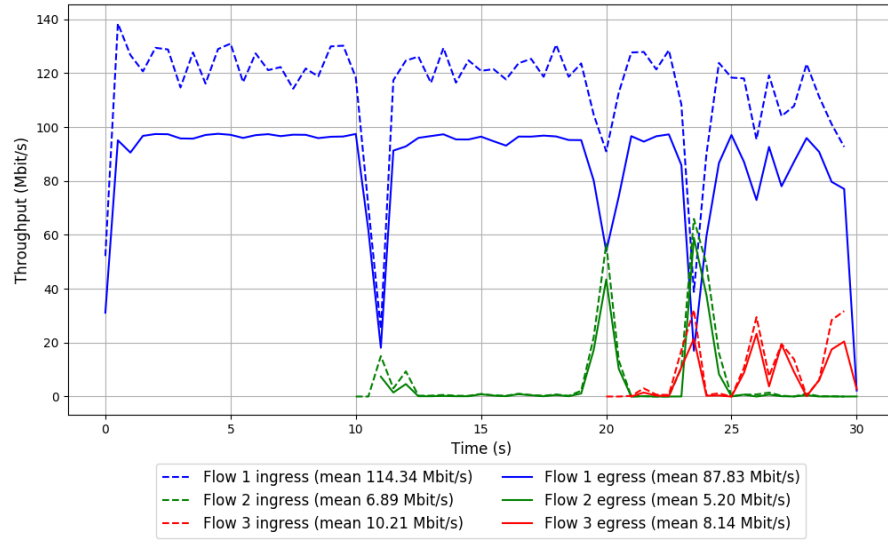
-- Flow 3:

Average throughput: 8.14 Mbit/s

95th percentile per-packet one-way delay: 62.721 ms

Loss rate: 28.11%

# Run 9: Report of TCP BBR — Data Link



Run 10: Statistics of TCP BBR

Start at: 2017-12-06 01:46:27

End at: 2017-12-06 01:46:57

Local clock offset: -1.181 ms

Remote clock offset: -1.09 ms

# Below is generated by plot.py at 2017-12-06 02:17:02

# Datalink statistics

-- Total of 3 flows:

Average throughput: 92.93 Mbit/s

95th percentile per-packet one-way delay: 67.125 ms

Loss rate: 22.14%

-- Flow 1:

Average throughput: 90.95 Mbit/s

95th percentile per-packet one-way delay: 67.104 ms

Loss rate: 21.97%

-- Flow 2:

Average throughput: 0.32 Mbit/s

95th percentile per-packet one-way delay: 64.395 ms

Loss rate: 54.55%

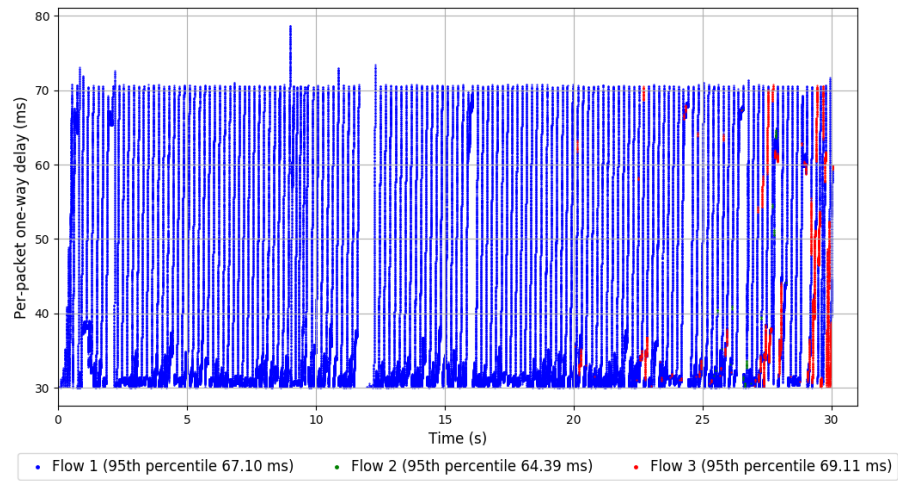
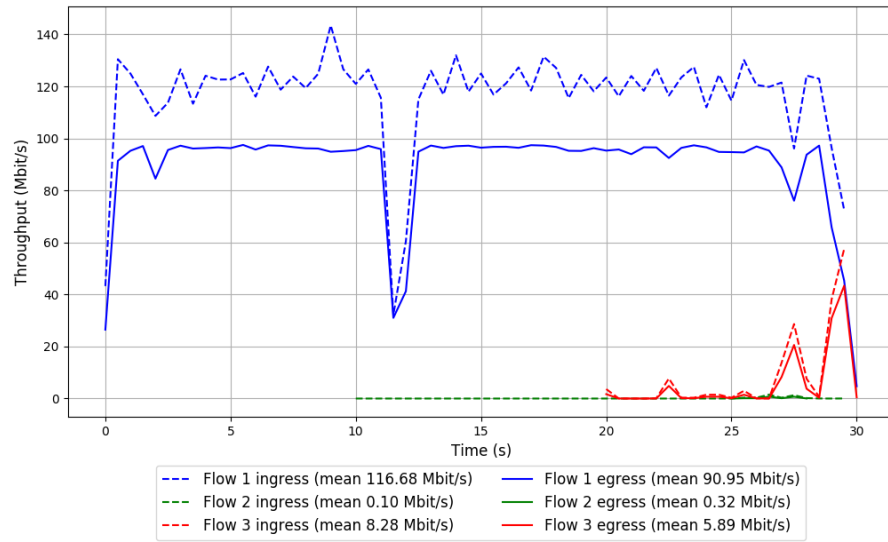
-- Flow 3:

Average throughput: 5.89 Mbit/s

95th percentile per-packet one-way delay: 69.107 ms

Loss rate: 28.66%

# Run 10: Report of TCP BBR — Data Link

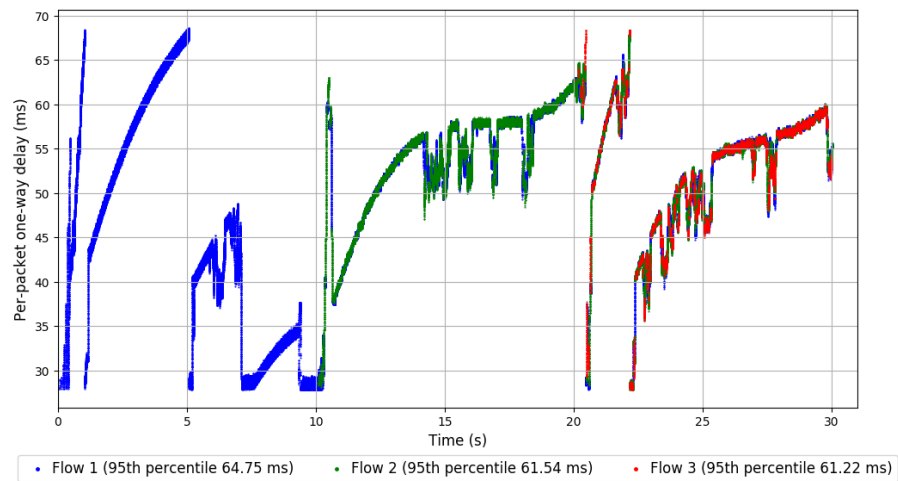
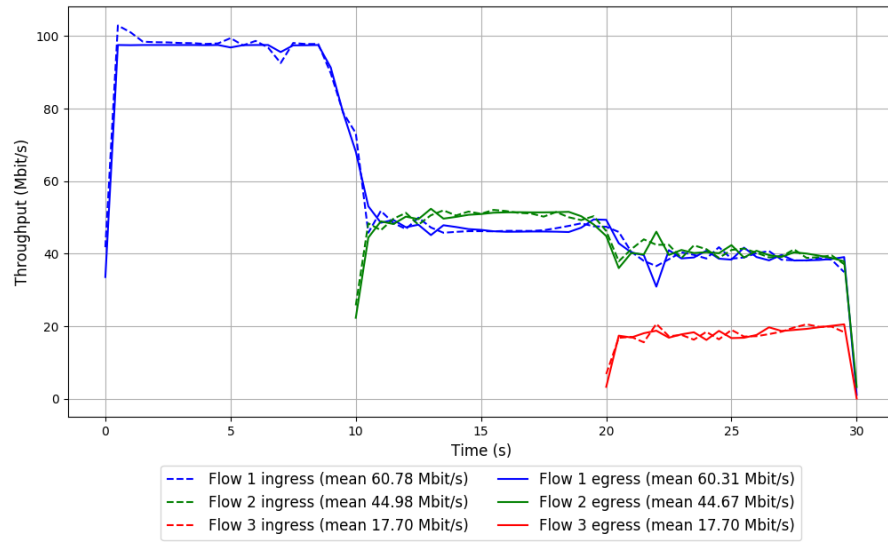


Run 1: Statistics of TCP Cubic

Start at: 2017-12-05 22:14:13  
End at: 2017-12-05 22:14:43  
Local clock offset: -0.379 ms  
Remote clock offset: -4.334 ms

# Below is generated by plot.py at 2017-12-06 02:17:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.92 Mbit/s  
95th percentile per-packet one-way delay: 63.214 ms  
Loss rate: 0.60%  
-- Flow 1:  
Average throughput: 60.31 Mbit/s  
95th percentile per-packet one-way delay: 64.754 ms  
Loss rate: 0.68%  
-- Flow 2:  
Average throughput: 44.67 Mbit/s  
95th percentile per-packet one-way delay: 61.538 ms  
Loss rate: 0.55%  
-- Flow 3:  
Average throughput: 17.70 Mbit/s  
95th percentile per-packet one-way delay: 61.217 ms  
Loss rate: 0.10%

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



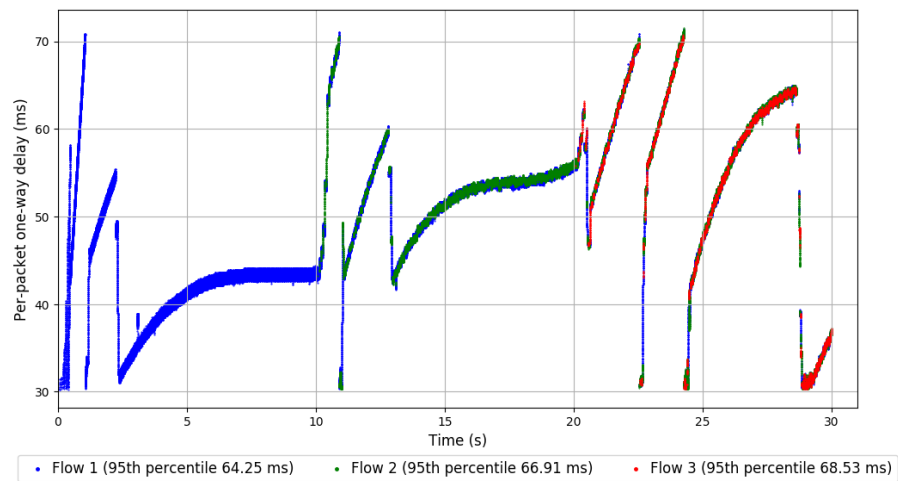
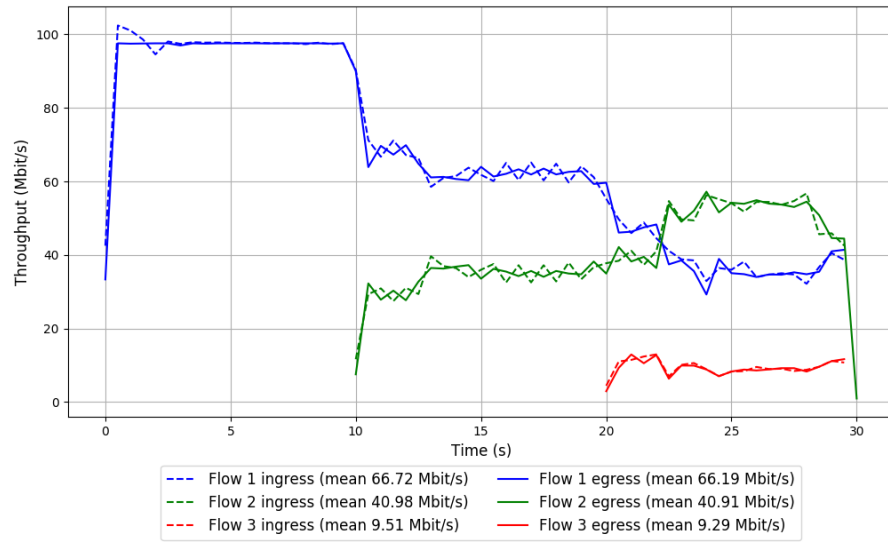
Run 2: Statistics of TCP Cubic

Start at: 2017-12-05 22:35:36  
End at: 2017-12-05 22:36:06  
Local clock offset: -0.251 ms  
Remote clock offset: -1.101 ms

# Below is generated by plot.py at 2017-12-06 02:17:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 96.44 Mbit/s  
95th percentile per-packet one-way delay: 65.466 ms  
Loss rate: 0.66%  
-- Flow 1:  
Average throughput: 66.19 Mbit/s  
95th percentile per-packet one-way delay: 64.251 ms  
Loss rate: 0.76%  
-- Flow 2:  
Average throughput: 40.91 Mbit/s  
95th percentile per-packet one-way delay: 66.907 ms  
Loss rate: 0.21%  
-- Flow 3:  
Average throughput: 9.29 Mbit/s  
95th percentile per-packet one-way delay: 68.530 ms  
Loss rate: 2.49%



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

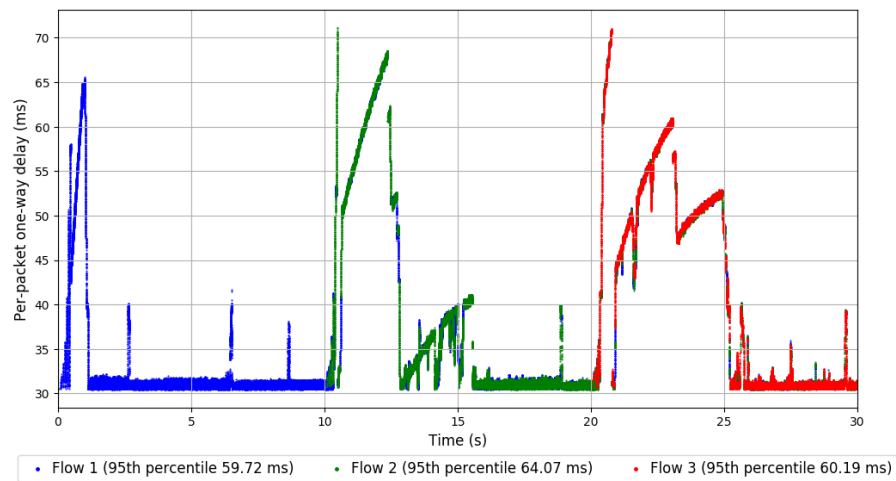
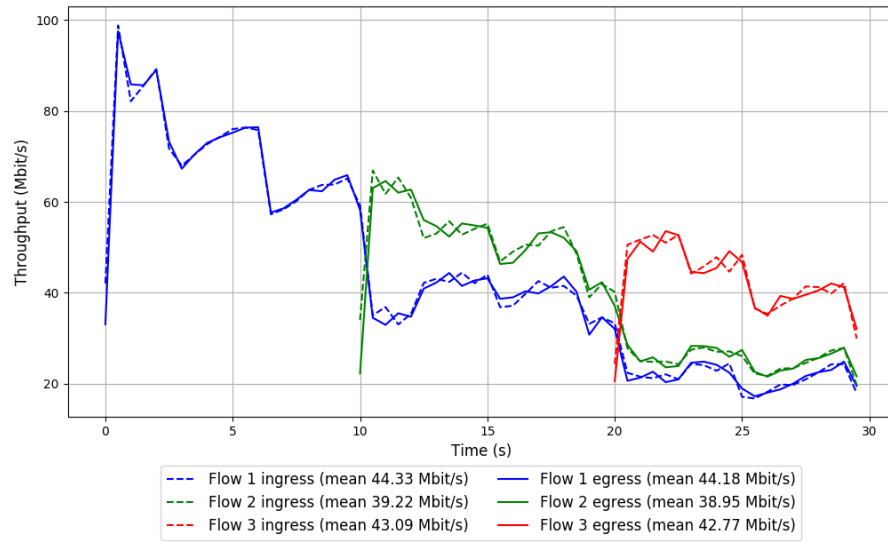


Run 3: Statistics of TCP Cubic

Start at: 2017-12-05 22:55:44  
End at: 2017-12-05 22:56:14  
Local clock offset: -0.345 ms  
Remote clock offset: -1.043 ms

# Below is generated by plot.py at 2017-12-06 02:17:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 84.29 Mbit/s  
95th percentile per-packet one-way delay: 61.350 ms  
Loss rate: 0.52%  
-- Flow 1:  
Average throughput: 44.18 Mbit/s  
95th percentile per-packet one-way delay: 59.721 ms  
Loss rate: 0.34%  
-- Flow 2:  
Average throughput: 38.95 Mbit/s  
95th percentile per-packet one-way delay: 64.067 ms  
Loss rate: 0.68%  
-- Flow 3:  
Average throughput: 42.77 Mbit/s  
95th percentile per-packet one-way delay: 60.191 ms  
Loss rate: 0.75%

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

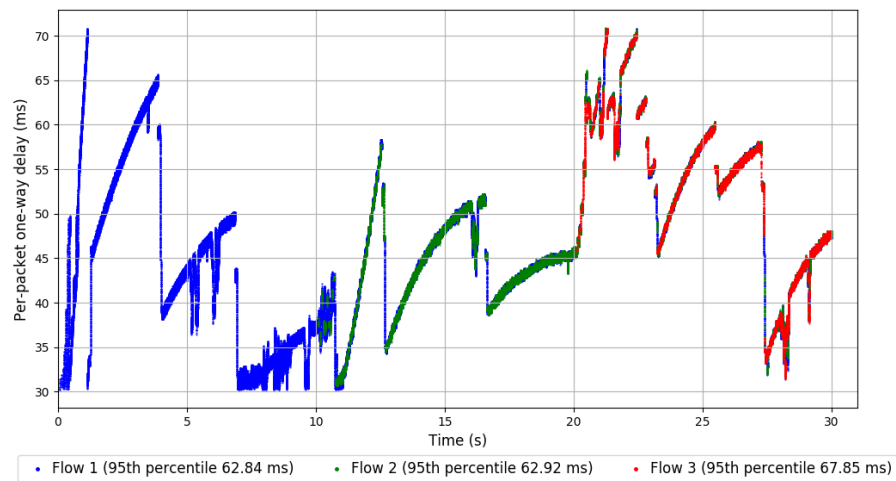
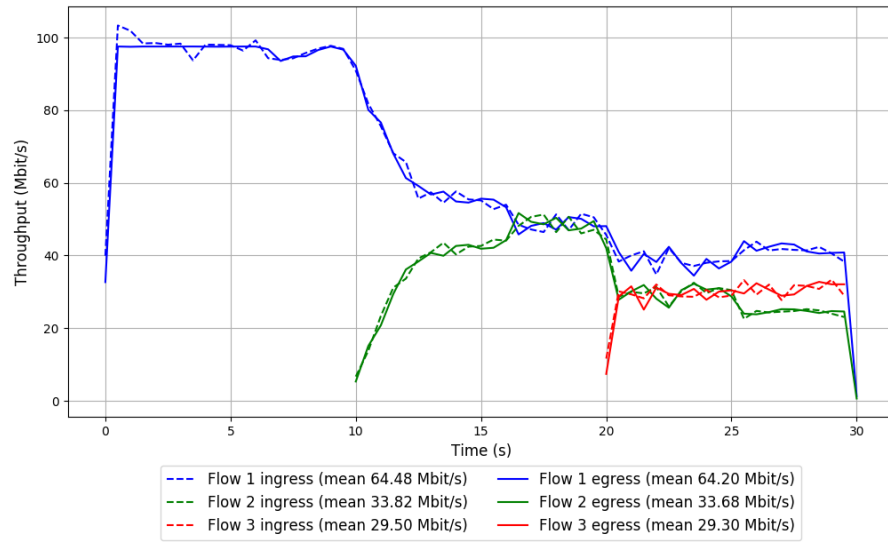


Run 4: Statistics of TCP Cubic

Start at: 2017-12-05 23:15:34  
End at: 2017-12-05 23:16:04  
Local clock offset: -0.258 ms  
Remote clock offset: -1.394 ms

# Below is generated by plot.py at 2017-12-06 02:17:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 96.30 Mbit/s  
95th percentile per-packet one-way delay: 63.113 ms  
Loss rate: 0.40%  
-- Flow 1:  
Average throughput: 64.20 Mbit/s  
95th percentile per-packet one-way delay: 62.836 ms  
Loss rate: 0.38%  
-- Flow 2:  
Average throughput: 33.68 Mbit/s  
95th percentile per-packet one-way delay: 62.924 ms  
Loss rate: 0.36%  
-- Flow 3:  
Average throughput: 29.30 Mbit/s  
95th percentile per-packet one-way delay: 67.850 ms  
Loss rate: 0.63%

# Run 4: Report of TCP Cubic — Data Link

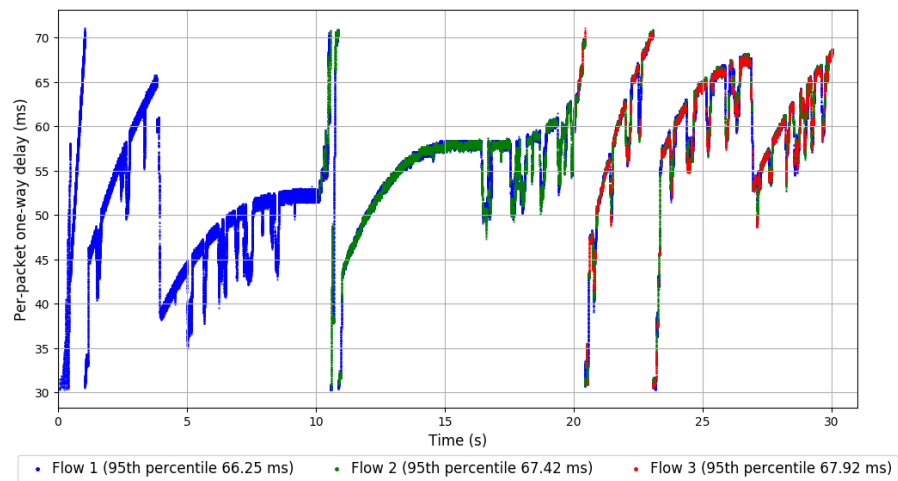
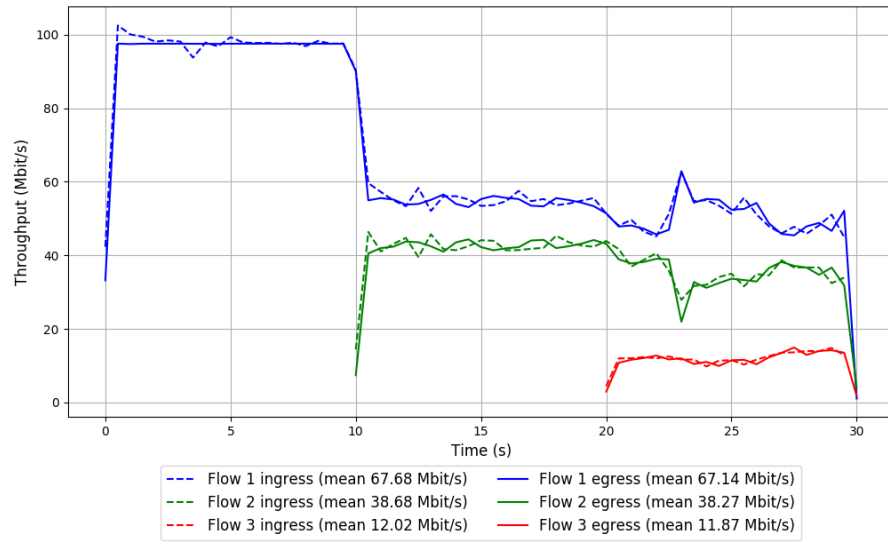


Run 5: Statistics of TCP Cubic

Start at: 2017-12-05 23:36:17  
End at: 2017-12-05 23:36:47  
Local clock offset: -0.277 ms  
Remote clock offset: -2.063 ms

# Below is generated by plot.py at 2017-12-06 02:17:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 96.50 Mbit/s  
95th percentile per-packet one-way delay: 66.686 ms  
Loss rate: 0.77%  
-- Flow 1:  
Average throughput: 67.14 Mbit/s  
95th percentile per-packet one-way delay: 66.250 ms  
Loss rate: 0.67%  
-- Flow 2:  
Average throughput: 38.27 Mbit/s  
95th percentile per-packet one-way delay: 67.420 ms  
Loss rate: 0.98%  
-- Flow 3:  
Average throughput: 11.87 Mbit/s  
95th percentile per-packet one-way delay: 67.923 ms  
Loss rate: 1.17%

# Run 5: Report of TCP Cubic — Data Link



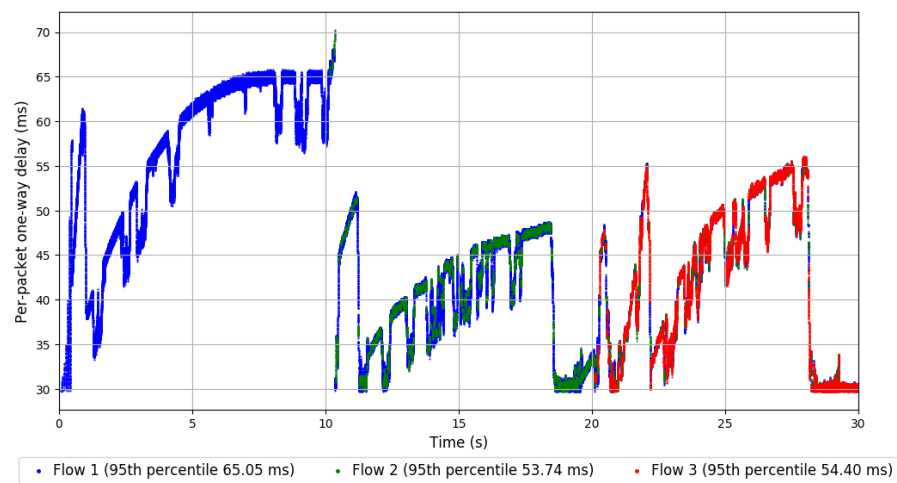
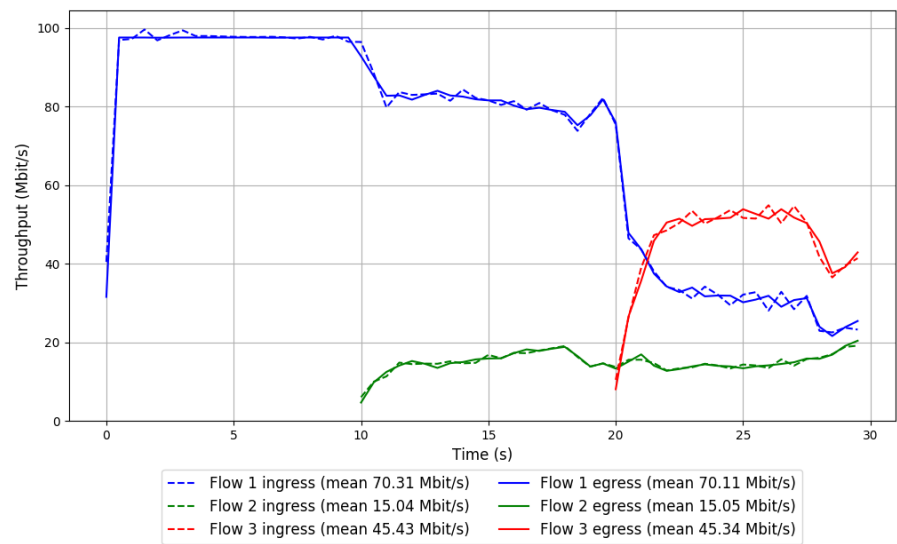
Run 6: Statistics of TCP Cubic

Start at: 2017-12-05 23:58:27  
End at: 2017-12-05 23:58:57  
Local clock offset: -0.307 ms  
Remote clock offset: -2.453 ms

# Below is generated by plot.py at 2017-12-06 02:17:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.15 Mbit/s  
95th percentile per-packet one-way delay: 64.840 ms  
Loss rate: 0.25%  
-- Flow 1:  
Average throughput: 70.11 Mbit/s  
95th percentile per-packet one-way delay: 65.049 ms  
Loss rate: 0.28%  
-- Flow 2:  
Average throughput: 15.05 Mbit/s  
95th percentile per-packet one-way delay: 53.744 ms  
Loss rate: 0.08%  
-- Flow 3:  
Average throughput: 45.34 Mbit/s  
95th percentile per-packet one-way delay: 54.402 ms  
Loss rate: 0.23%



Run 6: Report of TCP Cubic — Data Link

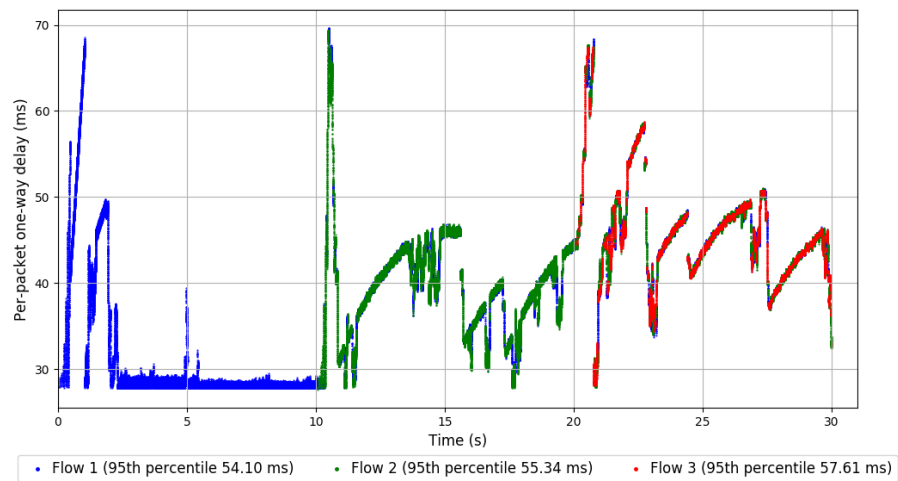
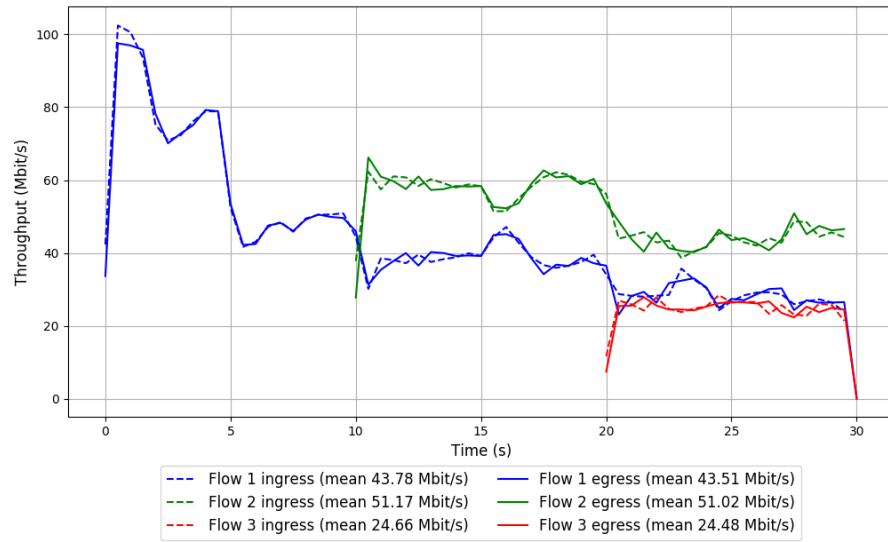


Run 7: Statistics of TCP Cubic

Start at: 2017-12-06 00:20:30  
End at: 2017-12-06 00:21:00  
Local clock offset: -0.493 ms  
Remote clock offset: -3.83 ms

# Below is generated by plot.py at 2017-12-06 02:18:06  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.62 Mbit/s  
95th percentile per-packet one-way delay: 55.158 ms  
Loss rate: 0.48%  
-- Flow 1:  
Average throughput: 43.51 Mbit/s  
95th percentile per-packet one-way delay: 54.105 ms  
Loss rate: 0.59%  
-- Flow 2:  
Average throughput: 51.02 Mbit/s  
95th percentile per-packet one-way delay: 55.340 ms  
Loss rate: 0.25%  
-- Flow 3:  
Average throughput: 24.48 Mbit/s  
95th percentile per-packet one-way delay: 57.611 ms  
Loss rate: 0.87%

## Run 7: Report of TCP Cubic — Data Link

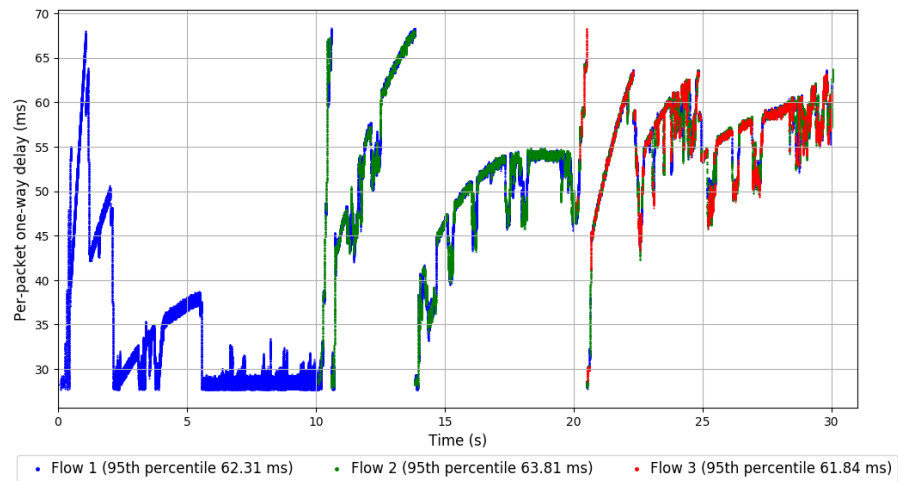
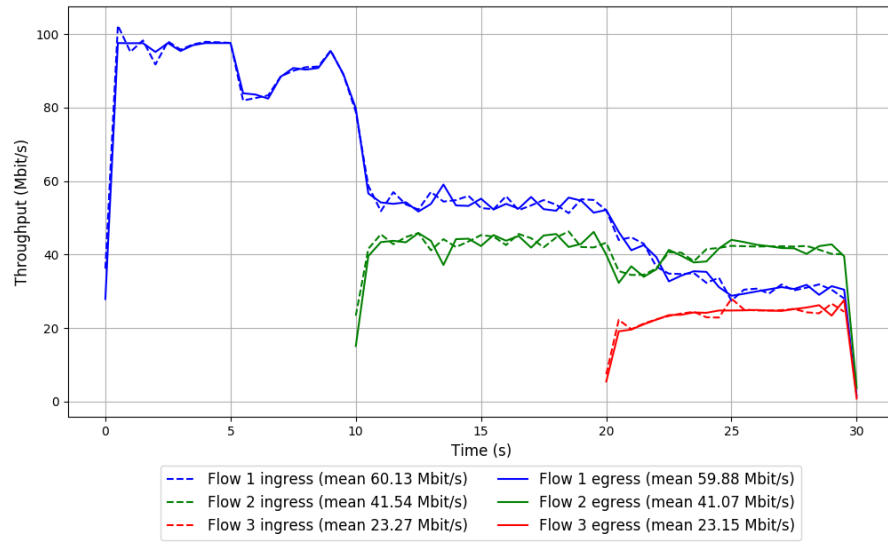


Run 8: Statistics of TCP Cubic

Start at: 2017-12-06 00:41:48  
End at: 2017-12-06 00:42:18  
Local clock offset: -0.503 ms  
Remote clock offset: -3.099 ms

# Below is generated by plot.py at 2017-12-06 02:18:21  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 94.90 Mbit/s  
95th percentile per-packet one-way delay: 62.697 ms  
Loss rate: 0.51%  
-- Flow 1:  
Average throughput: 59.88 Mbit/s  
95th percentile per-packet one-way delay: 62.309 ms  
Loss rate: 0.30%  
-- Flow 2:  
Average throughput: 41.07 Mbit/s  
95th percentile per-packet one-way delay: 63.811 ms  
Loss rate: 0.97%  
-- Flow 3:  
Average throughput: 23.15 Mbit/s  
95th percentile per-packet one-way delay: 61.845 ms  
Loss rate: 0.43%

## Run 8: Report of TCP Cubic — Data Link

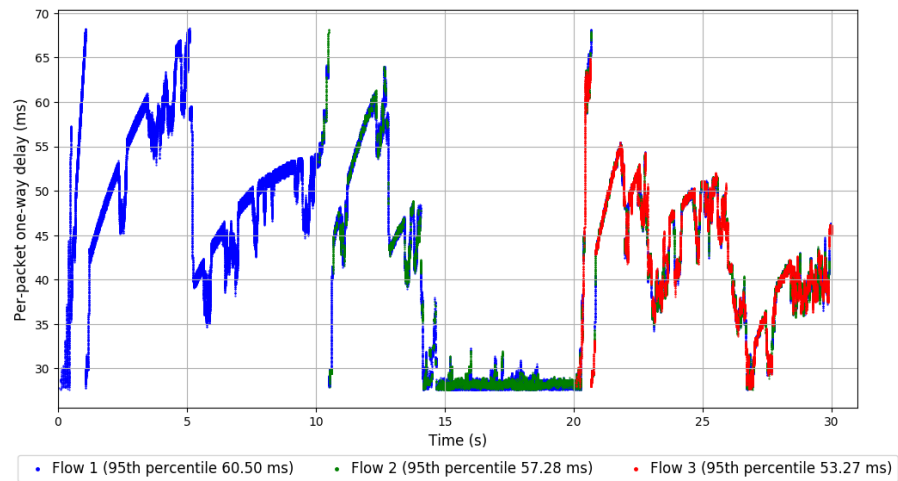
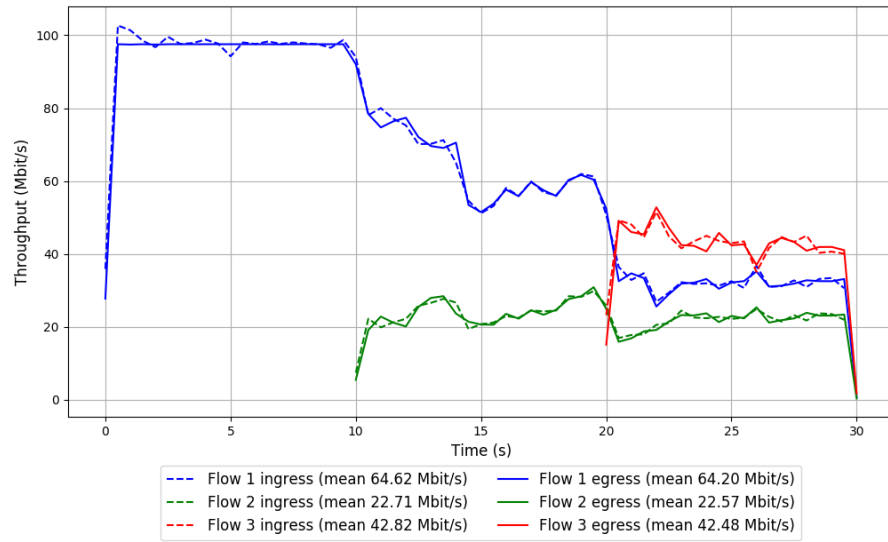


Run 9: Statistics of TCP Cubic

Start at: 2017-12-06 01:03:31  
End at: 2017-12-06 01:04:01  
Local clock offset: -0.661 ms  
Remote clock offset: -2.837 ms

# Below is generated by plot.py at 2017-12-06 02:18:22  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 93.32 Mbit/s  
95th percentile per-packet one-way delay: 59.892 ms  
Loss rate: 0.61%  
-- Flow 1:  
Average throughput: 64.20 Mbit/s  
95th percentile per-packet one-way delay: 60.504 ms  
Loss rate: 0.59%  
-- Flow 2:  
Average throughput: 22.57 Mbit/s  
95th percentile per-packet one-way delay: 57.285 ms  
Loss rate: 0.66%  
-- Flow 3:  
Average throughput: 42.48 Mbit/s  
95th percentile per-packet one-way delay: 53.270 ms  
Loss rate: 0.62%

# Run 9: Report of TCP Cubic — Data Link



Run 10: Statistics of TCP Cubic

Start at: 2017-12-06 01:28:55

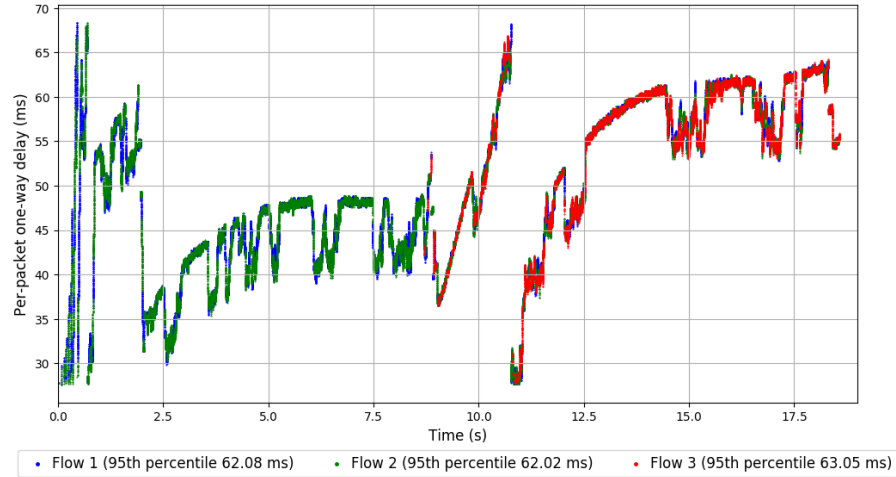
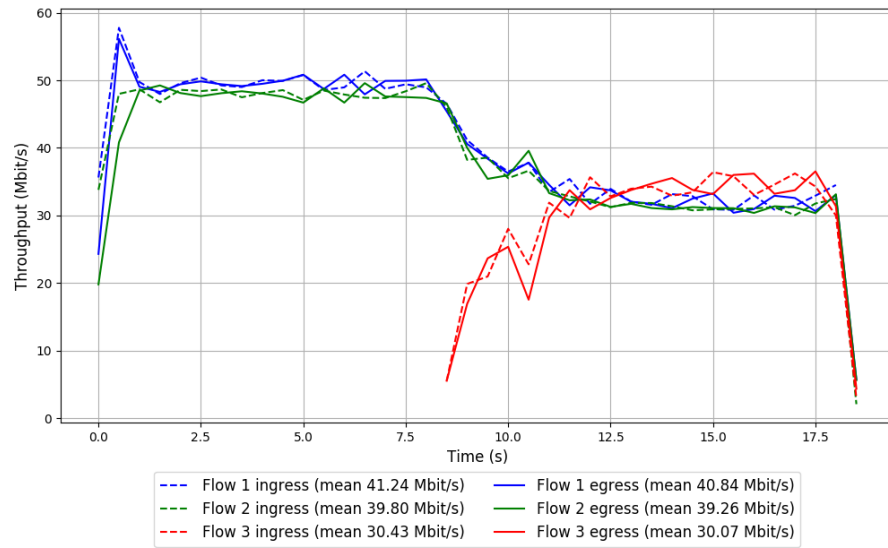
End at: 2017-12-06 01:29:25

Local clock offset: -0.885 ms

Remote clock offset: -3.042 ms



# Run 10: Report of TCP Cubic — Data Link

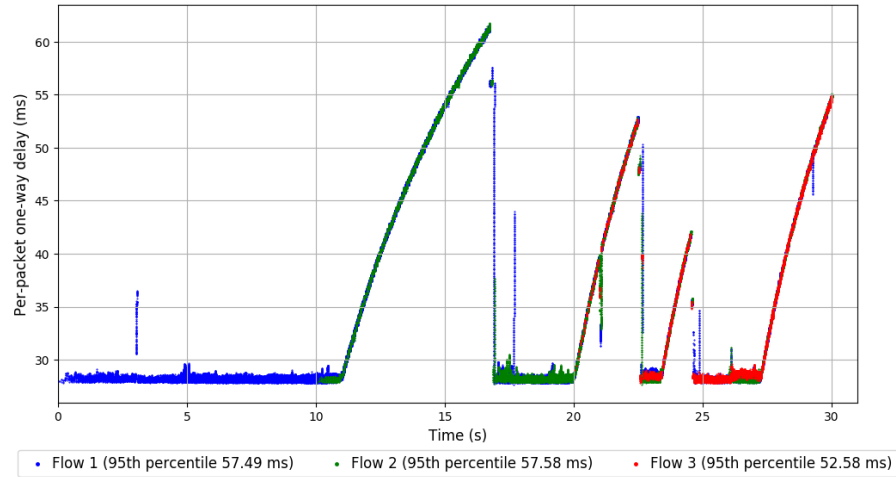
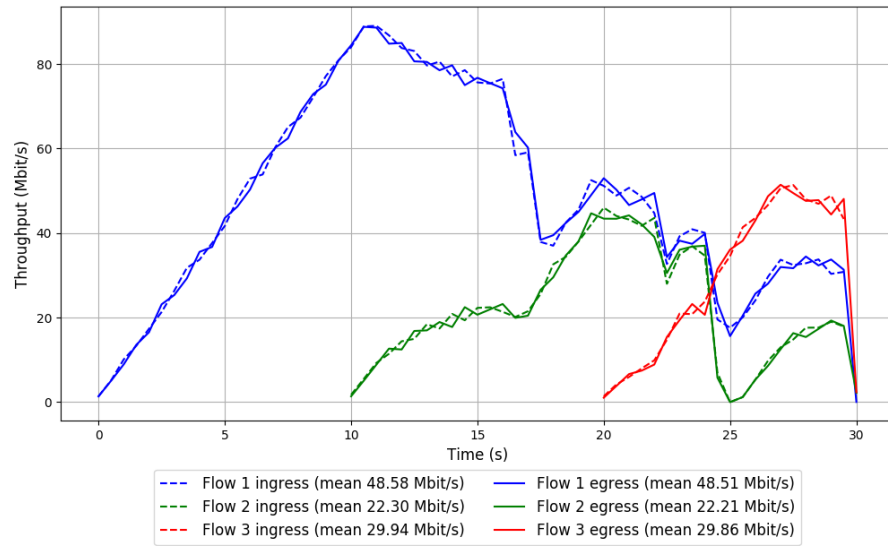


```
Run 1: Statistics of LEDBAT

Start at: 2017-12-05 22:24:08
End at: 2017-12-05 22:24:38
Local clock offset: -0.357 ms
Remote clock offset: -3.912 ms

# Below is generated by plot.py at 2017-12-06 02:18:22
# Datalink statistics
-- Total of 3 flows:
Average throughput: 73.22 Mbit/s
95th percentile per-packet one-way delay: 56.806 ms
Loss rate: 0.10%
-- Flow 1:
Average throughput: 48.51 Mbit/s
95th percentile per-packet one-way delay: 57.495 ms
Loss rate: 0.07%
-- Flow 2:
Average throughput: 22.21 Mbit/s
95th percentile per-packet one-way delay: 57.581 ms
Loss rate: 0.25%
-- Flow 3:
Average throughput: 29.86 Mbit/s
95th percentile per-packet one-way delay: 52.583 ms
Loss rate: 0.00%
```

# Run 1: Report of LEDBAT — Data Link

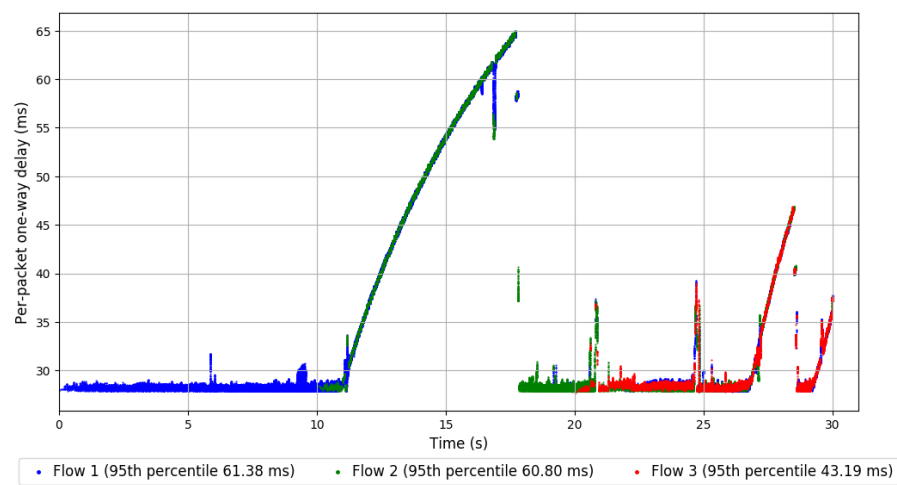
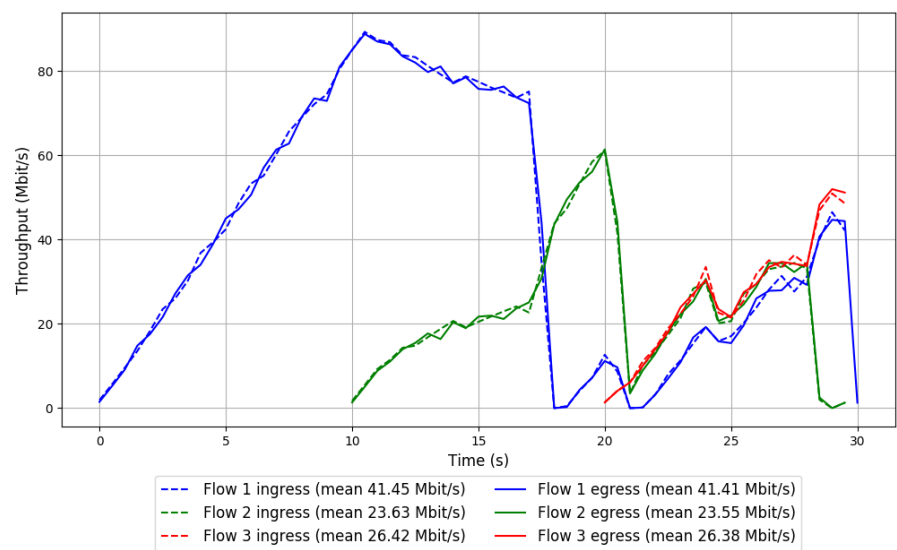


Run 2: Statistics of LEDBAT

Start at: 2017-12-05 22:44:24  
End at: 2017-12-05 22:44:54  
Local clock offset: -0.341 ms  
Remote clock offset: -3.554 ms

# Below is generated by plot.py at 2017-12-06 02:18:22  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 65.83 Mbit/s  
95th percentile per-packet one-way delay: 60.735 ms  
Loss rate: 0.13%  
-- Flow 1:  
Average throughput: 41.41 Mbit/s  
95th percentile per-packet one-way delay: 61.378 ms  
Loss rate: 0.07%  
-- Flow 2:  
Average throughput: 23.55 Mbit/s  
95th percentile per-packet one-way delay: 60.800 ms  
Loss rate: 0.31%  
-- Flow 3:  
Average throughput: 26.38 Mbit/s  
95th percentile per-packet one-way delay: 43.191 ms  
Loss rate: 0.05%

Run 2: Report of LEDBAT — Data Link

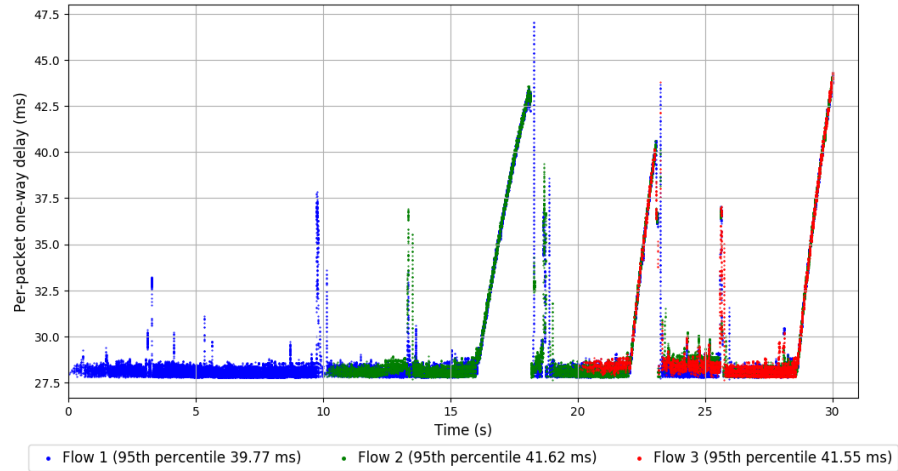
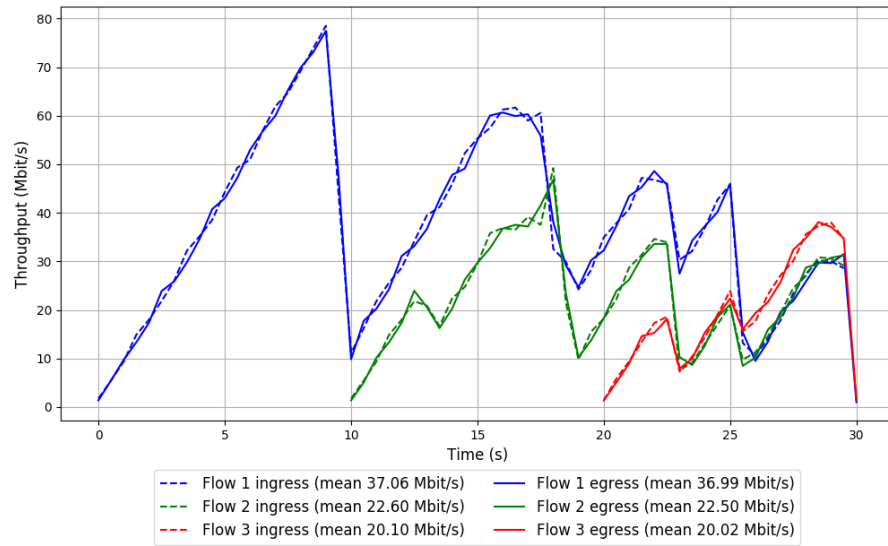


Run 3: Statistics of LEDBAT

Start at: 2017-12-05 23:04:29  
End at: 2017-12-05 23:04:59  
Local clock offset: -0.273 ms  
Remote clock offset: -3.671 ms

# Below is generated by plot.py at 2017-12-06 02:18:22  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 58.60 Mbit/s  
95th percentile per-packet one-way delay: 40.598 ms  
Loss rate: 0.21%  
-- Flow 1:  
Average throughput: 36.99 Mbit/s  
95th percentile per-packet one-way delay: 39.765 ms  
Loss rate: 0.13%  
-- Flow 2:  
Average throughput: 22.50 Mbit/s  
95th percentile per-packet one-way delay: 41.625 ms  
Loss rate: 0.36%  
-- Flow 3:  
Average throughput: 20.02 Mbit/s  
95th percentile per-packet one-way delay: 41.548 ms  
Loss rate: 0.26%

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



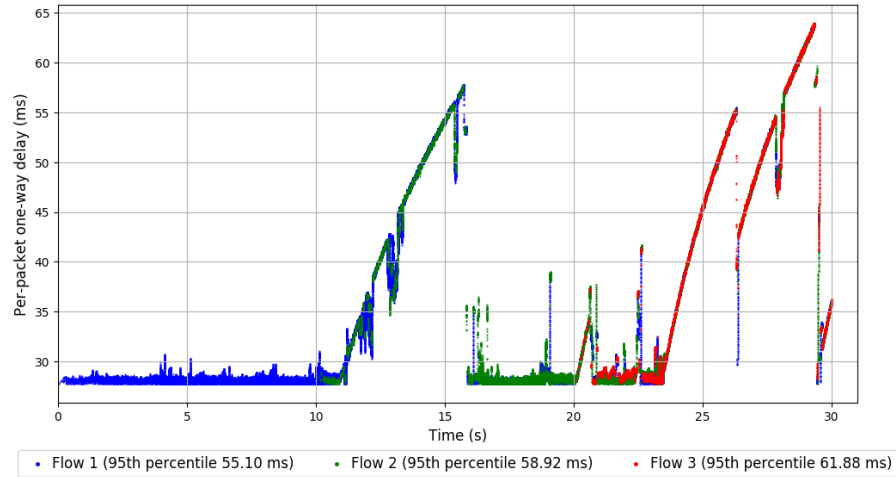
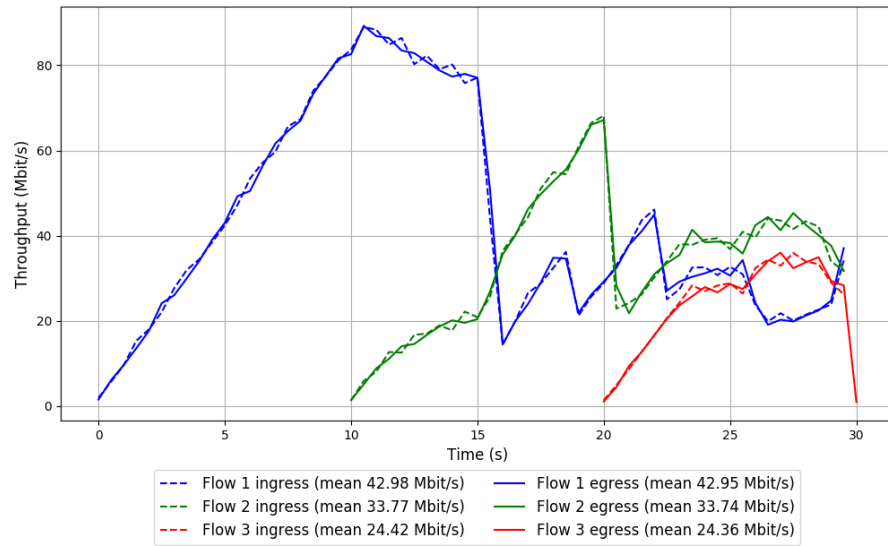
Run 4: Statistics of LEDBAT

Start at: 2017-12-05 23:24:44  
End at: 2017-12-05 23:25:14  
Local clock offset: -0.353 ms  
Remote clock offset: -4.334 ms

# Below is generated by plot.py at 2017-12-06 02:18:22  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 73.44 Mbit/s  
95th percentile per-packet one-way delay: 57.729 ms  
Loss rate: 0.06%  
-- Flow 1:  
Average throughput: 42.95 Mbit/s  
95th percentile per-packet one-way delay: 55.096 ms  
Loss rate: 0.04%  
-- Flow 2:  
Average throughput: 33.74 Mbit/s  
95th percentile per-packet one-way delay: 58.923 ms  
Loss rate: 0.07%  
-- Flow 3:  
Average throughput: 24.36 Mbit/s  
95th percentile per-packet one-way delay: 61.879 ms  
Loss rate: 0.15%



# Run 4: Report of LEDBAT — Data Link

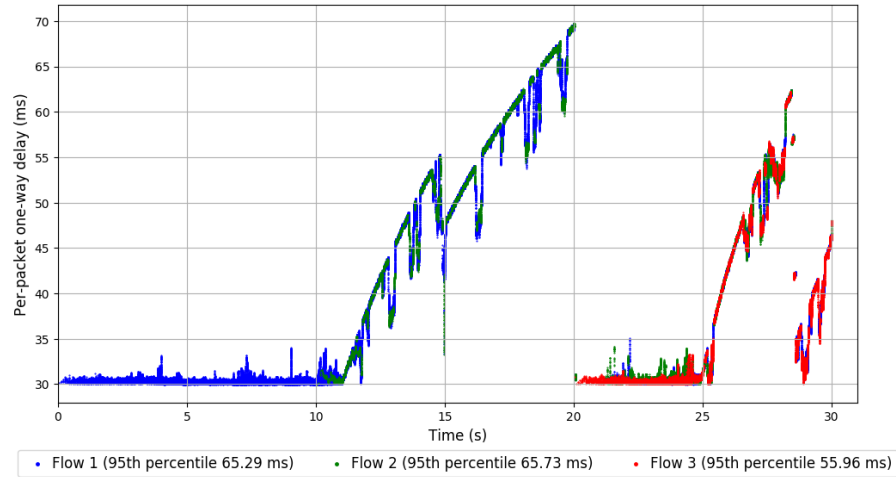
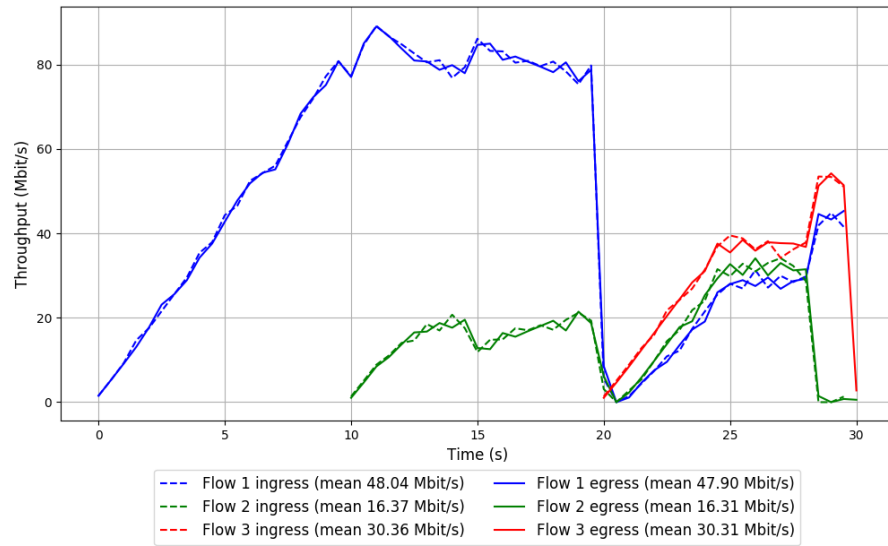


Run 5: Statistics of LEDBAT

Start at: 2017-12-05 23:46:24  
End at: 2017-12-05 23:46:54  
Local clock offset: -0.395 ms  
Remote clock offset: -2.461 ms

# Below is generated by plot.py at 2017-12-06 02:18:57  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 68.79 Mbit/s  
95th percentile per-packet one-way delay: 64.825 ms  
Loss rate: 0.21%  
-- Flow 1:  
Average throughput: 47.90 Mbit/s  
95th percentile per-packet one-way delay: 65.293 ms  
Loss rate: 0.24%  
-- Flow 2:  
Average throughput: 16.31 Mbit/s  
95th percentile per-packet one-way delay: 65.731 ms  
Loss rate: 0.30%  
-- Flow 3:  
Average throughput: 30.31 Mbit/s  
95th percentile per-packet one-way delay: 55.959 ms  
Loss rate: 0.00%

## Run 5: Report of LEDBAT — Data Link

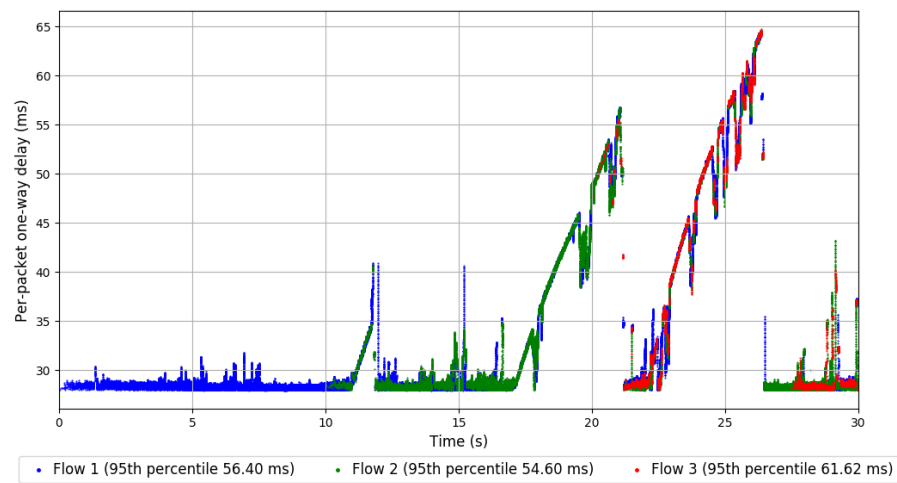
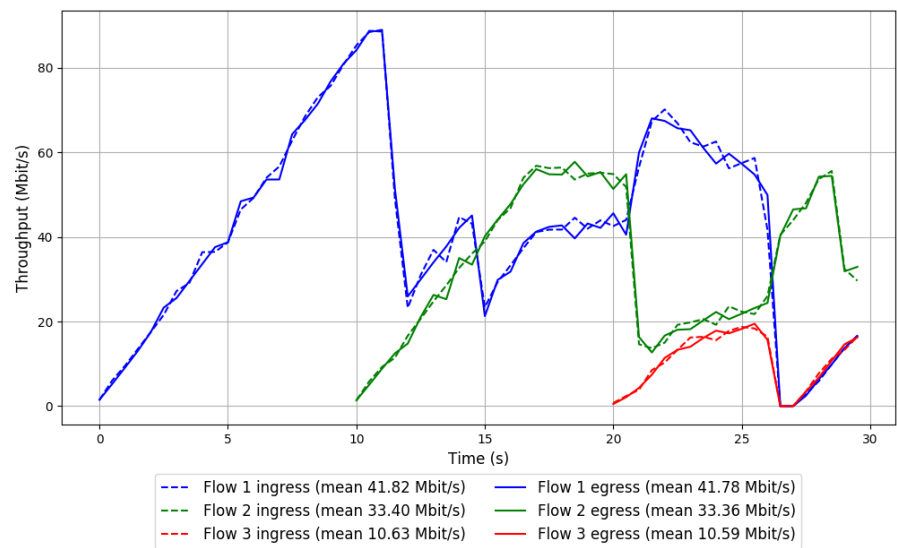


Run 6: Statistics of LEDBAT

Start at: 2017-12-06 00:08:35  
End at: 2017-12-06 00:09:05  
Local clock offset: -0.451 ms  
Remote clock offset: -4.121 ms

# Below is generated by plot.py at 2017-12-06 02:19:00  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 67.46 Mbit/s  
95th percentile per-packet one-way delay: 56.726 ms  
Loss rate: 0.13%  
-- Flow 1:  
Average throughput: 41.78 Mbit/s  
95th percentile per-packet one-way delay: 56.401 ms  
Loss rate: 0.08%  
-- Flow 2:  
Average throughput: 33.36 Mbit/s  
95th percentile per-packet one-way delay: 54.604 ms  
Loss rate: 0.13%  
-- Flow 3:  
Average throughput: 10.59 Mbit/s  
95th percentile per-packet one-way delay: 61.615 ms  
Loss rate: 0.59%

Run 6: Report of LEDBAT — Data Link

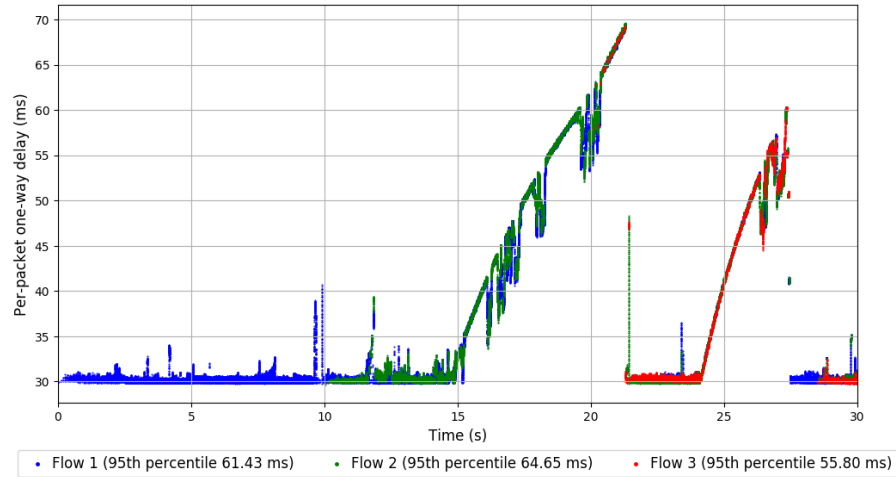
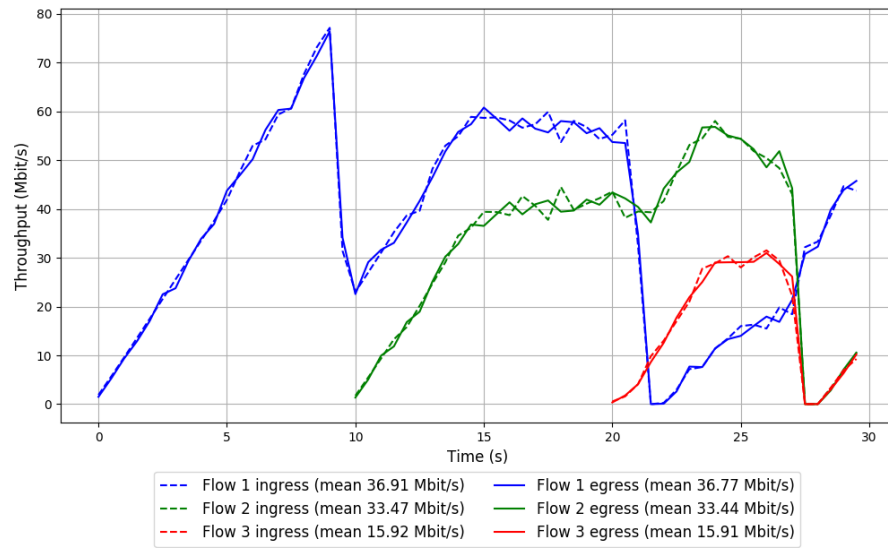


Run 7: Statistics of LEDBAT

Start at: 2017-12-06 00:30:04  
End at: 2017-12-06 00:30:34  
Local clock offset: -0.535 ms  
Remote clock offset: -1.472 ms

# Below is generated by plot.py at 2017-12-06 02:19:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 64.27 Mbit/s  
95th percentile per-packet one-way delay: 62.285 ms  
Loss rate: 0.27%  
-- Flow 1:  
Average throughput: 36.77 Mbit/s  
95th percentile per-packet one-way delay: 61.430 ms  
Loss rate: 0.37%  
-- Flow 2:  
Average throughput: 33.44 Mbit/s  
95th percentile per-packet one-way delay: 64.654 ms  
Loss rate: 0.09%  
-- Flow 3:  
Average throughput: 15.91 Mbit/s  
95th percentile per-packet one-way delay: 55.804 ms  
Loss rate: 0.32%

## Run 7: Report of LEDBAT — Data Link



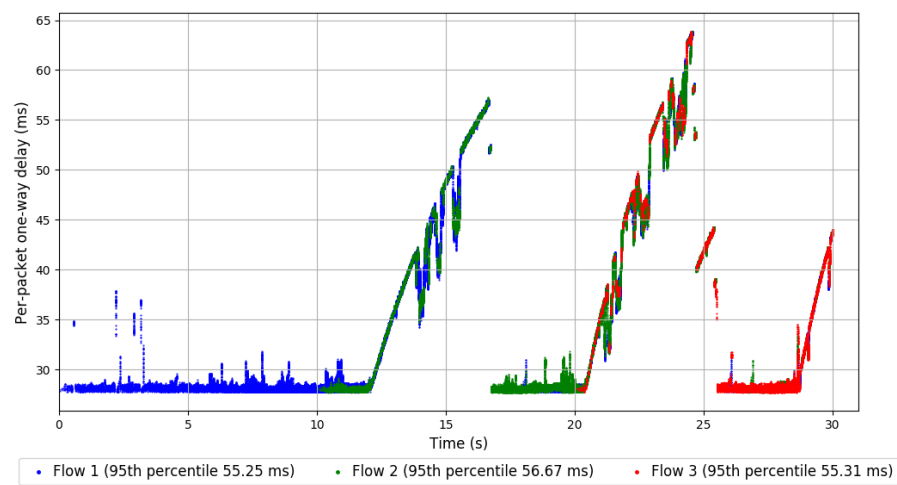
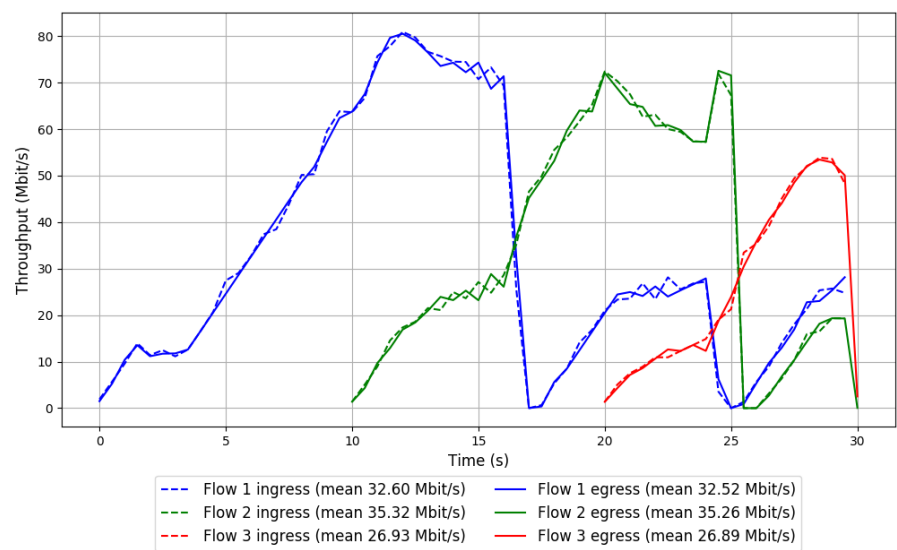
Run 8: Statistics of LEDBAT

Start at: 2017-12-06 00:51:06  
End at: 2017-12-06 00:51:36  
Local clock offset: -0.677 ms  
Remote clock offset: -2.95 ms

# Below is generated by plot.py at 2017-12-06 02:19:06  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 64.92 Mbit/s  
95th percentile per-packet one-way delay: 55.935 ms  
Loss rate: 0.12%  
-- Flow 1:  
Average throughput: 32.52 Mbit/s  
95th percentile per-packet one-way delay: 55.246 ms  
Loss rate: 0.18%  
-- Flow 2:  
Average throughput: 35.26 Mbit/s  
95th percentile per-packet one-way delay: 56.669 ms  
Loss rate: 0.08%  
-- Flow 3:  
Average throughput: 26.89 Mbit/s  
95th percentile per-packet one-way delay: 55.312 ms  
Loss rate: 0.00%



Run 8: Report of LEDBAT — Data Link

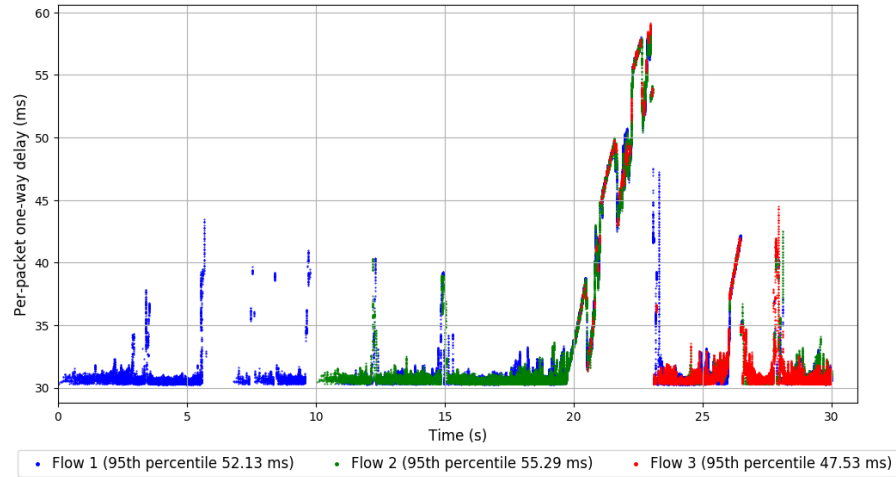
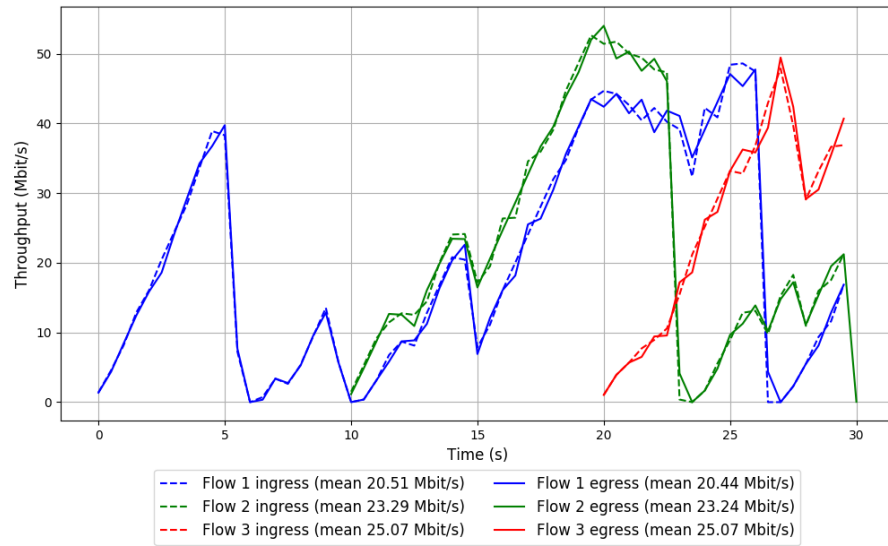


Run 9: Statistics of LEDBAT

Start at: 2017-12-06 01:15:31  
End at: 2017-12-06 01:16:01  
Local clock offset: -0.843 ms  
Remote clock offset: -0.334 ms

# Below is generated by plot.py at 2017-12-06 02:19:06  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 44.22 Mbit/s  
95th percentile per-packet one-way delay: 53.312 ms  
Loss rate: 0.25%  
-- Flow 1:  
Average throughput: 20.44 Mbit/s  
95th percentile per-packet one-way delay: 52.130 ms  
Loss rate: 0.35%  
-- Flow 2:  
Average throughput: 23.24 Mbit/s  
95th percentile per-packet one-way delay: 55.291 ms  
Loss rate: 0.23%  
-- Flow 3:  
Average throughput: 25.07 Mbit/s  
95th percentile per-packet one-way delay: 47.534 ms  
Loss rate: 0.03%

# Run 9: Report of LEDBAT — Data Link

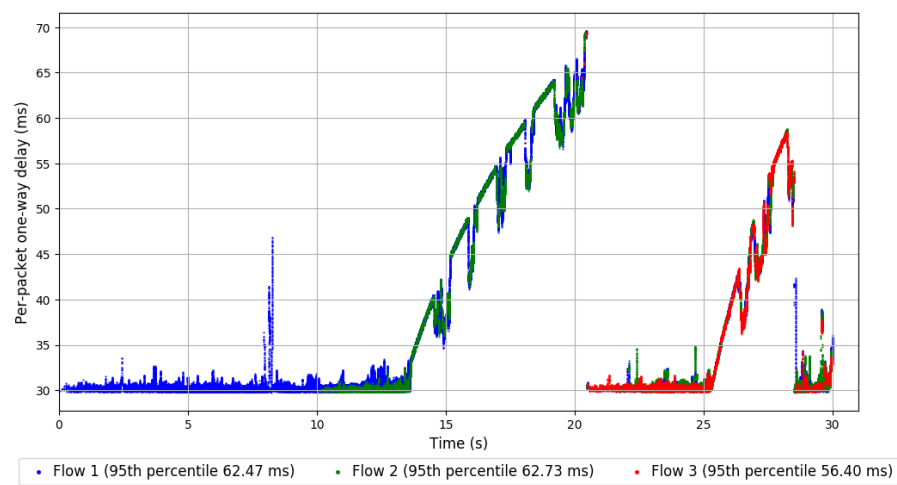
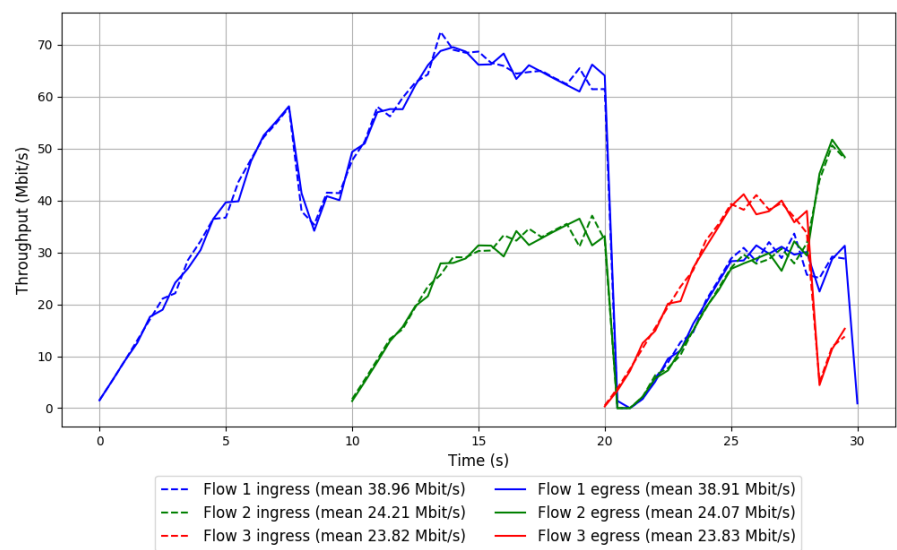


Run 10: Statistics of LEDBAT

Start at: 2017-12-06 01:40:15  
End at: 2017-12-06 01:40:45  
Local clock offset: -1.127 ms  
Remote clock offset: -1.156 ms

# Below is generated by plot.py at 2017-12-06 02:19:09  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 62.79 Mbit/s  
95th percentile per-packet one-way delay: 62.247 ms  
Loss rate: 0.24%  
-- Flow 1:  
Average throughput: 38.91 Mbit/s  
95th percentile per-packet one-way delay: 62.465 ms  
Loss rate: 0.10%  
-- Flow 2:  
Average throughput: 24.07 Mbit/s  
95th percentile per-packet one-way delay: 62.730 ms  
Loss rate: 0.58%  
-- Flow 3:  
Average throughput: 23.83 Mbit/s  
95th percentile per-packet one-way delay: 56.402 ms  
Loss rate: 0.28%

Run 10: Report of LEDBAT — Data Link

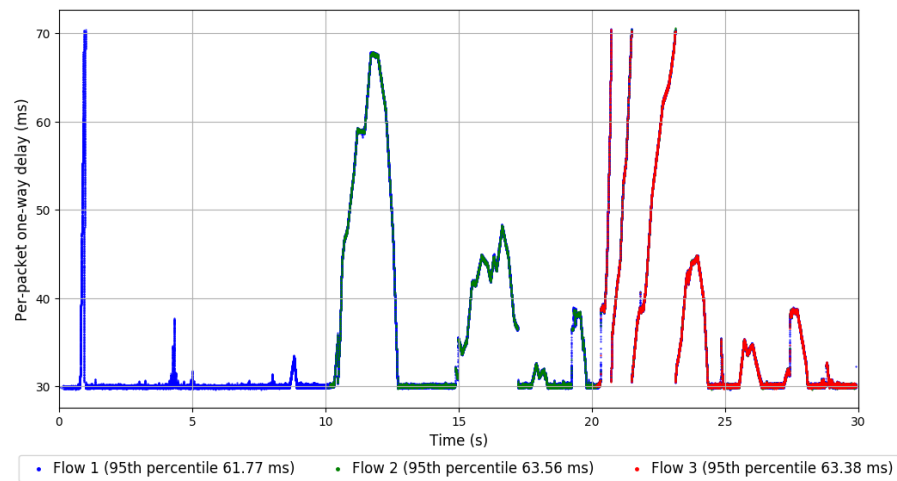
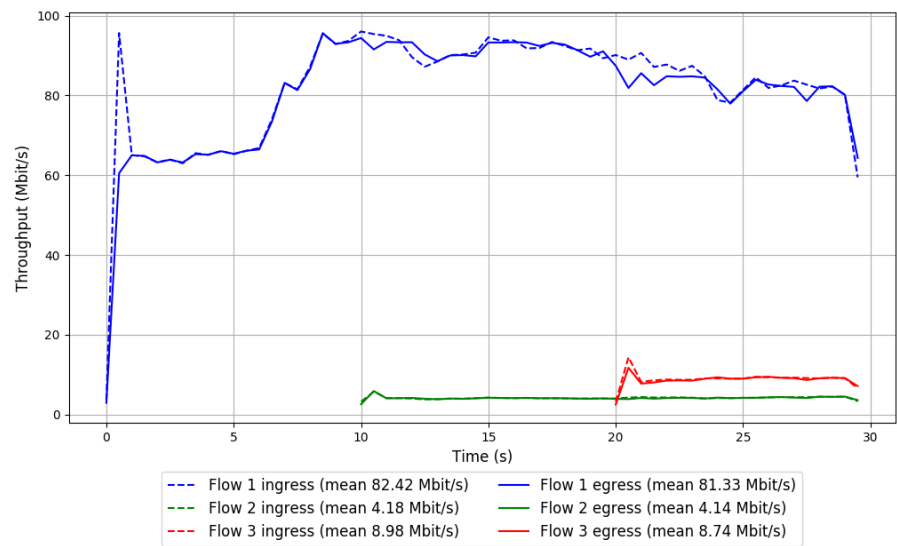


```
Run 1: Statistics of PCC

Start at: 2017-12-05 22:19:20
End at: 2017-12-05 22:19:50
Local clock offset: -0.36 ms
Remote clock offset: -2.123 ms

# Below is generated by plot.py at 2017-12-06 02:19:39
# Datalink statistics
-- Total of 3 flows:
Average throughput: 86.96 Mbit/s
95th percentile per-packet one-way delay: 62.002 ms
Loss rate: 1.35%
-- Flow 1:
Average throughput: 81.33 Mbit/s
95th percentile per-packet one-way delay: 61.768 ms
Loss rate: 1.31%
-- Flow 2:
Average throughput: 4.14 Mbit/s
95th percentile per-packet one-way delay: 63.565 ms
Loss rate: 1.01%
-- Flow 3:
Average throughput: 8.74 Mbit/s
95th percentile per-packet one-way delay: 63.375 ms
Loss rate: 2.74%
```

Run 1: Report of PCC — Data Link



Run 2: Statistics of PCC

Start at: 2017-12-05 22:40:01

End at: 2017-12-05 22:40:31

Local clock offset: -0.277 ms

Remote clock offset: -1.54 ms

# Below is generated by plot.py at 2017-12-06 02:19:44

# Datalink statistics

-- Total of 3 flows:

Average throughput: 91.36 Mbit/s

95th percentile per-packet one-way delay: 62.866 ms

Loss rate: 1.75%

-- Flow 1:

Average throughput: 78.42 Mbit/s

95th percentile per-packet one-way delay: 62.626 ms

Loss rate: 1.73%

-- Flow 2:

Average throughput: 14.73 Mbit/s

95th percentile per-packet one-way delay: 63.795 ms

Loss rate: 1.60%

-- Flow 3:

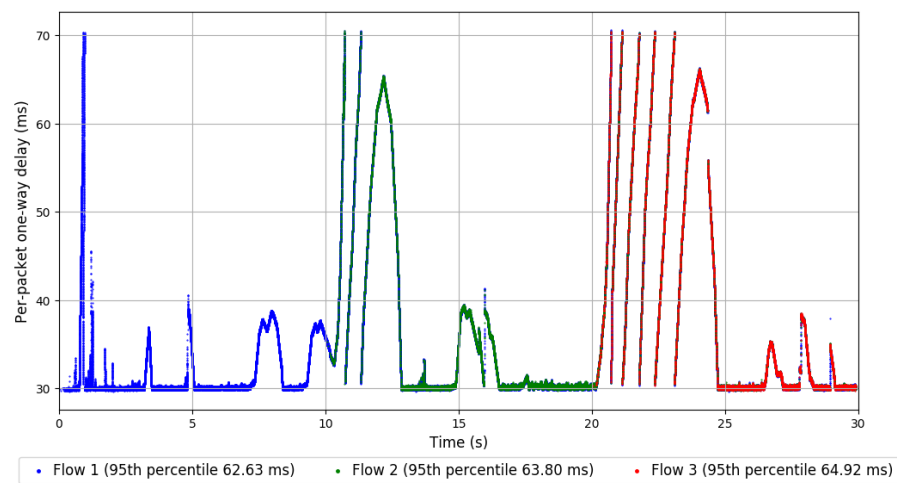
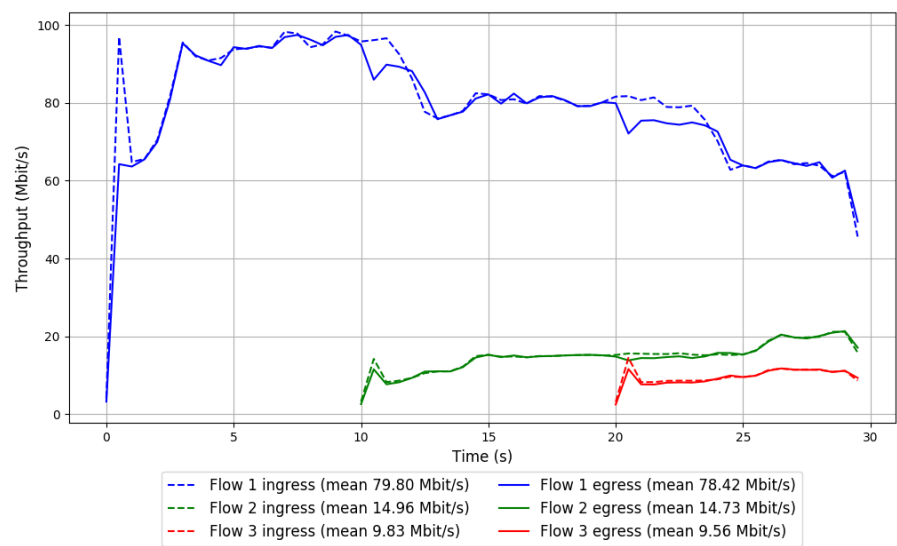
Average throughput: 9.56 Mbit/s

95th percentile per-packet one-way delay: 64.920 ms

Loss rate: 2.76%



Run 2: Report of PCC — Data Link

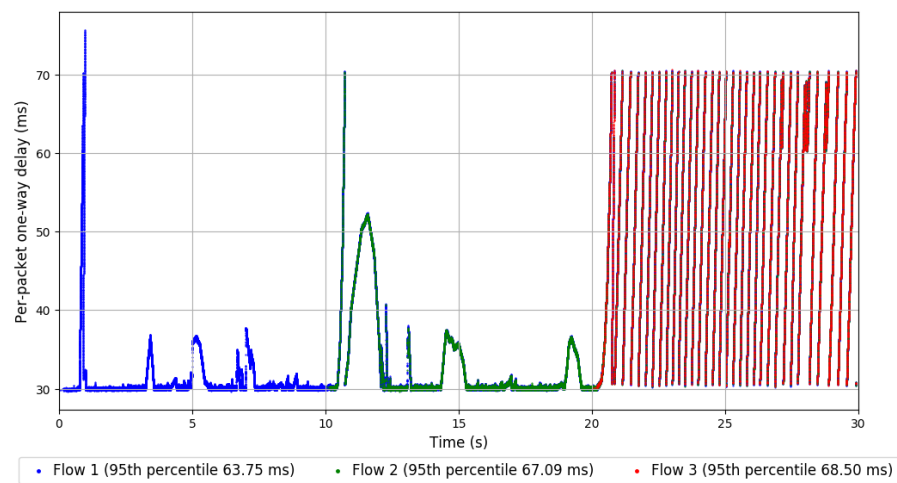
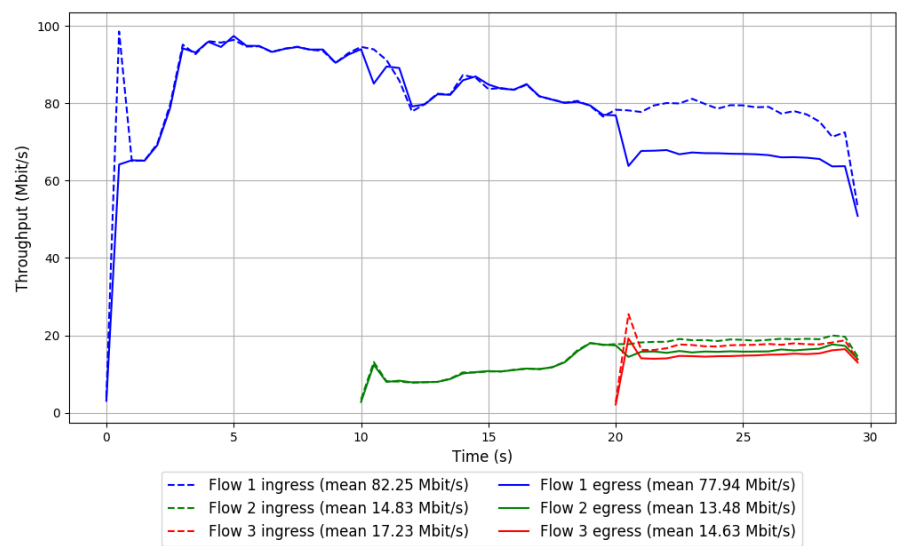


Run 3: Statistics of PCC

Start at: 2017-12-05 23:00:09  
End at: 2017-12-05 23:00:39  
Local clock offset: -0.271 ms  
Remote clock offset: -1.598 ms

# Below is generated by plot.py at 2017-12-06 02:20:18  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 91.71 Mbit/s  
95th percentile per-packet one-way delay: 65.038 ms  
Loss rate: 6.19%  
-- Flow 1:  
Average throughput: 77.94 Mbit/s  
95th percentile per-packet one-way delay: 63.753 ms  
Loss rate: 5.23%  
-- Flow 2:  
Average throughput: 13.48 Mbit/s  
95th percentile per-packet one-way delay: 67.090 ms  
Loss rate: 9.05%  
-- Flow 3:  
Average throughput: 14.63 Mbit/s  
95th percentile per-packet one-way delay: 68.505 ms  
Loss rate: 15.08%

Run 3: Report of PCC — Data Link

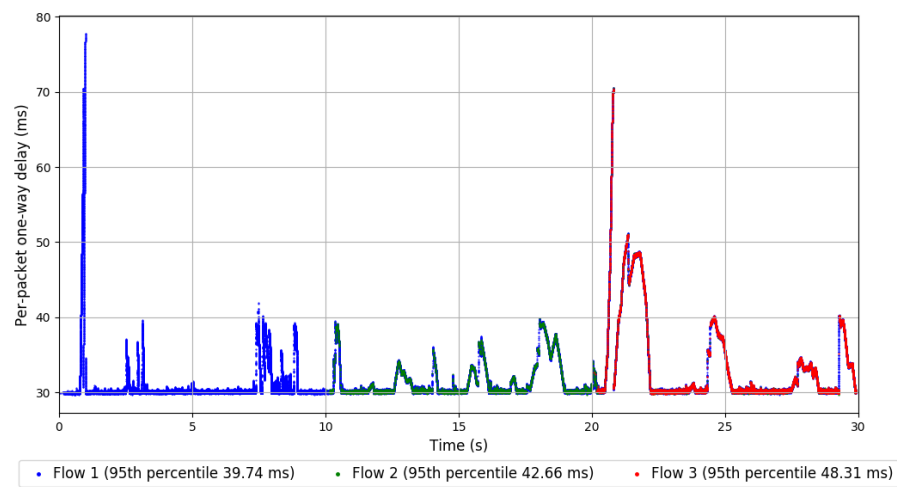
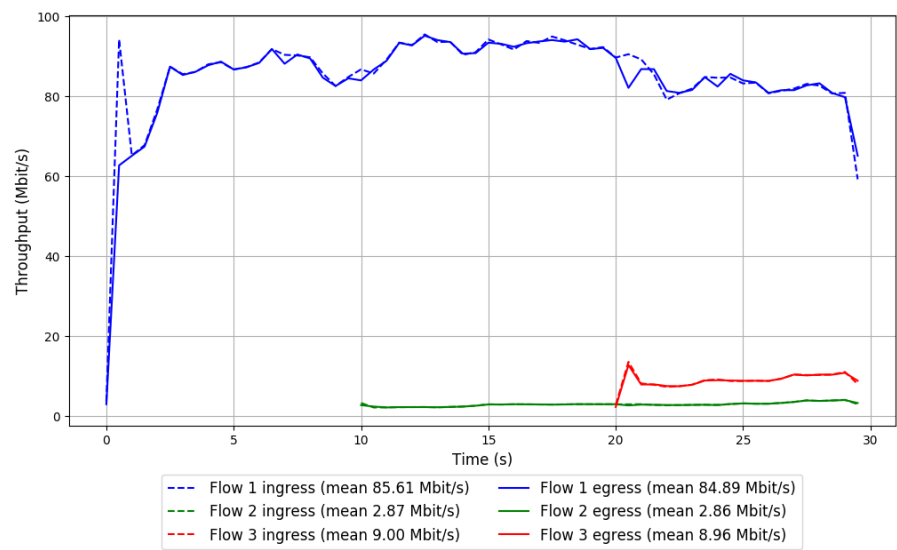


Run 4: Statistics of PCC

Start at: 2017-12-05 23:20:18  
End at: 2017-12-05 23:20:48  
Local clock offset: -0.26 ms  
Remote clock offset: -1.967 ms

# Below is generated by plot.py at 2017-12-06 02:20:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 89.75 Mbit/s  
95th percentile per-packet one-way delay: 40.112 ms  
Loss rate: 0.82%  
-- Flow 1:  
Average throughput: 84.89 Mbit/s  
95th percentile per-packet one-way delay: 39.737 ms  
Loss rate: 0.84%  
-- Flow 2:  
Average throughput: 2.86 Mbit/s  
95th percentile per-packet one-way delay: 42.664 ms  
Loss rate: 0.41%  
-- Flow 3:  
Average throughput: 8.96 Mbit/s  
95th percentile per-packet one-way delay: 48.310 ms  
Loss rate: 0.51%

Run 4: Report of PCC — Data Link



Run 5: Statistics of PCC

Start at: 2017-12-05 23:41:06

End at: 2017-12-05 23:41:36

Local clock offset: -0.301 ms

Remote clock offset: -2.6 ms

# Below is generated by plot.py at 2017-12-06 02:20:25

# Datalink statistics

-- Total of 3 flows:

Average throughput: 88.28 Mbit/s

95th percentile per-packet one-way delay: 64.849 ms

Loss rate: 1.48%

-- Flow 1:

Average throughput: 82.67 Mbit/s

95th percentile per-packet one-way delay: 64.929 ms

Loss rate: 1.48%

-- Flow 2:

Average throughput: 4.22 Mbit/s

95th percentile per-packet one-way delay: 65.823 ms

Loss rate: 1.47%

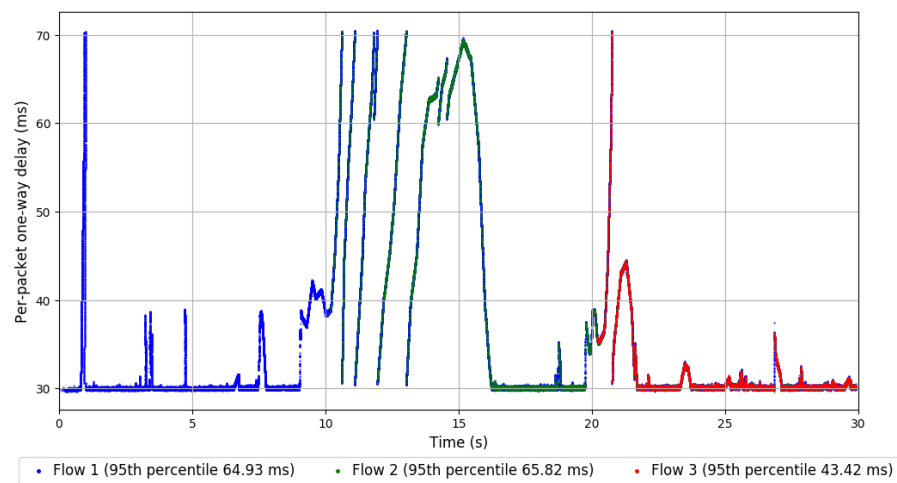
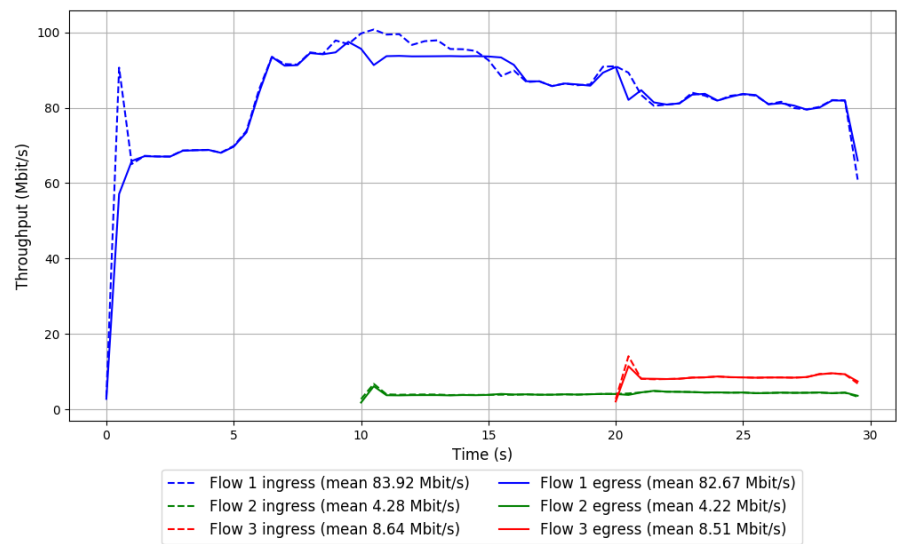
-- Flow 3:

Average throughput: 8.51 Mbit/s

95th percentile per-packet one-way delay: 43.421 ms

Loss rate: 1.53%

Run 5: Report of PCC — Data Link



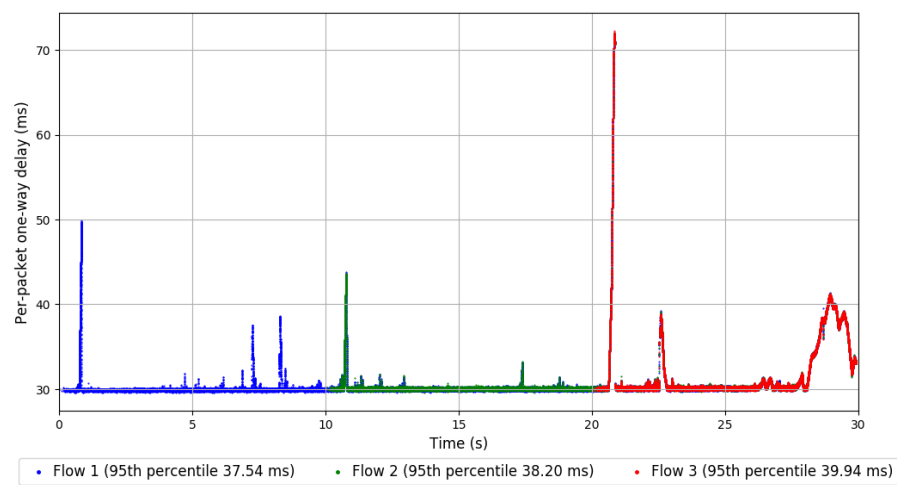
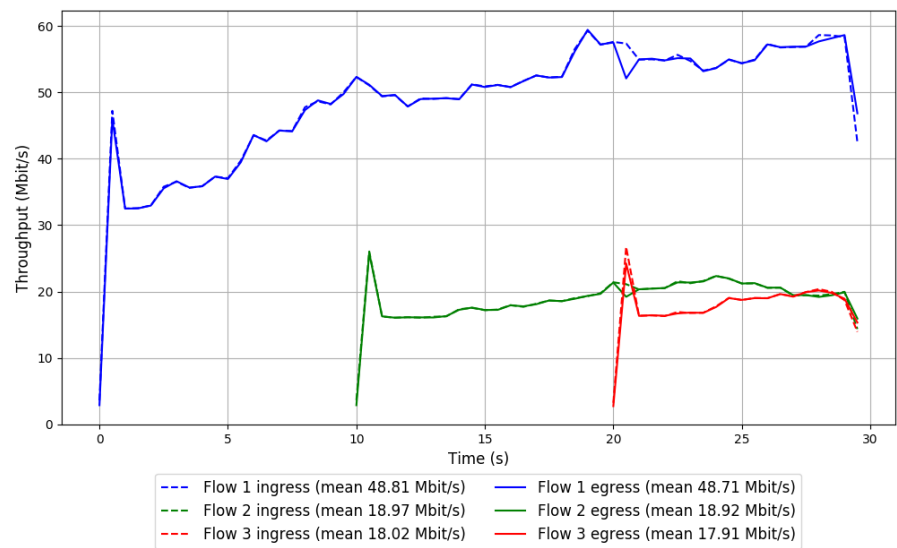
Run 6: Statistics of PCC

Start at: 2017-12-06 00:03:42  
End at: 2017-12-06 00:04:12  
Local clock offset: -0.34 ms  
Remote clock offset: -2.235 ms

# Below is generated by plot.py at 2017-12-06 02:20:25  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 67.19 Mbit/s  
95th percentile per-packet one-way delay: 38.106 ms  
Loss rate: 0.24%  
-- Flow 1:  
Average throughput: 48.71 Mbit/s  
95th percentile per-packet one-way delay: 37.537 ms  
Loss rate: 0.20%  
-- Flow 2:  
Average throughput: 18.92 Mbit/s  
95th percentile per-packet one-way delay: 38.204 ms  
Loss rate: 0.26%  
-- Flow 3:  
Average throughput: 17.91 Mbit/s  
95th percentile per-packet one-way delay: 39.939 ms  
Loss rate: 0.59%



Run 6: Report of PCC — Data Link



Run 7: Statistics of PCC

Start at: 2017-12-06 00:25:27

End at: 2017-12-06 00:25:57

Local clock offset: -0.436 ms

Remote clock offset: -3.77 ms

# Below is generated by plot.py at 2017-12-06 02:20:29

# Datalink statistics

-- Total of 3 flows:

Average throughput: 86.12 Mbit/s

95th percentile per-packet one-way delay: 59.669 ms

Loss rate: 1.08%

-- Flow 1:

Average throughput: 78.04 Mbit/s

95th percentile per-packet one-way delay: 59.538 ms

Loss rate: 1.13%

-- Flow 2:

Average throughput: 9.95 Mbit/s

95th percentile per-packet one-way delay: 61.188 ms

Loss rate: 0.74%

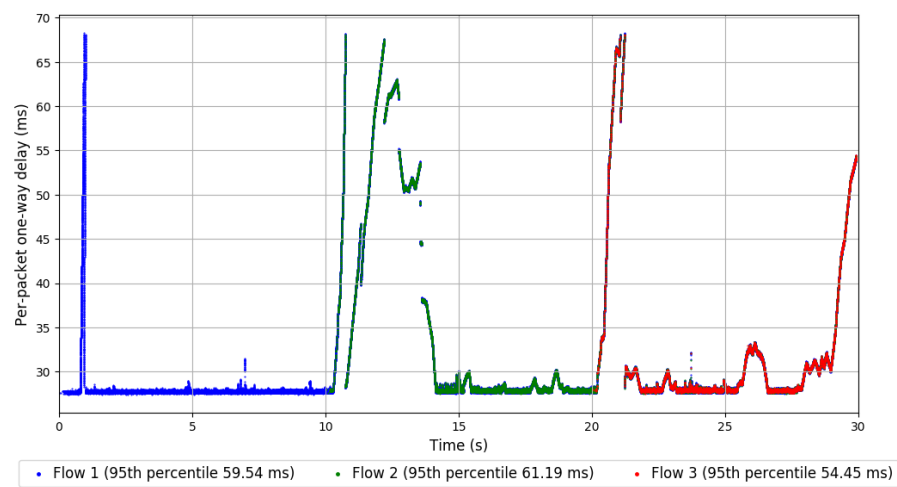
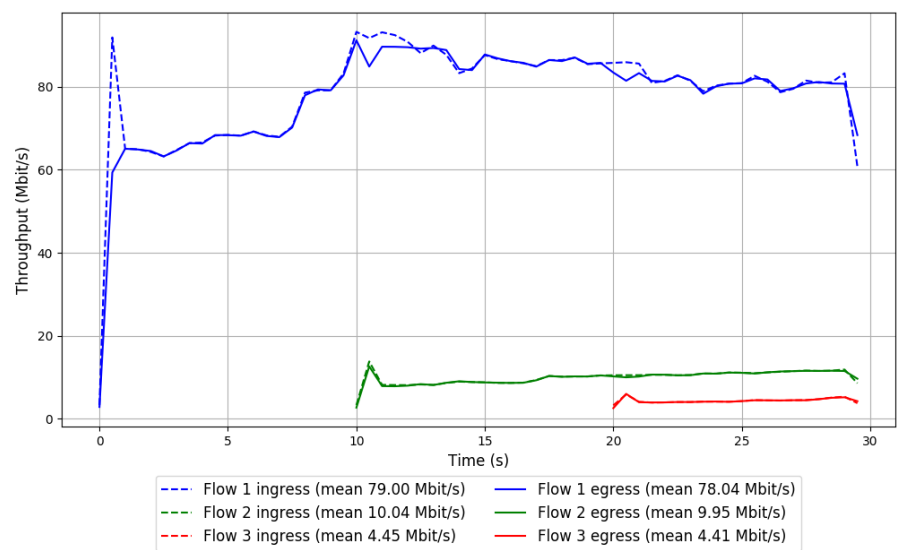
-- Flow 3:

Average throughput: 4.41 Mbit/s

95th percentile per-packet one-way delay: 54.447 ms

Loss rate: 0.44%

Run 7: Report of PCC — Data Link

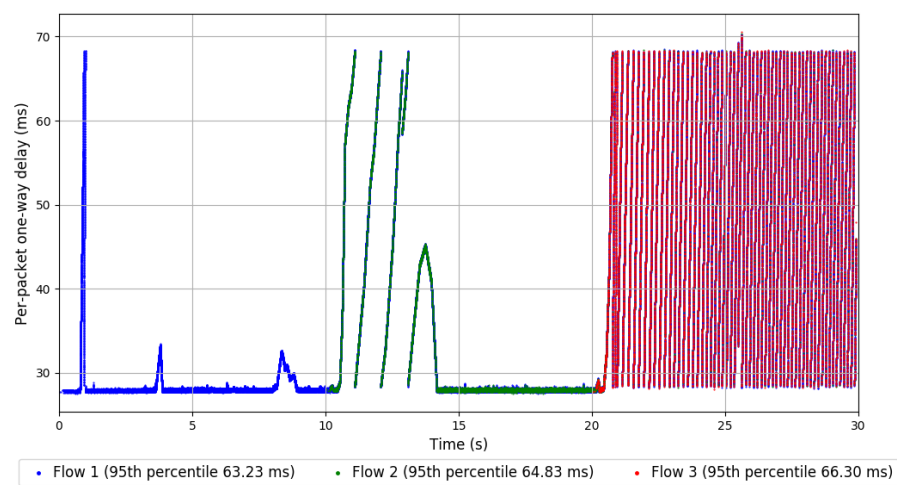
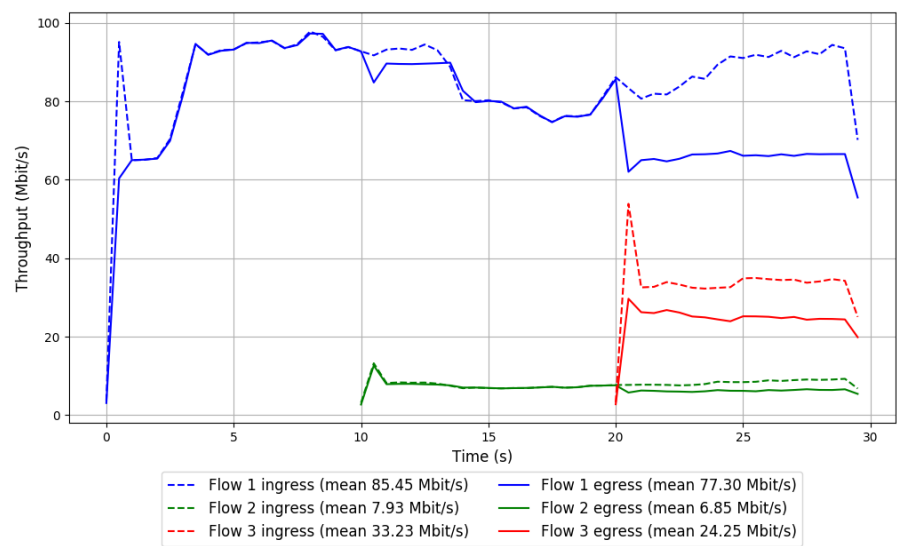


Run 8: Statistics of PCC

Start at: 2017-12-06 00:46:31  
End at: 2017-12-06 00:47:01  
Local clock offset: -0.635 ms  
Remote clock offset: -3.054 ms

# Below is generated by plot.py at 2017-12-06 02:20:39  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 89.86 Mbit/s  
95th percentile per-packet one-way delay: 63.865 ms  
Loss rate: 11.57%  
-- Flow 1:  
Average throughput: 77.30 Mbit/s  
95th percentile per-packet one-way delay: 63.228 ms  
Loss rate: 9.48%  
-- Flow 2:  
Average throughput: 6.85 Mbit/s  
95th percentile per-packet one-way delay: 64.835 ms  
Loss rate: 13.53%  
-- Flow 3:  
Average throughput: 24.25 Mbit/s  
95th percentile per-packet one-way delay: 66.297 ms  
Loss rate: 26.86%

Run 8: Report of PCC — Data Link

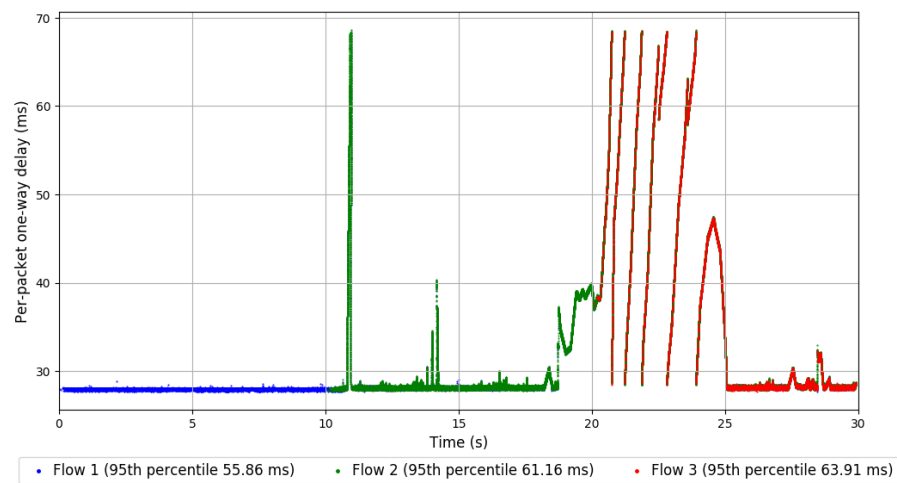
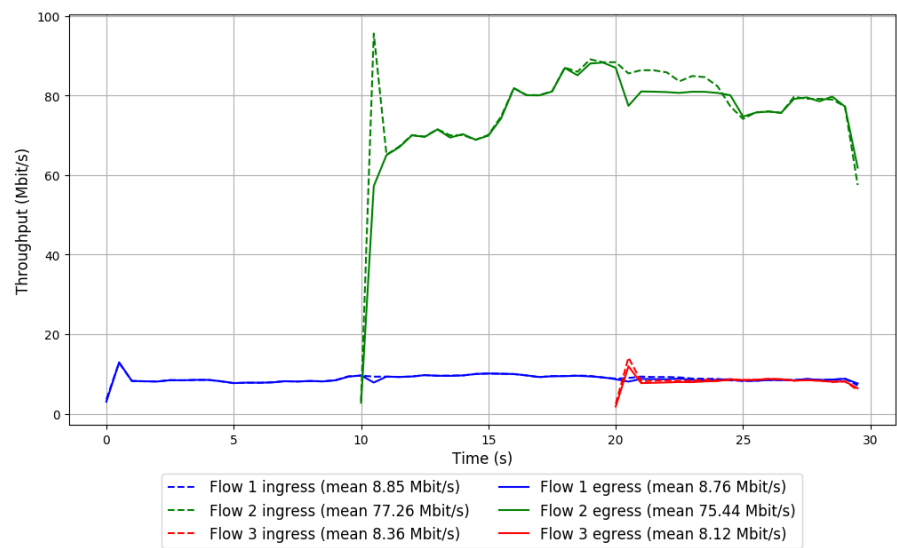


Run 9: Statistics of PCC

Start at: 2017-12-06 01:09:48  
End at: 2017-12-06 01:10:18  
Local clock offset: -0.816 ms  
Remote clock offset: -2.691 ms

# Below is generated by plot.py at 2017-12-06 02:20:45  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 61.59 Mbit/s  
95th percentile per-packet one-way delay: 61.041 ms  
Loss rate: 2.19%  
-- Flow 1:  
Average throughput: 8.76 Mbit/s  
95th percentile per-packet one-way delay: 55.863 ms  
Loss rate: 1.02%  
-- Flow 2:  
Average throughput: 75.44 Mbit/s  
95th percentile per-packet one-way delay: 61.158 ms  
Loss rate: 2.36%  
-- Flow 3:  
Average throughput: 8.12 Mbit/s  
95th percentile per-packet one-way delay: 63.905 ms  
Loss rate: 2.90%

Run 9: Report of PCC — Data Link



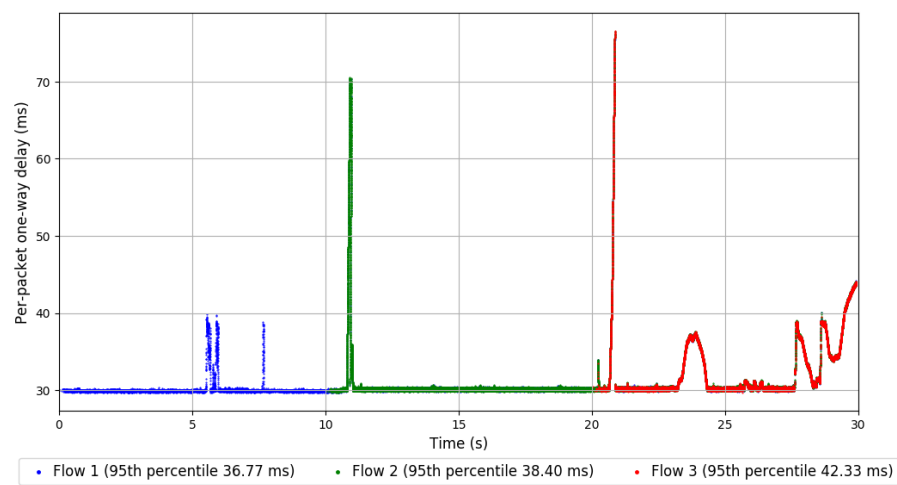
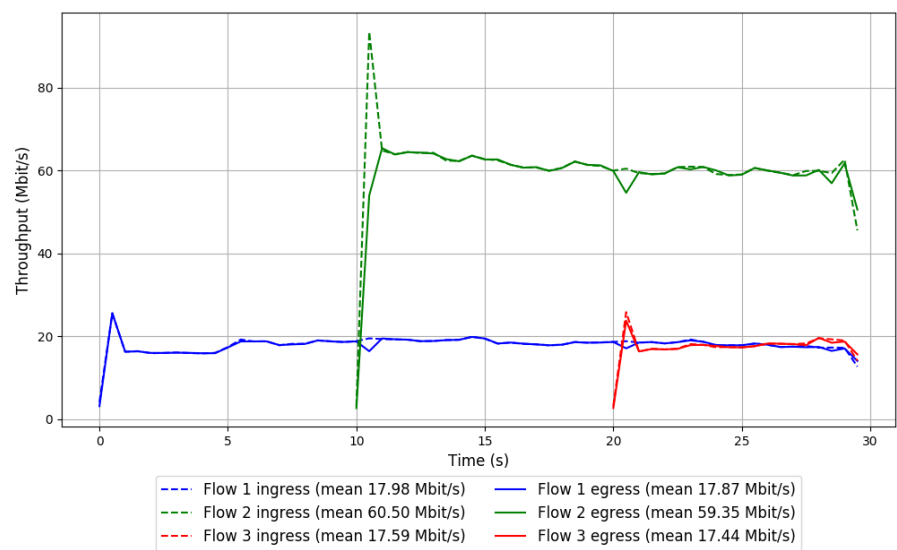
Run 10: Statistics of PCC

Start at: 2017-12-06 01:34:31  
End at: 2017-12-06 01:35:01  
Local clock offset: -1.044 ms  
Remote clock offset: -1.008 ms

# Below is generated by plot.py at 2017-12-06 02:20:50  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 63.09 Mbit/s  
95th percentile per-packet one-way delay: 38.332 ms  
Loss rate: 1.38%  
-- Flow 1:  
Average throughput: 17.87 Mbit/s  
95th percentile per-packet one-way delay: 36.769 ms  
Loss rate: 0.57%  
-- Flow 2:  
Average throughput: 59.35 Mbit/s  
95th percentile per-packet one-way delay: 38.400 ms  
Loss rate: 1.84%  
-- Flow 3:  
Average throughput: 17.44 Mbit/s  
95th percentile per-packet one-way delay: 42.326 ms  
Loss rate: 0.72%



Run 10: Report of PCC — Data Link

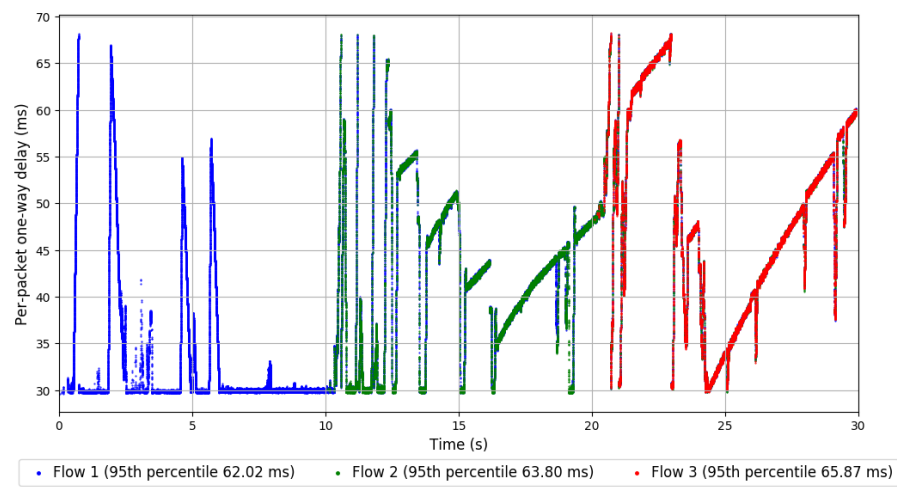
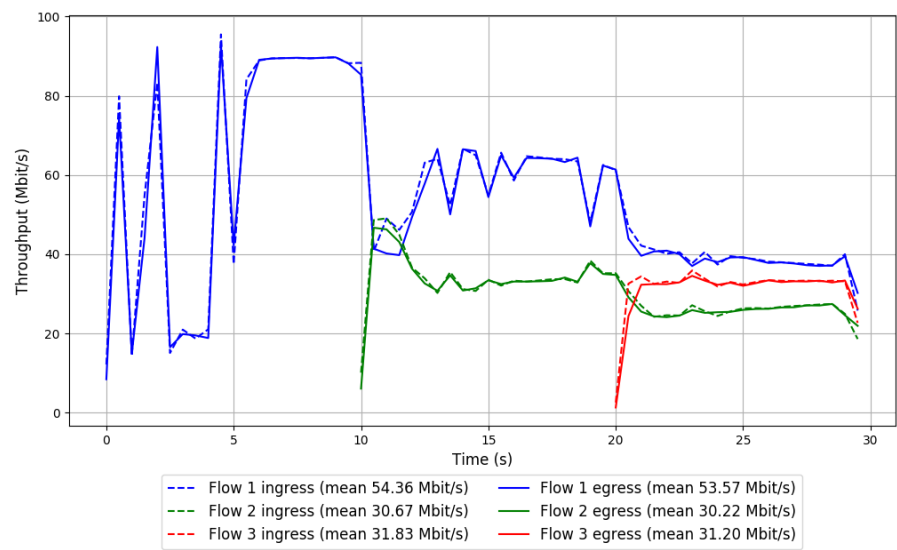


```
Run 1: Statistics of QUIC Cubic

Start at: 2017-12-05 22:32:36
End at: 2017-12-05 22:33:06
Local clock offset: -0.283 ms
Remote clock offset: -1.738 ms

# Below is generated by plot.py at 2017-12-06 02:21:25
# Datalink statistics
-- Total of 3 flows:
Average throughput: 83.90 Mbit/s
95th percentile per-packet one-way delay: 63.692 ms
Loss rate: 1.40%
-- Flow 1:
Average throughput: 53.57 Mbit/s
95th percentile per-packet one-way delay: 62.019 ms
Loss rate: 1.35%
-- Flow 2:
Average throughput: 30.22 Mbit/s
95th percentile per-packet one-way delay: 63.796 ms
Loss rate: 1.33%
-- Flow 3:
Average throughput: 31.20 Mbit/s
95th percentile per-packet one-way delay: 65.873 ms
Loss rate: 1.85%
```

Run 1: Report of QUIC Cubic — Data Link

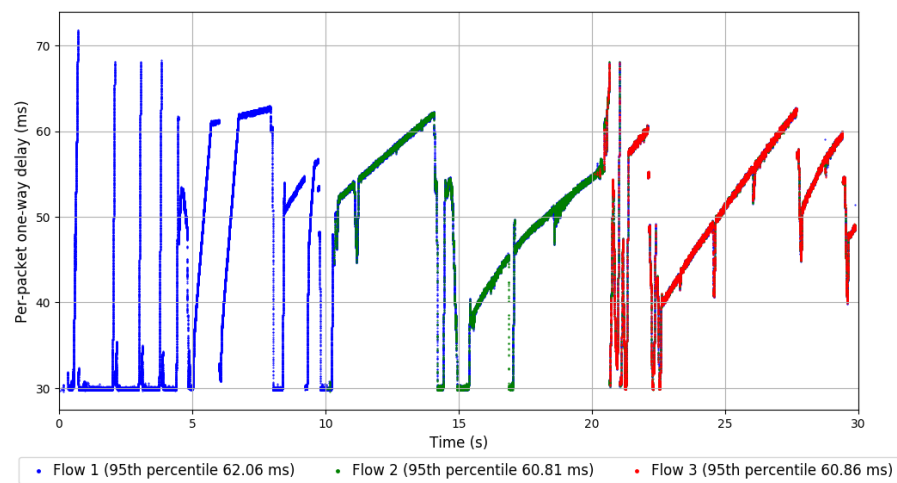
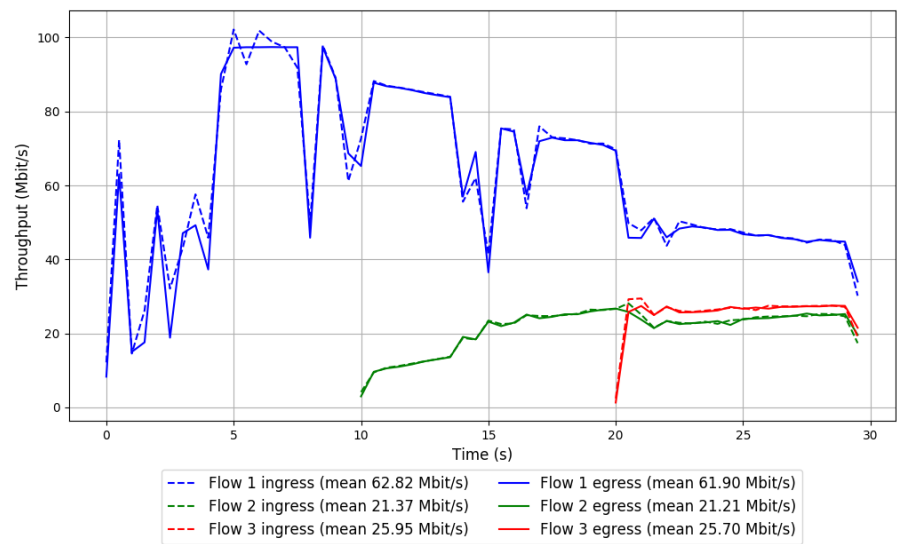


Run 2: Statistics of QUIC Cubic

Start at: 2017-12-05 22:52:45  
End at: 2017-12-05 22:53:15  
Local clock offset: -0.255 ms  
Remote clock offset: -1.582 ms

# Below is generated by plot.py at 2017-12-06 02:21:38  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 84.42 Mbit/s  
95th percentile per-packet one-way delay: 61.926 ms  
Loss rate: 1.24%  
-- Flow 1:  
Average throughput: 61.90 Mbit/s  
95th percentile per-packet one-way delay: 62.063 ms  
Loss rate: 1.40%  
-- Flow 2:  
Average throughput: 21.21 Mbit/s  
95th percentile per-packet one-way delay: 60.811 ms  
Loss rate: 0.65%  
-- Flow 3:  
Average throughput: 25.70 Mbit/s  
95th percentile per-packet one-way delay: 60.864 ms  
Loss rate: 1.05%

Run 2: Report of QUIC Cubic — Data Link

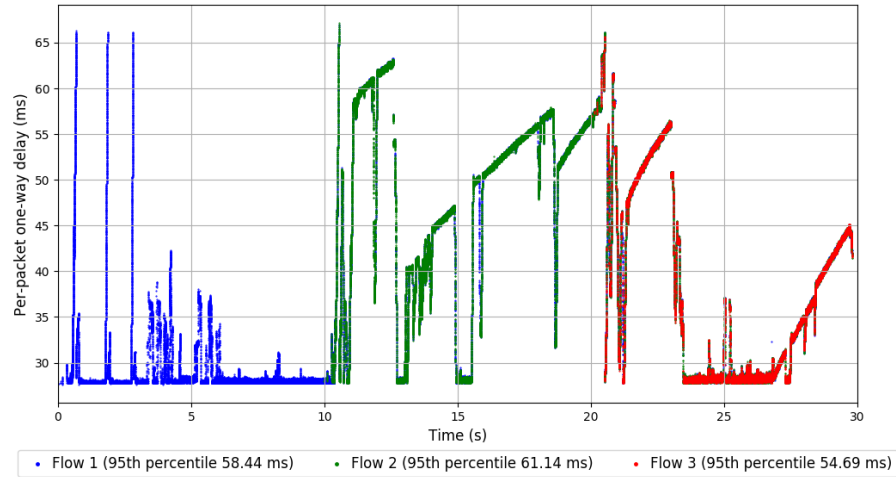
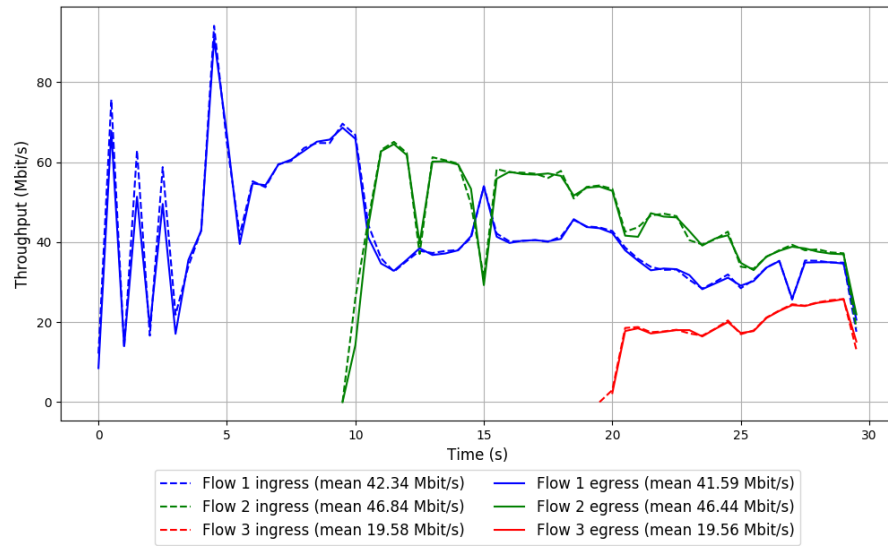


Run 3: Statistics of QUIC Cubic

Start at: 2017-12-05 23:12:34  
End at: 2017-12-05 23:13:04  
Local clock offset: -0.343 ms  
Remote clock offset: -3.864 ms

# Below is generated by plot.py at 2017-12-06 02:21:38  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 78.95 Mbit/s  
95th percentile per-packet one-way delay: 59.912 ms  
Loss rate: 1.25%  
-- Flow 1:  
Average throughput: 41.59 Mbit/s  
95th percentile per-packet one-way delay: 58.437 ms  
Loss rate: 1.72%  
-- Flow 2:  
Average throughput: 46.44 Mbit/s  
95th percentile per-packet one-way delay: 61.138 ms  
Loss rate: 0.80%  
-- Flow 3:  
Average throughput: 19.56 Mbit/s  
95th percentile per-packet one-way delay: 54.691 ms  
Loss rate: 0.25%

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



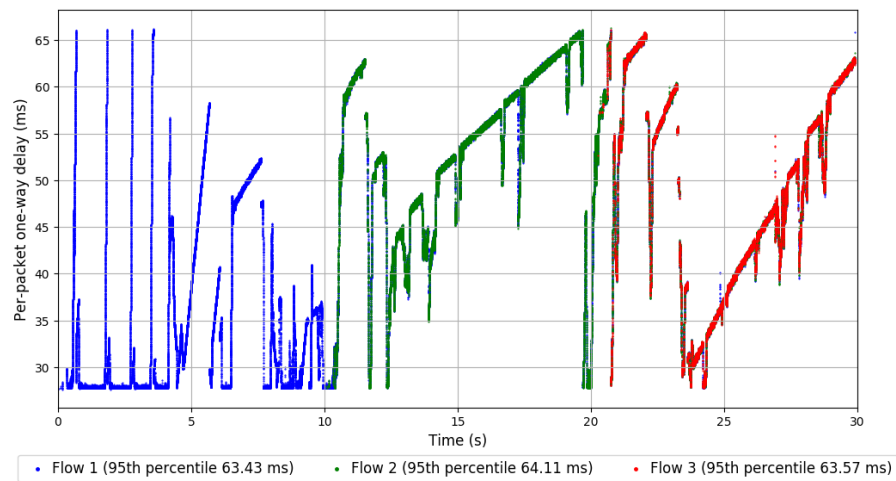
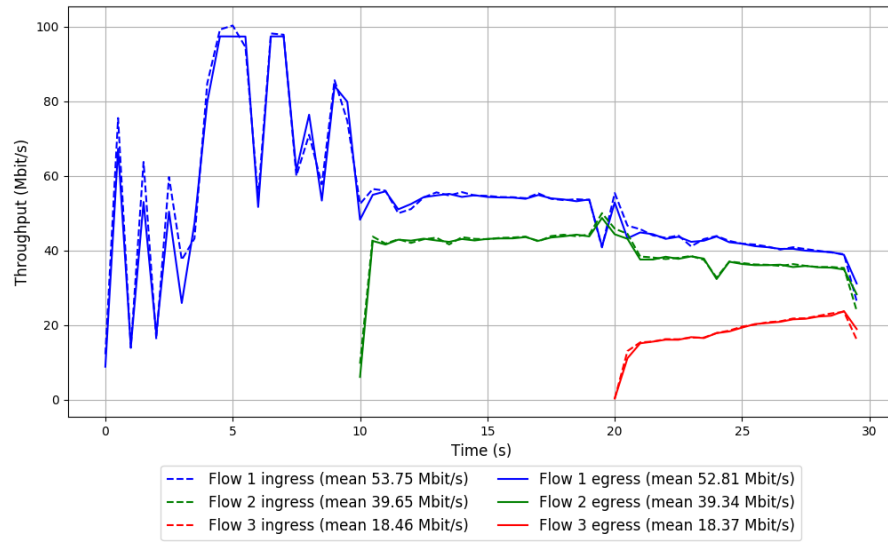
Run 4: Statistics of QUIC Cubic

Start at: 2017-12-05 23:33:10  
End at: 2017-12-05 23:33:40  
Local clock offset: -0.356 ms  
Remote clock offset: -4.615 ms

# Below is generated by plot.py at 2017-12-06 02:21:53  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 84.89 Mbit/s  
95th percentile per-packet one-way delay: 63.734 ms  
Loss rate: 1.22%  
-- Flow 1:  
Average throughput: 52.81 Mbit/s  
95th percentile per-packet one-way delay: 63.430 ms  
Loss rate: 1.62%  
-- Flow 2:  
Average throughput: 39.34 Mbit/s  
95th percentile per-packet one-way delay: 64.109 ms  
Loss rate: 0.59%  
-- Flow 3:  
Average throughput: 18.37 Mbit/s  
95th percentile per-packet one-way delay: 63.570 ms  
Loss rate: 0.38%



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

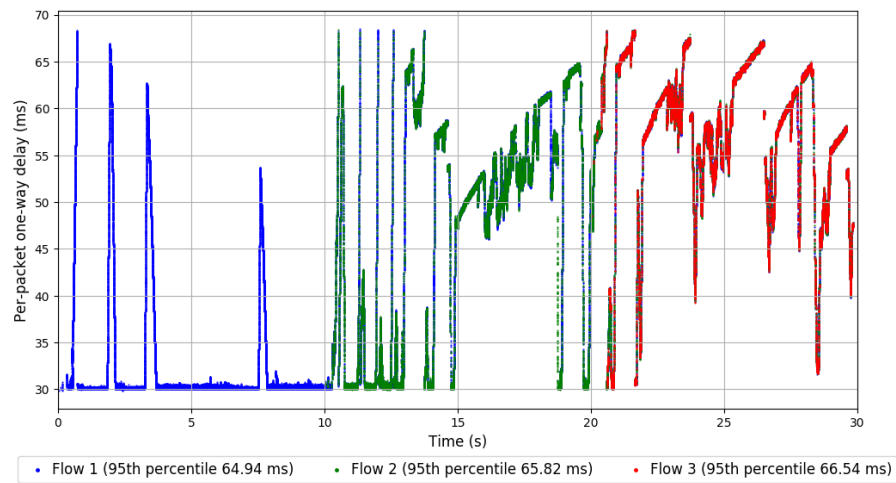
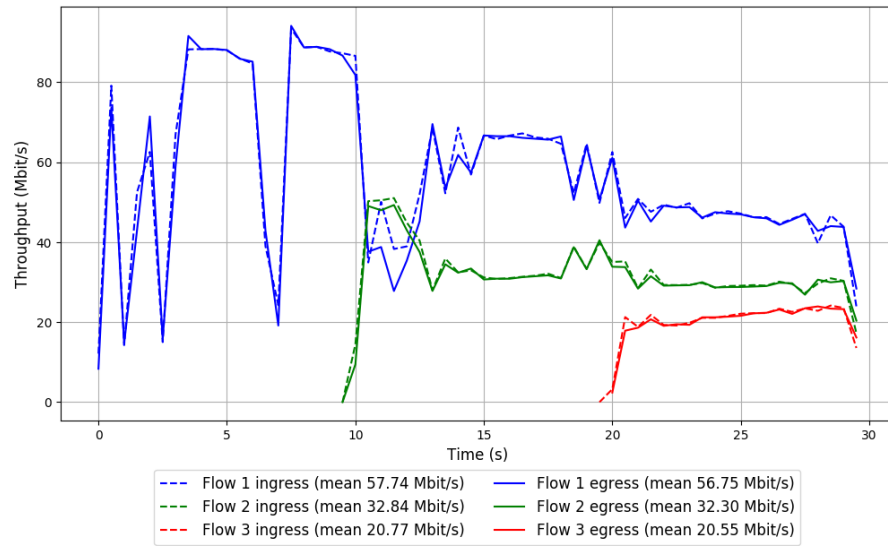


Run 5: Statistics of QUIC Cubic

Start at: 2017-12-05 23:55:07  
End at: 2017-12-05 23:55:37  
Local clock offset: -0.419 ms  
Remote clock offset: -2.324 ms

# Below is generated by plot.py at 2017-12-06 02:21:59  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.02 Mbit/s  
95th percentile per-packet one-way delay: 65.563 ms  
Loss rate: 1.58%  
-- Flow 1:  
Average throughput: 56.75 Mbit/s  
95th percentile per-packet one-way delay: 64.941 ms  
Loss rate: 1.65%  
-- Flow 2:  
Average throughput: 32.30 Mbit/s  
95th percentile per-packet one-way delay: 65.816 ms  
Loss rate: 1.57%  
-- Flow 3:  
Average throughput: 20.55 Mbit/s  
95th percentile per-packet one-way delay: 66.537 ms  
Loss rate: 1.09%

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

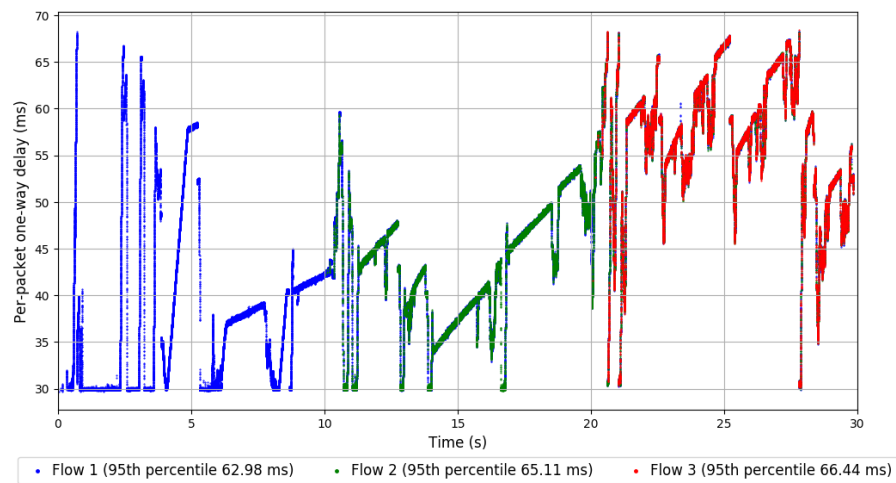
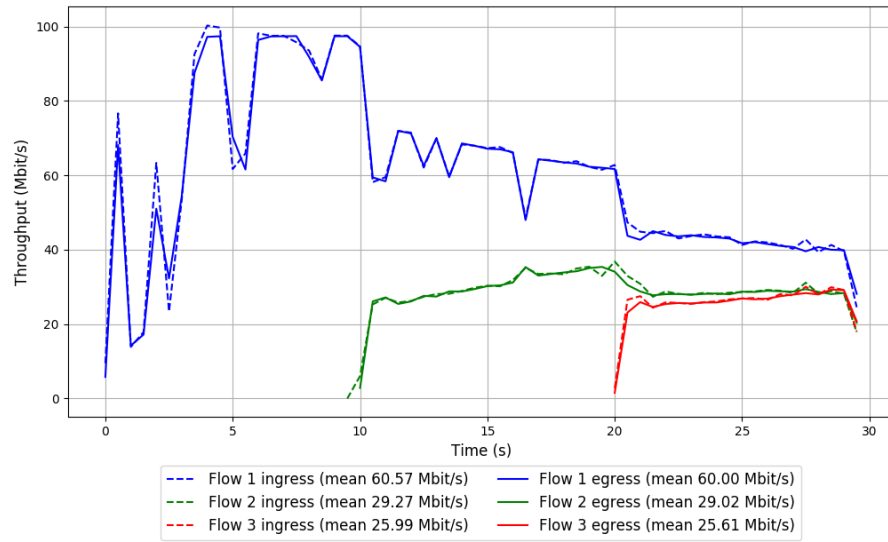


Run 6: Statistics of QUIC Cubic

Start at: 2017-12-06 00:17:20  
End at: 2017-12-06 00:17:50  
Local clock offset: -0.381 ms  
Remote clock offset: -1.843 ms

# Below is generated by plot.py at 2017-12-06 02:22:17  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 87.69 Mbit/s  
95th percentile per-packet one-way delay: 64.492 ms  
Loss rate: 0.92%  
-- Flow 1:  
Average throughput: 60.00 Mbit/s  
95th percentile per-packet one-way delay: 62.981 ms  
Loss rate: 0.88%  
-- Flow 2:  
Average throughput: 29.02 Mbit/s  
95th percentile per-packet one-way delay: 65.109 ms  
Loss rate: 0.83%  
-- Flow 3:  
Average throughput: 25.61 Mbit/s  
95th percentile per-packet one-way delay: 66.436 ms  
Loss rate: 1.40%

## Run 6: Report of QUIC Cubic — Data Link

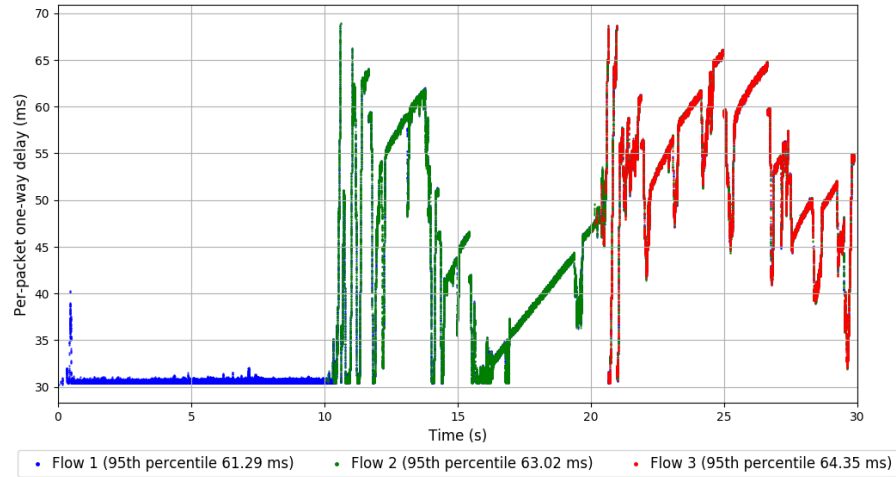
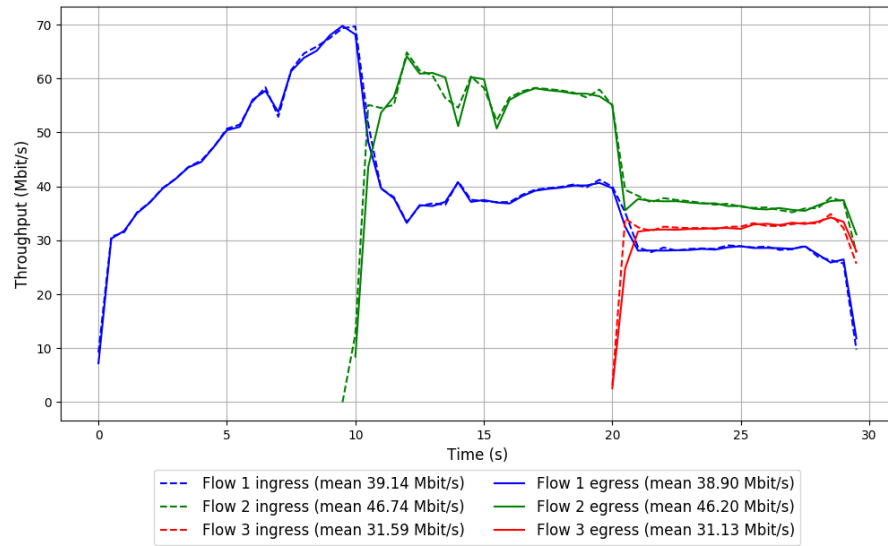


Run 7: Statistics of QUIC Cubic

Start at: 2017-12-06 00:38:41  
End at: 2017-12-06 00:39:11  
Local clock offset: -0.593 ms  
Remote clock offset: -0.565 ms

# Below is generated by plot.py at 2017-12-06 02:22:17  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 79.85 Mbit/s  
95th percentile per-packet one-way delay: 62.791 ms  
Loss rate: 0.84%  
-- Flow 1:  
Average throughput: 38.90 Mbit/s  
95th percentile per-packet one-way delay: 61.292 ms  
Loss rate: 0.53%  
-- Flow 2:  
Average throughput: 46.20 Mbit/s  
95th percentile per-packet one-way delay: 63.018 ms  
Loss rate: 1.04%  
-- Flow 3:  
Average throughput: 31.13 Mbit/s  
95th percentile per-packet one-way delay: 64.346 ms  
Loss rate: 1.39%

## Run 7: Report of QUIC Cubic — Data Link



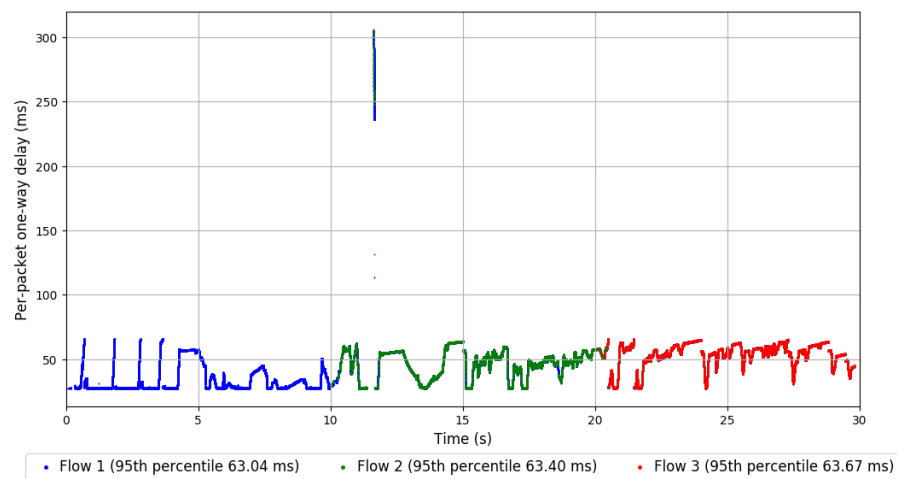
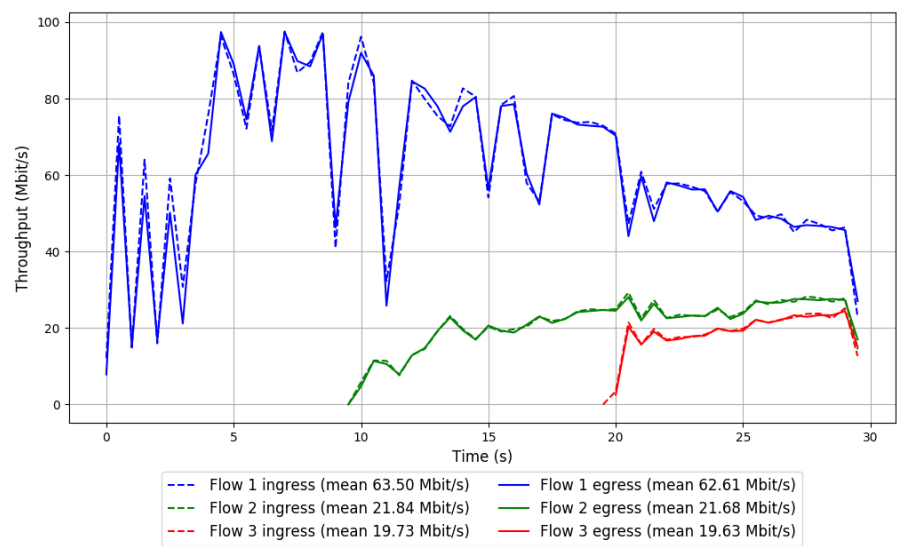
Run 8: Statistics of QUIC Cubic

Start at: 2017-12-06 01:00:07  
End at: 2017-12-06 01:00:37  
Local clock offset: -0.658 ms  
Remote clock offset: -2.903 ms

# Below is generated by plot.py at 2017-12-06 02:22:27  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 83.48 Mbit/s  
95th percentile per-packet one-way delay: 63.185 ms  
Loss rate: 1.18%  
-- Flow 1:  
Average throughput: 62.61 Mbit/s  
95th percentile per-packet one-way delay: 63.040 ms  
Loss rate: 1.35%  
-- Flow 2:  
Average throughput: 21.68 Mbit/s  
95th percentile per-packet one-way delay: 63.400 ms  
Loss rate: 0.69%  
-- Flow 3:  
Average throughput: 19.63 Mbit/s  
95th percentile per-packet one-way delay: 63.667 ms  
Loss rate: 0.61%



Run 8: Report of QUIC Cubic — Data Link

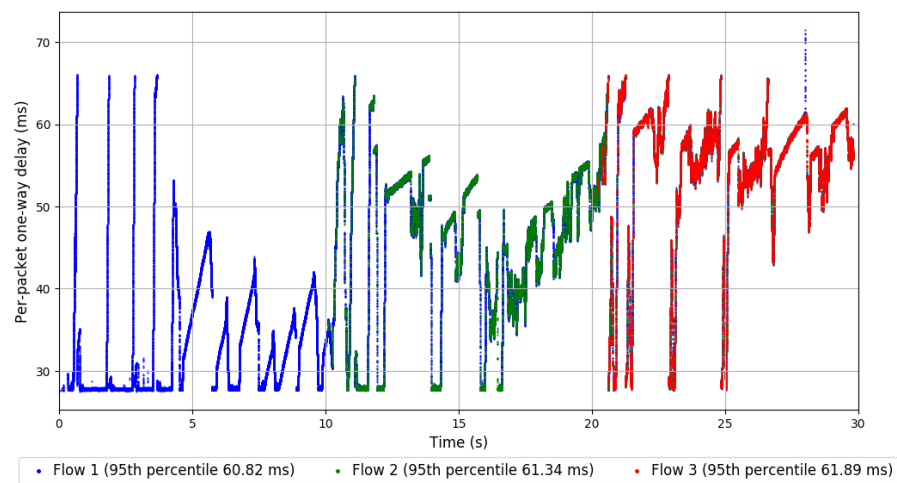
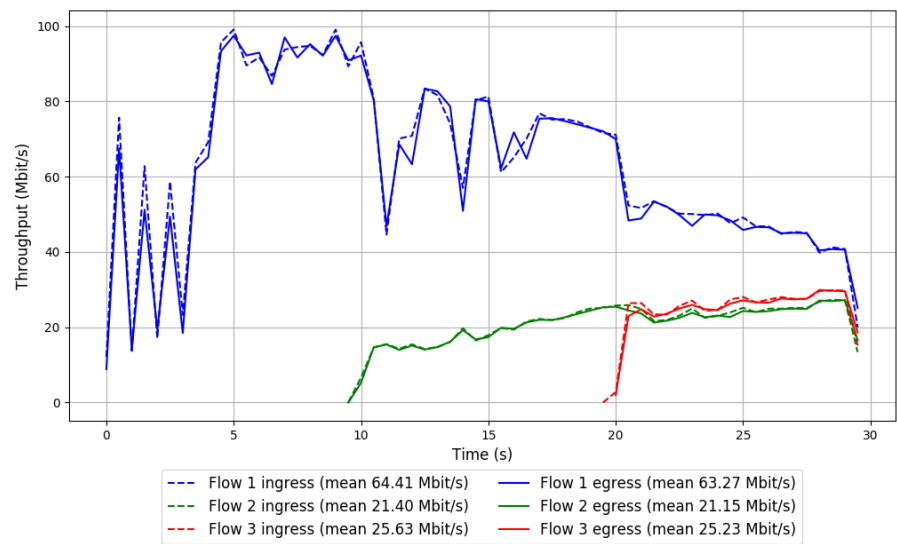


Run 9: Statistics of QUIC Cubic

Start at: 2017-12-06 01:25:20  
End at: 2017-12-06 01:25:50  
Local clock offset: -0.84 ms  
Remote clock offset: -3.005 ms

# Below is generated by plot.py at 2017-12-06 02:23:10  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.65 Mbit/s  
95th percentile per-packet one-way delay: 61.129 ms  
Loss rate: 1.55%  
-- Flow 1:  
Average throughput: 63.27 Mbit/s  
95th percentile per-packet one-way delay: 60.820 ms  
Loss rate: 1.66%  
-- Flow 2:  
Average throughput: 21.15 Mbit/s  
95th percentile per-packet one-way delay: 61.340 ms  
Loss rate: 1.06%  
-- Flow 3:  
Average throughput: 25.23 Mbit/s  
95th percentile per-packet one-way delay: 61.886 ms  
Loss rate: 1.49%

Run 9: Report of QUIC Cubic — Data Link



Run 10: Statistics of QUIC Cubic

Start at: 2017-12-06 01:49:59

End at: 2017-12-06 01:50:29

Local clock offset: -1.098 ms

Remote clock offset: -1.23 ms

# Below is generated by plot.py at 2017-12-06 02:23:24

# Datalink statistics

-- Total of 3 flows:

Average throughput: 86.45 Mbit/s

95th percentile per-packet one-way delay: 63.944 ms

Loss rate: 1.28%

-- Flow 1:

Average throughput: 56.12 Mbit/s

95th percentile per-packet one-way delay: 63.741 ms

Loss rate: 1.51%

-- Flow 2:

Average throughput: 34.32 Mbit/s

95th percentile per-packet one-way delay: 64.519 ms

Loss rate: 0.83%

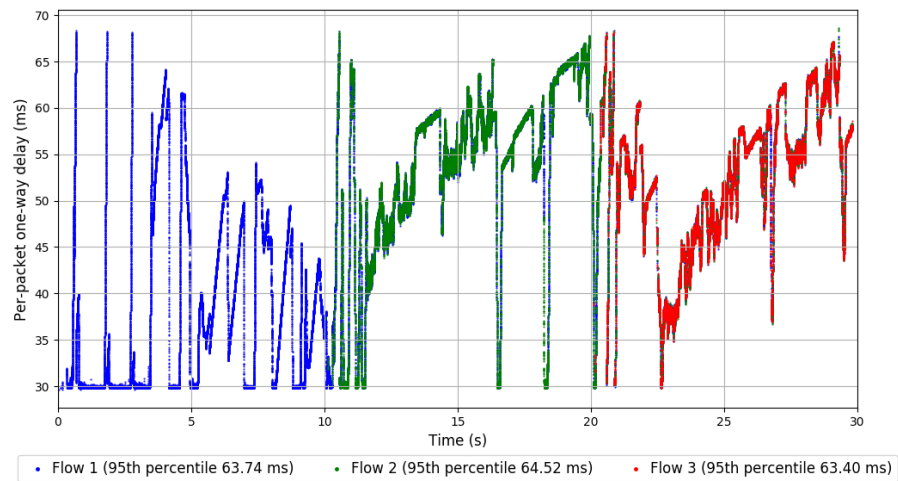
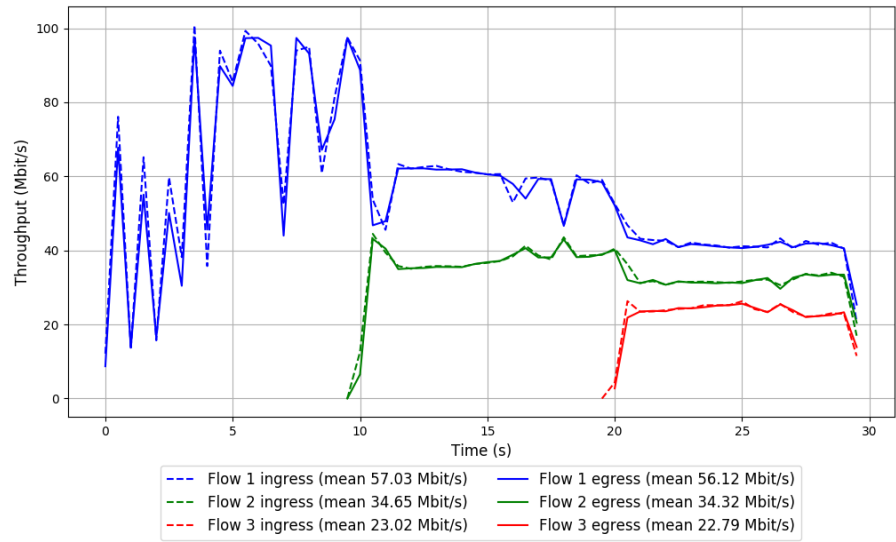
-- Flow 3:

Average throughput: 22.79 Mbit/s

95th percentile per-packet one-way delay: 63.399 ms

Loss rate: 1.00%

# Run 10: Report of QUIC Cubic — Data Link

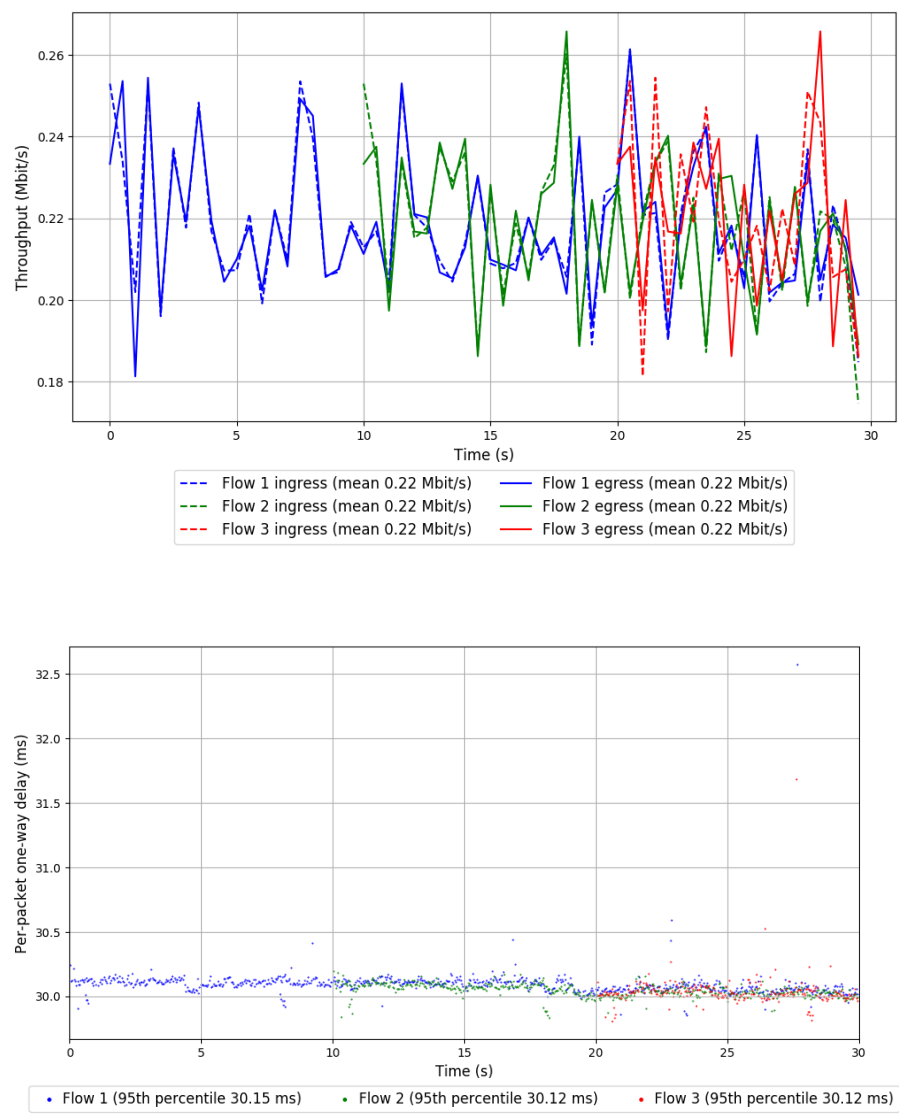


Run 1: Statistics of SReAM

Start at: 2017-12-05 22:25:41  
End at: 2017-12-05 22:26:11  
Local clock offset: -0.366 ms  
Remote clock offset: -1.796 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 30.144 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.152 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.118 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.118 ms  
Loss rate: 0.00%

Run 1: Report of SReAM — Data Link



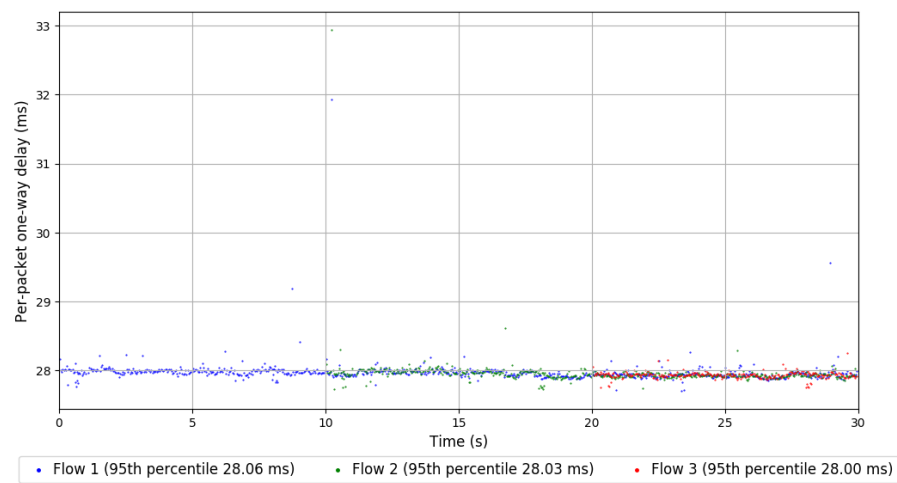
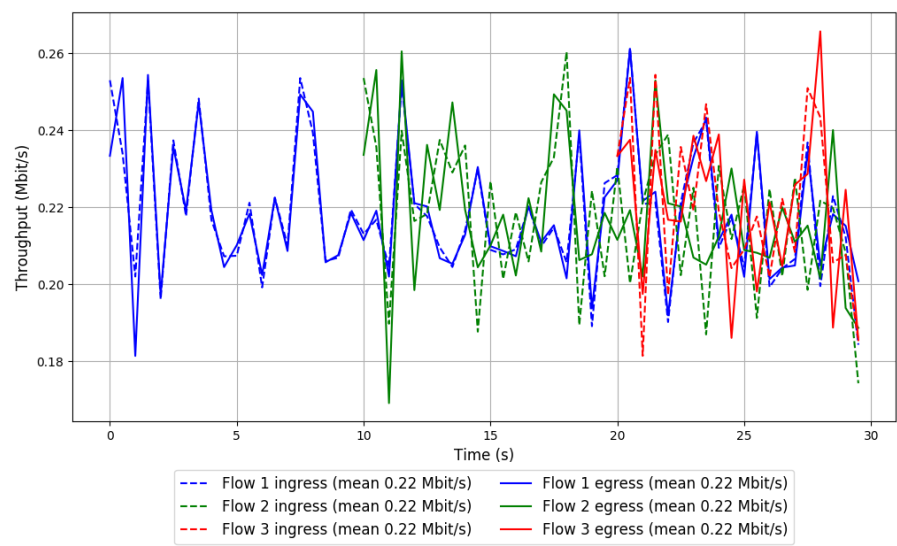
Run 2: Statistics of SReAM

Start at: 2017-12-05 22:45:51  
End at: 2017-12-05 22:46:21  
Local clock offset: -0.358 ms  
Remote clock offset: -3.655 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 28.036 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.057 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.028 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 27.998 ms  
Loss rate: 0.00%



Run 2: Report of SReAM — Data Link

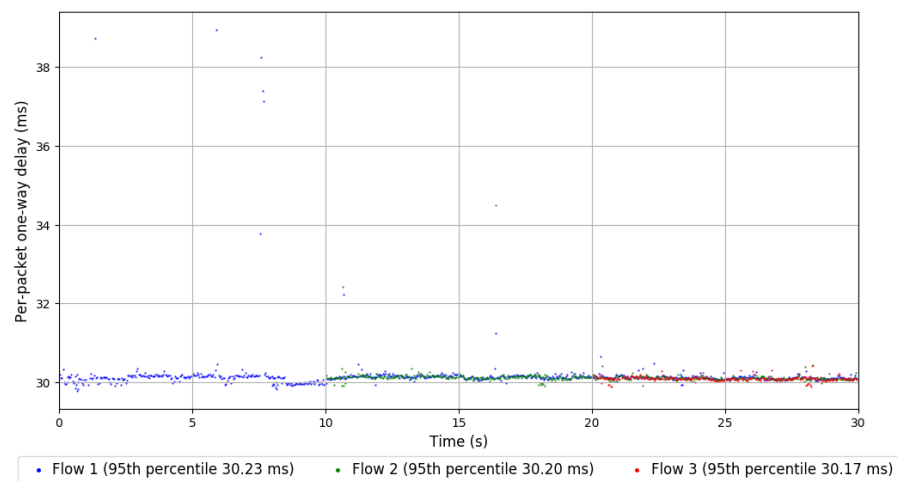
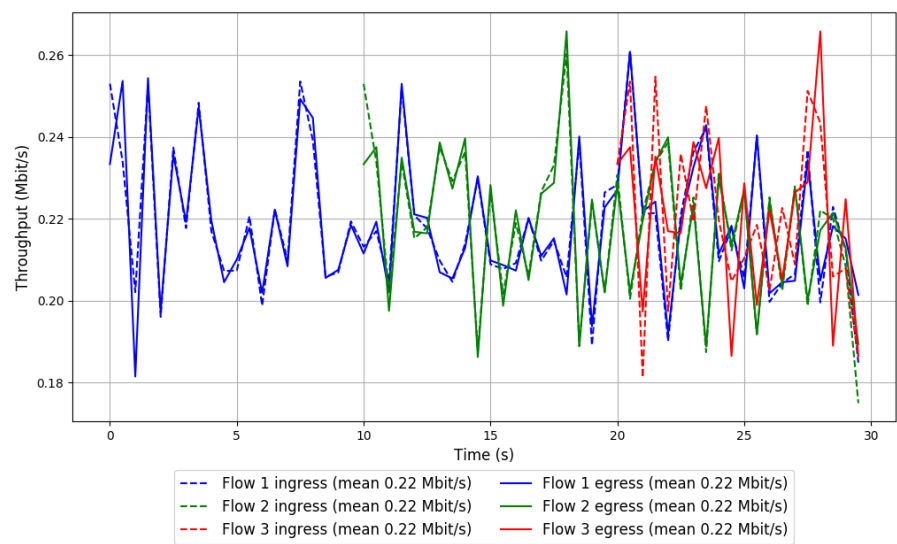


Run 3: Statistics of SReAM

Start at: 2017-12-05 23:05:52  
End at: 2017-12-05 23:06:22  
Local clock offset: -0.335 ms  
Remote clock offset: -1.552 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 30.212 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.229 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.196 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.174 ms  
Loss rate: 0.00%

Run 3: Report of SReAM — Data Link

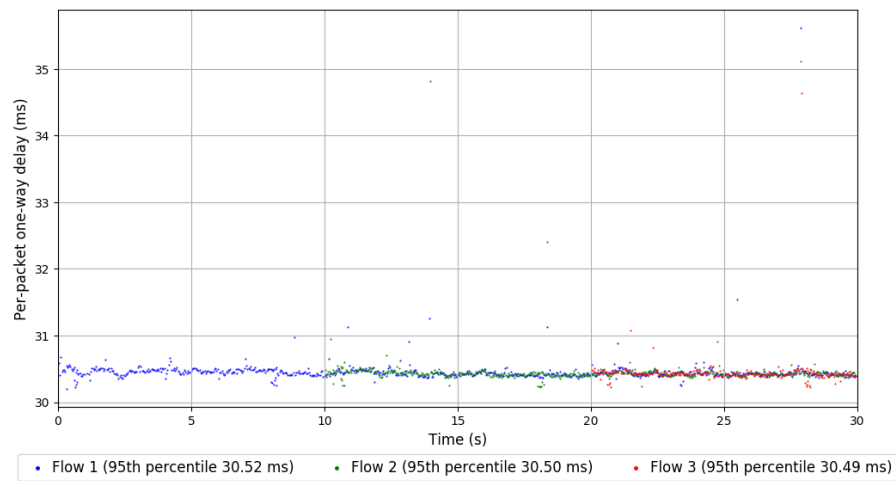
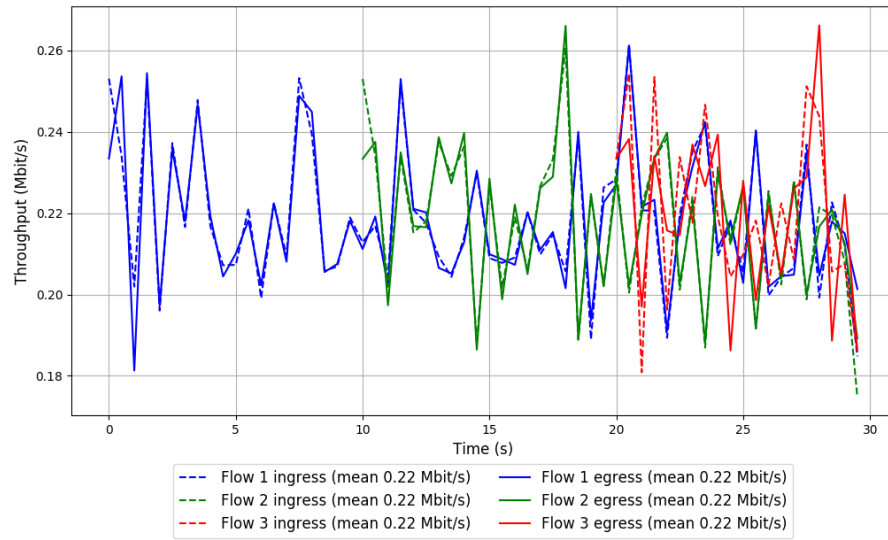


Run 4: Statistics of SReAM

Start at: 2017-12-05 23:26:14  
End at: 2017-12-05 23:26:44  
Local clock offset: -0.28 ms  
Remote clock offset: -1.788 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 30.516 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.525 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.501 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.489 ms  
Loss rate: 0.00%

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

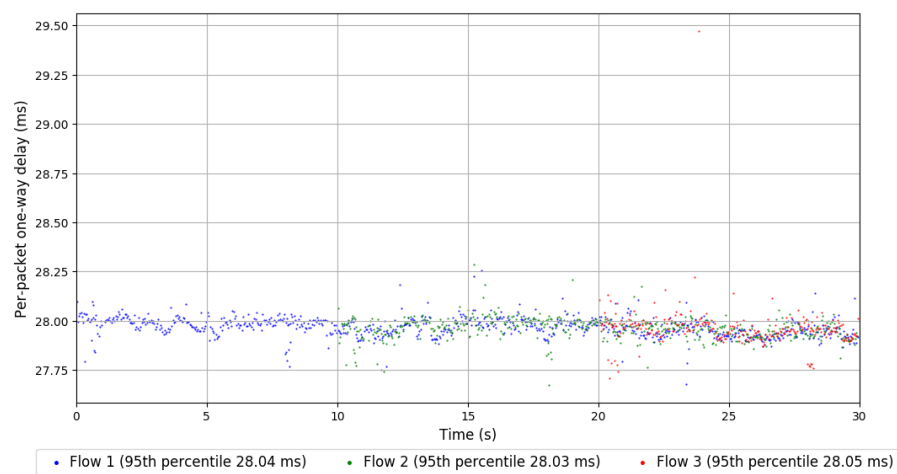
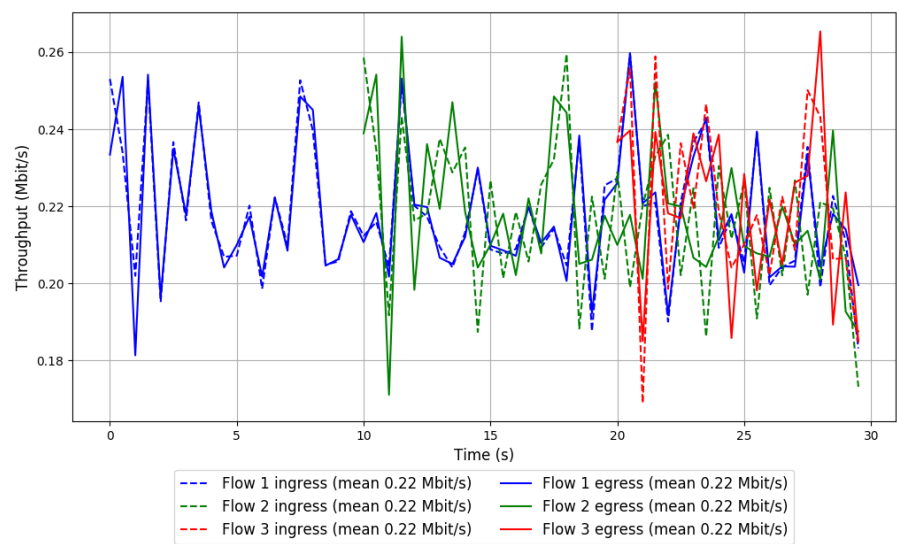


Run 5: Statistics of SReAM

Start at: 2017-12-05 23:48:00  
End at: 2017-12-05 23:48:30  
Local clock offset: -0.302 ms  
Remote clock offset: -4.544 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 28.036 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.040 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.027 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.049 ms  
Loss rate: 0.00%

Run 5: Report of SCRaM — Data Link



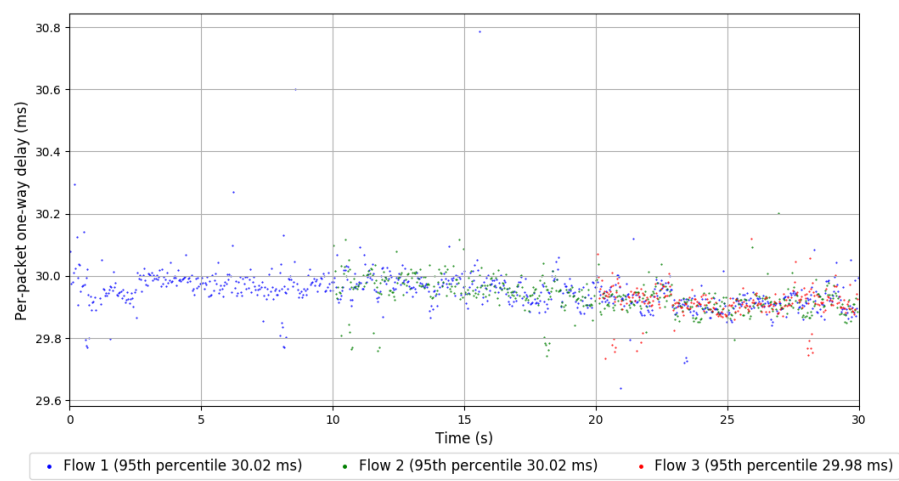
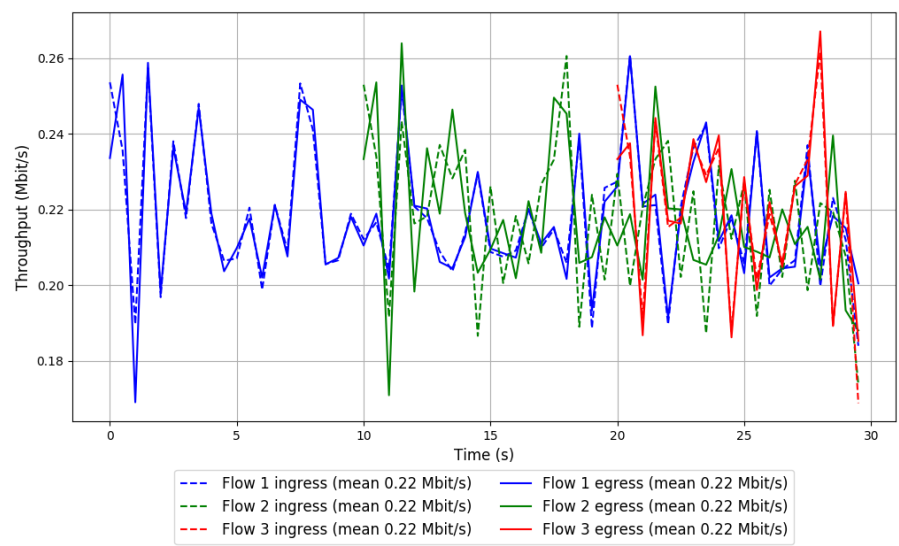
Run 6: Statistics of SReAM

Start at: 2017-12-06 00:10:05  
End at: 2017-12-06 00:10:35  
Local clock offset: -0.439 ms  
Remote clock offset: -2.188 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 30.018 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.024 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.018 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 29.977 ms  
Loss rate: 0.00%



Run 6: Report of SReAM — Data Link

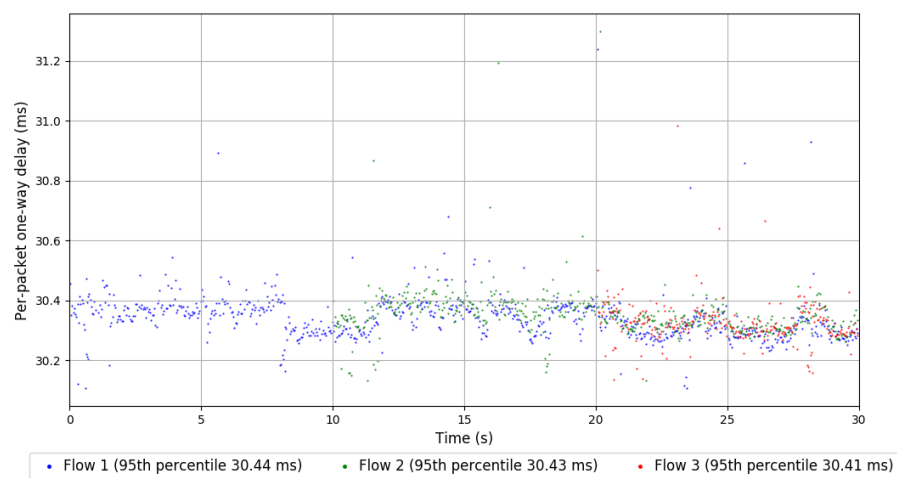
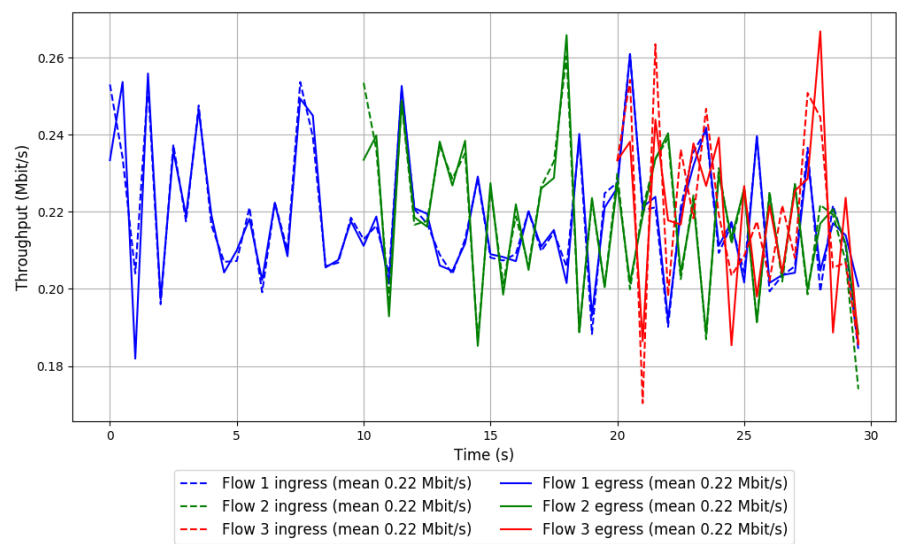


Run 7: Statistics of SReAM

Start at: 2017-12-06 00:31:31  
End at: 2017-12-06 00:32:01  
Local clock offset: -0.461 ms  
Remote clock offset: -0.926 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 30.431 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.439 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.431 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.414 ms  
Loss rate: 0.00%

Run 7: Report of SReAM — Data Link

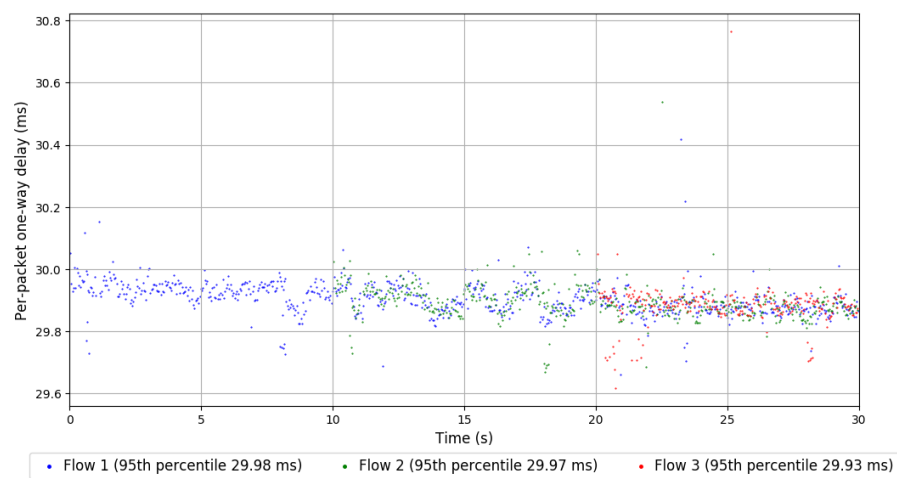
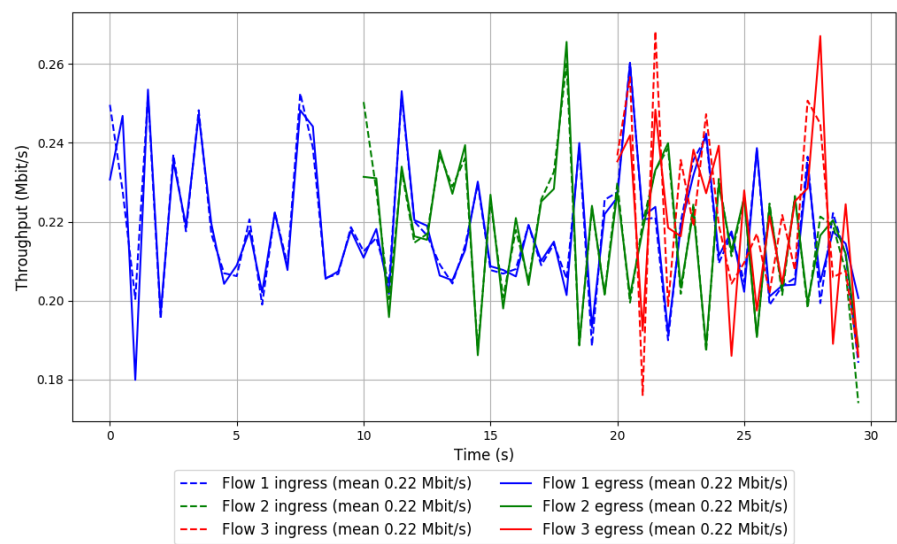


Run 8: Statistics of SReAM

Start at: 2017-12-06 00:52:40  
End at: 2017-12-06 00:53:10  
Local clock offset: -0.589 ms  
Remote clock offset: -0.824 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 29.972 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 29.978 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 29.970 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 29.932 ms  
Loss rate: 0.00%

Run 8: Report of SReAM — Data Link

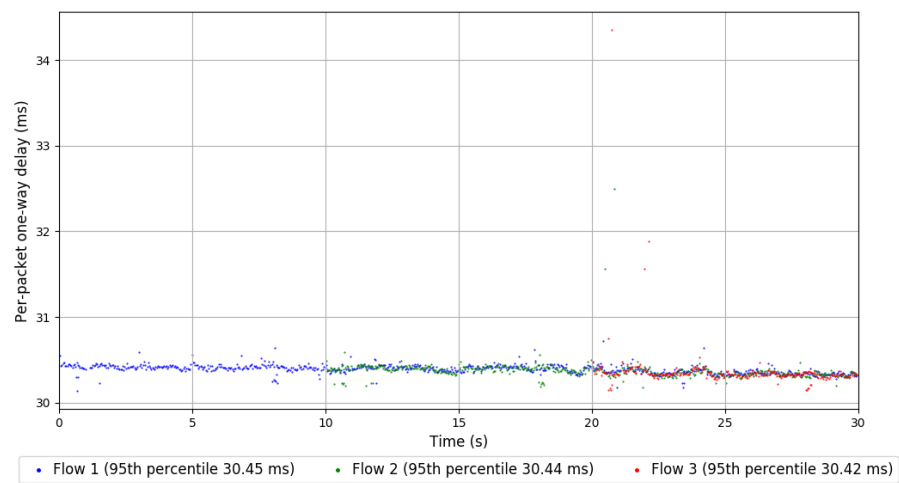
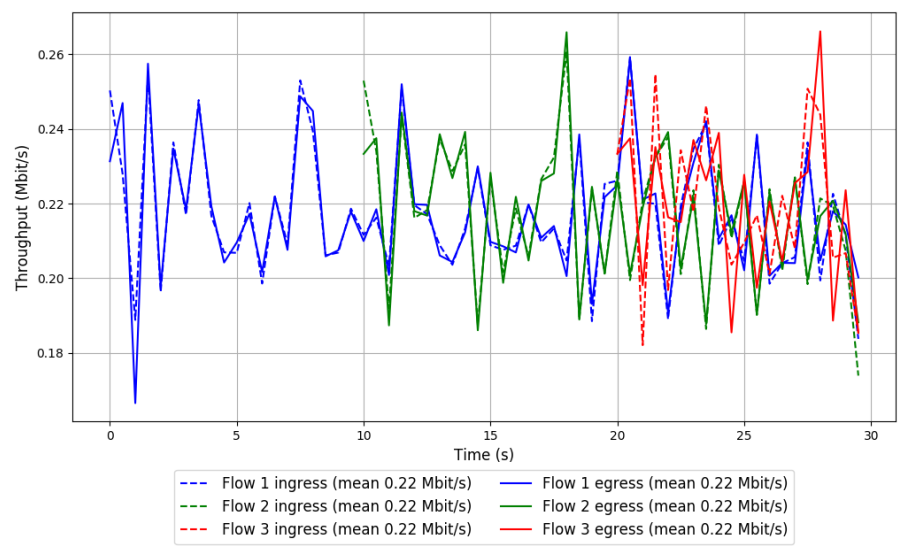


Run 9: Statistics of SReAM

Start at: 2017-12-06 01:17:05  
End at: 2017-12-06 01:17:35  
Local clock offset: -0.772 ms  
Remote clock offset: -0.325 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 30.449 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.453 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.441 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 30.424 ms  
Loss rate: 0.00%

Run 9: Report of SReAM — Data Link



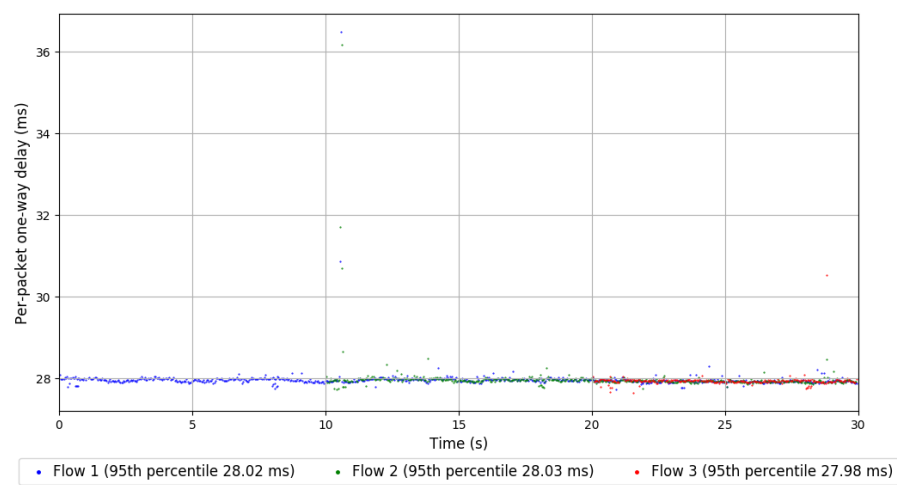
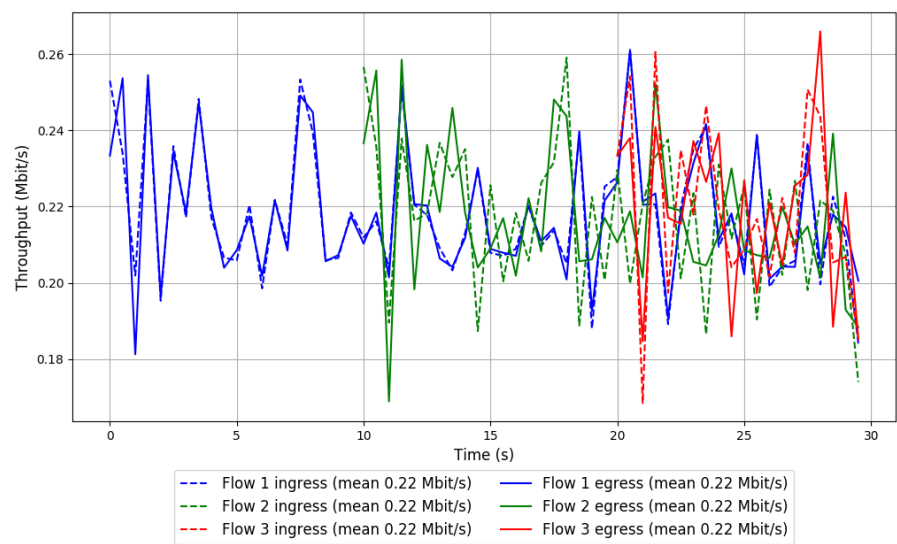
Run 10: Statistics of SReAM

Start at: 2017-12-06 01:41:59  
End at: 2017-12-06 01:42:29  
Local clock offset: -1.115 ms  
Remote clock offset: -3.191 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 0.44 Mbit/s  
95th percentile per-packet one-way delay: 28.025 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.025 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 28.029 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.22 Mbit/s  
95th percentile per-packet one-way delay: 27.984 ms  
Loss rate: 0.00%



Run 10: Report of SCReAM — Data Link

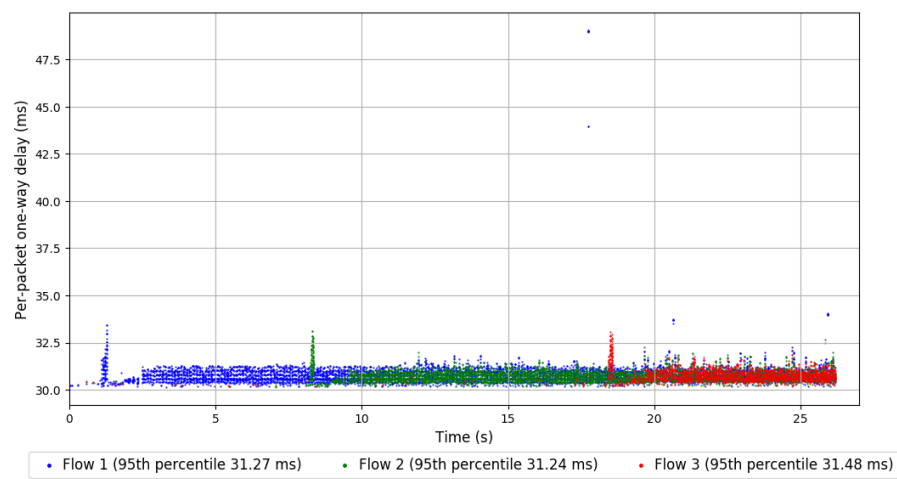
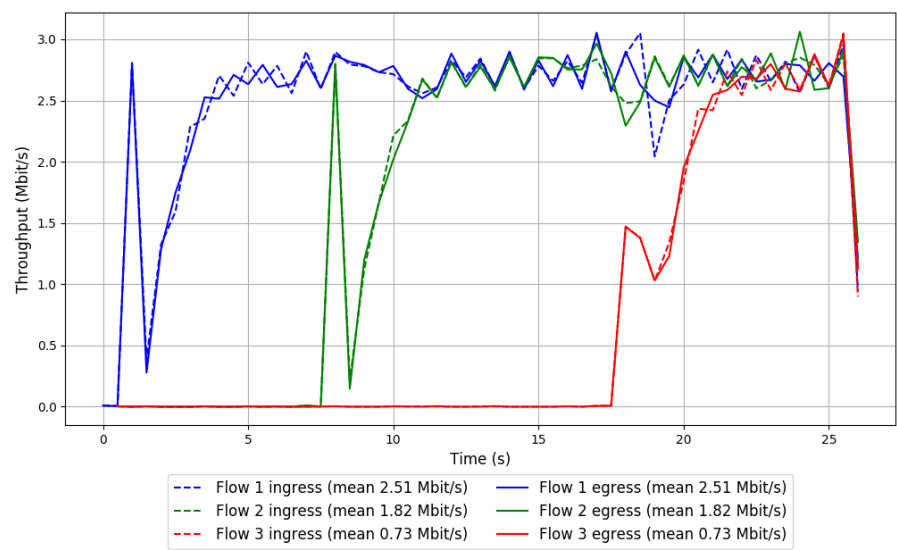


Run 1: Statistics of WebRTC media

Start at: 2017-12-05 22:31:19  
End at: 2017-12-05 22:31:49  
Local clock offset: -0.351 ms  
Remote clock offset: -1.183 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 5.01 Mbit/s  
95th percentile per-packet one-way delay: 31.279 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 2.51 Mbit/s  
95th percentile per-packet one-way delay: 31.267 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.82 Mbit/s  
95th percentile per-packet one-way delay: 31.240 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.73 Mbit/s  
95th percentile per-packet one-way delay: 31.475 ms  
Loss rate: 0.00%

Run 1: Report of WebRTC media — Data Link

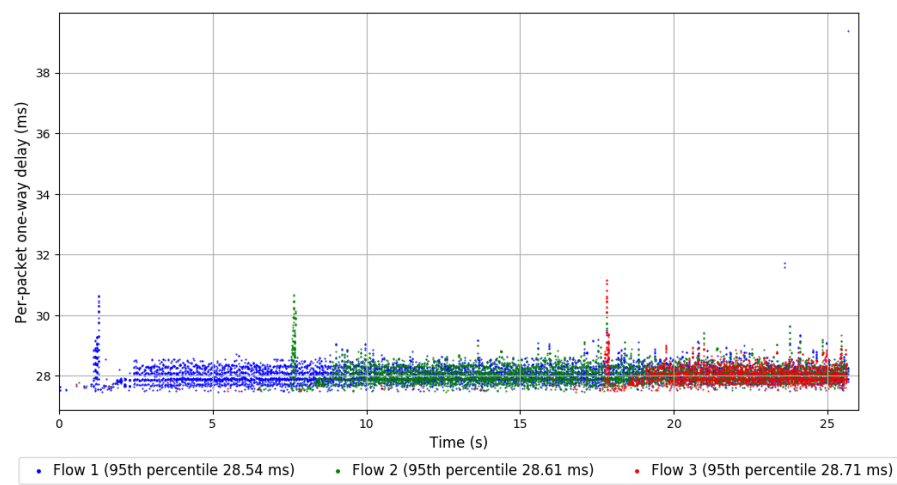
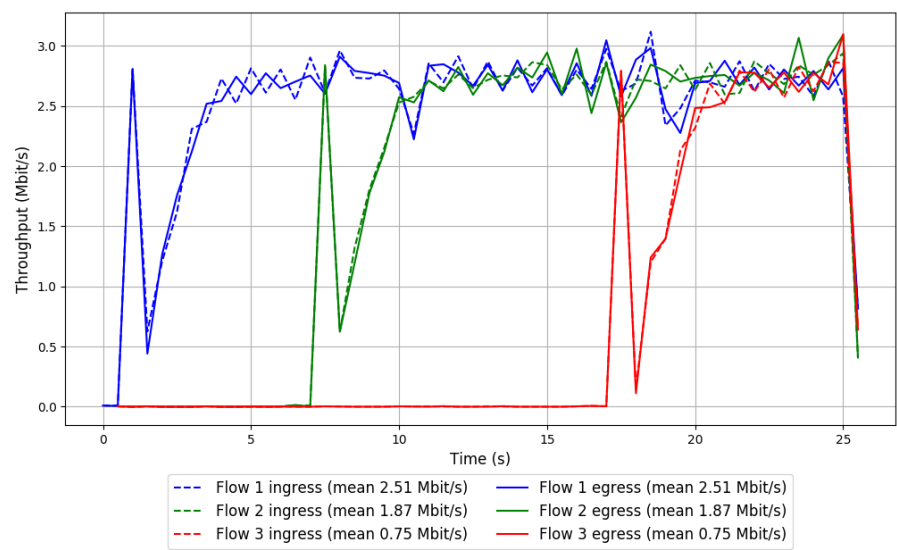


Run 2: Statistics of WebRTC media

Start at: 2017-12-05 22:51:26  
End at: 2017-12-05 22:51:56  
Local clock offset: -0.269 ms  
Remote clock offset: -3.737 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 5.07 Mbit/s  
95th percentile per-packet one-way delay: 28.573 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 2.51 Mbit/s  
95th percentile per-packet one-way delay: 28.535 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.87 Mbit/s  
95th percentile per-packet one-way delay: 28.613 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.75 Mbit/s  
95th percentile per-packet one-way delay: 28.709 ms  
Loss rate: 0.00%

Run 2: Report of WebRTC media — Data Link

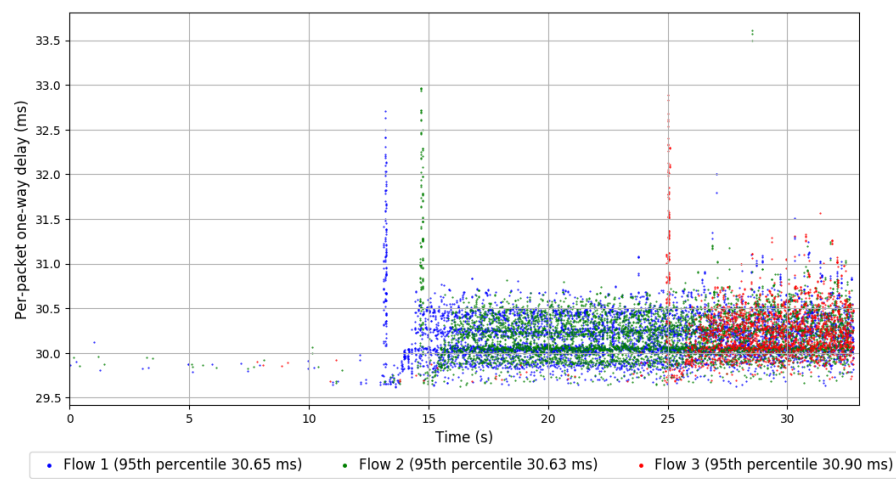
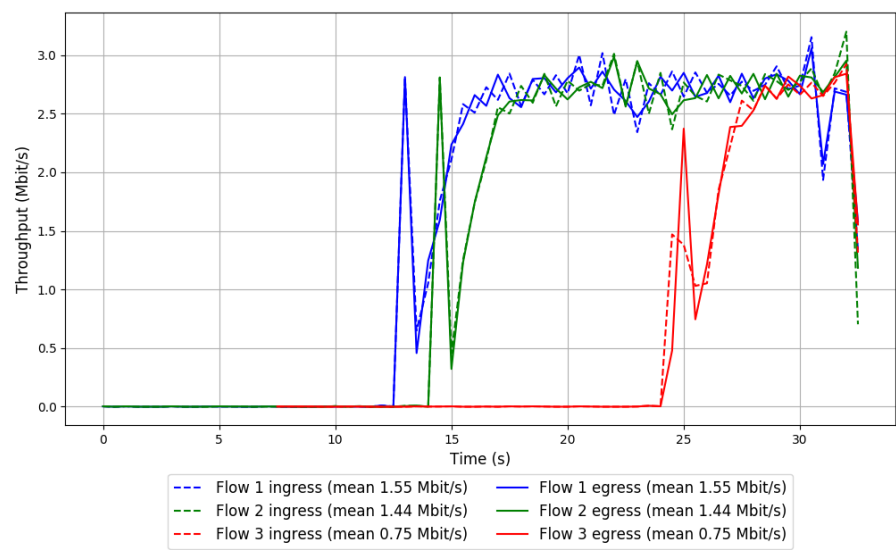


Run 3: Statistics of WebRTC media

Start at: 2017-12-05 23:11:17  
End at: 2017-12-05 23:11:47  
Local clock offset: -0.268 ms  
Remote clock offset: -1.701 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 3.56 Mbit/s  
95th percentile per-packet one-way delay: 30.671 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 1.55 Mbit/s  
95th percentile per-packet one-way delay: 30.652 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.44 Mbit/s  
95th percentile per-packet one-way delay: 30.626 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.75 Mbit/s  
95th percentile per-packet one-way delay: 30.903 ms  
Loss rate: 0.00%

Run 3: Report of WebRTC media — Data Link



Run 4: Statistics of WebRTC media

Start at: 2017-12-05 23:31:52

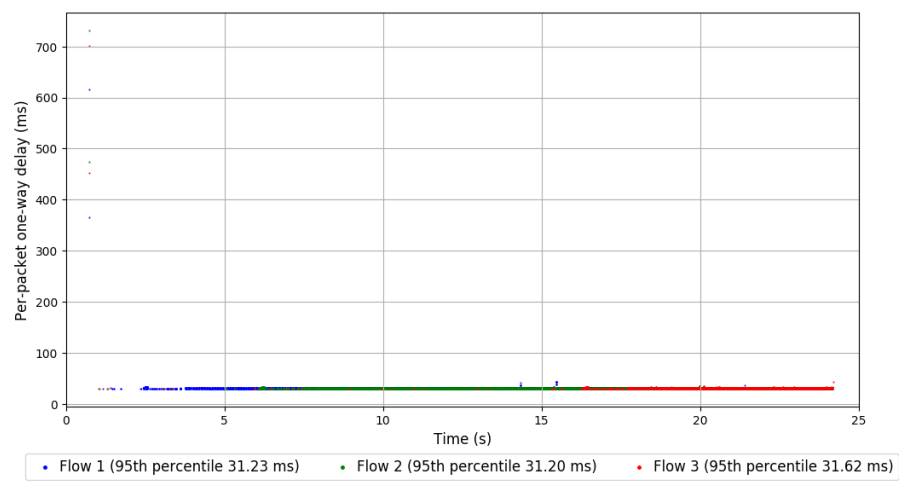
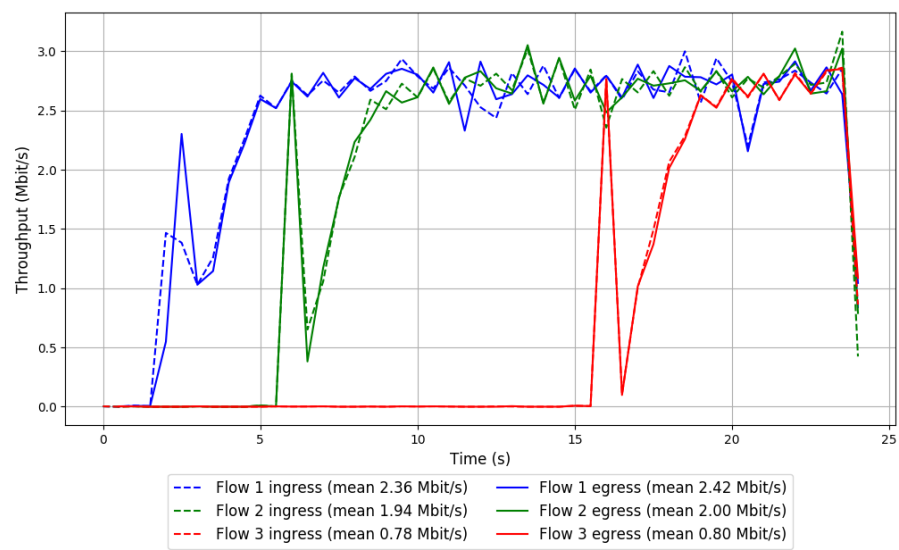
End at: 2017-12-05 23:32:22

Local clock offset: -0.249 ms

Remote clock offset: -1.893 ms



Run 4: Report of WebRTC media — Data Link

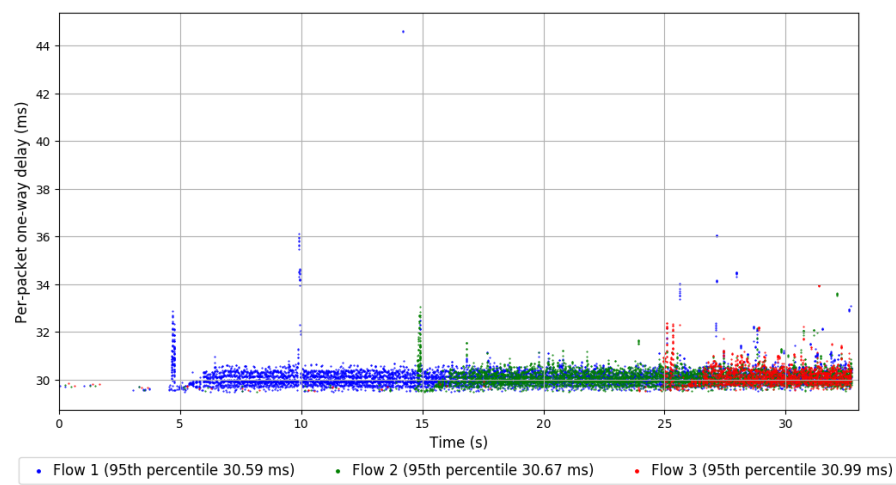
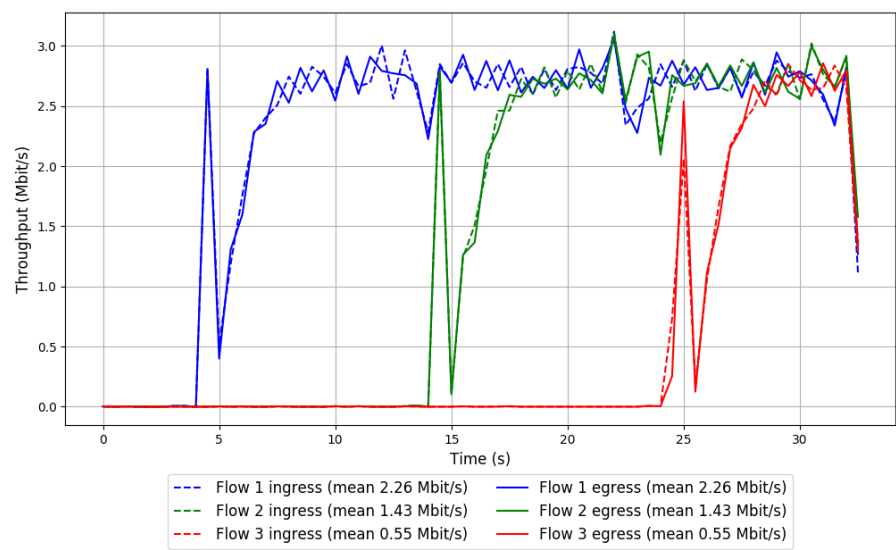


Run 5: Statistics of WebRTC media

Start at: 2017-12-05 23:53:49  
End at: 2017-12-05 23:54:19  
Local clock offset: -0.319 ms  
Remote clock offset: -2.554 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 4.23 Mbit/s  
95th percentile per-packet one-way delay: 30.676 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 2.26 Mbit/s  
95th percentile per-packet one-way delay: 30.593 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.43 Mbit/s  
95th percentile per-packet one-way delay: 30.666 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.55 Mbit/s  
95th percentile per-packet one-way delay: 30.989 ms  
Loss rate: 0.00%

Run 5: Report of WebRTC media — Data Link

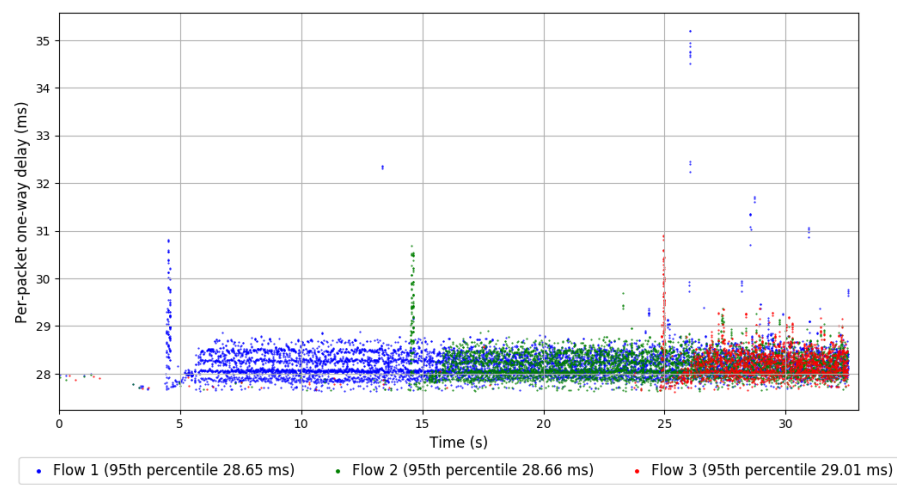
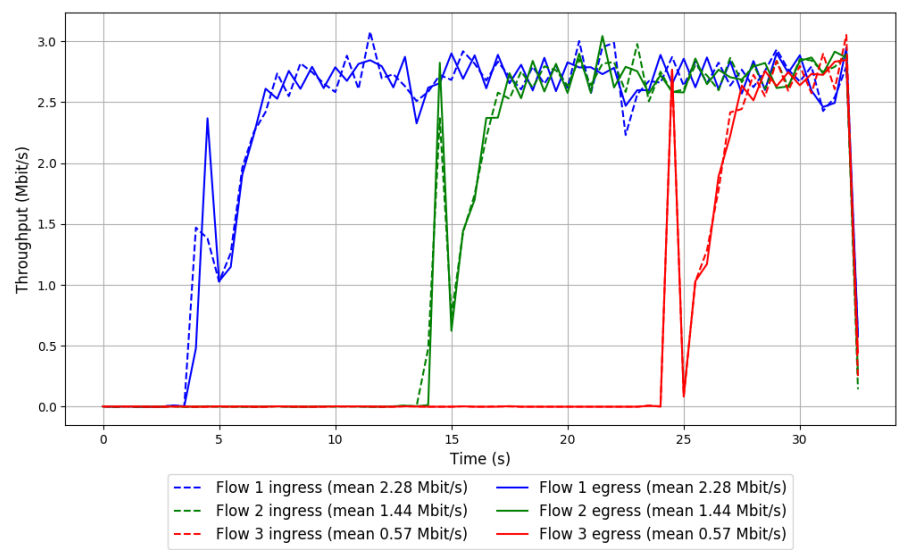


Run 6: Statistics of WebRTC media

Start at: 2017-12-06 00:16:01  
End at: 2017-12-06 00:16:31  
Local clock offset: -0.467 ms  
Remote clock offset: -3.983 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 4.28 Mbit/s  
95th percentile per-packet one-way delay: 28.679 ms  
Loss rate: 0.02%  
-- Flow 1:  
Average throughput: 2.28 Mbit/s  
95th percentile per-packet one-way delay: 28.648 ms  
Loss rate: 0.04%  
-- Flow 2:  
Average throughput: 1.44 Mbit/s  
95th percentile per-packet one-way delay: 28.664 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.57 Mbit/s  
95th percentile per-packet one-way delay: 29.008 ms  
Loss rate: 0.00%

Run 6: Report of WebRTC media — Data Link

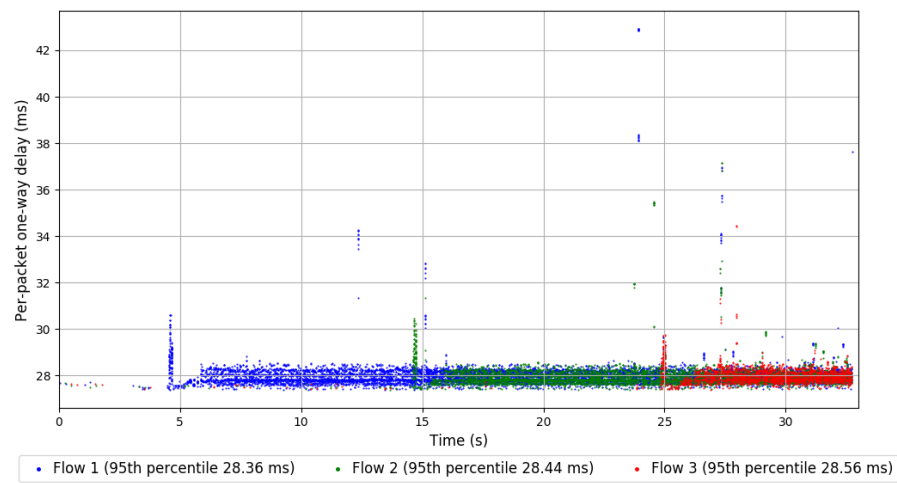
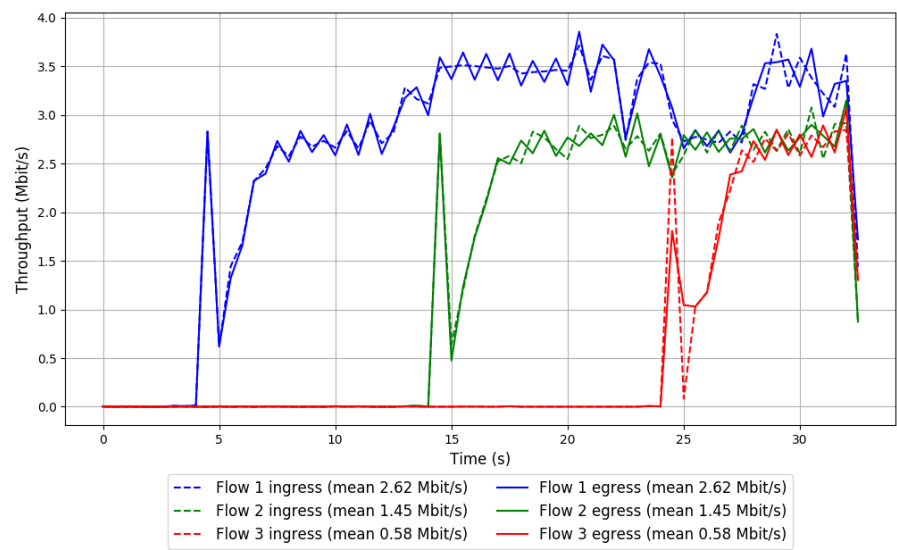


Run 7: Statistics of WebRTC media

Start at: 2017-12-06 00:37:23  
End at: 2017-12-06 00:37:53  
Local clock offset: -0.487 ms  
Remote clock offset: -3.302 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 4.63 Mbit/s  
95th percentile per-packet one-way delay: 28.409 ms  
Loss rate: 0.06%  
-- Flow 1:  
Average throughput: 2.62 Mbit/s  
95th percentile per-packet one-way delay: 28.364 ms  
Loss rate: 0.09%  
-- Flow 2:  
Average throughput: 1.45 Mbit/s  
95th percentile per-packet one-way delay: 28.436 ms  
Loss rate: 0.02%  
-- Flow 3:  
Average throughput: 0.58 Mbit/s  
95th percentile per-packet one-way delay: 28.562 ms  
Loss rate: 0.00%

Run 7: Report of WebRTC media — Data Link



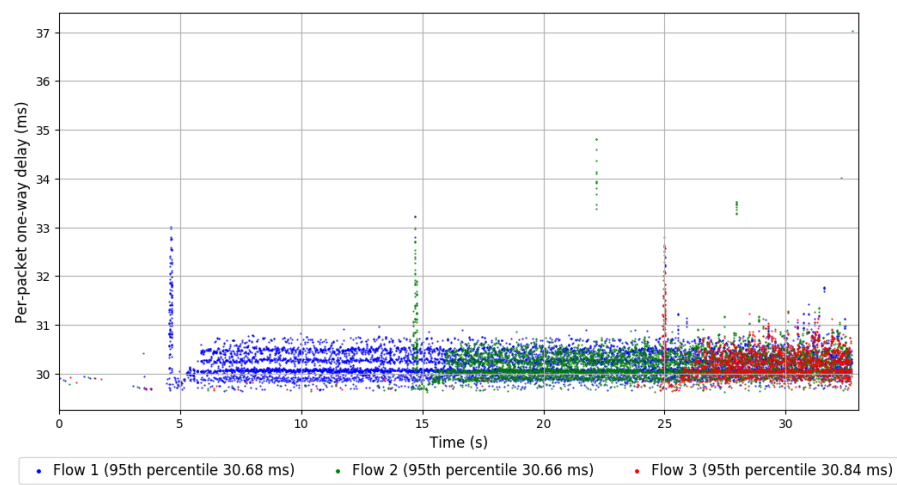
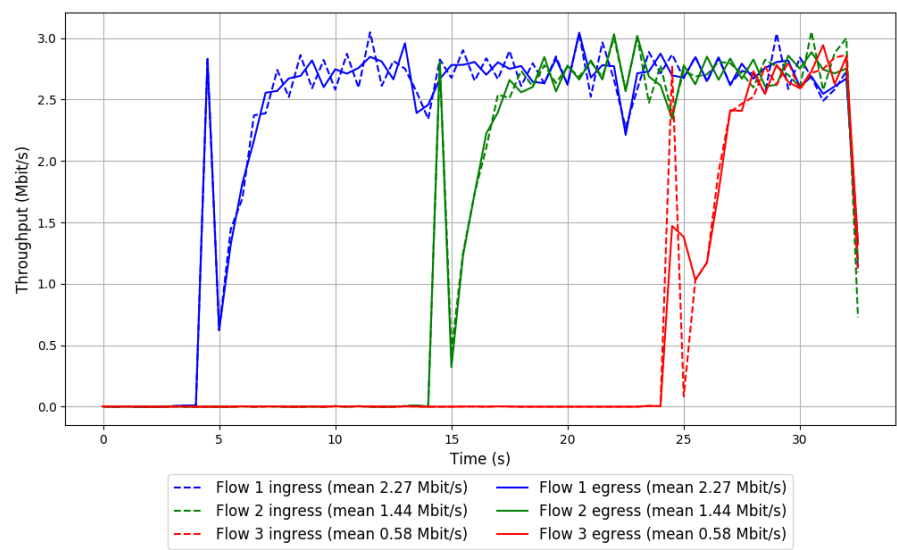
Run 8: Statistics of WebRTC media

Start at: 2017-12-06 00:58:49  
End at: 2017-12-06 00:59:19  
Local clock offset: -0.633 ms  
Remote clock offset: -0.667 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 4.27 Mbit/s  
95th percentile per-packet one-way delay: 30.692 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 2.27 Mbit/s  
95th percentile per-packet one-way delay: 30.678 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.44 Mbit/s  
95th percentile per-packet one-way delay: 30.655 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.58 Mbit/s  
95th percentile per-packet one-way delay: 30.835 ms  
Loss rate: 0.00%



Run 8: Report of WebRTC media — Data Link

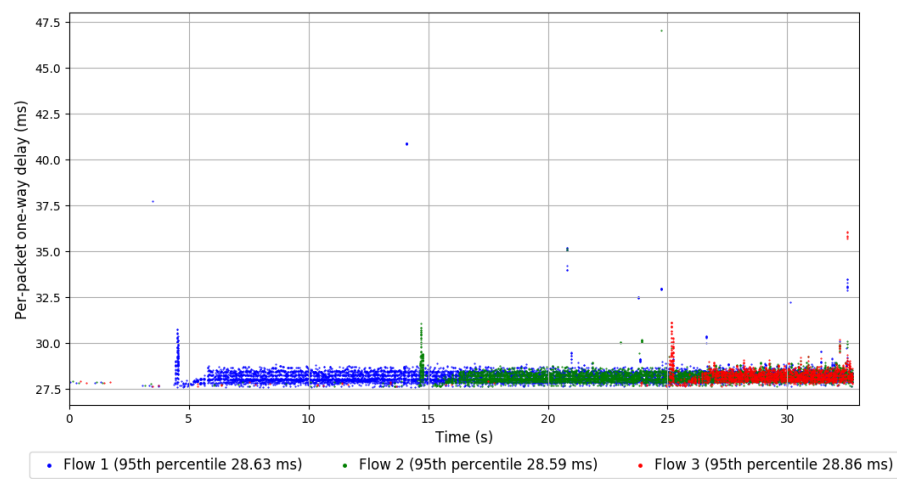
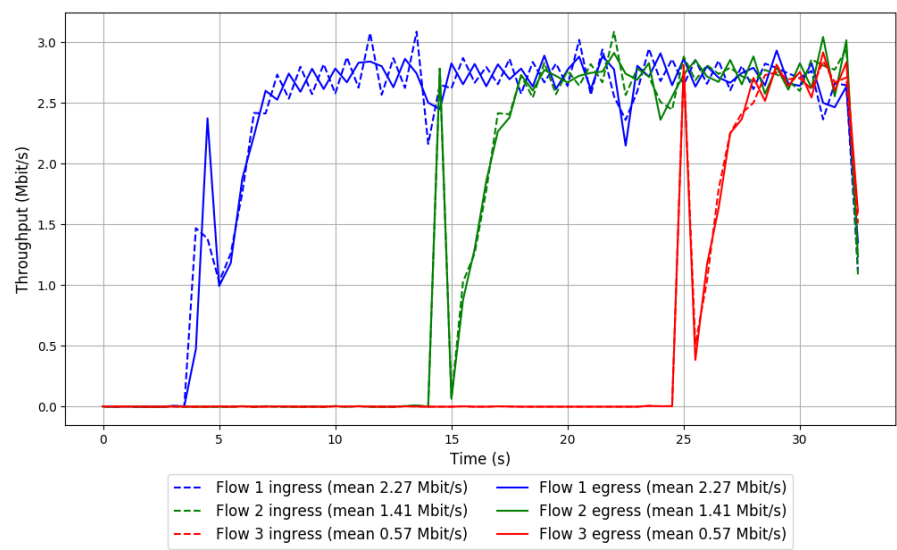


Run 9: Statistics of WebRTC media

Start at: 2017-12-06 01:24:00  
End at: 2017-12-06 01:24:30  
Local clock offset: -0.838 ms  
Remote clock offset: -2.844 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 4.24 Mbit/s  
95th percentile per-packet one-way delay: 28.645 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 2.27 Mbit/s  
95th percentile per-packet one-way delay: 28.634 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.41 Mbit/s  
95th percentile per-packet one-way delay: 28.595 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.57 Mbit/s  
95th percentile per-packet one-way delay: 28.859 ms  
Loss rate: 0.00%

Run 9: Report of WebRTC media — Data Link

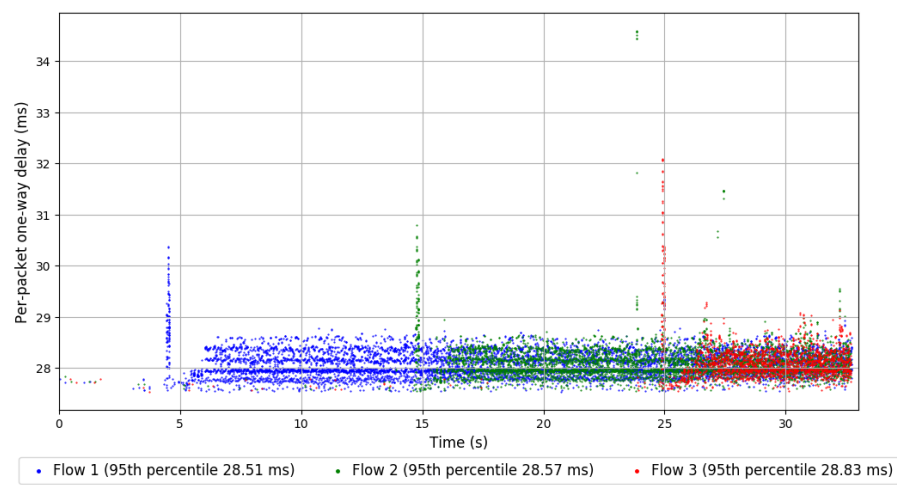
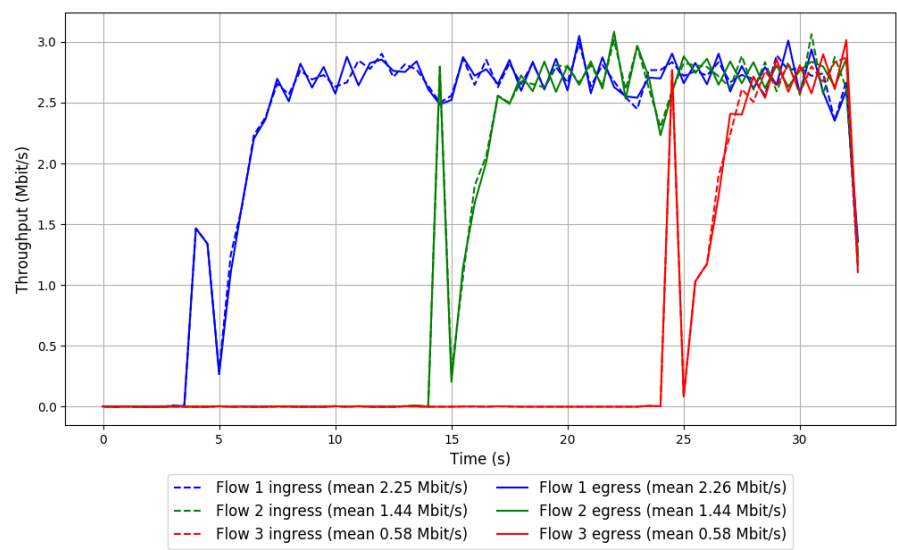


Run 10: Statistics of WebRTC media

Start at: 2017-12-06 01:48:39  
End at: 2017-12-06 01:49:09  
Local clock offset: -1.172 ms  
Remote clock offset: -3.375 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 4.26 Mbit/s  
95th percentile per-packet one-way delay: 28.564 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 2.26 Mbit/s  
95th percentile per-packet one-way delay: 28.509 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 1.44 Mbit/s  
95th percentile per-packet one-way delay: 28.571 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 0.58 Mbit/s  
95th percentile per-packet one-way delay: 28.831 ms  
Loss rate: 0.00%

Run 10: Report of WebRTC media — Data Link

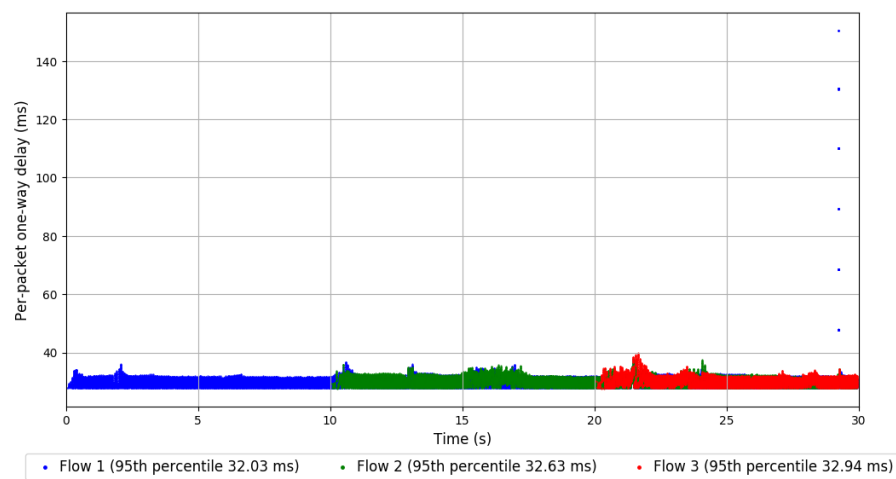
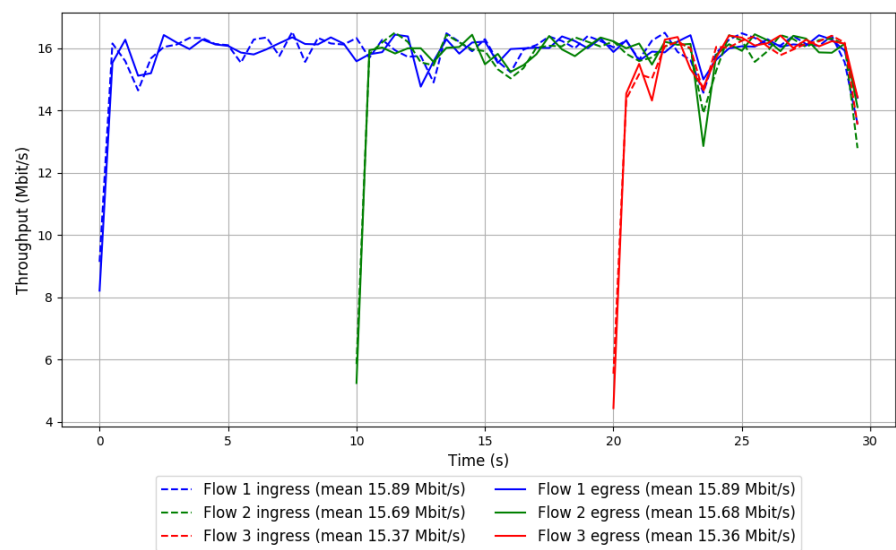


Run 1: Statistics of Sprout

Start at: 2017-12-05 22:26:58  
End at: 2017-12-05 22:27:28  
Local clock offset: -0.35 ms  
Remote clock offset: -3.803 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 31.39 Mbit/s  
95th percentile per-packet one-way delay: 32.374 ms  
Loss rate: 0.03%  
-- Flow 1:  
Average throughput: 15.89 Mbit/s  
95th percentile per-packet one-way delay: 32.030 ms  
Loss rate: 0.03%  
-- Flow 2:  
Average throughput: 15.68 Mbit/s  
95th percentile per-packet one-way delay: 32.635 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 15.36 Mbit/s  
95th percentile per-packet one-way delay: 32.940 ms  
Loss rate: 0.07%

Run 1: Report of Sprout — Data Link



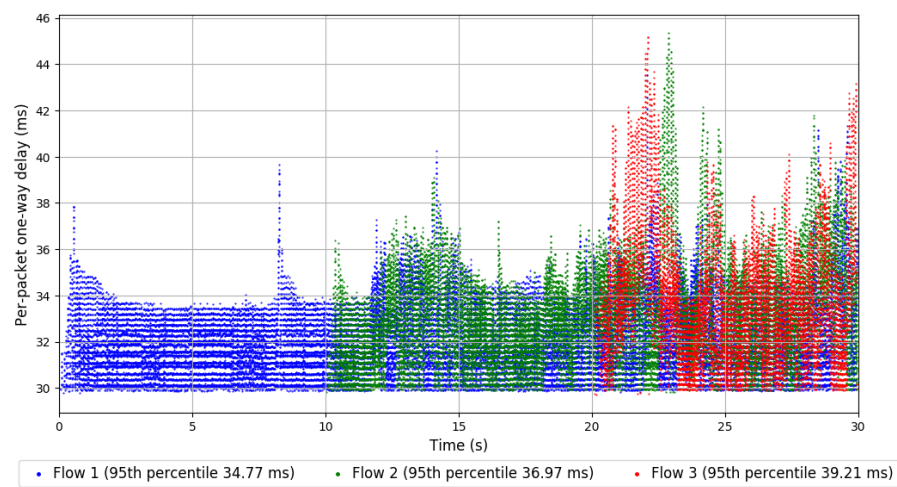
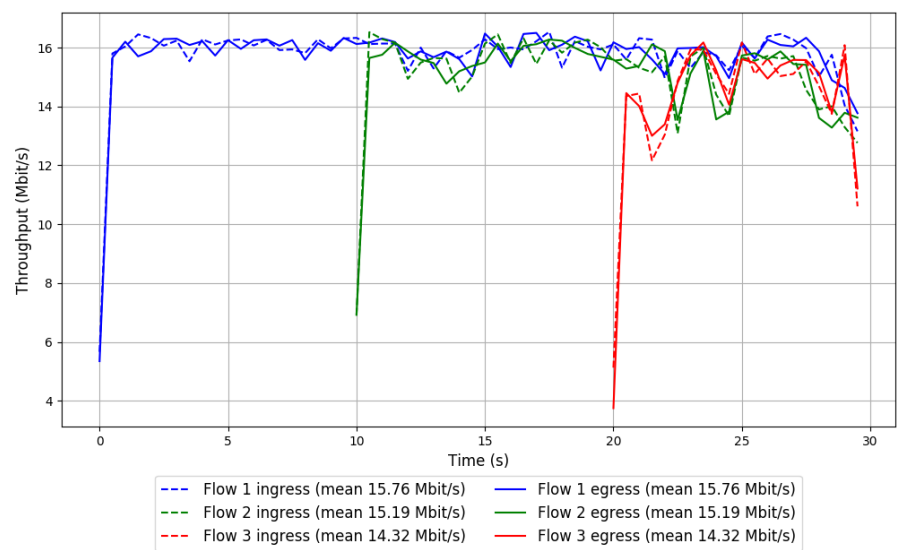
Run 2: Statistics of Sprout

Start at: 2017-12-05 22:47:08  
End at: 2017-12-05 22:47:38  
Local clock offset: -0.355 ms  
Remote clock offset: -1.595 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 30.59 Mbit/s  
95th percentile per-packet one-way delay: 36.503 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 15.76 Mbit/s  
95th percentile per-packet one-way delay: 34.772 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 15.19 Mbit/s  
95th percentile per-packet one-way delay: 36.973 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 14.32 Mbit/s  
95th percentile per-packet one-way delay: 39.214 ms  
Loss rate: 0.00%



Run 2: Report of Sprout — Data Link

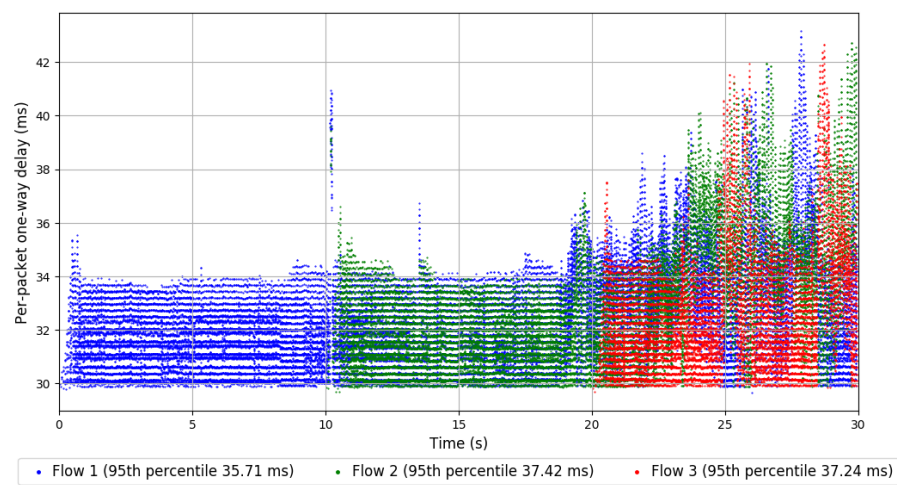
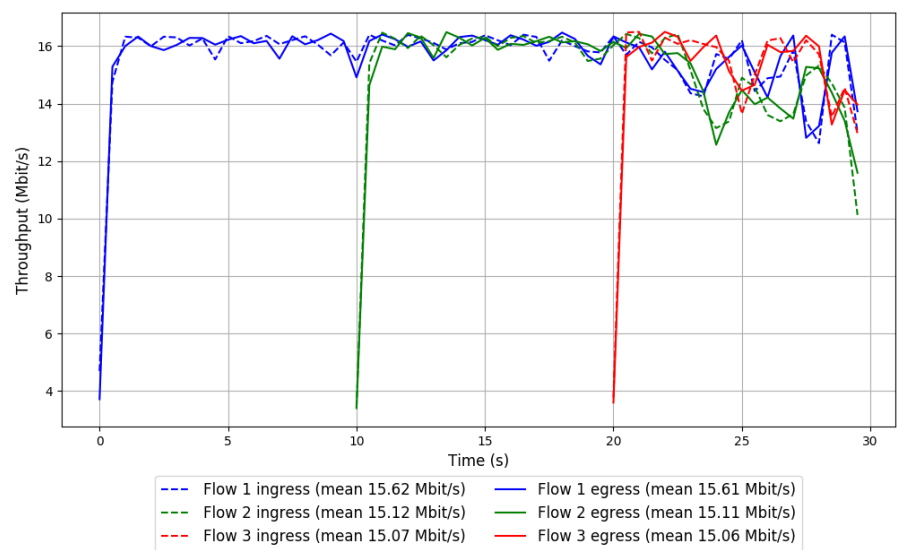


### Run 3: Statistics of Sprout

Start at: 2017-12-05 23:07:09  
End at: 2017-12-05 23:07:39  
Local clock offset: -0.256 ms  
Remote clock offset: -1.602 ms

```
# Below is generated by plot.py at 2017-12-06 02:23:24
# Datalink statistics
-- Total of 3 flows:
Average throughput: 30.62 Mbit/s
95th percentile per-packet one-way delay: 36.661 ms
Loss rate: 0.02%
-- Flow 1:
Average throughput: 15.61 Mbit/s
95th percentile per-packet one-way delay: 35.709 ms
Loss rate: 0.04%
-- Flow 2:
Average throughput: 15.11 Mbit/s
95th percentile per-packet one-way delay: 37.418 ms
Loss rate: 0.00%
-- Flow 3:
Average throughput: 15.06 Mbit/s
95th percentile per-packet one-way delay: 37.238 ms
Loss rate: 0.00%
```

Run 3: Report of Sprout — Data Link

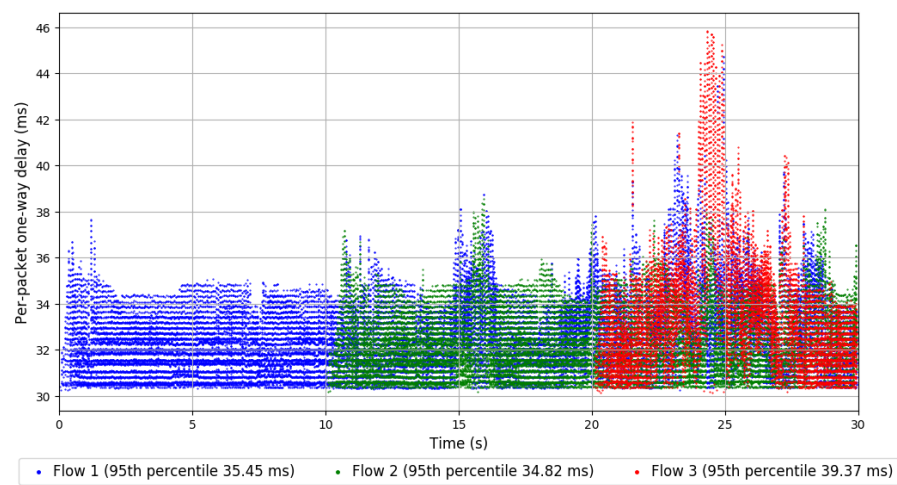
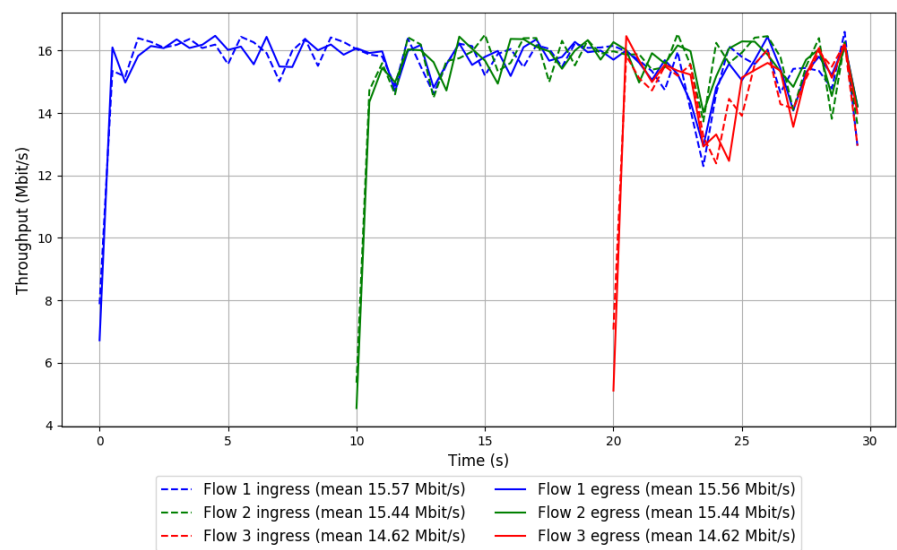


#### Run 4: Statistics of Sprout

Start at: 2017-12-05 23:27:32  
End at: 2017-12-05 23:28:02  
Local clock offset: -0.266 ms  
Remote clock offset: -1.803 ms

```
# Below is generated by plot.py at 2017-12-06 02:23:24
# Datalink statistics
-- Total of 3 flows:
Average throughput: 30.66 Mbit/s
95th percentile per-packet one-way delay: 35.747 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 15.56 Mbit/s
95th percentile per-packet one-way delay: 35.450 ms
Loss rate: 0.00%
-- Flow 2:
Average throughput: 15.44 Mbit/s
95th percentile per-packet one-way delay: 34.818 ms
Loss rate: 0.00%
-- Flow 3:
Average throughput: 14.62 Mbit/s
95th percentile per-packet one-way delay: 39.370 ms
Loss rate: 0.00%
```

Run 4: Report of Sprout — Data Link

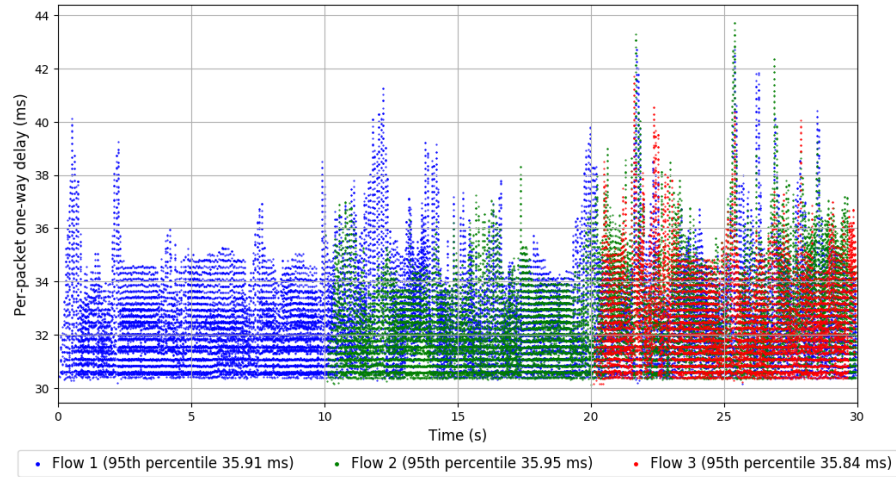
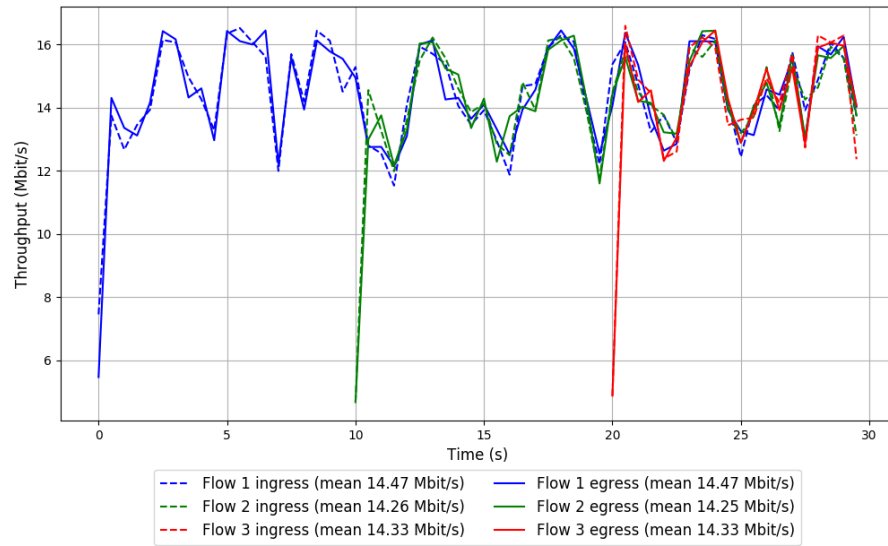


Run 5: Statistics of Sprout

Start at: 2017-12-05 23:49:17  
End at: 2017-12-05 23:49:47  
Local clock offset: -0.408 ms  
Remote clock offset: -2.094 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 28.68 Mbit/s  
95th percentile per-packet one-way delay: 35.911 ms  
Loss rate: 0.01%  
-- Flow 1:  
Average throughput: 14.47 Mbit/s  
95th percentile per-packet one-way delay: 35.908 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 14.25 Mbit/s  
95th percentile per-packet one-way delay: 35.949 ms  
Loss rate: 0.04%  
-- Flow 3:  
Average throughput: 14.33 Mbit/s  
95th percentile per-packet one-way delay: 35.840 ms  
Loss rate: 0.00%

## Run 5: Report of Sprout — Data Link



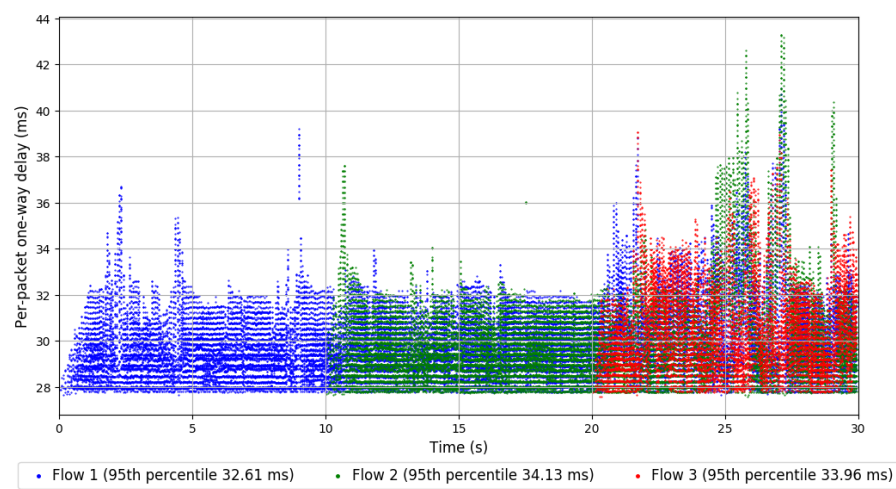
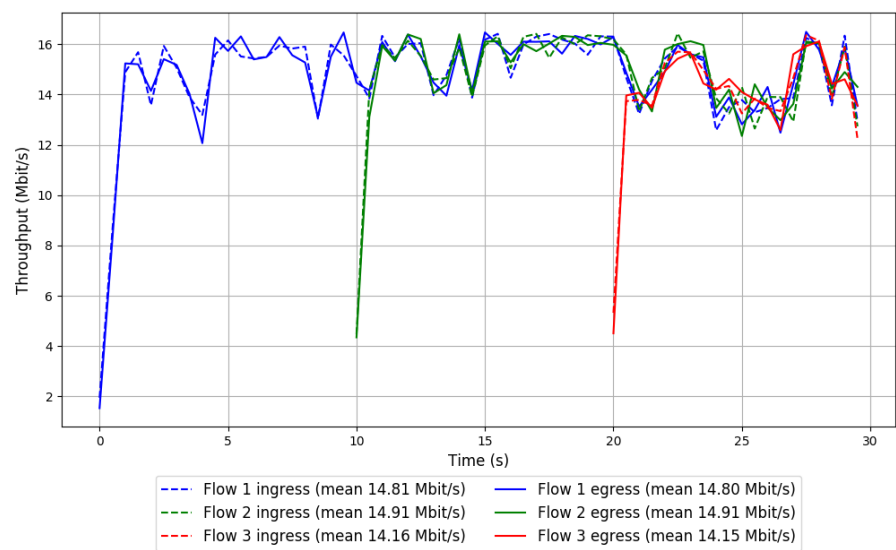
Run 6: Statistics of Sprout

Start at: 2017-12-06 00:11:23  
End at: 2017-12-06 00:11:53  
Local clock offset: -0.354 ms  
Remote clock offset: -4.107 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 29.39 Mbit/s  
95th percentile per-packet one-way delay: 33.353 ms  
Loss rate: 0.02%  
-- Flow 1:  
Average throughput: 14.80 Mbit/s  
95th percentile per-packet one-way delay: 32.609 ms  
Loss rate: 0.04%  
-- Flow 2:  
Average throughput: 14.91 Mbit/s  
95th percentile per-packet one-way delay: 34.132 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 14.15 Mbit/s  
95th percentile per-packet one-way delay: 33.956 ms  
Loss rate: 0.00%



Run 6: Report of Sprout — Data Link

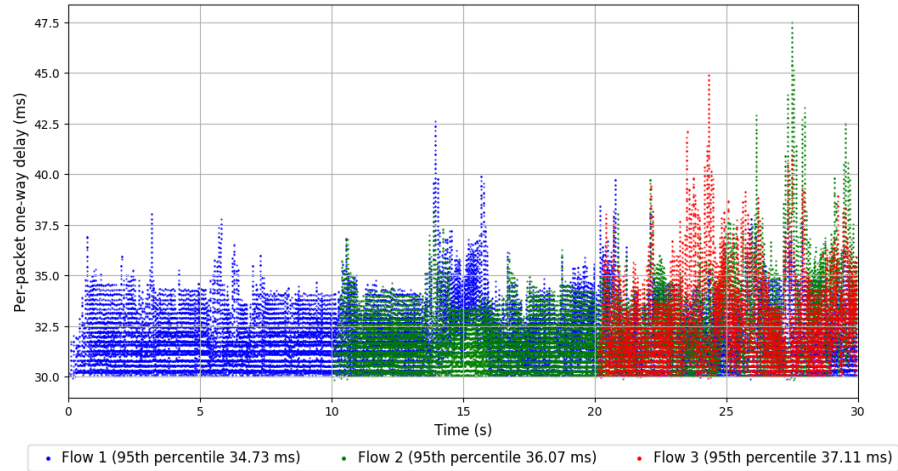
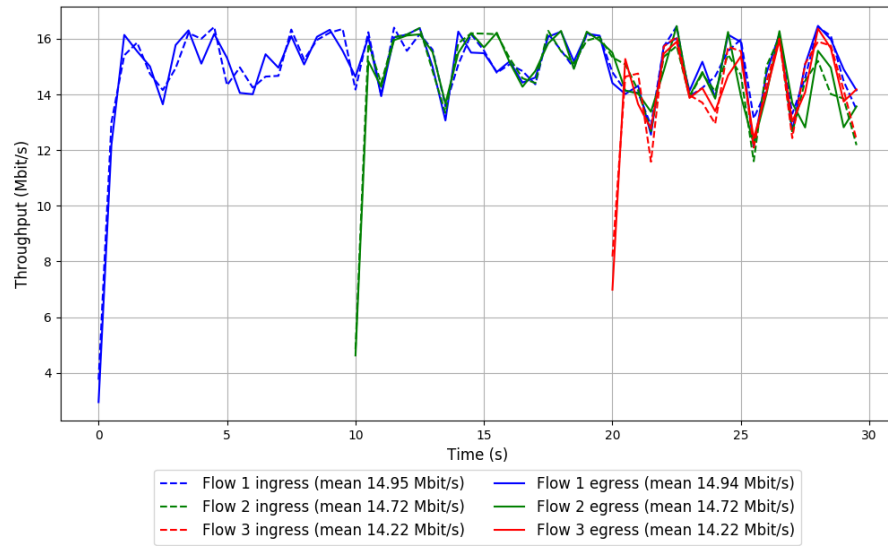


Run 7: Statistics of Sprout

Start at: 2017-12-06 00:32:49  
End at: 2017-12-06 00:33:19  
Local clock offset: -0.568 ms  
Remote clock offset: -1.143 ms

# Below is generated by plot.py at 2017-12-06 02:23:24  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 29.43 Mbit/s  
95th percentile per-packet one-way delay: 35.641 ms  
Loss rate: 0.02%  
-- Flow 1:  
Average throughput: 14.94 Mbit/s  
95th percentile per-packet one-way delay: 34.727 ms  
Loss rate: 0.04%  
-- Flow 2:  
Average throughput: 14.72 Mbit/s  
95th percentile per-packet one-way delay: 36.070 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 14.22 Mbit/s  
95th percentile per-packet one-way delay: 37.111 ms  
Loss rate: 0.00%

## Run 7: Report of Sprout — Data Link

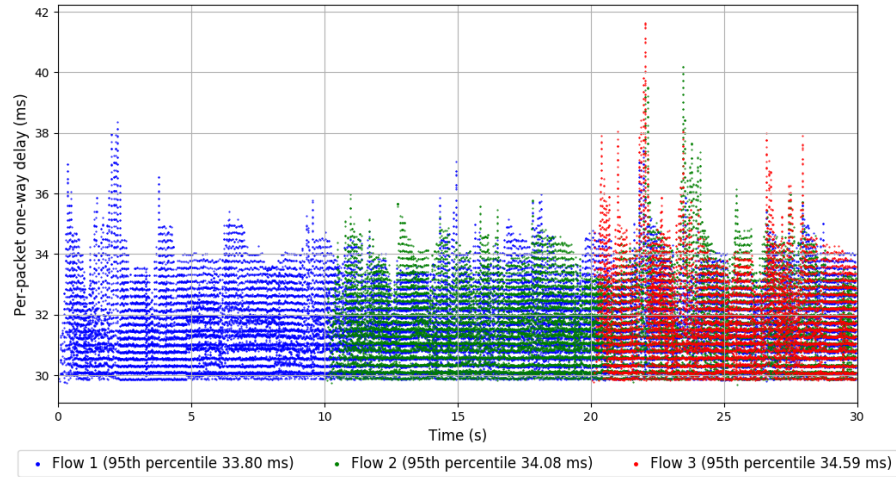
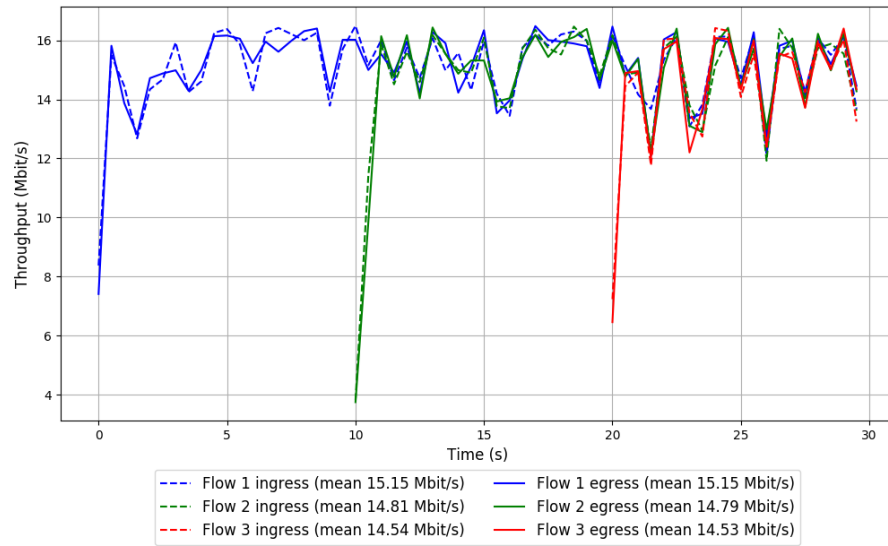


Run 8: Statistics of Sprout

Start at: 2017-12-06 00:53:57  
End at: 2017-12-06 00:54:27  
Local clock offset: -0.582 ms  
Remote clock offset: -0.722 ms

```
# Below is generated by plot.py at 2017-12-06 02:23:27
# Datalink statistics
-- Total of 3 flows:
Average throughput: 29.78 Mbit/s
95th percentile per-packet one-way delay: 34.032 ms
Loss rate: 0.05%
-- Flow 1:
Average throughput: 15.15 Mbit/s
95th percentile per-packet one-way delay: 33.803 ms
Loss rate: 0.02%
-- Flow 2:
Average throughput: 14.79 Mbit/s
95th percentile per-packet one-way delay: 34.083 ms
Loss rate: 0.11%
-- Flow 3:
Average throughput: 14.53 Mbit/s
95th percentile per-packet one-way delay: 34.586 ms
Loss rate: 0.00%
```

## Run 8: Report of Sprout — Data Link

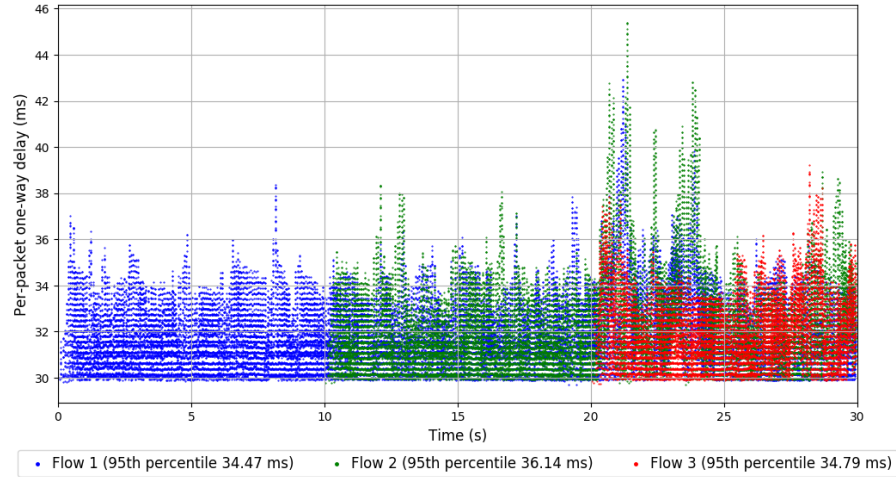
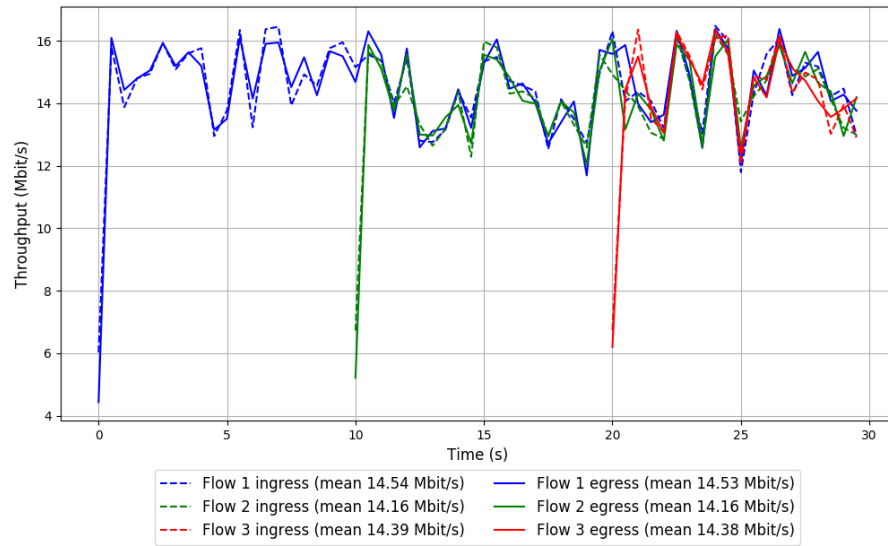


Run 9: Statistics of Sprout

Start at: 2017-12-06 01:18:23  
End at: 2017-12-06 01:18:53  
Local clock offset: -0.794 ms  
Remote clock offset: -0.692 ms

```
# Below is generated by plot.py at 2017-12-06 02:23:27
# Datalink statistics
-- Total of 3 flows:
Average throughput: 28.70 Mbit/s
95th percentile per-packet one-way delay: 34.995 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 14.53 Mbit/s
95th percentile per-packet one-way delay: 34.465 ms
Loss rate: 0.00%
-- Flow 2:
Average throughput: 14.16 Mbit/s
95th percentile per-packet one-way delay: 36.142 ms
Loss rate: 0.00%
-- Flow 3:
Average throughput: 14.38 Mbit/s
95th percentile per-packet one-way delay: 34.794 ms
Loss rate: 0.00%
```

## Run 9: Report of Sprout — Data Link



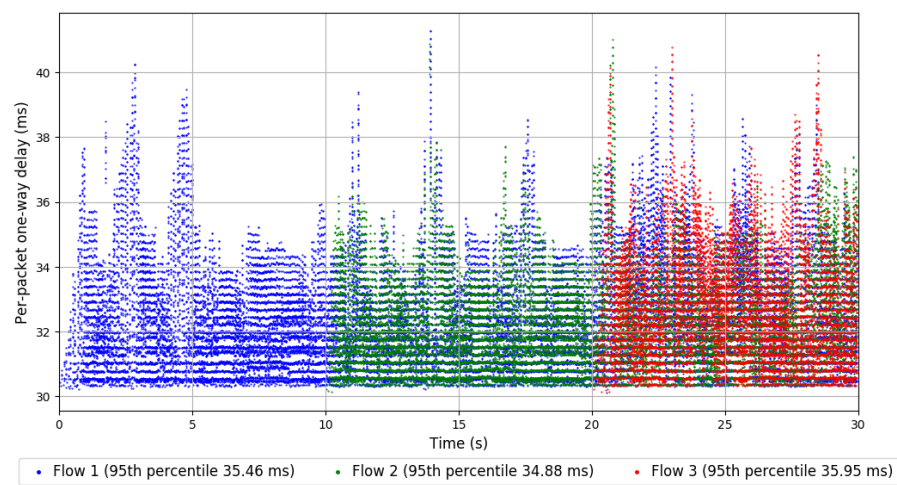
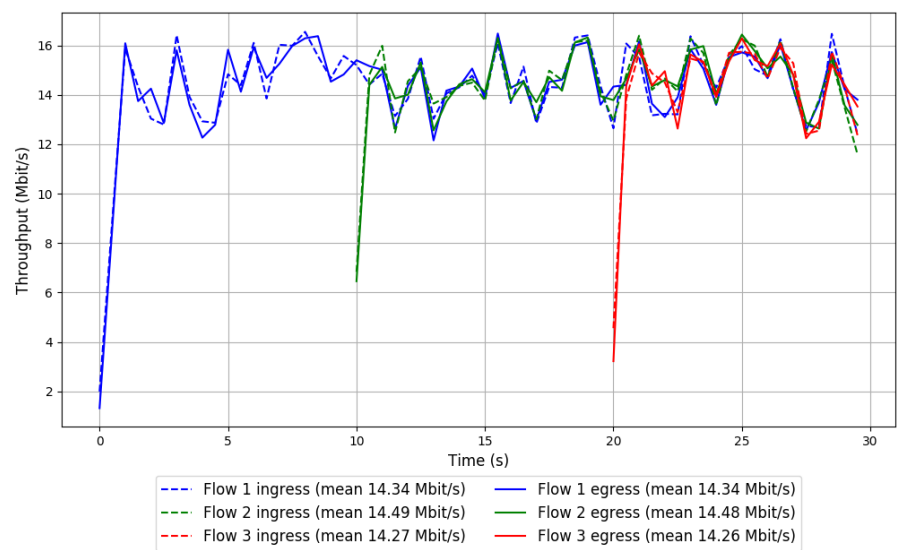
Run 10: Statistics of Sprout

Start at: 2017-12-06 01:43:16  
End at: 2017-12-06 01:43:46  
Local clock offset: -1.048 ms  
Remote clock offset: -0.656 ms

# Below is generated by plot.py at 2017-12-06 02:23:27  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 28.68 Mbit/s  
95th percentile per-packet one-way delay: 35.410 ms  
Loss rate: 0.03%  
-- Flow 1:  
Average throughput: 14.34 Mbit/s  
95th percentile per-packet one-way delay: 35.464 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 14.48 Mbit/s  
95th percentile per-packet one-way delay: 34.880 ms  
Loss rate: 0.09%  
-- Flow 3:  
Average throughput: 14.26 Mbit/s  
95th percentile per-packet one-way delay: 35.954 ms  
Loss rate: 0.00%



Run 10: Report of Sprout — Data Link

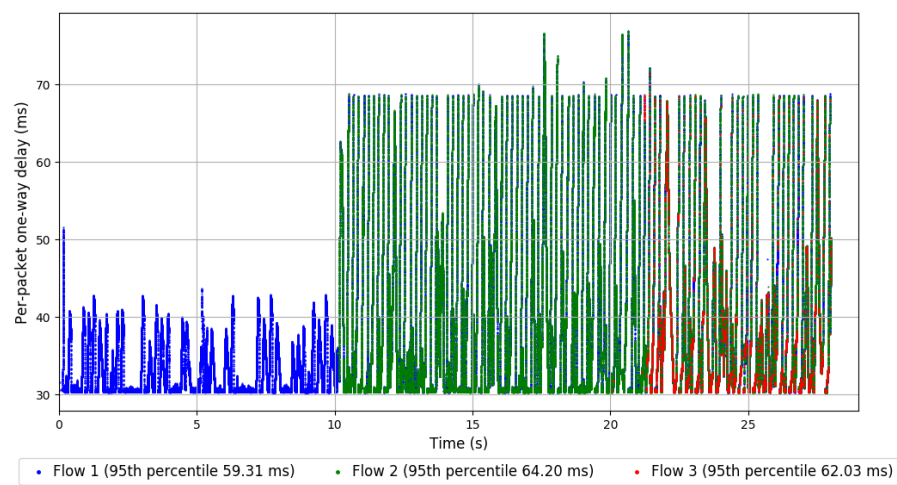
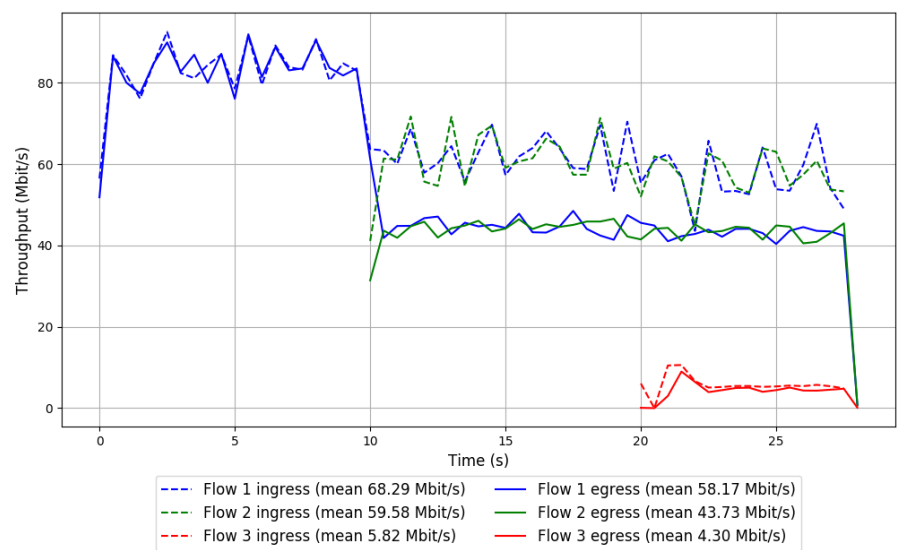


Run 1: Statistics of TaoVA-100x

Start at: 2017-12-05 22:15:48  
End at: 2017-12-05 22:16:18  
Local clock offset: -0.255 ms  
Remote clock offset: -1.753 ms

# Below is generated by plot.py at 2017-12-06 02:25:19  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 87.48 Mbit/s  
95th percentile per-packet one-way delay: 61.681 ms  
Loss rate: 19.11%  
-- Flow 1:  
Average throughput: 58.17 Mbit/s  
95th percentile per-packet one-way delay: 59.314 ms  
Loss rate: 14.77%  
-- Flow 2:  
Average throughput: 43.73 Mbit/s  
95th percentile per-packet one-way delay: 64.197 ms  
Loss rate: 26.54%  
-- Flow 3:  
Average throughput: 4.30 Mbit/s  
95th percentile per-packet one-way delay: 62.031 ms  
Loss rate: 26.01%

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

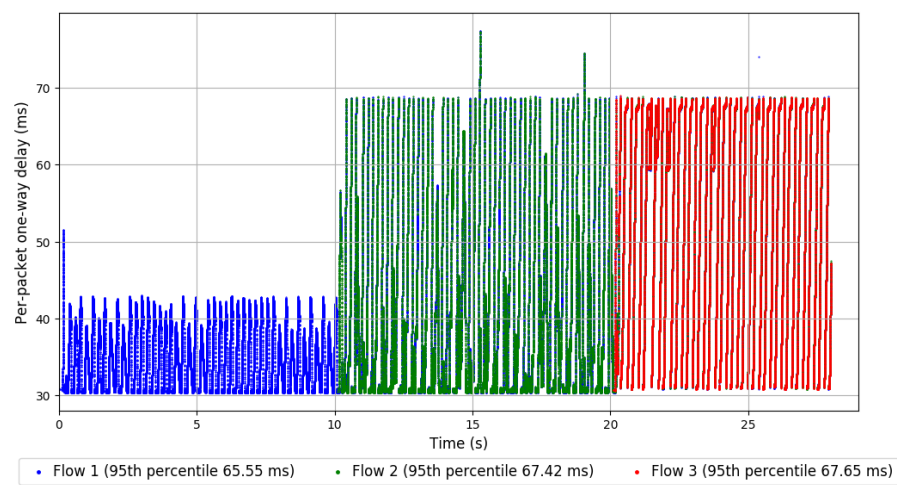
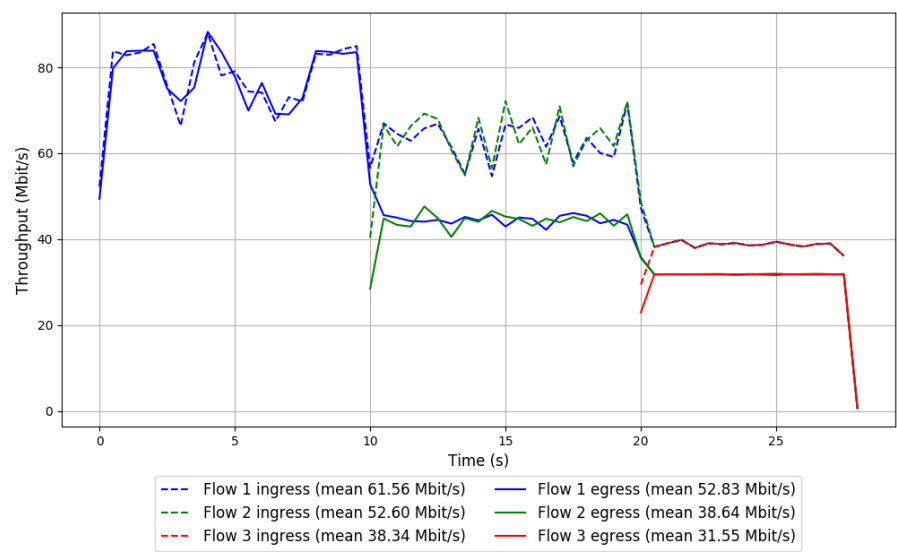


Run 2: Statistics of TaoVA-100x

Start at: 2017-12-05 22:37:03  
End at: 2017-12-05 22:37:33  
Local clock offset: -0.359 ms  
Remote clock offset: -1.126 ms

# Below is generated by plot.py at 2017-12-06 02:25:20  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 86.60 Mbit/s  
95th percentile per-packet one-way delay: 67.327 ms  
Loss rate: 18.43%  
-- Flow 1:  
Average throughput: 52.83 Mbit/s  
95th percentile per-packet one-way delay: 65.548 ms  
Loss rate: 14.13%  
-- Flow 2:  
Average throughput: 38.64 Mbit/s  
95th percentile per-packet one-way delay: 67.425 ms  
Loss rate: 26.51%  
-- Flow 3:  
Average throughput: 31.55 Mbit/s  
95th percentile per-packet one-way delay: 67.650 ms  
Loss rate: 17.66%

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

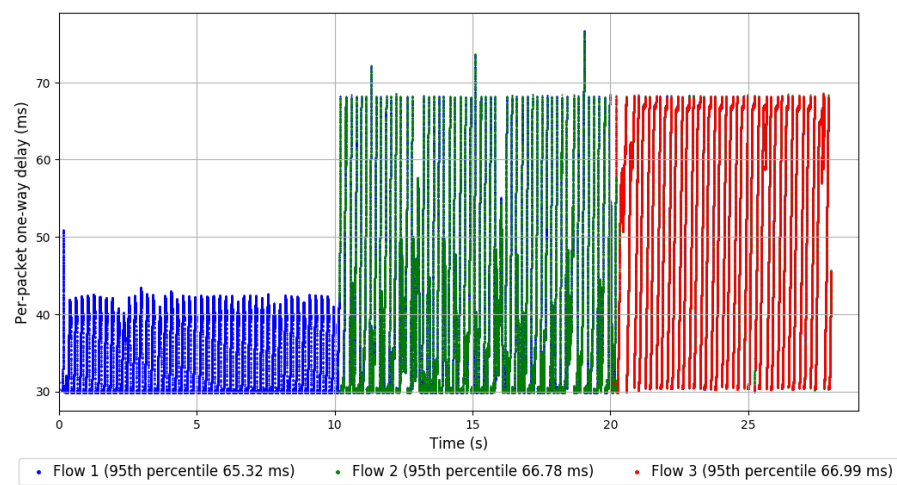
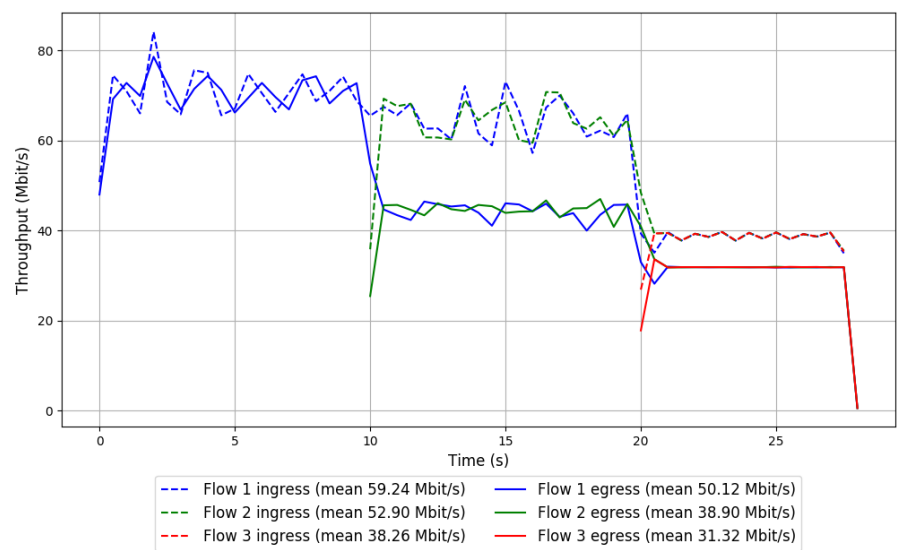


Run 3: Statistics of TaoVA-100x

Start at: 2017-12-05 22:57:13  
End at: 2017-12-05 22:57:43  
Local clock offset: -0.267 ms  
Remote clock offset: -1.575 ms

# Below is generated by plot.py at 2017-12-06 02:25:27  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 83.98 Mbit/s  
95th percentile per-packet one-way delay: 66.689 ms  
Loss rate: 19.23%  
-- Flow 1:  
Average throughput: 50.12 Mbit/s  
95th percentile per-packet one-way delay: 65.318 ms  
Loss rate: 15.36%  
-- Flow 2:  
Average throughput: 38.90 Mbit/s  
95th percentile per-packet one-way delay: 66.780 ms  
Loss rate: 26.39%  
-- Flow 3:  
Average throughput: 31.32 Mbit/s  
95th percentile per-packet one-way delay: 66.989 ms  
Loss rate: 17.98%

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



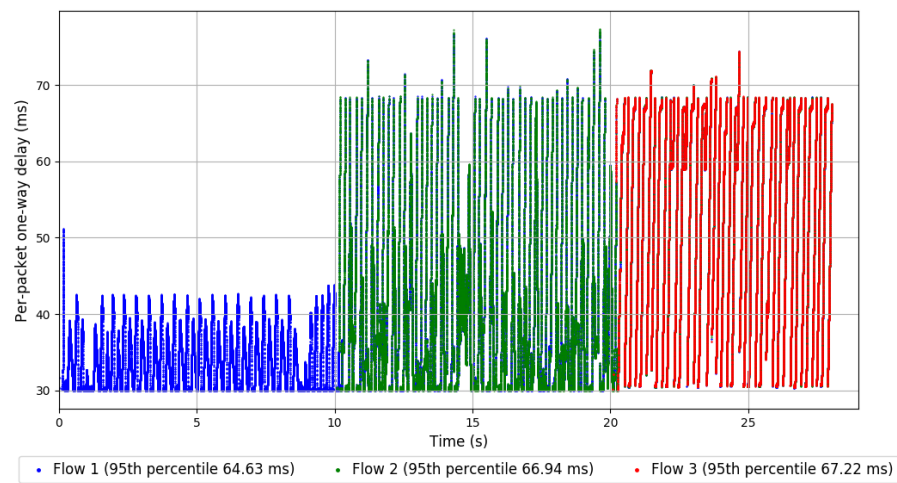
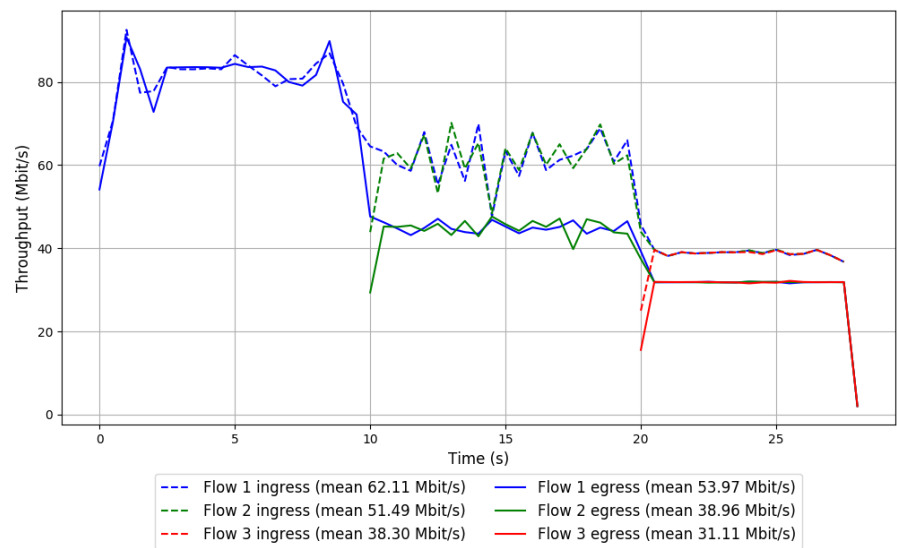
Run 4: Statistics of TaoVA-100x

Start at: 2017-12-05 23:17:02  
End at: 2017-12-05 23:17:32  
Local clock offset: -0.37 ms  
Remote clock offset: -1.834 ms

# Below is generated by plot.py at 2017-12-06 02:25:47  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 87.83 Mbit/s  
95th percentile per-packet one-way delay: 66.772 ms  
Loss rate: 17.04%  
-- Flow 1:  
Average throughput: 53.97 Mbit/s  
95th percentile per-packet one-way delay: 64.626 ms  
Loss rate: 13.00%  
-- Flow 2:  
Average throughput: 38.96 Mbit/s  
95th percentile per-packet one-way delay: 66.937 ms  
Loss rate: 24.19%  
-- Flow 3:  
Average throughput: 31.11 Mbit/s  
95th percentile per-packet one-way delay: 67.223 ms  
Loss rate: 18.38%



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

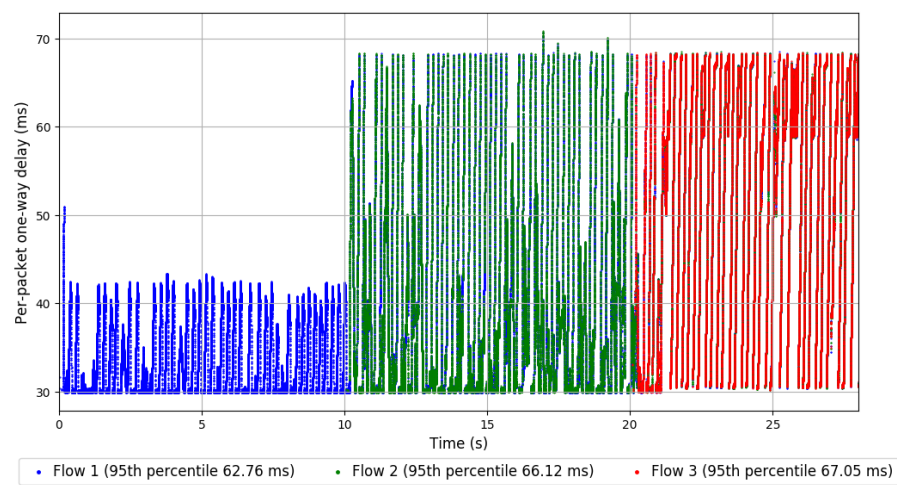
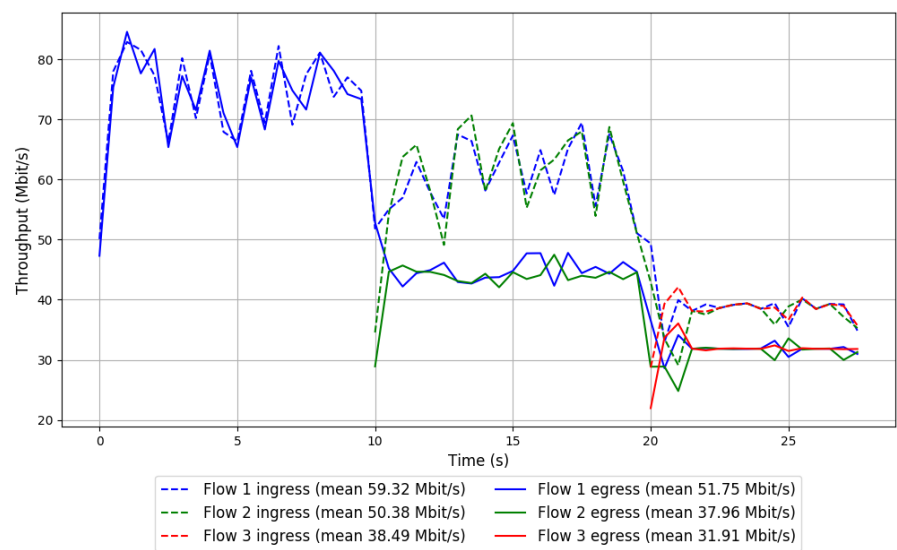


Run 5: Statistics of TaoVA-100x

Start at: 2017-12-05 23:37:57  
End at: 2017-12-05 23:38:27  
Local clock offset: -0.268 ms  
Remote clock offset: -2.498 ms

# Below is generated by plot.py at 2017-12-06 02:25:47  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.14 Mbit/s  
95th percentile per-packet one-way delay: 65.197 ms  
Loss rate: 16.97%  
-- Flow 1:  
Average throughput: 51.75 Mbit/s  
95th percentile per-packet one-way delay: 62.761 ms  
Loss rate: 12.77%  
-- Flow 2:  
Average throughput: 37.96 Mbit/s  
95th percentile per-packet one-way delay: 66.119 ms  
Loss rate: 24.64%  
-- Flow 3:  
Average throughput: 31.91 Mbit/s  
95th percentile per-packet one-way delay: 67.054 ms  
Loss rate: 17.12%

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

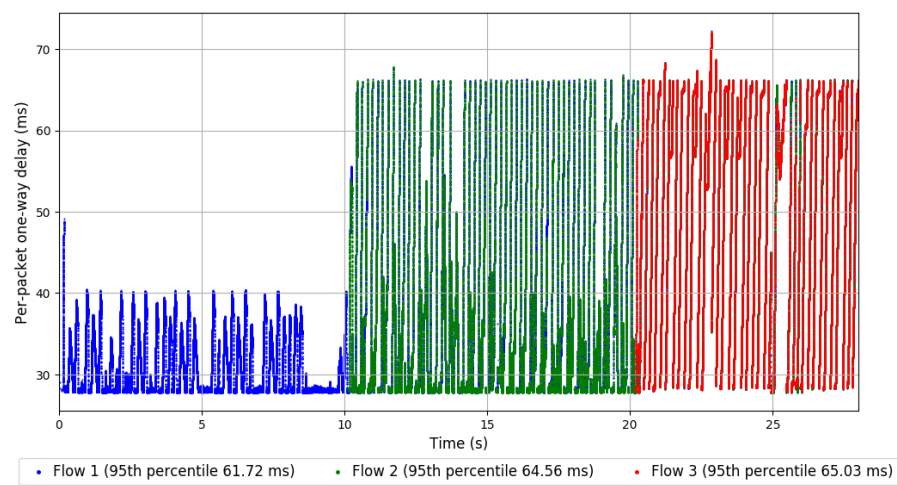
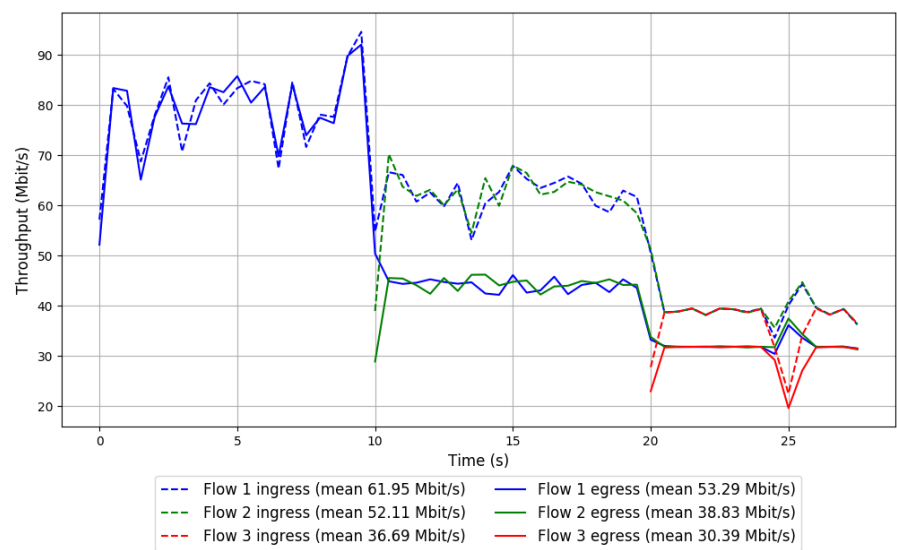


Run 6: Statistics of TaoVA-100x

Start at: 2017-12-06 00:00:08  
End at: 2017-12-06 00:00:38  
Local clock offset: -0.333 ms  
Remote clock offset: -4.346 ms

# Below is generated by plot.py at 2017-12-06 02:25:48  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 86.80 Mbit/s  
95th percentile per-packet one-way delay: 64.270 ms  
Loss rate: 17.97%  
-- Flow 1:  
Average throughput: 53.29 Mbit/s  
95th percentile per-packet one-way delay: 61.723 ms  
Loss rate: 13.97%  
-- Flow 2:  
Average throughput: 38.83 Mbit/s  
95th percentile per-packet one-way delay: 64.556 ms  
Loss rate: 25.52%  
-- Flow 3:  
Average throughput: 30.39 Mbit/s  
95th percentile per-packet one-way delay: 65.027 ms  
Loss rate: 17.47%

Run 6: Report of TaoVA-100x — Data Link

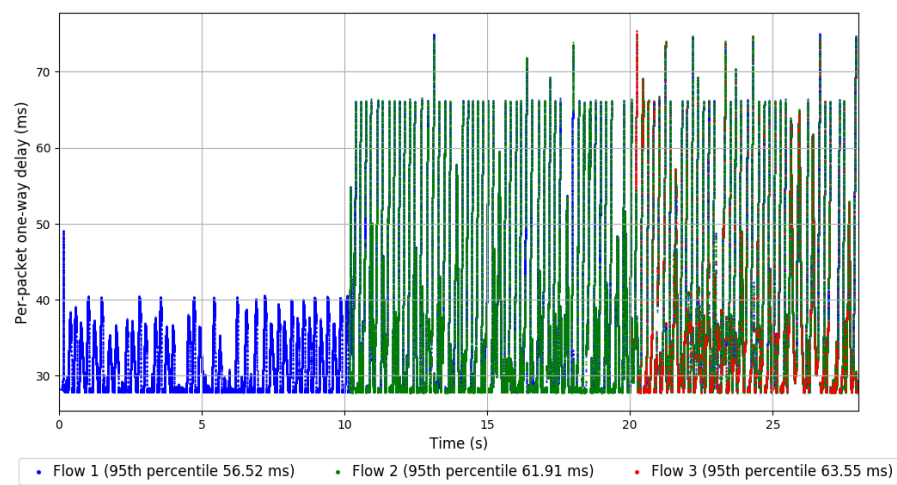
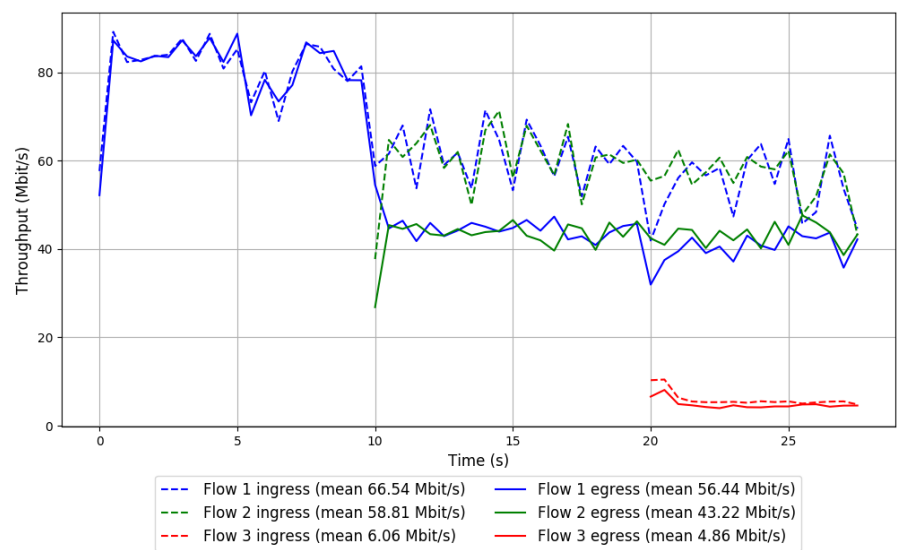


Run 7: Statistics of TaoVA-100x

Start at: 2017-12-06 00:22:02  
End at: 2017-12-06 00:22:32  
Local clock offset: -0.5 ms  
Remote clock offset: -3.768 ms

# Below is generated by plot.py at 2017-12-06 02:25:48  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.53 Mbit/s  
95th percentile per-packet one-way delay: 59.310 ms  
Loss rate: 19.29%  
-- Flow 1:  
Average throughput: 56.44 Mbit/s  
95th percentile per-packet one-way delay: 56.520 ms  
Loss rate: 15.17%  
-- Flow 2:  
Average throughput: 43.22 Mbit/s  
95th percentile per-packet one-way delay: 61.913 ms  
Loss rate: 26.54%  
-- Flow 3:  
Average throughput: 4.86 Mbit/s  
95th percentile per-packet one-way delay: 63.546 ms  
Loss rate: 19.85%

Run 7: Report of TaoVA-100x — Data Link



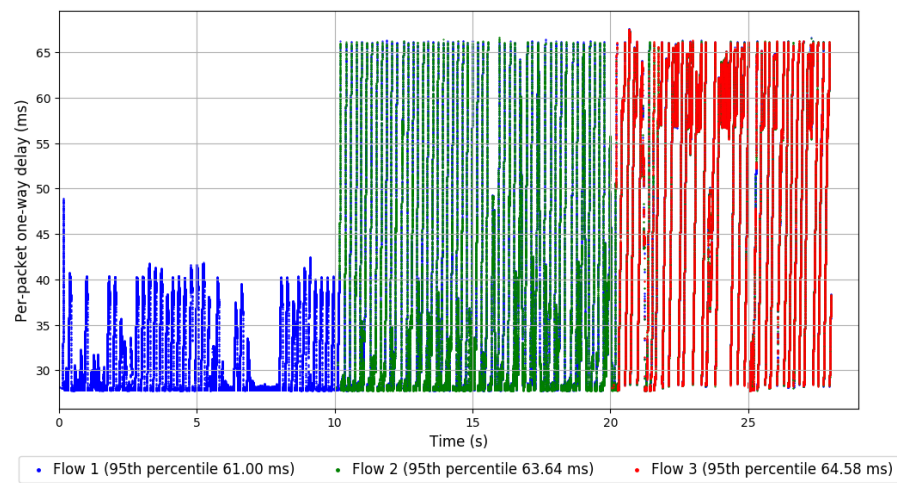
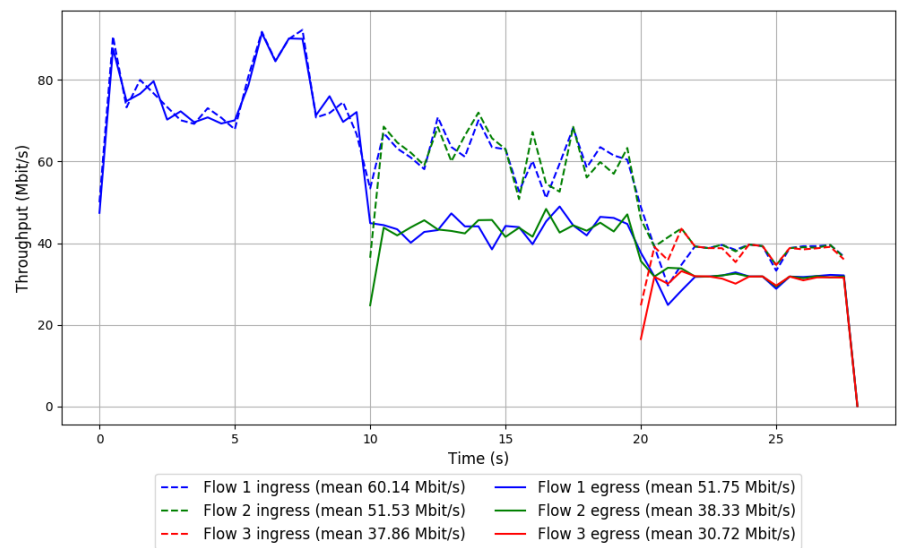
Run 8: Statistics of TaoVA-100x

Start at: 2017-12-06 00:43:24  
End at: 2017-12-06 00:43:54  
Local clock offset: -0.51 ms  
Remote clock offset: -2.939 ms

# Below is generated by plot.py at 2017-12-06 02:25:48  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.06 Mbit/s  
95th percentile per-packet one-way delay: 62.955 ms  
Loss rate: 18.12%  
-- Flow 1:  
Average throughput: 51.75 Mbit/s  
95th percentile per-packet one-way delay: 60.996 ms  
Loss rate: 13.91%  
-- Flow 2:  
Average throughput: 38.33 Mbit/s  
95th percentile per-packet one-way delay: 63.637 ms  
Loss rate: 25.57%  
-- Flow 3:  
Average throughput: 30.72 Mbit/s  
95th percentile per-packet one-way delay: 64.578 ms  
Loss rate: 18.75%



Run 8: Report of TaoVA-100x — Data Link

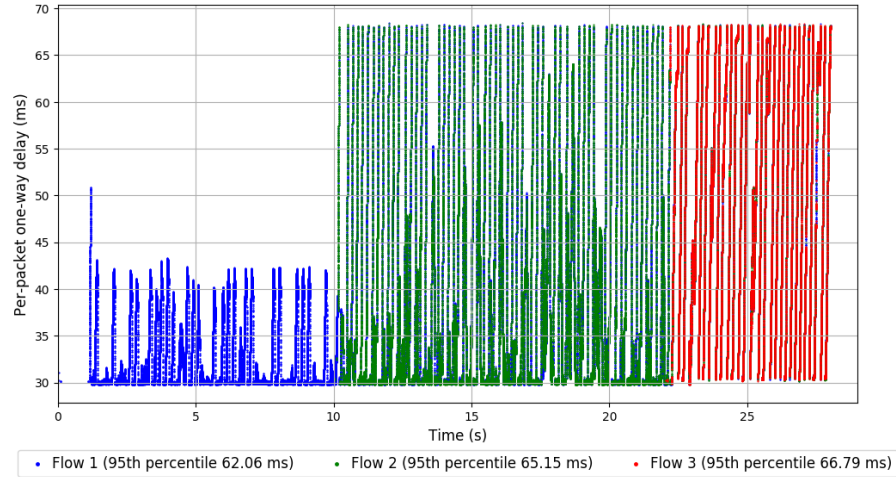
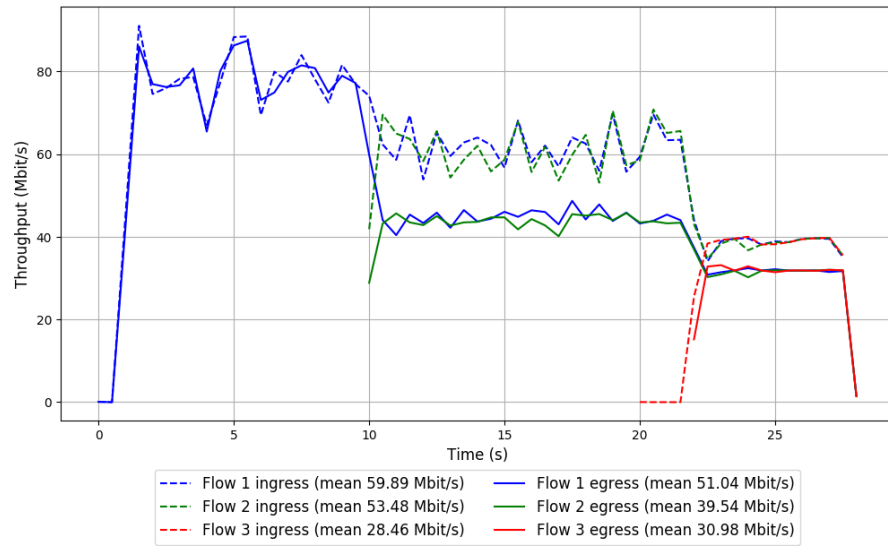


Run 9: Statistics of TaoVA-100x

Start at: 2017-12-06 01:05:16  
End at: 2017-12-06 01:05:46  
Local clock offset: -0.774 ms  
Remote clock offset: -0.743 ms

# Below is generated by plot.py at 2017-12-06 02:27:39  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 83.05 Mbit/s  
95th percentile per-packet one-way delay: 64.206 ms  
Loss rate: 18.75%  
-- Flow 1:  
Average throughput: 51.04 Mbit/s  
95th percentile per-packet one-way delay: 62.062 ms  
Loss rate: 14.69%  
-- Flow 2:  
Average throughput: 39.54 Mbit/s  
95th percentile per-packet one-way delay: 65.146 ms  
Loss rate: 25.95%  
-- Flow 3:  
Average throughput: 30.98 Mbit/s  
95th percentile per-packet one-way delay: 66.787 ms  
Loss rate: 18.18%

# Run 9: Report of TaoVA-100x — Data Link

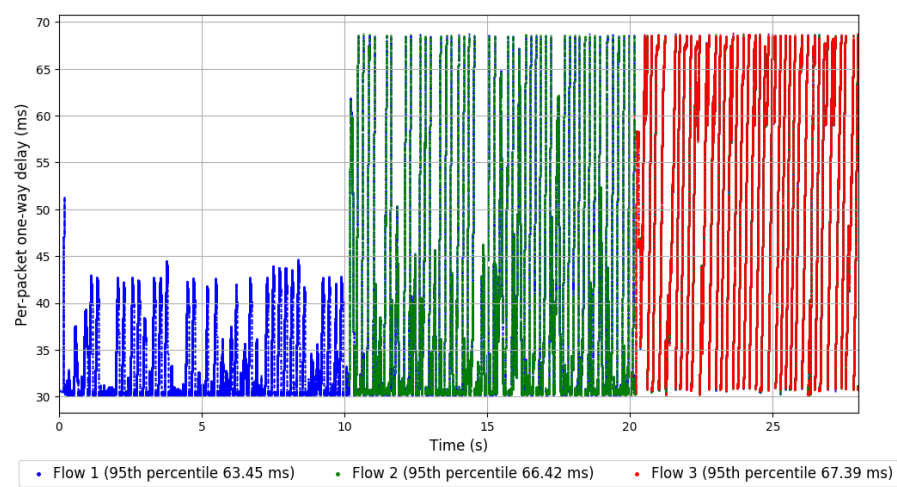
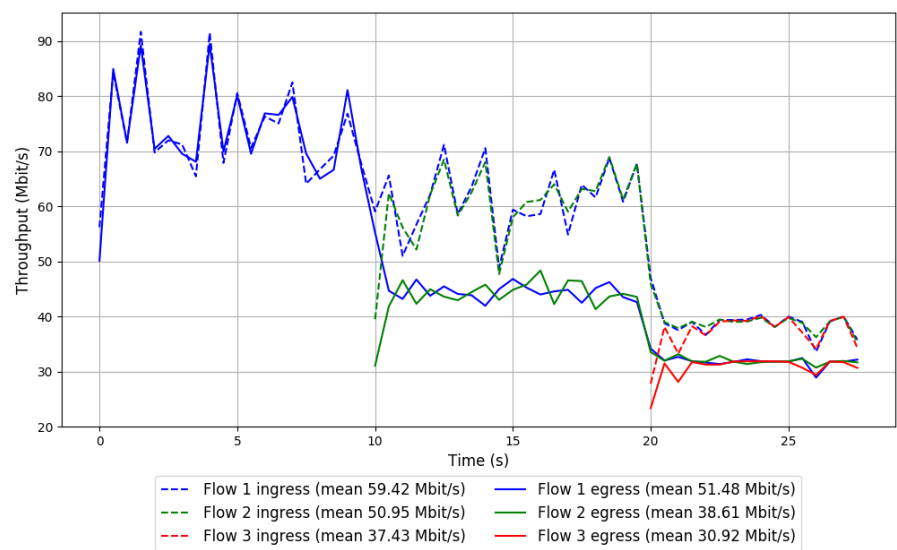


Run 10: Statistics of TaoVA-100x

Start at: 2017-12-06 01:30:29  
End at: 2017-12-06 01:30:59  
Local clock offset: -0.903 ms  
Remote clock offset: -0.514 ms

# Below is generated by plot.py at 2017-12-06 02:27:41  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 85.05 Mbit/s  
95th percentile per-packet one-way delay: 65.710 ms  
Loss rate: 17.24%  
-- Flow 1:  
Average throughput: 51.48 Mbit/s  
95th percentile per-packet one-way delay: 63.454 ms  
Loss rate: 13.36%  
-- Flow 2:  
Average throughput: 38.61 Mbit/s  
95th percentile per-packet one-way delay: 66.415 ms  
Loss rate: 24.23%  
-- Flow 3:  
Average throughput: 30.92 Mbit/s  
95th percentile per-packet one-way delay: 67.385 ms  
Loss rate: 17.41%

Run 10: Report of TaoVA-100x — Data Link

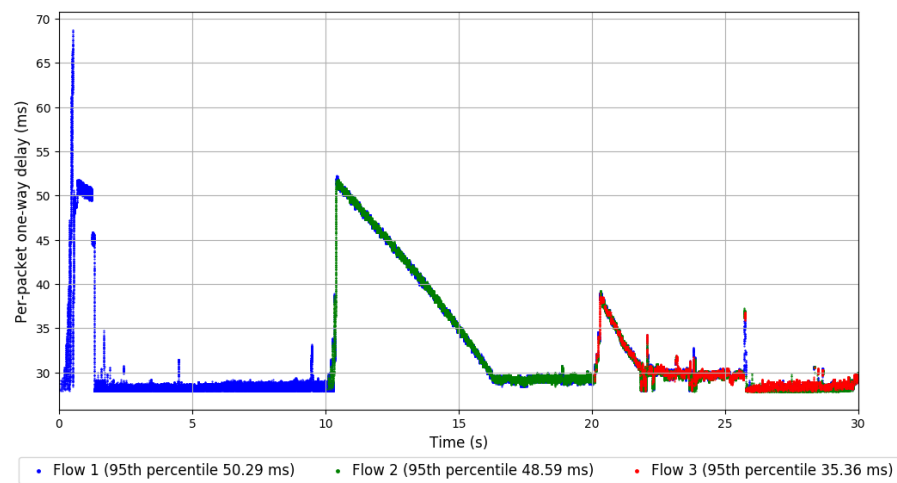
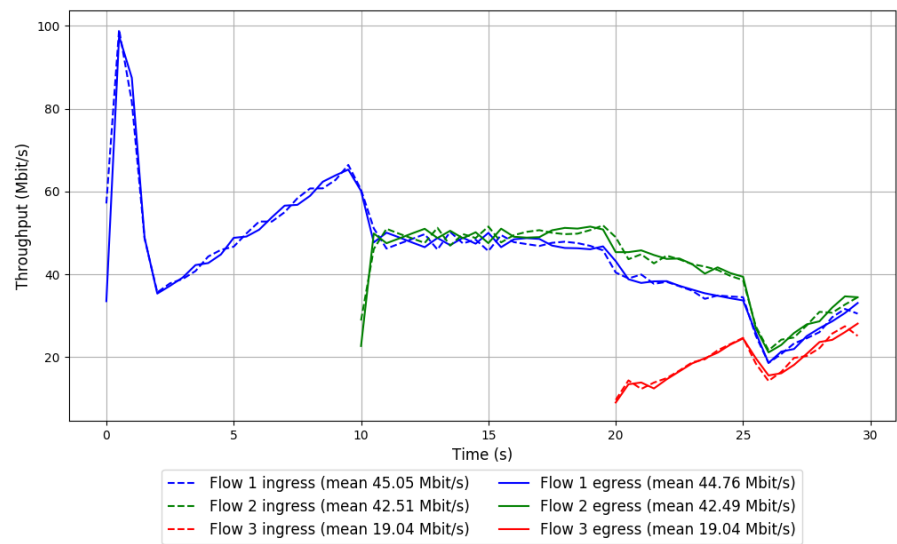


Run 1: Statistics of TCP Vegas

Start at: 2017-12-05 22:28:19  
End at: 2017-12-05 22:28:49  
Local clock offset: -0.377 ms  
Remote clock offset: -3.742 ms

# Below is generated by plot.py at 2017-12-06 02:27:41  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 79.35 Mbit/s  
95th percentile per-packet one-way delay: 49.565 ms  
Loss rate: 0.38%  
-- Flow 1:  
Average throughput: 44.76 Mbit/s  
95th percentile per-packet one-way delay: 50.287 ms  
Loss rate: 0.64%  
-- Flow 2:  
Average throughput: 42.49 Mbit/s  
95th percentile per-packet one-way delay: 48.594 ms  
Loss rate: 0.05%  
-- Flow 3:  
Average throughput: 19.04 Mbit/s  
95th percentile per-packet one-way delay: 35.357 ms  
Loss rate: 0.02%

Run 1: Report of TCP Vegas — Data Link



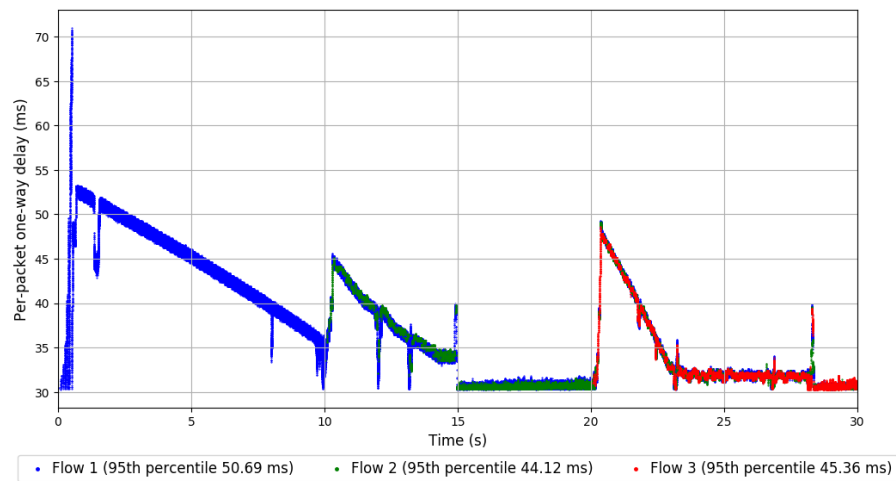
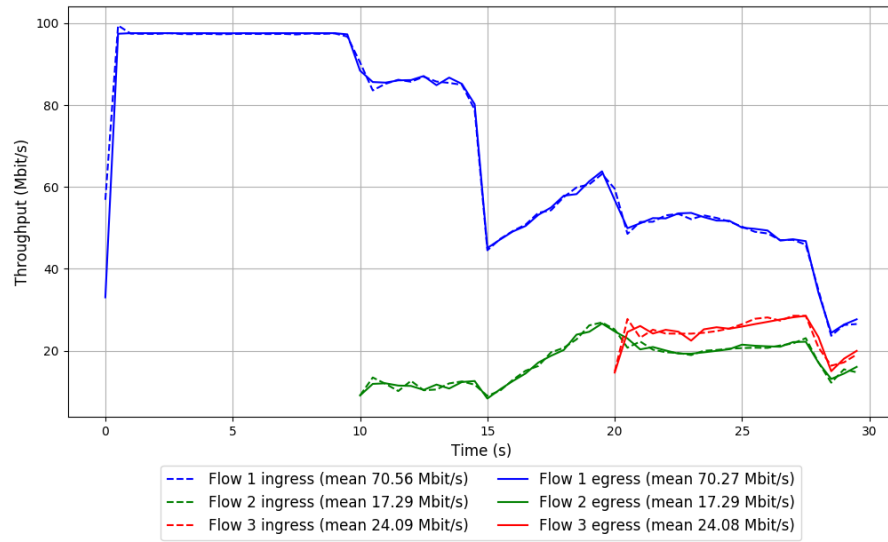
Run 2: Statistics of TCP Vegas

Start at: 2017-12-05 22:48:29  
End at: 2017-12-05 22:48:59  
Local clock offset: -0.266 ms  
Remote clock offset: -1.082 ms

# Below is generated by plot.py at 2017-12-06 02:27:41  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 89.76 Mbit/s  
95th percentile per-packet one-way delay: 50.178 ms  
Loss rate: 0.33%  
-- Flow 1:  
Average throughput: 70.27 Mbit/s  
95th percentile per-packet one-way delay: 50.686 ms  
Loss rate: 0.40%  
-- Flow 2:  
Average throughput: 17.29 Mbit/s  
95th percentile per-packet one-way delay: 44.119 ms  
Loss rate: 0.08%  
-- Flow 3:  
Average throughput: 24.08 Mbit/s  
95th percentile per-packet one-way delay: 45.363 ms  
Loss rate: 0.04%



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

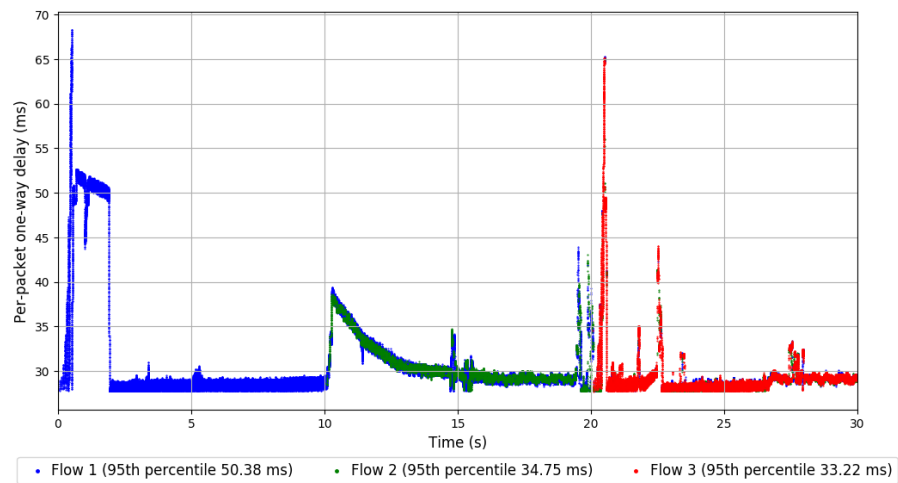
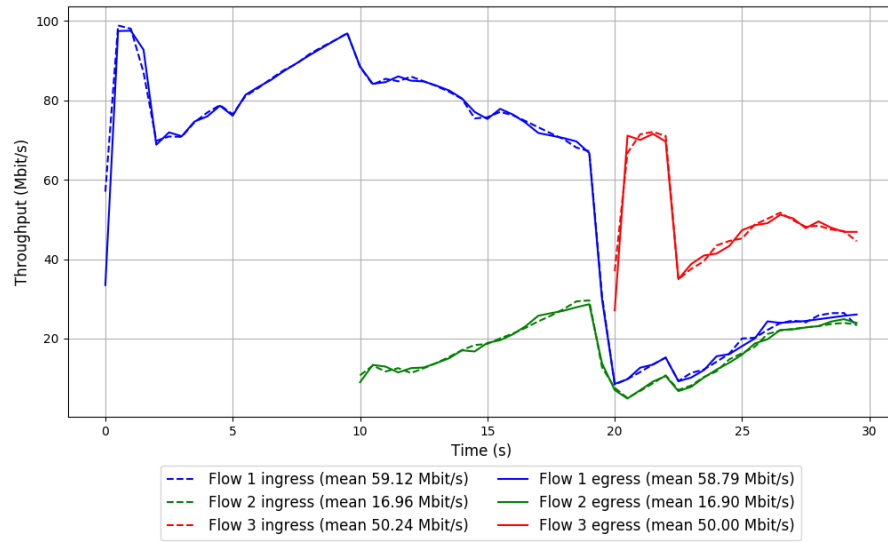


Run 3: Statistics of TCP Vegas

Start at: 2017-12-05 23:08:28  
End at: 2017-12-05 23:08:58  
Local clock offset: -0.34 ms  
Remote clock offset: -3.777 ms

# Below is generated by plot.py at 2017-12-06 02:27:41  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 86.60 Mbit/s  
95th percentile per-packet one-way delay: 49.177 ms  
Loss rate: 0.52%  
-- Flow 1:  
Average throughput: 58.79 Mbit/s  
95th percentile per-packet one-way delay: 50.381 ms  
Loss rate: 0.55%  
-- Flow 2:  
Average throughput: 16.90 Mbit/s  
95th percentile per-packet one-way delay: 34.751 ms  
Loss rate: 0.33%  
-- Flow 3:  
Average throughput: 50.00 Mbit/s  
95th percentile per-packet one-way delay: 33.224 ms  
Loss rate: 0.54%

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



Run 4: Statistics of TCP Vegas

Start at: 2017-12-05 23:28:53

End at: 2017-12-05 23:29:23

Local clock offset: -0.357 ms

Remote clock offset: -2.43 ms

# Below is generated by plot.py at 2017-12-06 02:27:41

# Datalink statistics

-- Total of 3 flows:

Average throughput: 77.06 Mbit/s

95th percentile per-packet one-way delay: 32.841 ms

Loss rate: 0.71%

-- Flow 1:

Average throughput: 47.67 Mbit/s

95th percentile per-packet one-way delay: 32.924 ms

Loss rate: 1.10%

-- Flow 2:

Average throughput: 31.85 Mbit/s

95th percentile per-packet one-way delay: 32.800 ms

Loss rate: 0.05%

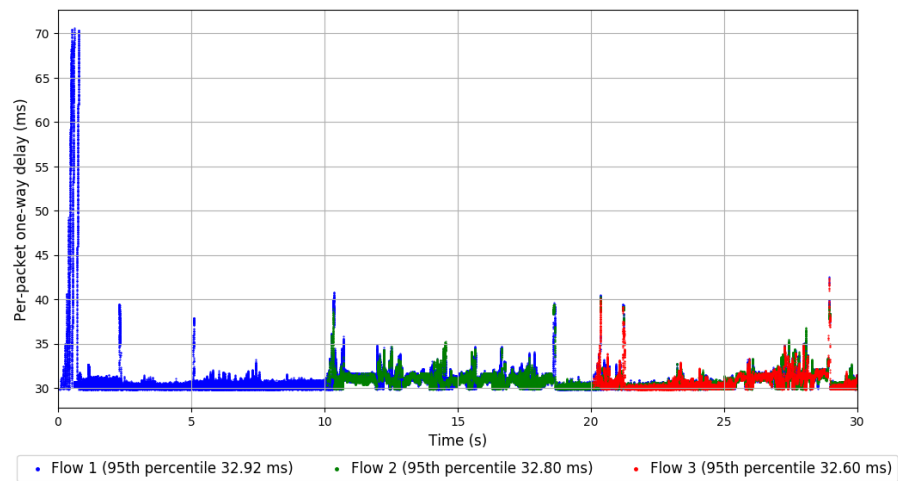
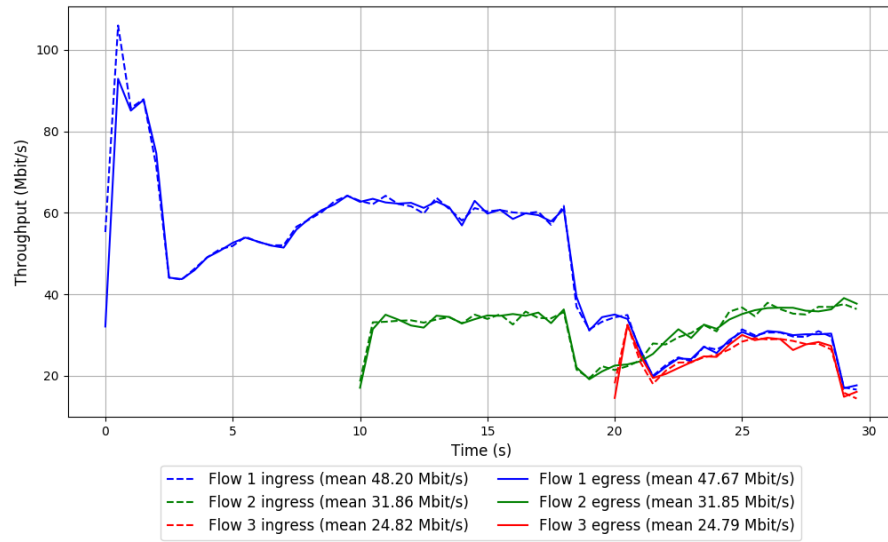
-- Flow 3:

Average throughput: 24.79 Mbit/s

95th percentile per-packet one-way delay: 32.603 ms

Loss rate: 0.14%

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

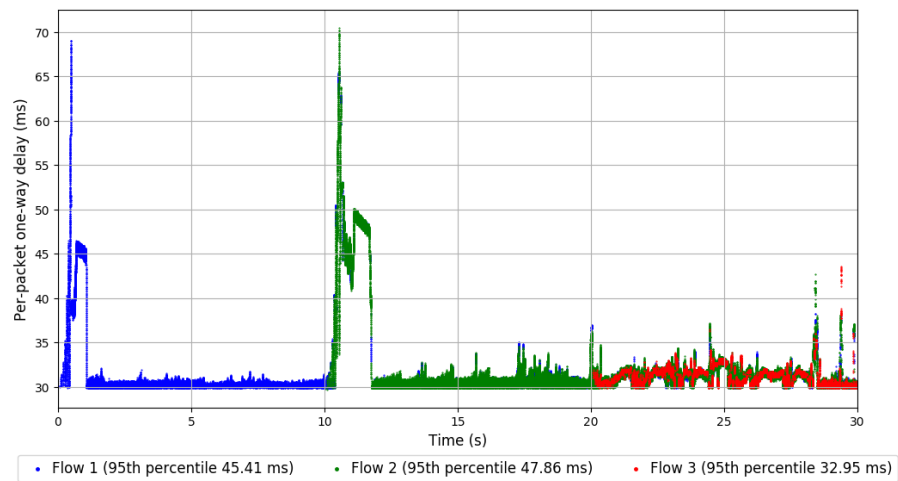
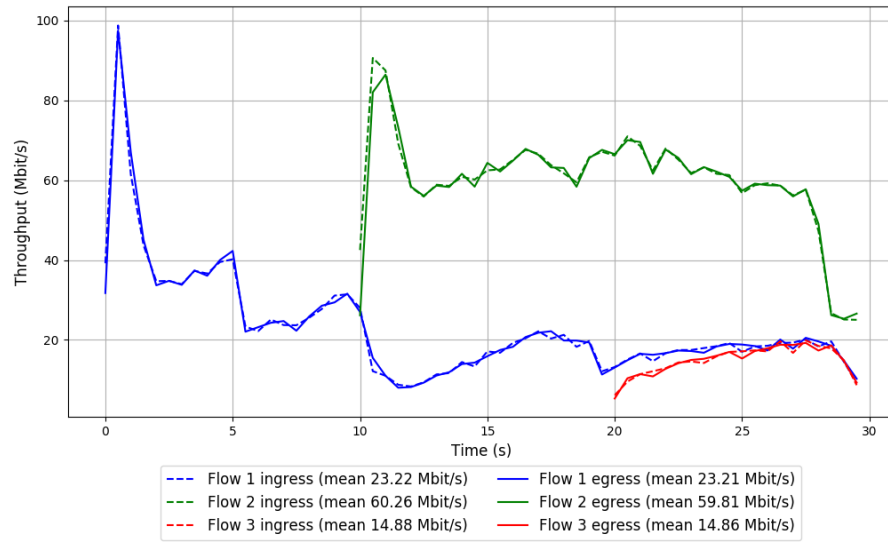


Run 5: Statistics of TCP Vegas

Start at: 2017-12-05 23:50:37  
End at: 2017-12-05 23:51:07  
Local clock offset: -0.416 ms  
Remote clock offset: -2.533 ms

# Below is generated by plot.py at 2017-12-06 02:27:41  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 67.95 Mbit/s  
95th percentile per-packet one-way delay: 45.831 ms  
Loss rate: 0.49%  
-- Flow 1:  
Average throughput: 23.21 Mbit/s  
95th percentile per-packet one-way delay: 45.415 ms  
Loss rate: 0.04%  
-- Flow 2:  
Average throughput: 59.81 Mbit/s  
95th percentile per-packet one-way delay: 47.861 ms  
Loss rate: 0.79%  
-- Flow 3:  
Average throughput: 14.86 Mbit/s  
95th percentile per-packet one-way delay: 32.955 ms  
Loss rate: 0.24%

# Run 5: Report of TCP Vegas — Data Link



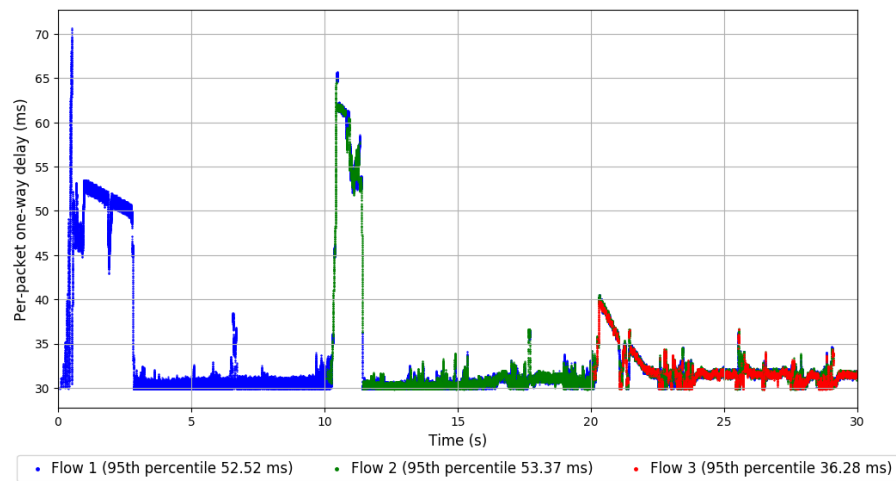
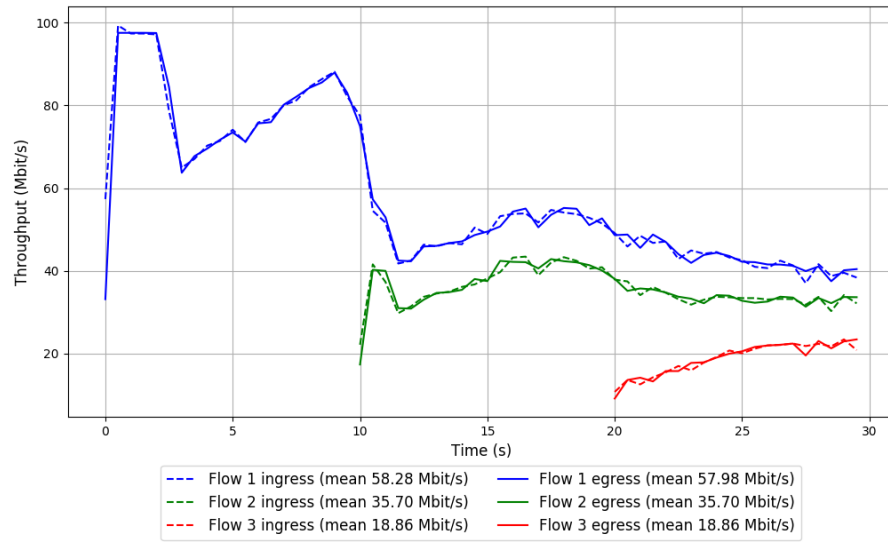
Run 6: Statistics of TCP Vegas

Start at: 2017-12-06 00:12:45  
End at: 2017-12-06 00:13:15  
Local clock offset: -0.465 ms  
Remote clock offset: -2.068 ms

# Below is generated by plot.py at 2017-12-06 02:27:41  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 88.01 Mbit/s  
95th percentile per-packet one-way delay: 52.463 ms  
Loss rate: 0.33%  
-- Flow 1:  
Average throughput: 57.98 Mbit/s  
95th percentile per-packet one-way delay: 52.521 ms  
Loss rate: 0.50%  
-- Flow 2:  
Average throughput: 35.70 Mbit/s  
95th percentile per-packet one-way delay: 53.365 ms  
Loss rate: 0.01%  
-- Flow 3:  
Average throughput: 18.86 Mbit/s  
95th percentile per-packet one-way delay: 36.284 ms  
Loss rate: 0.00%



# Run 6: Report of TCP Vegas — Data Link

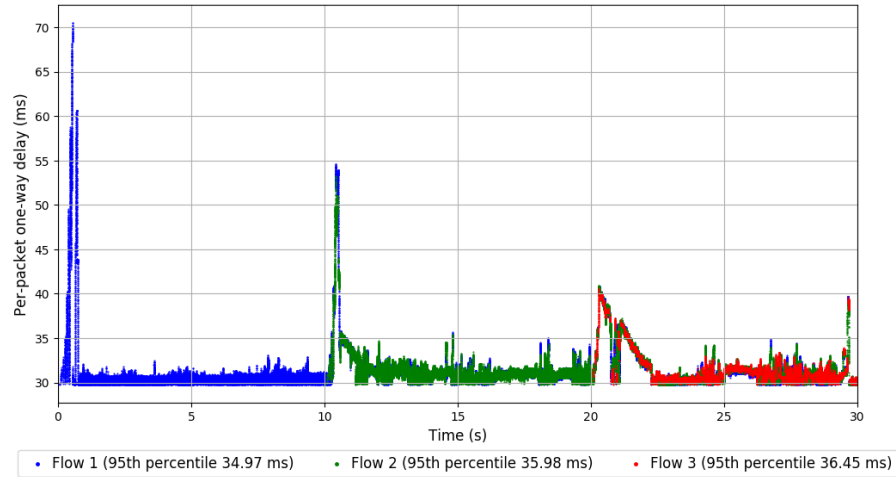
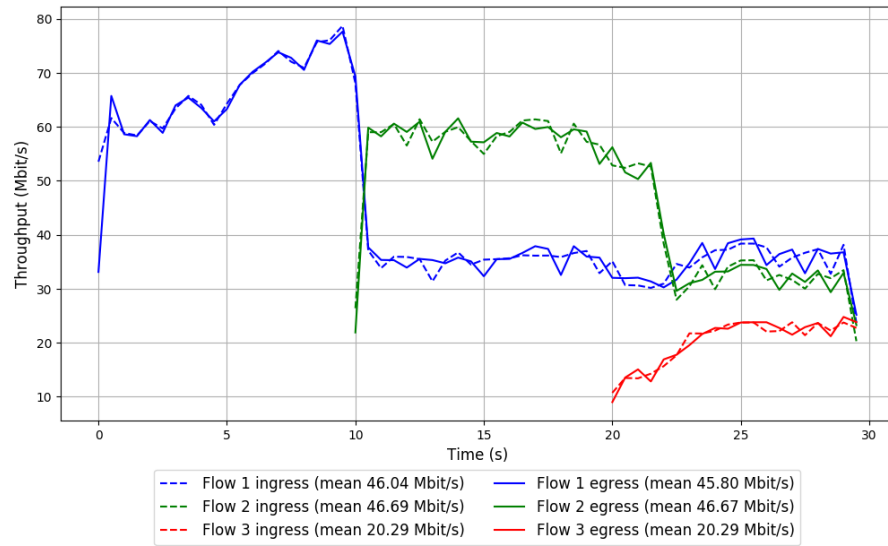


Run 7: Statistics of TCP Vegas

Start at: 2017-12-06 00:34:10  
End at: 2017-12-06 00:34:40  
Local clock offset: -0.566 ms  
Remote clock offset: -1.329 ms

# Below is generated by plot.py at 2017-12-06 02:27:58  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 83.62 Mbit/s  
95th percentile per-packet one-way delay: 35.673 ms  
Loss rate: 0.30%  
-- Flow 1:  
Average throughput: 45.80 Mbit/s  
95th percentile per-packet one-way delay: 34.974 ms  
Loss rate: 0.52%  
-- Flow 2:  
Average throughput: 46.67 Mbit/s  
95th percentile per-packet one-way delay: 35.975 ms  
Loss rate: 0.03%  
-- Flow 3:  
Average throughput: 20.29 Mbit/s  
95th percentile per-packet one-way delay: 36.446 ms  
Loss rate: 0.01%

## Run 7: Report of TCP Vegas — Data Link

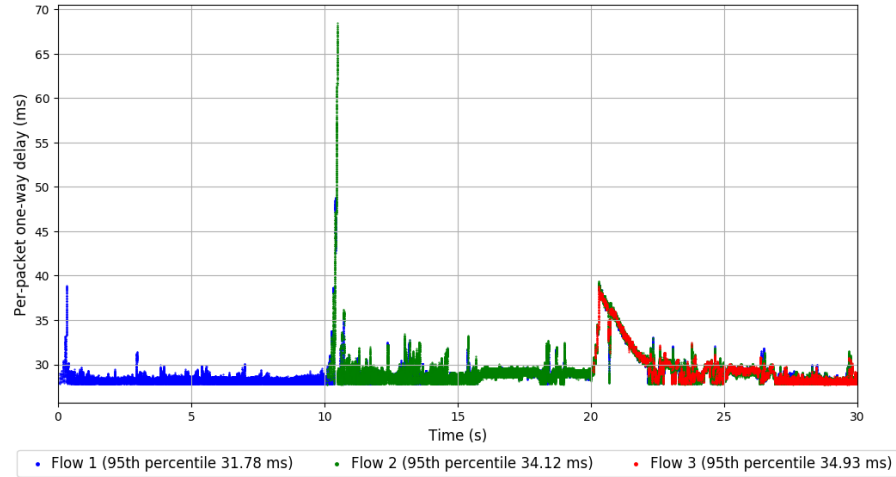
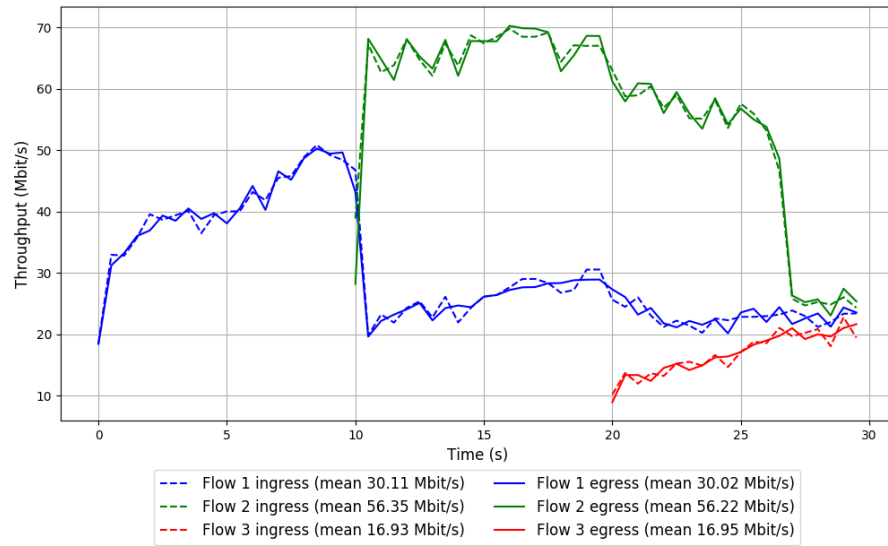


Run 8: Statistics of TCP Vegas

Start at: 2017-12-06 00:55:21  
End at: 2017-12-06 00:55:51  
Local clock offset: -0.706 ms  
Remote clock offset: -2.863 ms

# Below is generated by plot.py at 2017-12-06 02:27:58  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 73.06 Mbit/s  
95th percentile per-packet one-way delay: 33.399 ms  
Loss rate: 0.24%  
-- Flow 1:  
Average throughput: 30.02 Mbit/s  
95th percentile per-packet one-way delay: 31.782 ms  
Loss rate: 0.30%  
-- Flow 2:  
Average throughput: 56.22 Mbit/s  
95th percentile per-packet one-way delay: 34.123 ms  
Loss rate: 0.22%  
-- Flow 3:  
Average throughput: 16.95 Mbit/s  
95th percentile per-packet one-way delay: 34.930 ms  
Loss rate: 0.01%

## Run 8: Report of TCP Vegas — Data Link

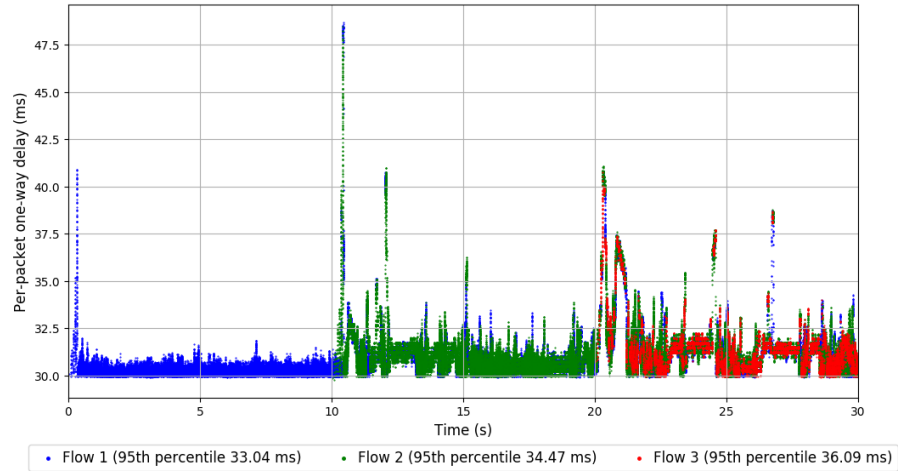
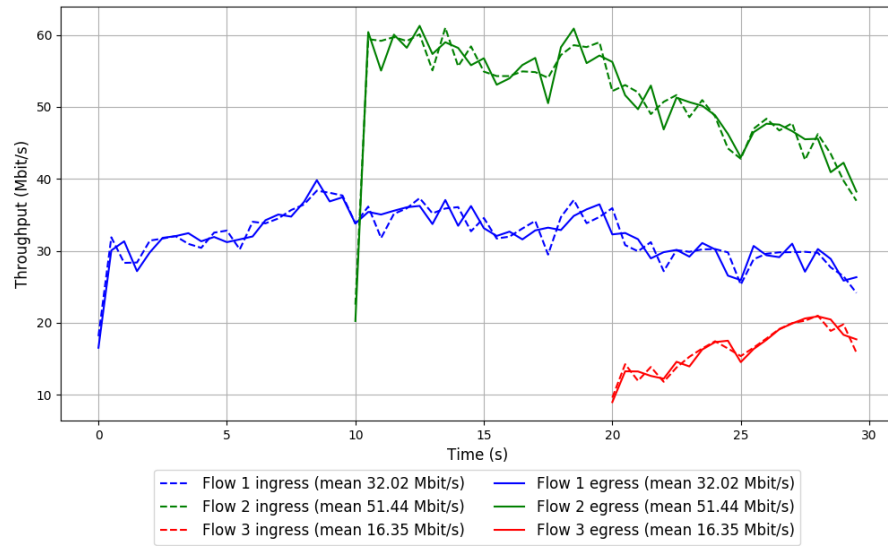


Run 9: Statistics of TCP Vegas

Start at: 2017-12-06 01:19:52  
End at: 2017-12-06 01:20:22  
Local clock offset: -0.901 ms  
Remote clock offset: -0.718 ms

# Below is generated by plot.py at 2017-12-06 02:28:03  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 71.70 Mbit/s  
95th percentile per-packet one-way delay: 33.774 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 32.02 Mbit/s  
95th percentile per-packet one-way delay: 33.040 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 51.44 Mbit/s  
95th percentile per-packet one-way delay: 34.469 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 16.35 Mbit/s  
95th percentile per-packet one-way delay: 36.094 ms  
Loss rate: 0.00%

# Run 9: Report of TCP Vegas — Data Link



Run 10: Statistics of TCP Vegas

Start at: 2017-12-06 01:44:41

End at: 2017-12-06 01:45:11

Local clock offset: -1.134 ms

Remote clock offset: -1.16 ms

# Below is generated by plot.py at 2017-12-06 02:28:03

# Datalink statistics

-- Total of 3 flows:

Average throughput: 63.14 Mbit/s

95th percentile per-packet one-way delay: 51.294 ms

Loss rate: 1.25%

-- Flow 1:

Average throughput: 40.77 Mbit/s

95th percentile per-packet one-way delay: 37.300 ms

Loss rate: 1.15%

-- Flow 2:

Average throughput: 10.28 Mbit/s

95th percentile per-packet one-way delay: 37.623 ms

Loss rate: 0.15%

-- Flow 3:

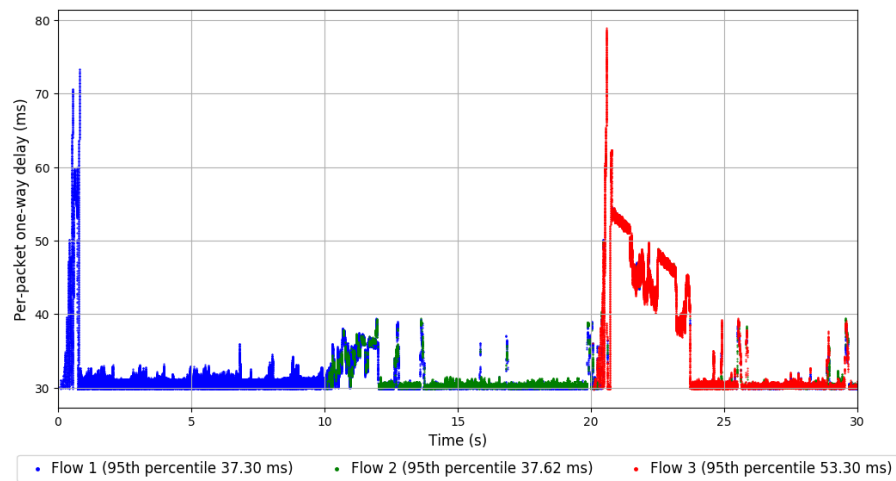
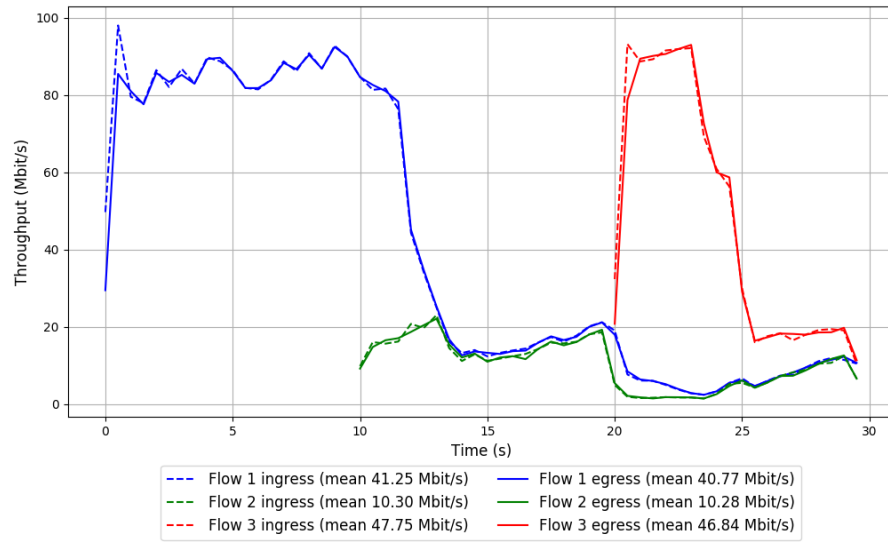
Average throughput: 46.84 Mbit/s

95th percentile per-packet one-way delay: 53.302 ms

Loss rate: 1.97%



# Run 10: Report of TCP Vegas — Data Link

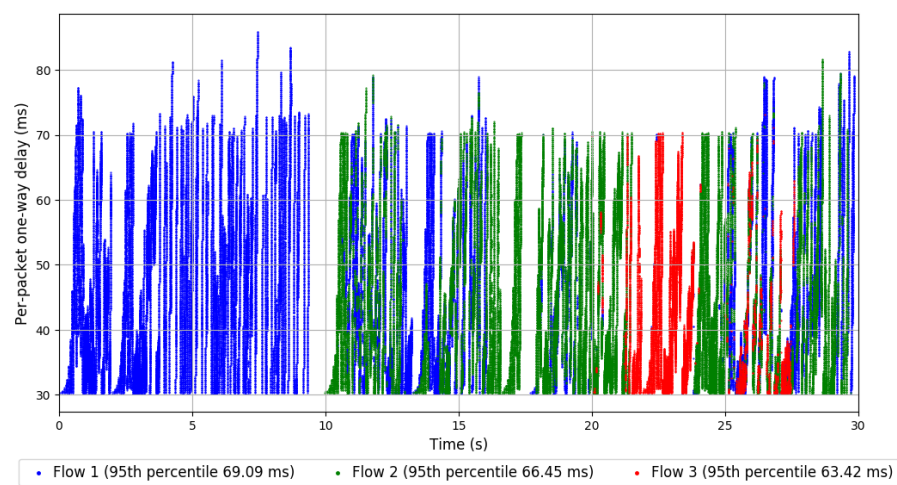
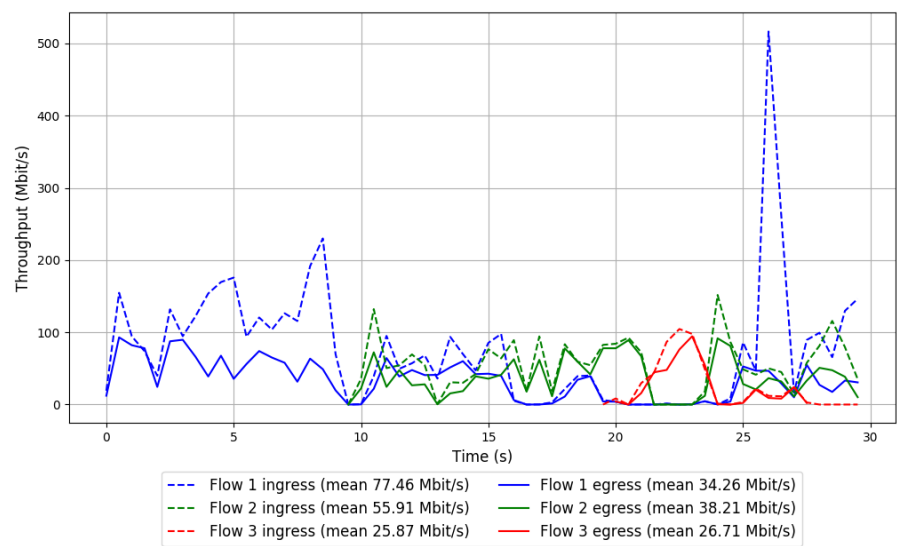


Run 1: Statistics of Verus

Start at: 2017-12-05 22:20:51  
End at: 2017-12-05 22:21:21  
Local clock offset: -0.271 ms  
Remote clock offset: -1.612 ms

# Below is generated by plot.py at 2017-12-06 02:28:22  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 66.39 Mbit/s  
95th percentile per-packet one-way delay: 67.684 ms  
Loss rate: 45.98%  
-- Flow 1:  
Average throughput: 34.26 Mbit/s  
95th percentile per-packet one-way delay: 69.089 ms  
Loss rate: 55.72%  
-- Flow 2:  
Average throughput: 38.21 Mbit/s  
95th percentile per-packet one-way delay: 66.453 ms  
Loss rate: 31.85%  
-- Flow 3:  
Average throughput: 26.71 Mbit/s  
95th percentile per-packet one-way delay: 63.417 ms  
Loss rate: 18.58%

Run 1: Report of Verus — Data Link

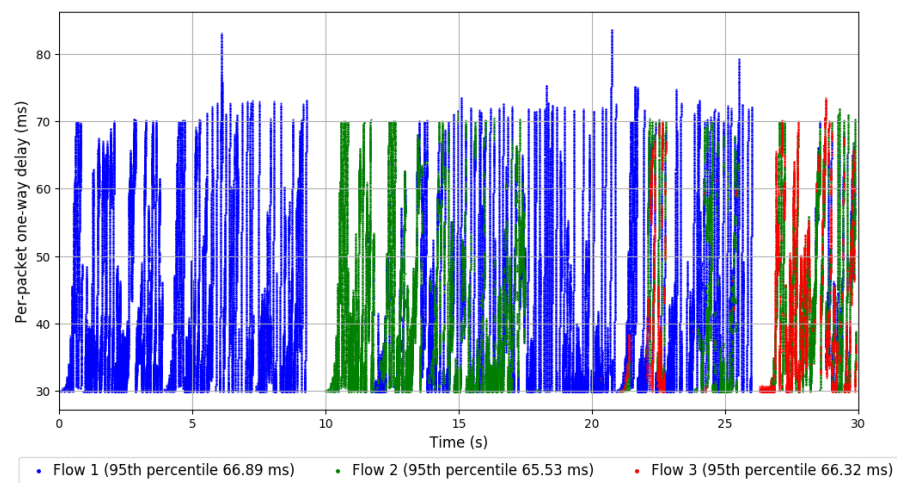
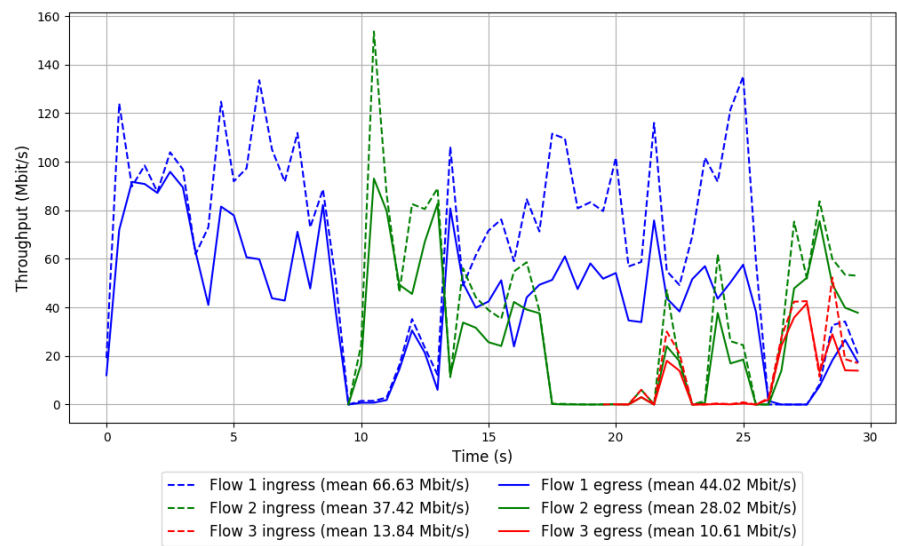


Run 2: Statistics of Verus

Start at: 2017-12-05 22:41:25  
End at: 2017-12-05 22:41:55  
Local clock offset: -0.36 ms  
Remote clock offset: -1.535 ms

# Below is generated by plot.py at 2017-12-06 02:28:22  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 66.17 Mbit/s  
95th percentile per-packet one-way delay: 66.489 ms  
Loss rate: 31.09%  
-- Flow 1:  
Average throughput: 44.02 Mbit/s  
95th percentile per-packet one-way delay: 66.886 ms  
Loss rate: 33.89%  
-- Flow 2:  
Average throughput: 28.02 Mbit/s  
95th percentile per-packet one-way delay: 65.533 ms  
Loss rate: 25.08%  
-- Flow 3:  
Average throughput: 10.61 Mbit/s  
95th percentile per-packet one-way delay: 66.316 ms  
Loss rate: 23.27%

Run 2: Report of Verus — Data Link

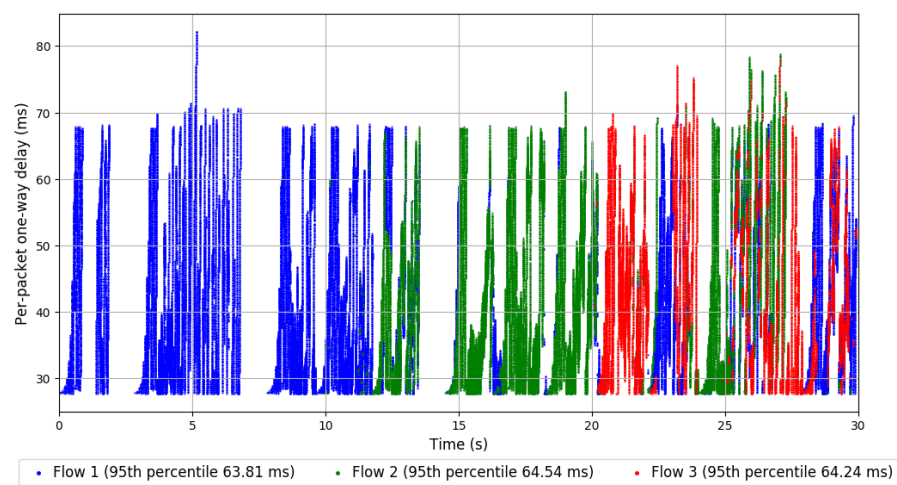
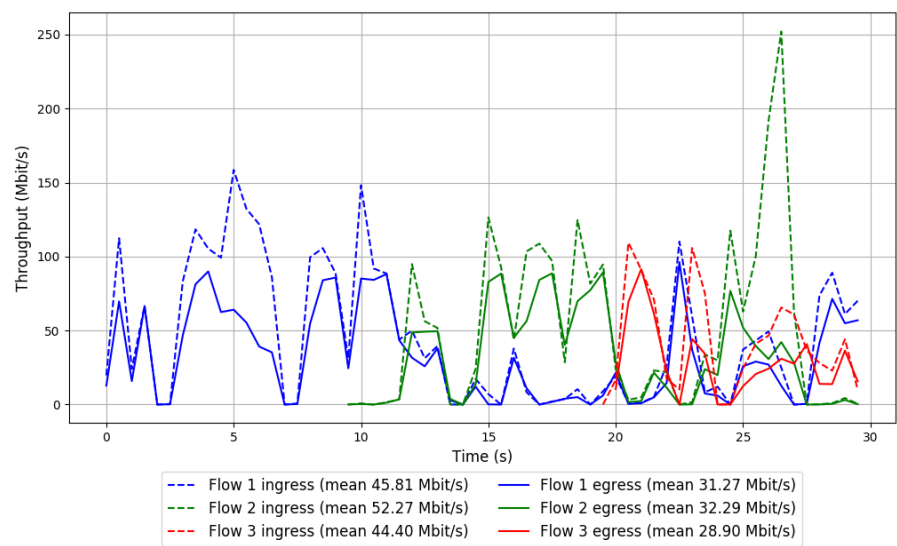


Run 3: Statistics of Verus

Start at: 2017-12-05 23:01:34  
End at: 2017-12-05 23:02:04  
Local clock offset: -0.278 ms  
Remote clock offset: -3.726 ms

# Below is generated by plot.py at 2017-12-06 02:28:45  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 62.16 Mbit/s  
95th percentile per-packet one-way delay: 64.175 ms  
Loss rate: 34.62%  
-- Flow 1:  
Average throughput: 31.27 Mbit/s  
95th percentile per-packet one-way delay: 63.814 ms  
Loss rate: 31.69%  
-- Flow 2:  
Average throughput: 32.29 Mbit/s  
95th percentile per-packet one-way delay: 64.541 ms  
Loss rate: 38.39%  
-- Flow 3:  
Average throughput: 28.90 Mbit/s  
95th percentile per-packet one-way delay: 64.241 ms  
Loss rate: 34.89%

Run 3: Report of Verus — Data Link



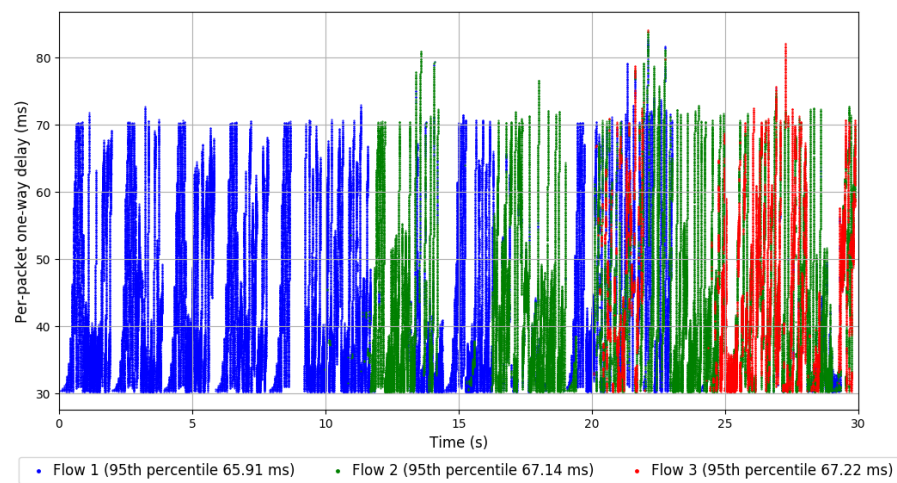
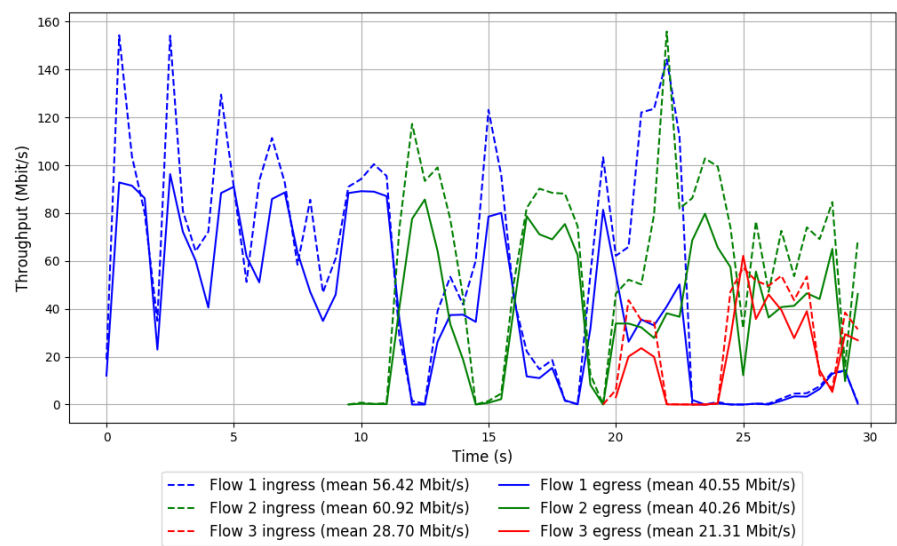
Run 4: Statistics of Verus

Start at: 2017-12-05 23:21:42  
End at: 2017-12-05 23:22:12  
Local clock offset: -0.249 ms  
Remote clock offset: -1.557 ms

# Below is generated by plot.py at 2017-12-06 02:29:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 74.10 Mbit/s  
95th percentile per-packet one-way delay: 66.454 ms  
Loss rate: 30.19%  
-- Flow 1:  
Average throughput: 40.55 Mbit/s  
95th percentile per-packet one-way delay: 65.914 ms  
Loss rate: 28.26%  
-- Flow 2:  
Average throughput: 40.26 Mbit/s  
95th percentile per-packet one-way delay: 67.140 ms  
Loss rate: 33.92%  
-- Flow 3:  
Average throughput: 21.31 Mbit/s  
95th percentile per-packet one-way delay: 67.222 ms  
Loss rate: 25.61%



Run 4: Report of Verus — Data Link

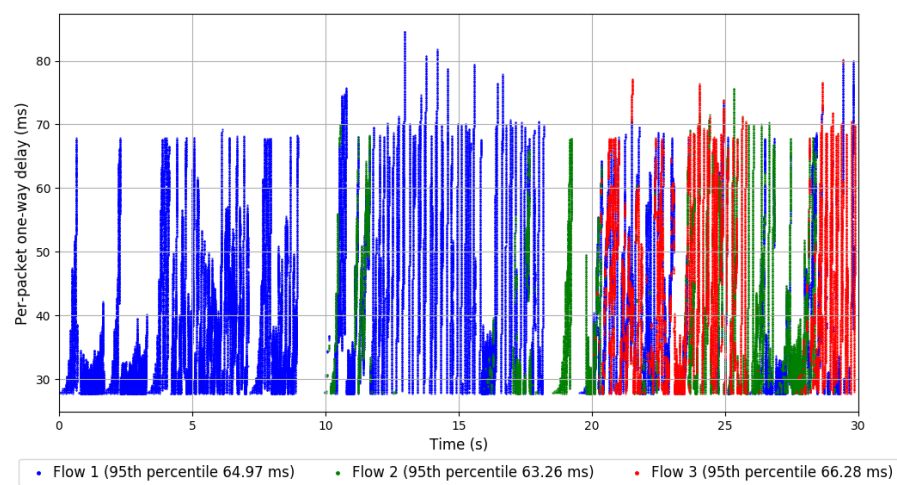
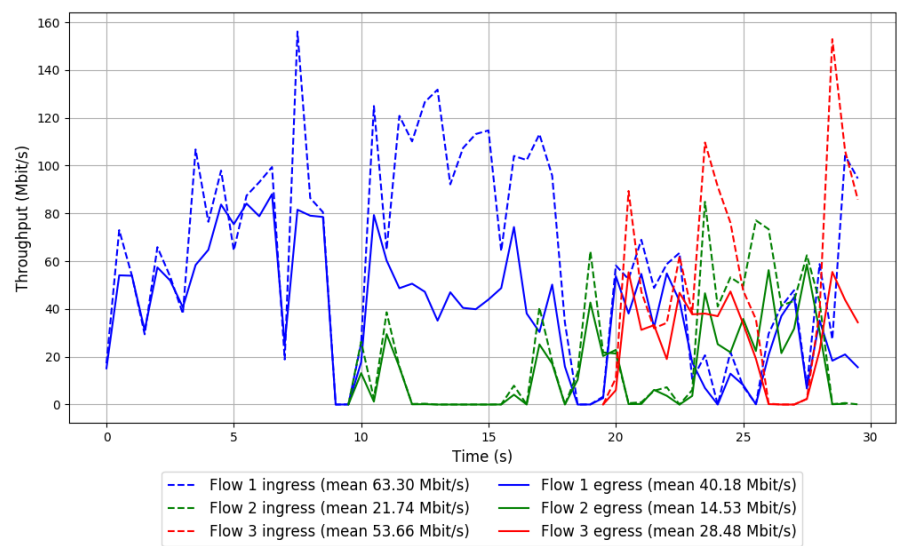


Run 5: Statistics of Verus

Start at: 2017-12-05 23:42:48  
End at: 2017-12-05 23:43:18  
Local clock offset: -0.392 ms  
Remote clock offset: -4.735 ms

# Below is generated by plot.py at 2017-12-06 02:29:02  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 59.05 Mbit/s  
95th percentile per-packet one-way delay: 64.991 ms  
Loss rate: 38.08%  
-- Flow 1:  
Average throughput: 40.18 Mbit/s  
95th percentile per-packet one-way delay: 64.967 ms  
Loss rate: 36.48%  
-- Flow 2:  
Average throughput: 14.53 Mbit/s  
95th percentile per-packet one-way delay: 63.262 ms  
Loss rate: 34.22%  
-- Flow 3:  
Average throughput: 28.48 Mbit/s  
95th percentile per-packet one-way delay: 66.277 ms  
Loss rate: 46.89%

Run 5: Report of Verus — Data Link

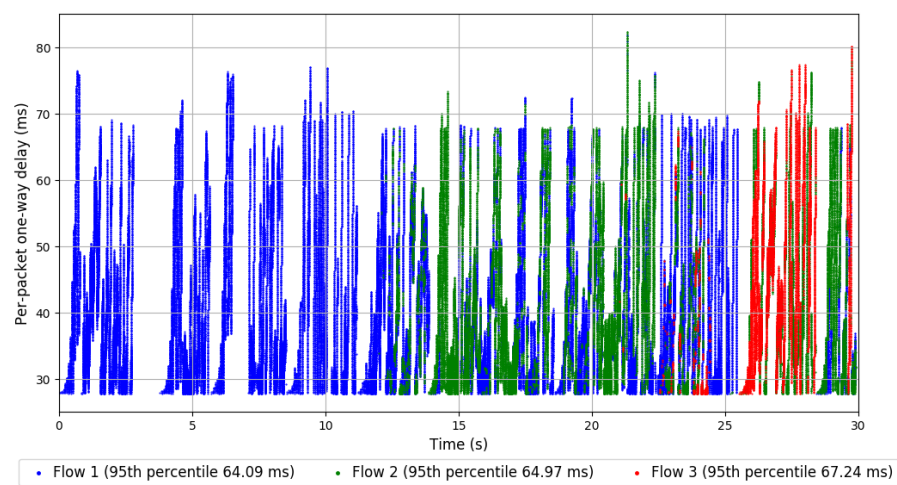
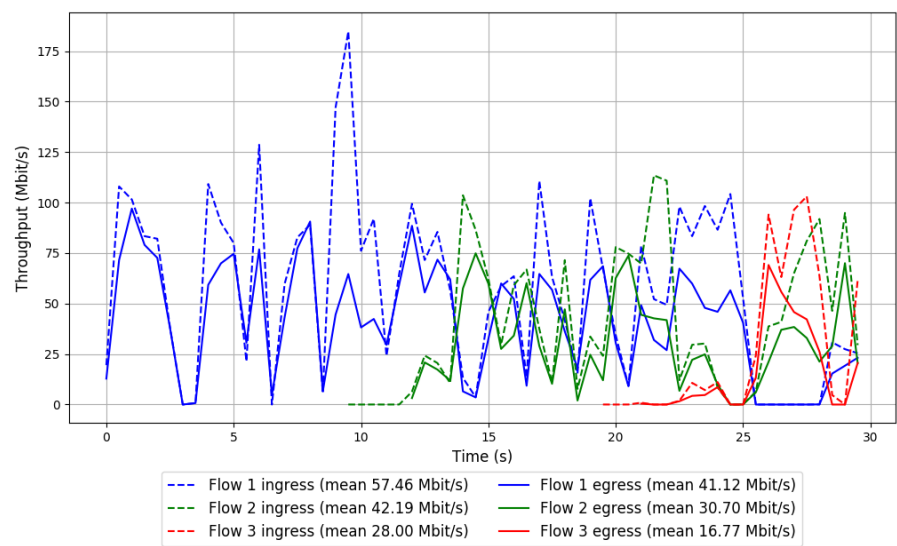


Run 6: Statistics of Verus

Start at: 2017-12-06 00:05:15  
End at: 2017-12-06 00:05:45  
Local clock offset: -0.44 ms  
Remote clock offset: -4.286 ms

# Below is generated by plot.py at 2017-12-06 02:29:06  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 64.40 Mbit/s  
95th percentile per-packet one-way delay: 64.663 ms  
Loss rate: 31.93%  
-- Flow 1:  
Average throughput: 41.12 Mbit/s  
95th percentile per-packet one-way delay: 64.088 ms  
Loss rate: 28.42%  
-- Flow 2:  
Average throughput: 30.70 Mbit/s  
95th percentile per-packet one-way delay: 64.974 ms  
Loss rate: 34.55%  
-- Flow 3:  
Average throughput: 16.77 Mbit/s  
95th percentile per-packet one-way delay: 67.244 ms  
Loss rate: 46.10%

Run 6: Report of Verus — Data Link

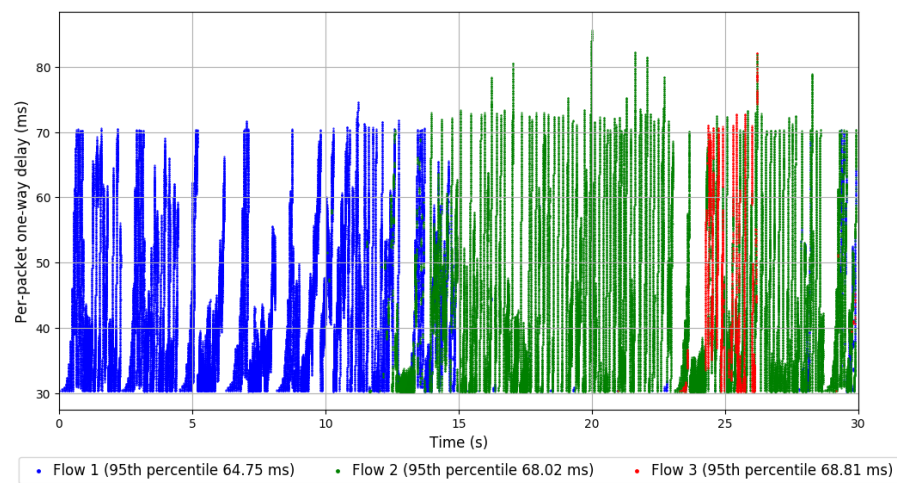
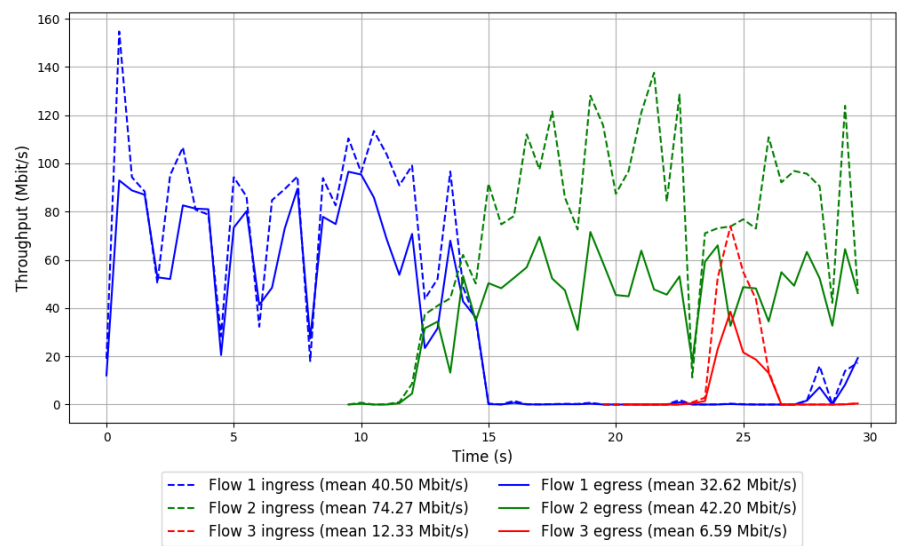


Run 7: Statistics of Verus

Start at: 2017-12-06 00:26:55  
End at: 2017-12-06 00:27:25  
Local clock offset: -0.445 ms  
Remote clock offset: -1.009 ms

# Below is generated by plot.py at 2017-12-06 02:29:07  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 62.72 Mbit/s  
95th percentile per-packet one-way delay: 66.414 ms  
Loss rate: 33.29%  
-- Flow 1:  
Average throughput: 32.62 Mbit/s  
95th percentile per-packet one-way delay: 64.752 ms  
Loss rate: 19.38%  
-- Flow 2:  
Average throughput: 42.20 Mbit/s  
95th percentile per-packet one-way delay: 68.017 ms  
Loss rate: 43.13%  
-- Flow 3:  
Average throughput: 6.59 Mbit/s  
95th percentile per-packet one-way delay: 68.813 ms  
Loss rate: 51.88%

Run 7: Report of Verus — Data Link



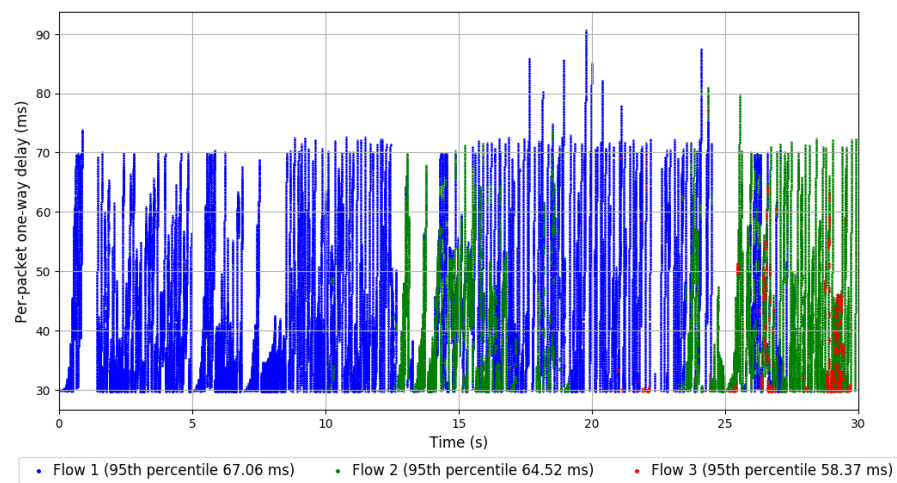
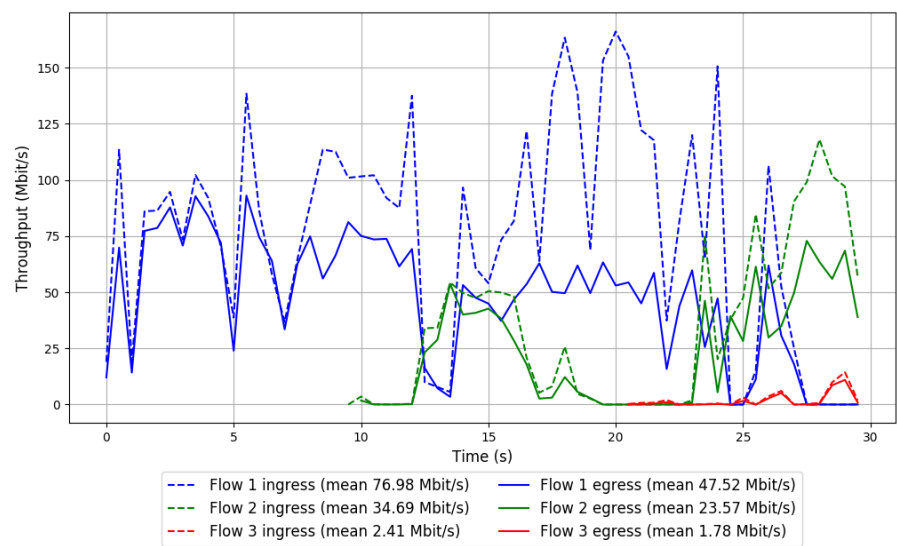
Run 8: Statistics of Verus

Start at: 2017-12-06 00:48:03  
End at: 2017-12-06 00:48:33  
Local clock offset: -0.558 ms  
Remote clock offset: -0.901 ms

# Below is generated by plot.py at 2017-12-06 02:29:11  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 63.35 Mbit/s  
95th percentile per-packet one-way delay: 66.546 ms  
Loss rate: 36.83%  
-- Flow 1:  
Average throughput: 47.52 Mbit/s  
95th percentile per-packet one-way delay: 67.058 ms  
Loss rate: 38.38%  
-- Flow 2:  
Average throughput: 23.57 Mbit/s  
95th percentile per-packet one-way delay: 64.522 ms  
Loss rate: 32.03%  
-- Flow 3:  
Average throughput: 1.78 Mbit/s  
95th percentile per-packet one-way delay: 58.366 ms  
Loss rate: 26.55%



Run 8: Report of Verus — Data Link



Run 9: Statistics of Verus

Start at: 2017-12-06 01:11:24

End at: 2017-12-06 01:11:54

Local clock offset: -0.73 ms

Remote clock offset: -2.76 ms

# Below is generated by plot.py at 2017-12-06 02:29:25

# Datalink statistics

-- Total of 3 flows:

Average throughput: 66.57 Mbit/s

95th percentile per-packet one-way delay: 64.612 ms

Loss rate: 35.50%

-- Flow 1:

Average throughput: 47.59 Mbit/s

95th percentile per-packet one-way delay: 62.804 ms

Loss rate: 20.10%

-- Flow 2:

Average throughput: 25.13 Mbit/s

95th percentile per-packet one-way delay: 68.190 ms

Loss rate: 58.90%

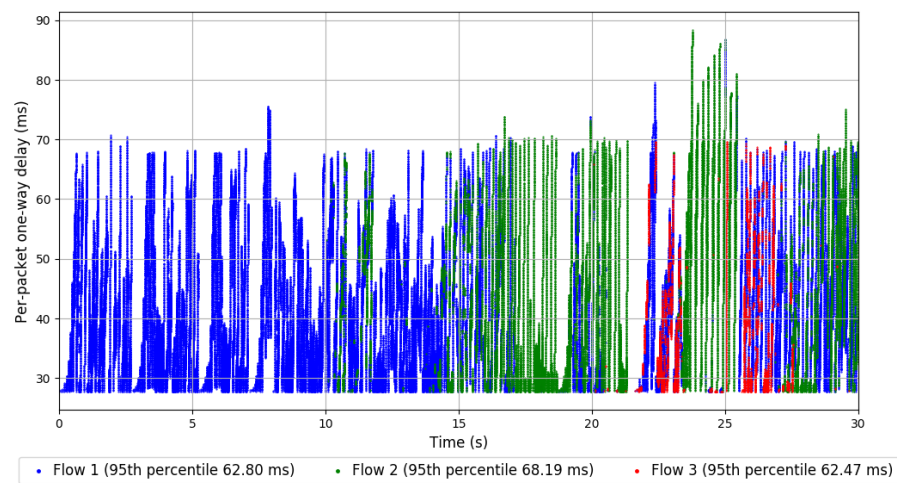
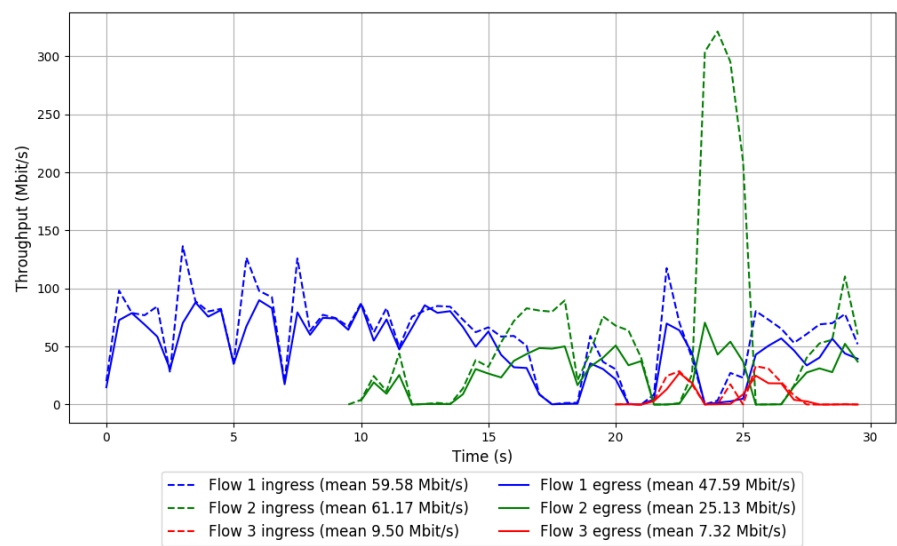
-- Flow 3:

Average throughput: 7.32 Mbit/s

95th percentile per-packet one-way delay: 62.465 ms

Loss rate: 23.72%

Run 9: Report of Verus — Data Link

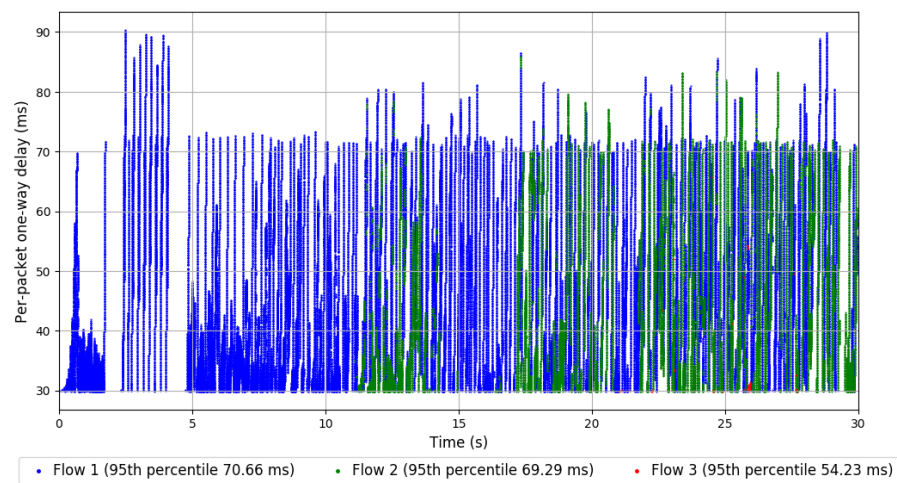
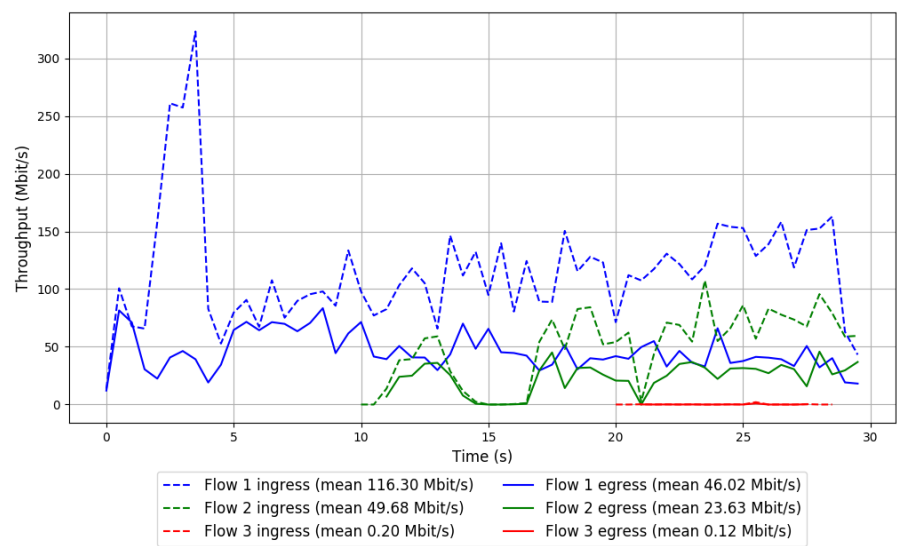


Run 10: Statistics of Verus

Start at: 2017-12-06 01:36:20  
End at: 2017-12-06 01:36:50  
Local clock offset: -0.974 ms  
Remote clock offset: -0.994 ms

# Below is generated by plot.py at 2017-12-06 02:29:43  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 60.96 Mbit/s  
95th percentile per-packet one-way delay: 70.283 ms  
Loss rate: 59.16%  
-- Flow 1:  
Average throughput: 46.02 Mbit/s  
95th percentile per-packet one-way delay: 70.660 ms  
Loss rate: 60.41%  
-- Flow 2:  
Average throughput: 23.63 Mbit/s  
95th percentile per-packet one-way delay: 69.294 ms  
Loss rate: 54.76%  
-- Flow 3:  
Average throughput: 0.12 Mbit/s  
95th percentile per-packet one-way delay: 54.235 ms  
Loss rate: 55.92%

Run 10: Report of Verus — Data Link

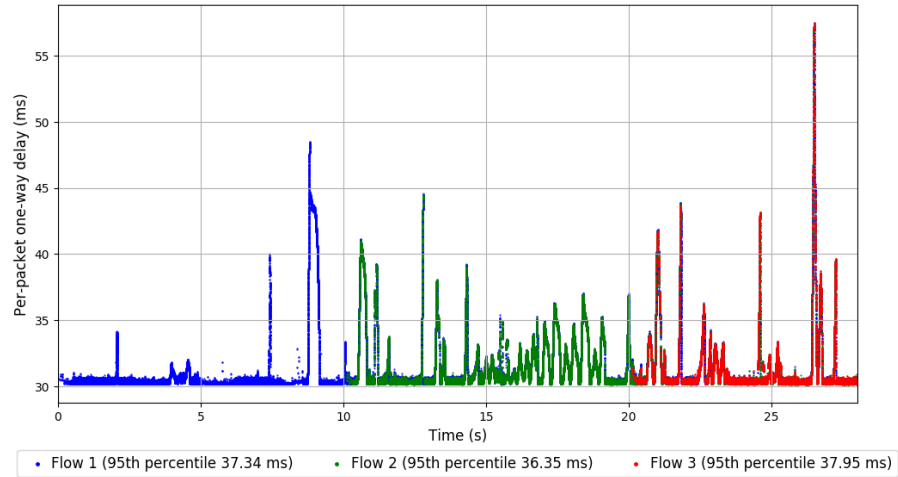
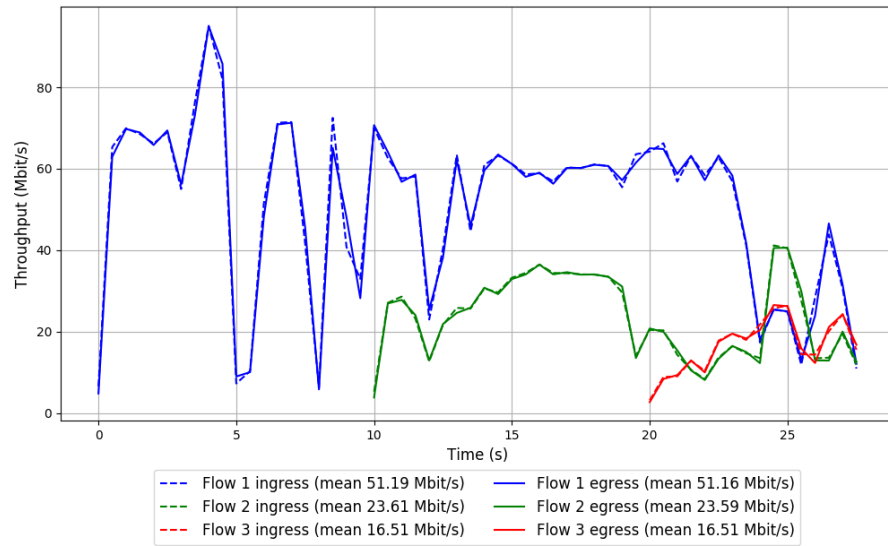


Run 1: Statistics of Copa

Start at: 2017-12-05 22:17:36  
End at: 2017-12-05 22:18:06  
Local clock offset: -0.29 ms  
Remote clock offset: -1.788 ms

# Below is generated by plot.py at 2017-12-06 02:30:33  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 70.98 Mbit/s  
95th percentile per-packet one-way delay: 37.066 ms  
Loss rate: 0.07%  
-- Flow 1:  
Average throughput: 51.16 Mbit/s  
95th percentile per-packet one-way delay: 37.339 ms  
Loss rate: 0.07%  
-- Flow 2:  
Average throughput: 23.59 Mbit/s  
95th percentile per-packet one-way delay: 36.354 ms  
Loss rate: 0.10%  
-- Flow 3:  
Average throughput: 16.51 Mbit/s  
95th percentile per-packet one-way delay: 37.953 ms  
Loss rate: 0.01%

## Run 1: Report of Copa — Data Link



Run 2: Statistics of Copa

Start at: 2017-12-05 22:38:34

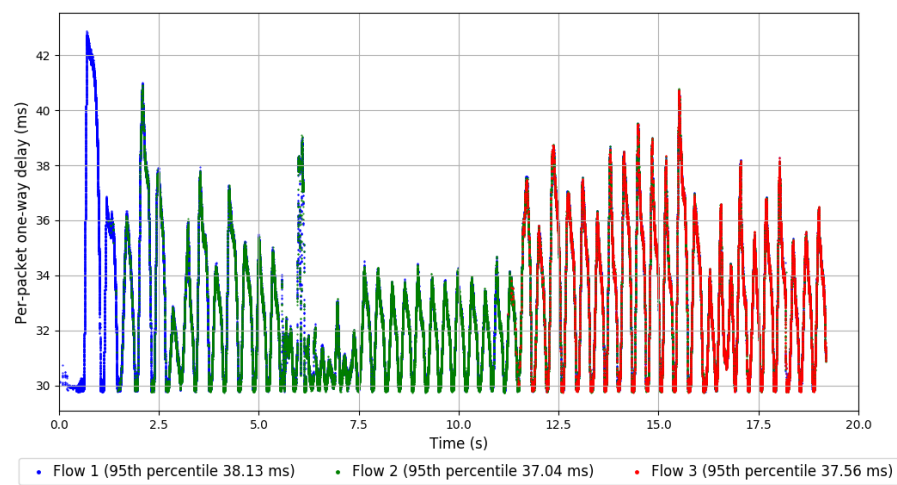
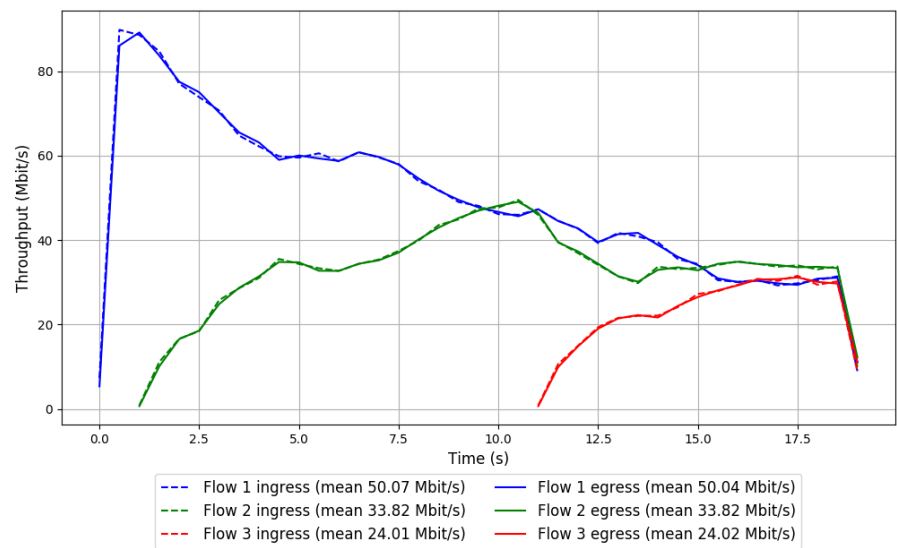
End at: 2017-12-05 22:39:04

Local clock offset: -0.269 ms

Remote clock offset: -1.629 ms



Run 2: Report of Copa — Data Link



Run 3: Statistics of Copa

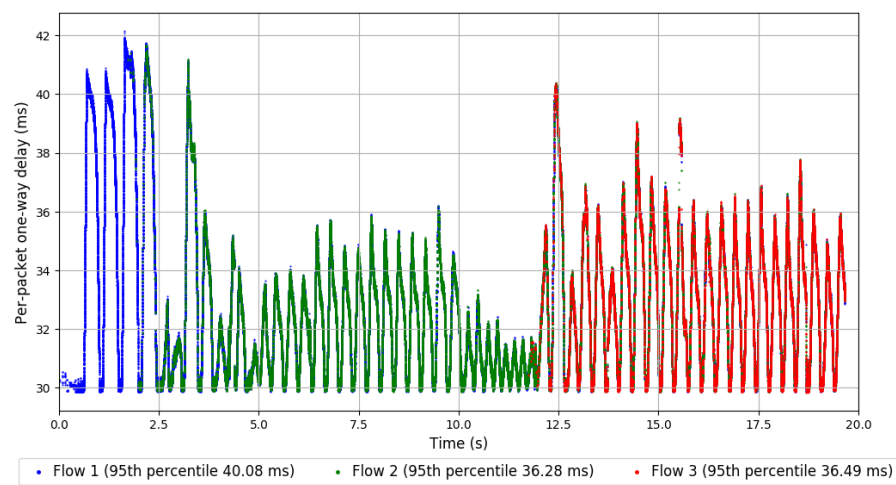
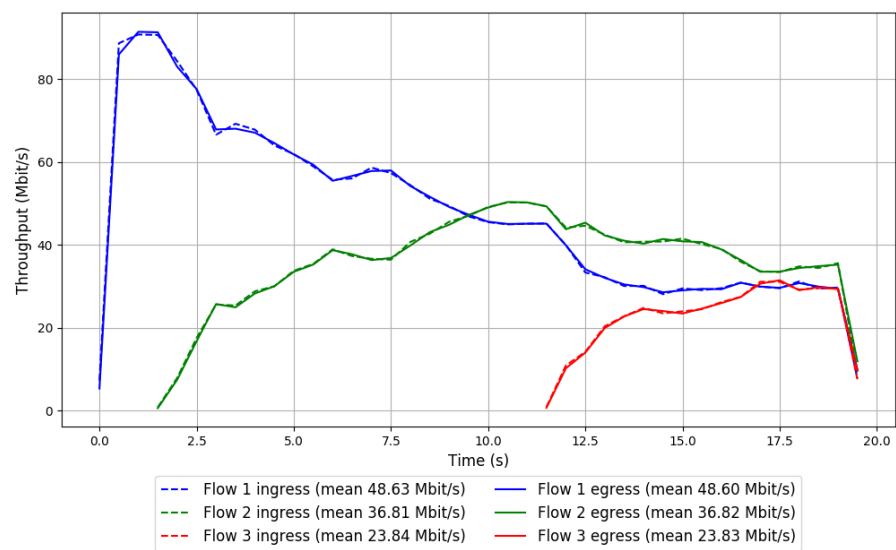
Start at: 2017-12-05 22:58:43

End at: 2017-12-05 22:59:13

Local clock offset: -0.345 ms

Remote clock offset: -1.65 ms

Run 3: Report of Copa — Data Link

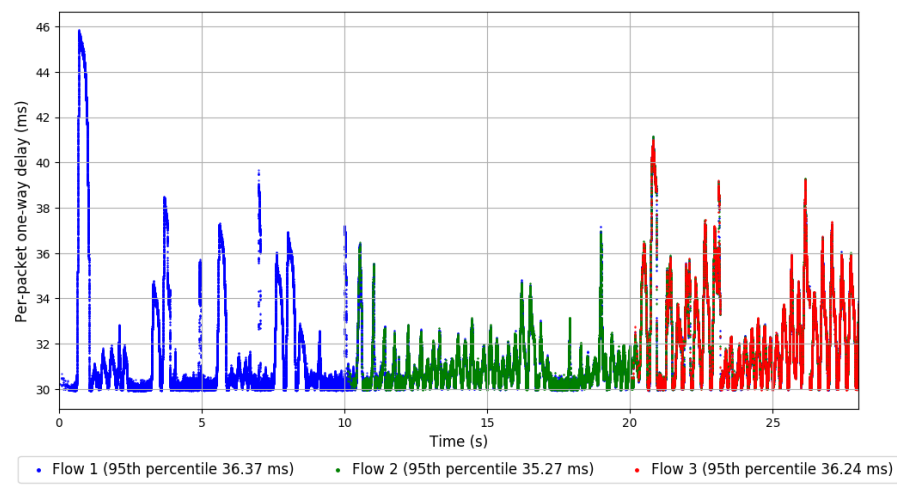
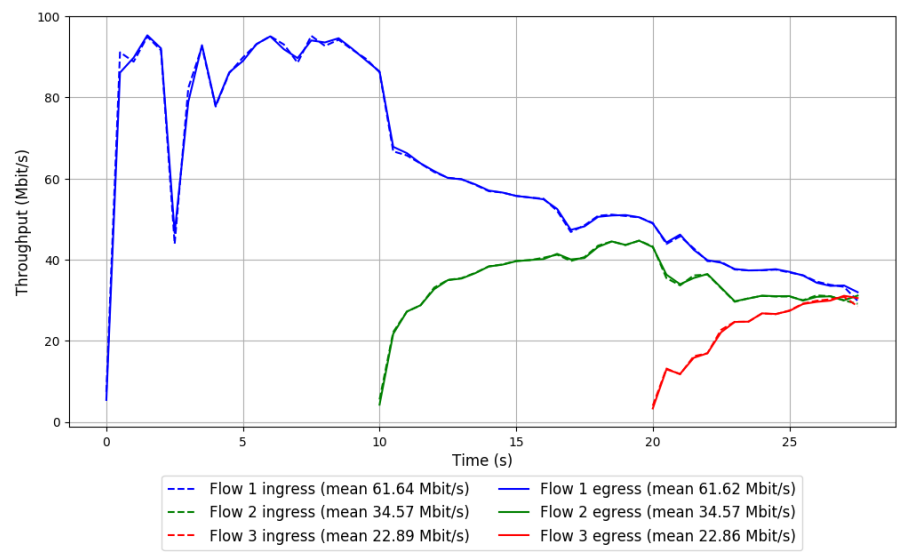


Run 4: Statistics of Copa

Start at: 2017-12-05 23:18:39  
End at: 2017-12-05 23:19:09  
Local clock offset: -0.247 ms  
Remote clock offset: -1.792 ms

# Below is generated by plot.py at 2017-12-06 02:31:26  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 90.30 Mbit/s  
95th percentile per-packet one-way delay: 36.061 ms  
Loss rate: 0.02%  
-- Flow 1:  
Average throughput: 61.62 Mbit/s  
95th percentile per-packet one-way delay: 36.368 ms  
Loss rate: 0.02%  
-- Flow 2:  
Average throughput: 34.57 Mbit/s  
95th percentile per-packet one-way delay: 35.271 ms  
Loss rate: 0.02%  
-- Flow 3:  
Average throughput: 22.86 Mbit/s  
95th percentile per-packet one-way delay: 36.241 ms  
Loss rate: 0.07%

Run 4: Report of Copa — Data Link



Run 5: Statistics of Copa

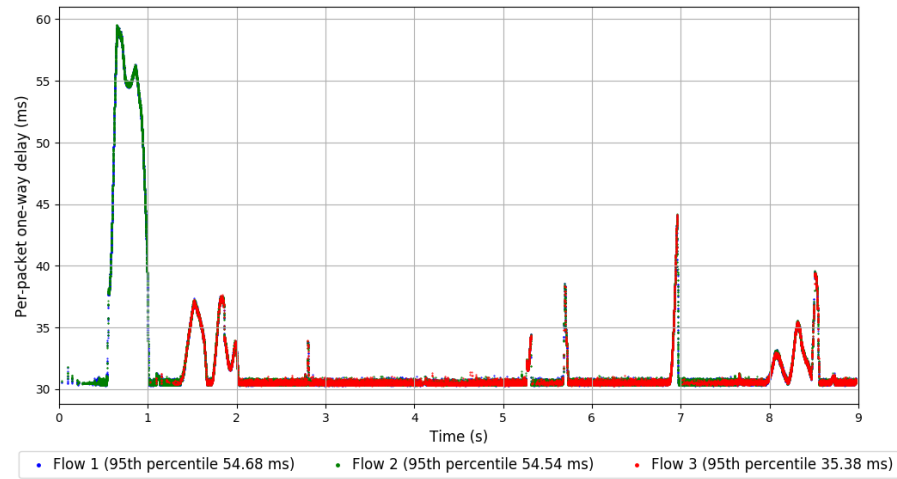
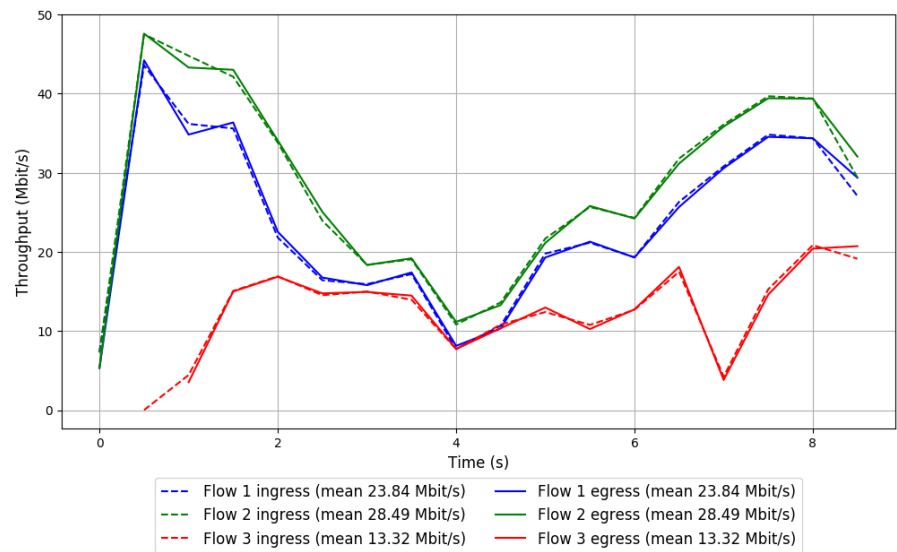
Start at: 2017-12-05 23:39:42

End at: 2017-12-05 23:40:12

Local clock offset: -0.301 ms

Remote clock offset: -2.148 ms

Run 5: Report of Copa — Data Link



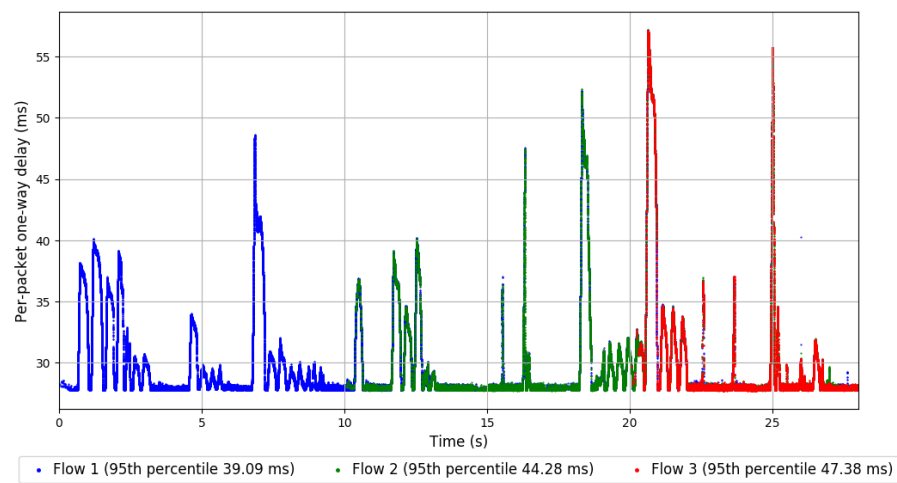
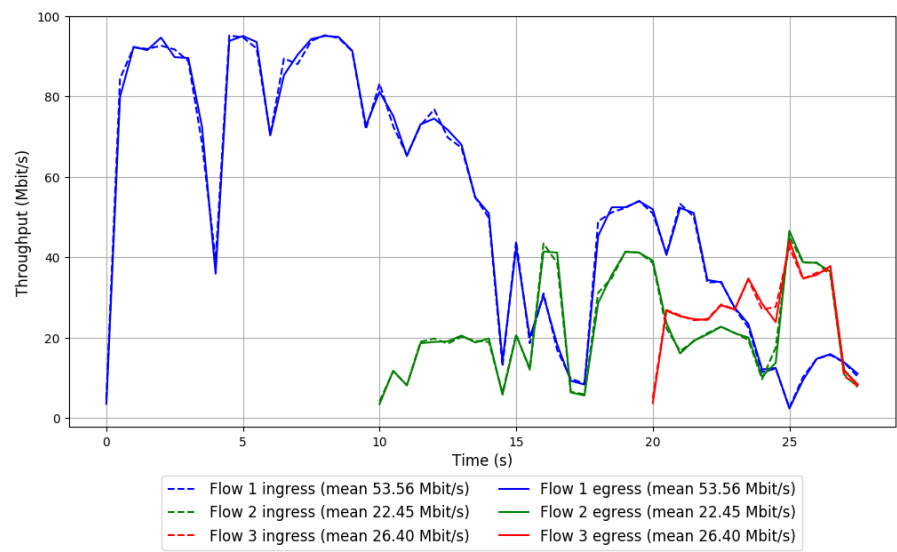
Run 6: Statistics of Copa

Start at: 2017-12-06 00:01:55  
End at: 2017-12-06 00:02:25  
Local clock offset: -0.428 ms  
Remote clock offset: -4.429 ms

# Below is generated by plot.py at 2017-12-06 02:31:26  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 75.46 Mbit/s  
95th percentile per-packet one-way delay: 39.501 ms  
Loss rate: 0.01%  
-- Flow 1:  
Average throughput: 53.56 Mbit/s  
95th percentile per-packet one-way delay: 39.090 ms  
Loss rate: 0.01%  
-- Flow 2:  
Average throughput: 22.45 Mbit/s  
95th percentile per-packet one-way delay: 44.284 ms  
Loss rate: 0.01%  
-- Flow 3:  
Average throughput: 26.40 Mbit/s  
95th percentile per-packet one-way delay: 47.385 ms  
Loss rate: 0.02%



Run 6: Report of Copa — Data Link

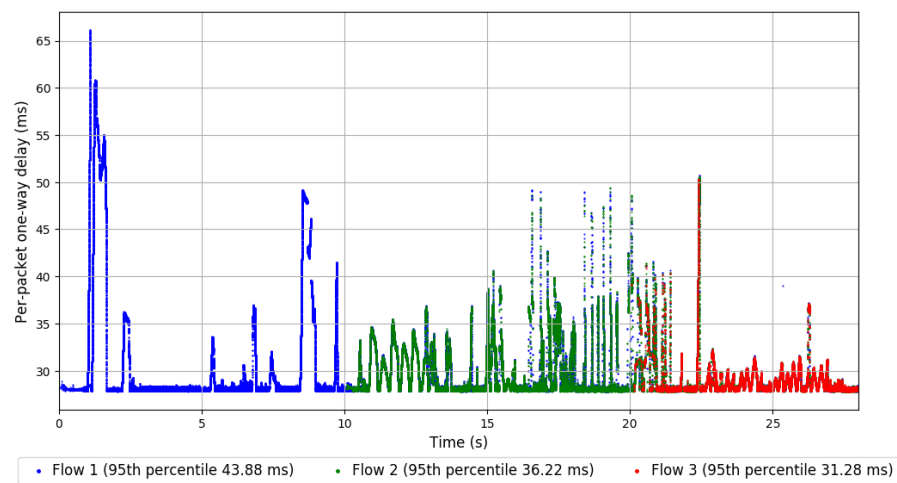
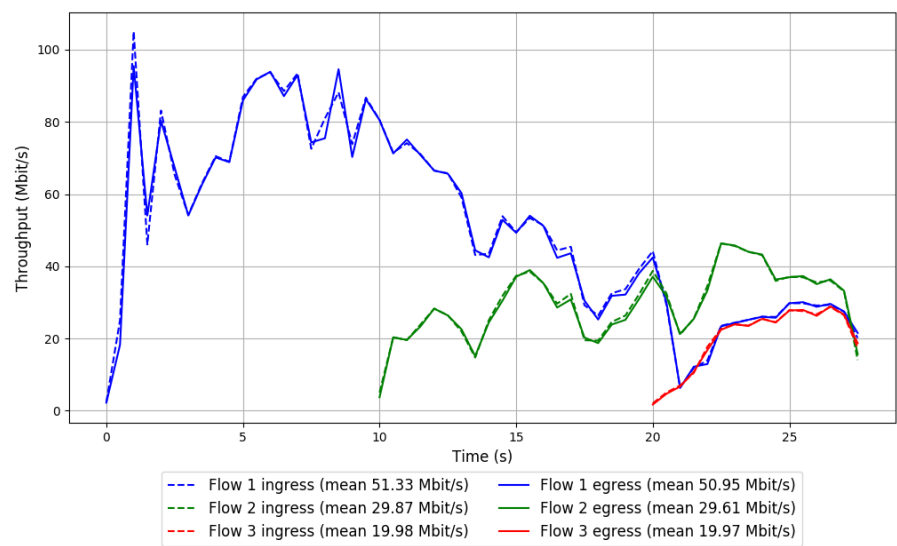


Run 7: Statistics of Copa

Start at: 2017-12-06 00:23:47  
End at: 2017-12-06 00:24:17  
Local clock offset: -0.508 ms  
Remote clock offset: -3.713 ms

# Below is generated by plot.py at 2017-12-06 02:31:26  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 75.62 Mbit/s  
95th percentile per-packet one-way delay: 38.379 ms  
Loss rate: 0.74%  
-- Flow 1:  
Average throughput: 50.95 Mbit/s  
95th percentile per-packet one-way delay: 43.878 ms  
Loss rate: 0.74%  
-- Flow 2:  
Average throughput: 29.61 Mbit/s  
95th percentile per-packet one-way delay: 36.221 ms  
Loss rate: 0.89%  
-- Flow 3:  
Average throughput: 19.97 Mbit/s  
95th percentile per-packet one-way delay: 31.276 ms  
Loss rate: 0.20%

Run 7: Report of Copa — Data Link



Run 8: Statistics of Copa

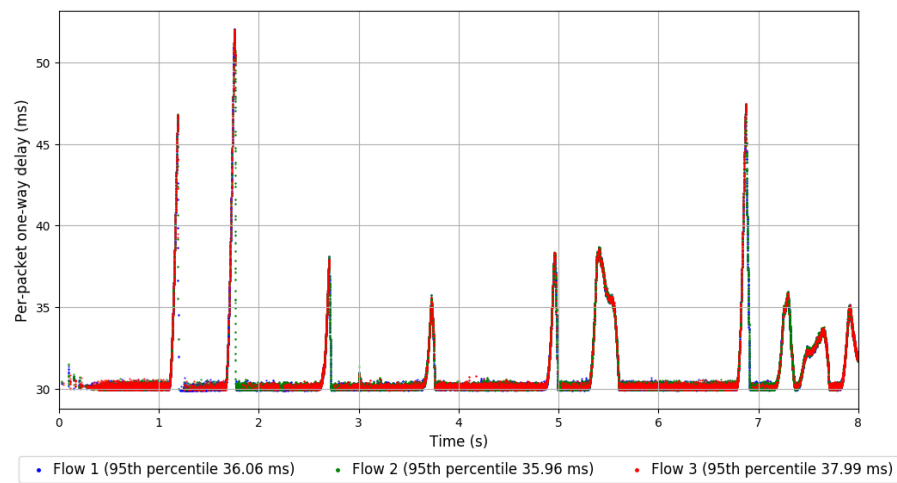
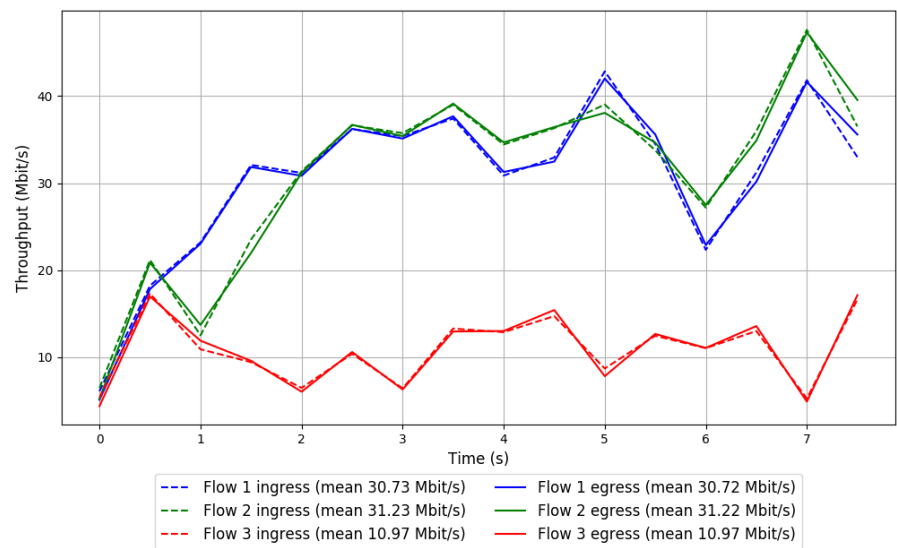
Start at: 2017-12-06 00:45:09

End at: 2017-12-06 00:45:39

Local clock offset: -0.623 ms

Remote clock offset: -0.862 ms

Run 8: Report of Copa — Data Link

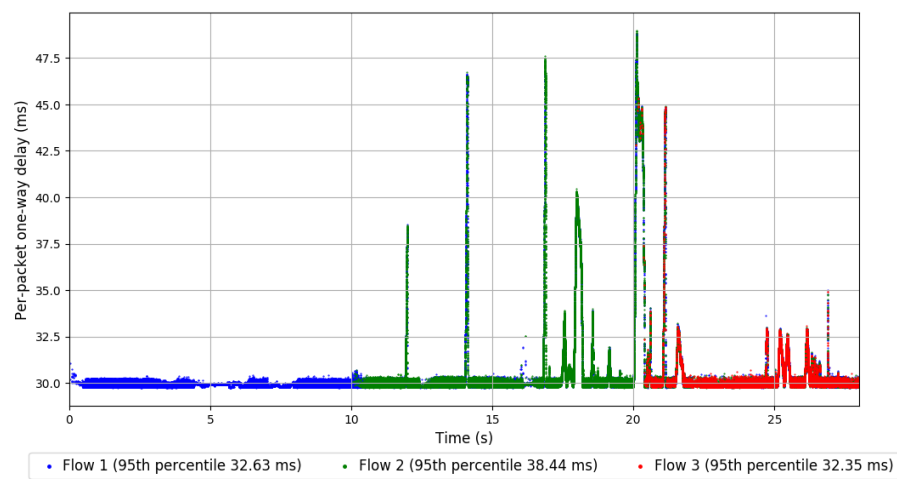
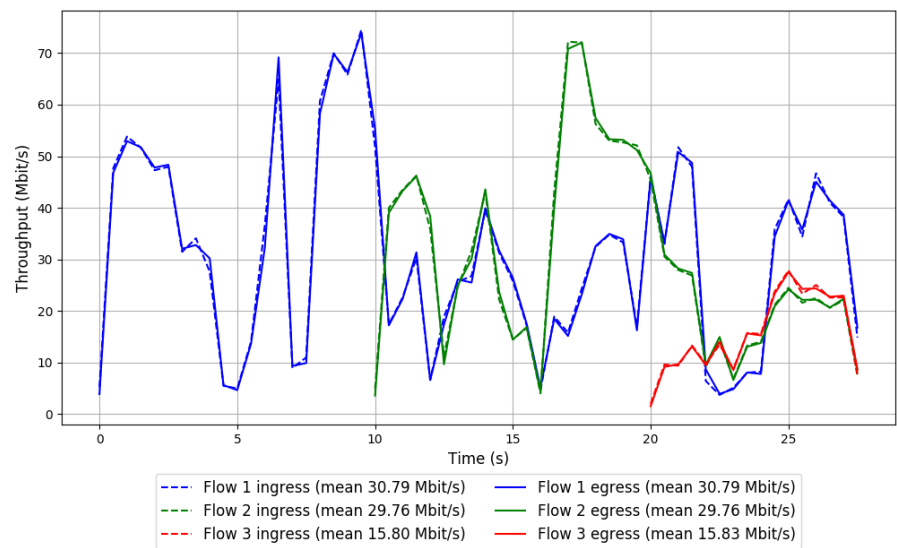


Run 9: Statistics of Copa

Start at: 2017-12-06 01:07:37  
End at: 2017-12-06 01:08:07  
Local clock offset: -0.713 ms  
Remote clock offset: -0.712 ms

# Below is generated by plot.py at 2017-12-06 02:31:26  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 54.37 Mbit/s  
95th percentile per-packet one-way delay: 34.679 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 30.79 Mbit/s  
95th percentile per-packet one-way delay: 32.629 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 29.76 Mbit/s  
95th percentile per-packet one-way delay: 38.442 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 15.83 Mbit/s  
95th percentile per-packet one-way delay: 32.349 ms  
Loss rate: 0.00%

Run 9: Report of Copa — Data Link



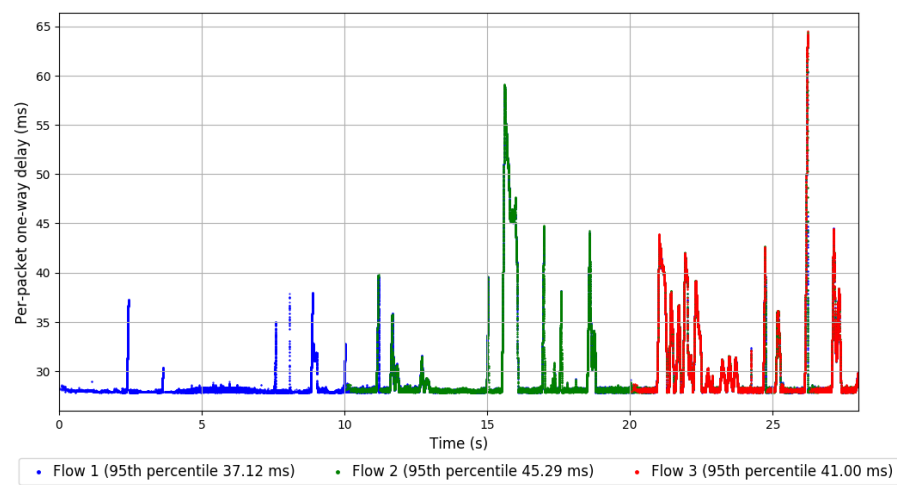
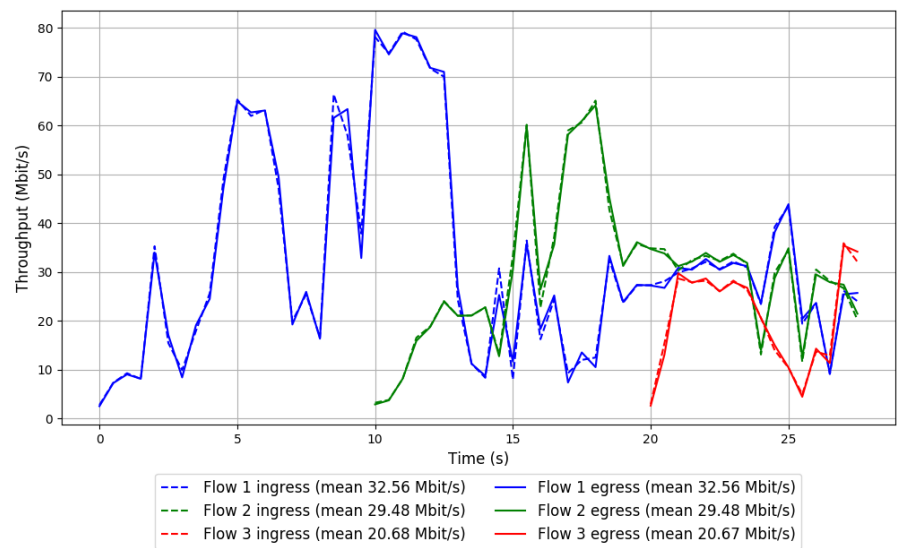
Run 10: Statistics of Copa

Start at: 2017-12-06 01:32:39  
End at: 2017-12-06 01:33:09  
Local clock offset: -0.93 ms  
Remote clock offset: -2.947 ms

# Below is generated by plot.py at 2017-12-06 02:31:37  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 57.36 Mbit/s  
95th percentile per-packet one-way delay: 40.451 ms  
Loss rate: 0.01%  
-- Flow 1:  
Average throughput: 32.56 Mbit/s  
95th percentile per-packet one-way delay: 37.118 ms  
Loss rate: 0.01%  
-- Flow 2:  
Average throughput: 29.48 Mbit/s  
95th percentile per-packet one-way delay: 45.290 ms  
Loss rate: 0.00%  
-- Flow 3:  
Average throughput: 20.67 Mbit/s  
95th percentile per-packet one-way delay: 40.996 ms  
Loss rate: 0.02%



Run 10: Report of Copa — Data Link

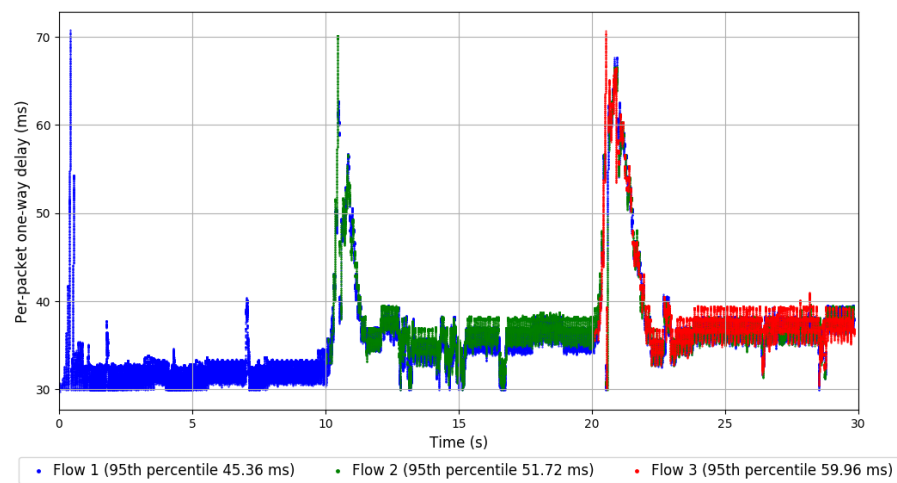
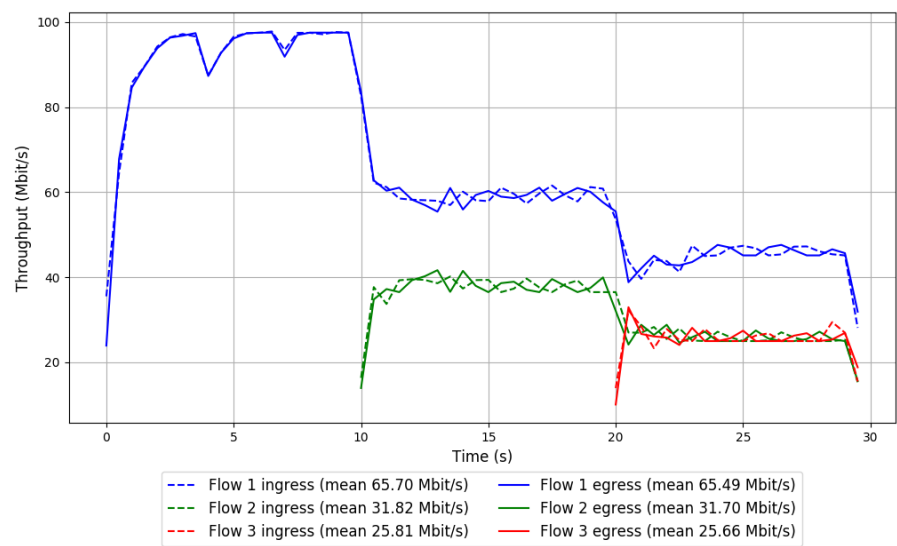


```
Run 1: Statistics of Indigo

Start at: 2017-12-05 22:22:28
End at: 2017-12-05 22:22:58
Local clock offset: -0.357 ms
Remote clock offset: -1.927 ms

# Below is generated by plot.py at 2017-12-06 02:32:00
# Datalink statistics
-- Total of 3 flows:
Average throughput: 94.87 Mbit/s
95th percentile per-packet one-way delay: 49.198 ms
Loss rate: 0.33%
-- Flow 1:
Average throughput: 65.49 Mbit/s
95th percentile per-packet one-way delay: 45.359 ms
Loss rate: 0.29%
-- Flow 2:
Average throughput: 31.70 Mbit/s
95th percentile per-packet one-way delay: 51.718 ms
Loss rate: 0.35%
-- Flow 3:
Average throughput: 25.66 Mbit/s
95th percentile per-packet one-way delay: 59.958 ms
Loss rate: 0.59%
```

Run 1: Report of Indigo — Data Link

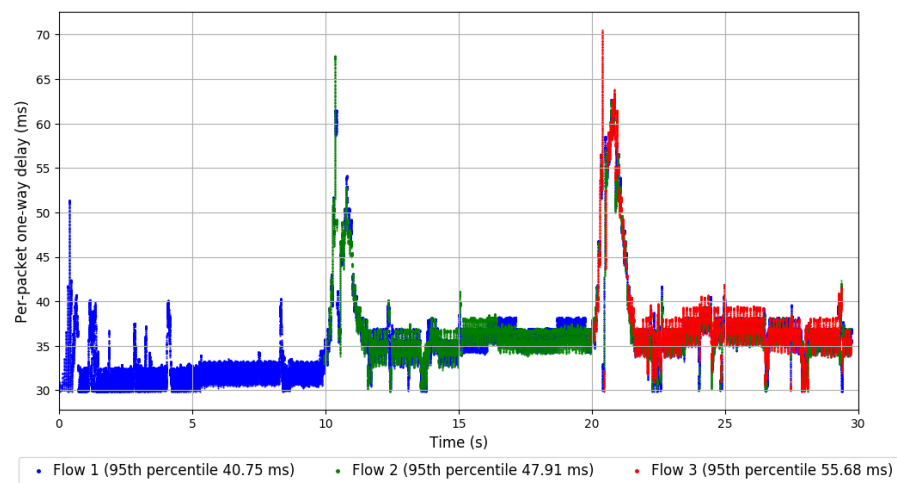
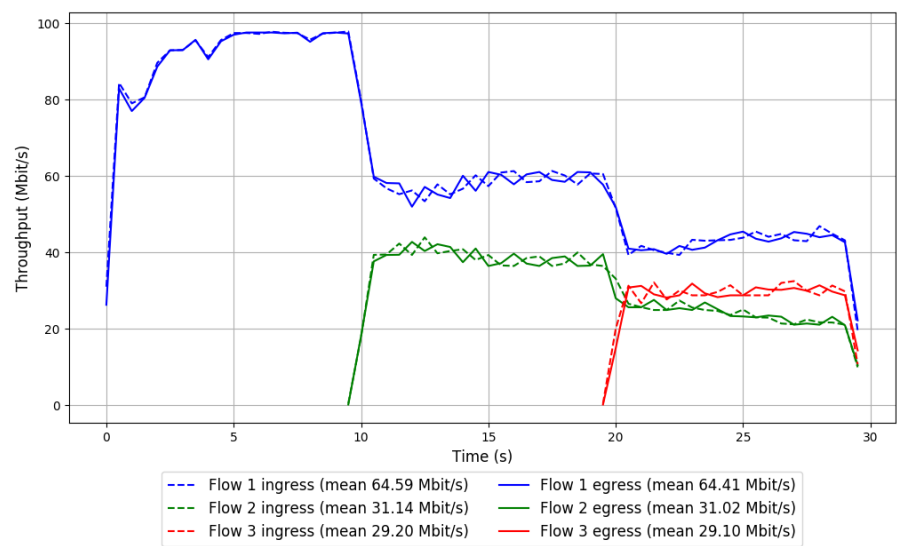


Run 2: Statistics of Indigo

Start at: 2017-12-05 22:42:51  
End at: 2017-12-05 22:43:21  
Local clock offset: -0.361 ms  
Remote clock offset: -1.606 ms

# Below is generated by plot.py at 2017-12-06 02:32:03  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 94.59 Mbit/s  
95th percentile per-packet one-way delay: 45.305 ms  
Loss rate: 0.31%  
-- Flow 1:  
Average throughput: 64.41 Mbit/s  
95th percentile per-packet one-way delay: 40.750 ms  
Loss rate: 0.27%  
-- Flow 2:  
Average throughput: 31.02 Mbit/s  
95th percentile per-packet one-way delay: 47.910 ms  
Loss rate: 0.39%  
-- Flow 3:  
Average throughput: 29.10 Mbit/s  
95th percentile per-packet one-way delay: 55.682 ms  
Loss rate: 0.34%

Run 2: Report of Indigo — Data Link

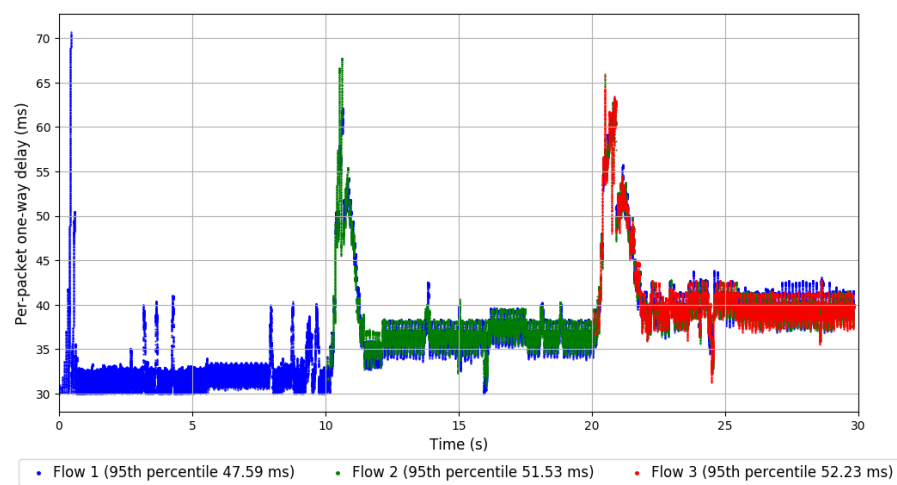
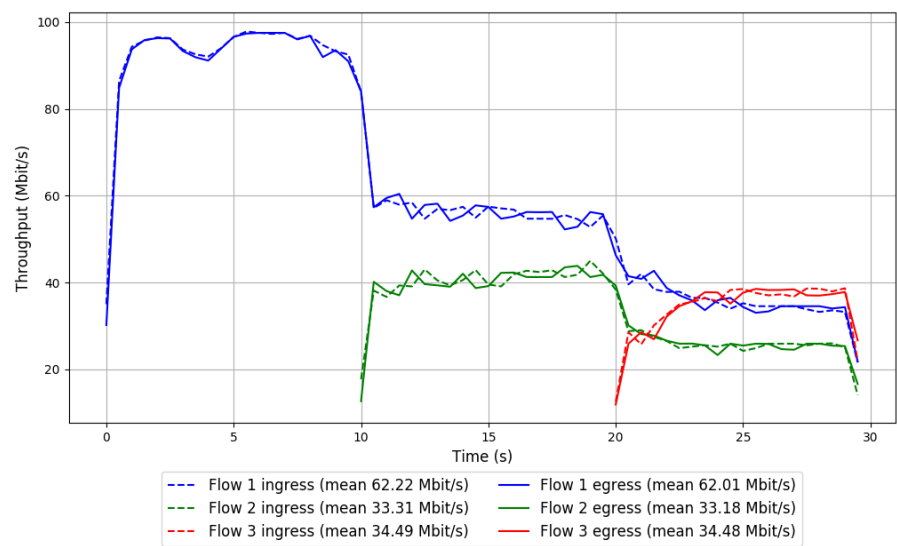


Run 3: Statistics of Indigo

Start at: 2017-12-05 23:02:59  
End at: 2017-12-05 23:03:29  
Local clock offset: -0.361 ms  
Remote clock offset: -1.578 ms

# Below is generated by plot.py at 2017-12-06 02:32:06  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.29 Mbit/s  
95th percentile per-packet one-way delay: 49.535 ms  
Loss rate: 0.28%  
-- Flow 1:  
Average throughput: 62.01 Mbit/s  
95th percentile per-packet one-way delay: 47.591 ms  
Loss rate: 0.30%  
-- Flow 2:  
Average throughput: 33.18 Mbit/s  
95th percentile per-packet one-way delay: 51.526 ms  
Loss rate: 0.36%  
-- Flow 3:  
Average throughput: 34.48 Mbit/s  
95th percentile per-packet one-way delay: 52.227 ms  
Loss rate: 0.03%

Run 3: Report of Indigo — Data Link



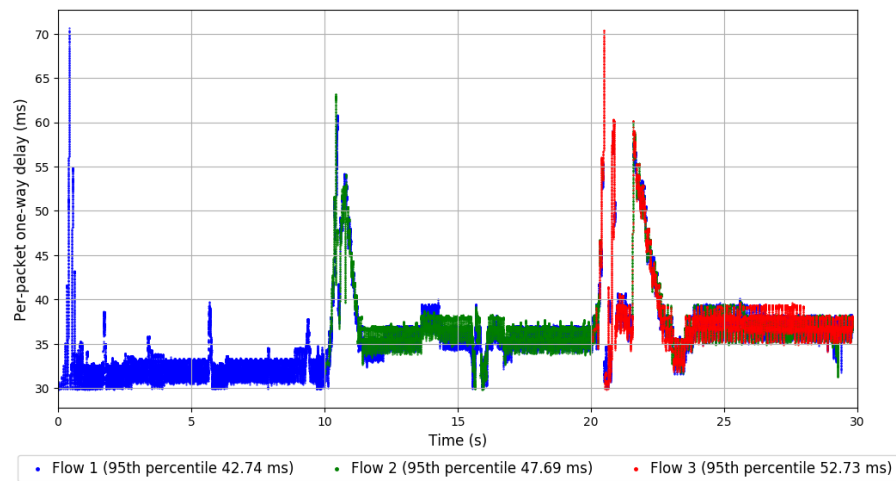
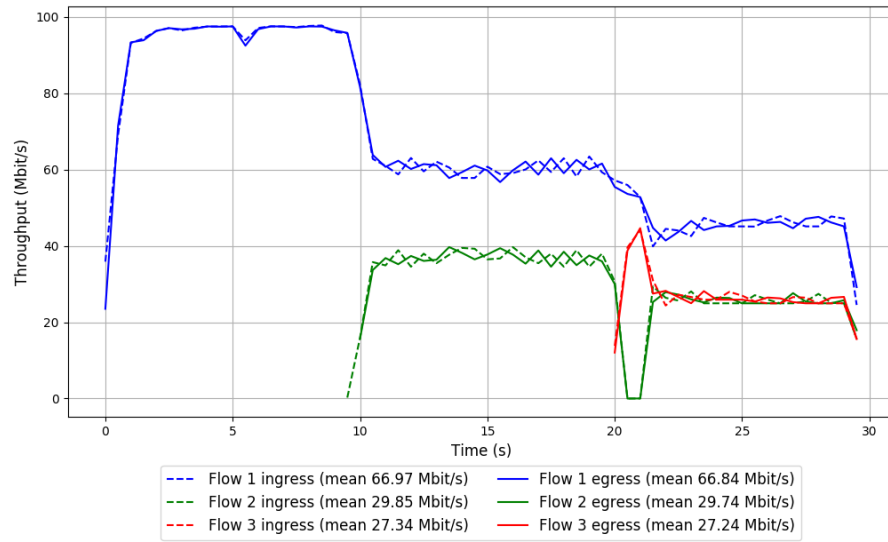
Run 4: Statistics of Indigo

Start at: 2017-12-05 23:23:12  
End at: 2017-12-05 23:23:42  
Local clock offset: -0.345 ms  
Remote clock offset: -2.167 ms

# Below is generated by plot.py at 2017-12-06 02:32:35  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.50 Mbit/s  
95th percentile per-packet one-way delay: 45.851 ms  
Loss rate: 0.22%  
-- Flow 1:  
Average throughput: 66.84 Mbit/s  
95th percentile per-packet one-way delay: 42.741 ms  
Loss rate: 0.17%  
-- Flow 2:  
Average throughput: 29.74 Mbit/s  
95th percentile per-packet one-way delay: 47.694 ms  
Loss rate: 0.35%  
-- Flow 3:  
Average throughput: 27.24 Mbit/s  
95th percentile per-packet one-way delay: 52.725 ms  
Loss rate: 0.33%



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

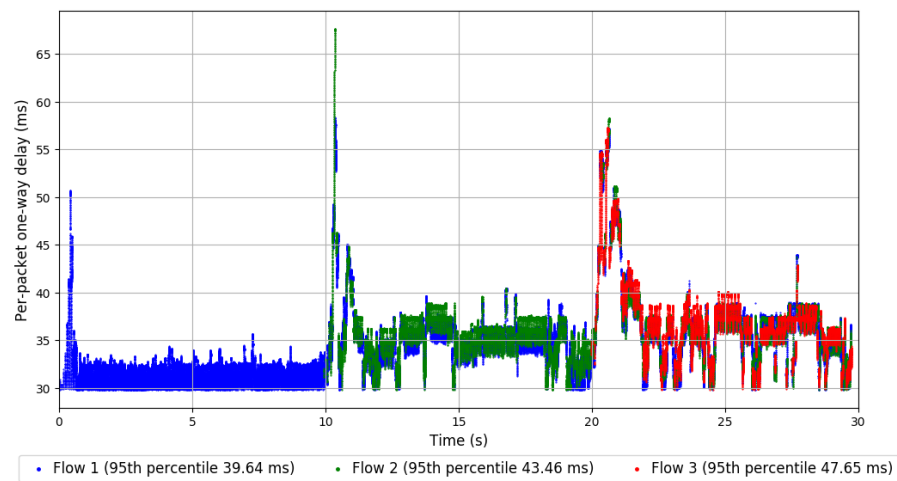
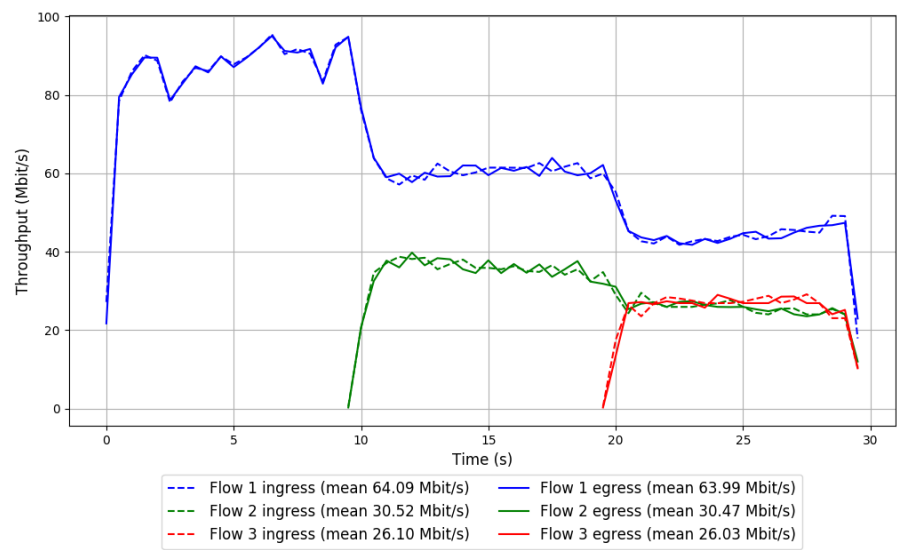


Run 5: Statistics of Indigo

Start at: 2017-12-05 23:44:26  
End at: 2017-12-05 23:44:56  
Local clock offset: -0.306 ms  
Remote clock offset: -2.579 ms

# Below is generated by plot.py at 2017-12-06 02:32:37  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 92.81 Mbit/s  
95th percentile per-packet one-way delay: 41.494 ms  
Loss rate: 0.15%  
-- Flow 1:  
Average throughput: 63.99 Mbit/s  
95th percentile per-packet one-way delay: 39.640 ms  
Loss rate: 0.13%  
-- Flow 2:  
Average throughput: 30.47 Mbit/s  
95th percentile per-packet one-way delay: 43.459 ms  
Loss rate: 0.16%  
-- Flow 3:  
Average throughput: 26.03 Mbit/s  
95th percentile per-packet one-way delay: 47.650 ms  
Loss rate: 0.26%

Run 5: Report of Indigo — Data Link



Run 6: Statistics of Indigo

Start at: 2017-12-06 00:06:50

End at: 2017-12-06 00:07:20

Local clock offset: -0.342 ms

Remote clock offset: -4.33 ms

# Below is generated by plot.py at 2017-12-06 02:32:49

# Datalink statistics

-- Total of 3 flows:

Average throughput: 92.44 Mbit/s

95th percentile per-packet one-way delay: 44.470 ms

Loss rate: 0.16%

-- Flow 1:

Average throughput: 62.85 Mbit/s

95th percentile per-packet one-way delay: 42.619 ms

Loss rate: 0.13%

-- Flow 2:

Average throughput: 28.93 Mbit/s

95th percentile per-packet one-way delay: 46.720 ms

Loss rate: 0.18%

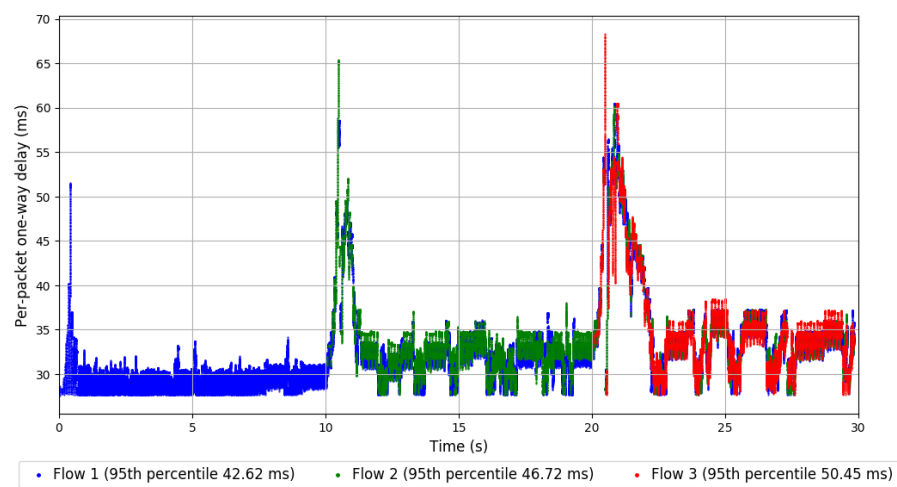
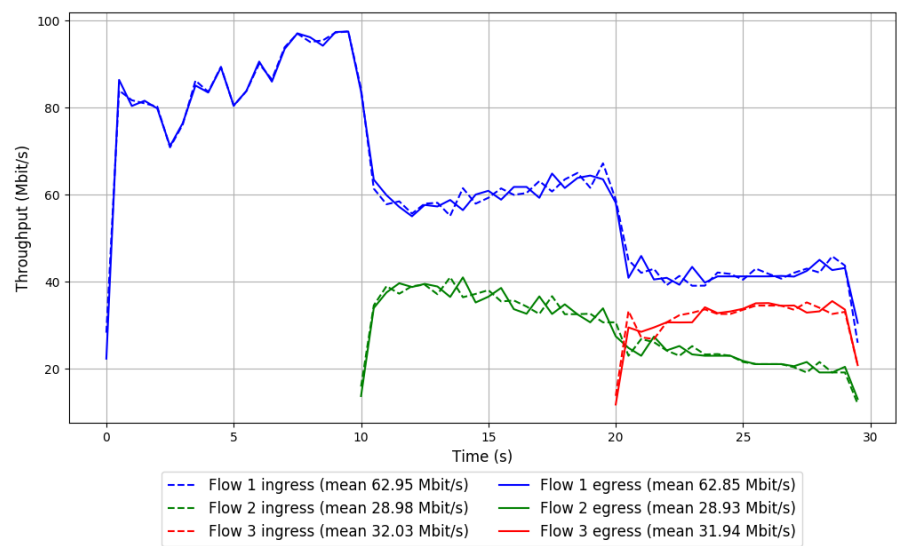
-- Flow 3:

Average throughput: 31.94 Mbit/s

95th percentile per-packet one-way delay: 50.450 ms

Loss rate: 0.29%

Run 6: Report of Indigo — Data Link

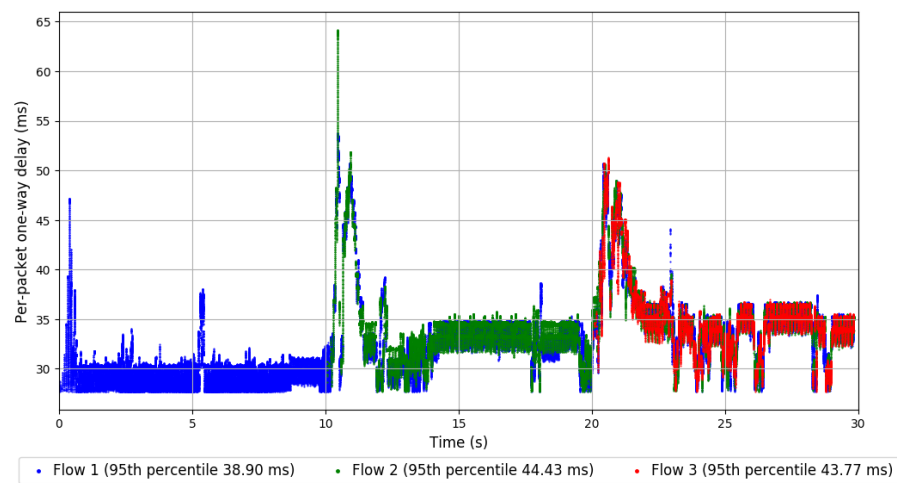
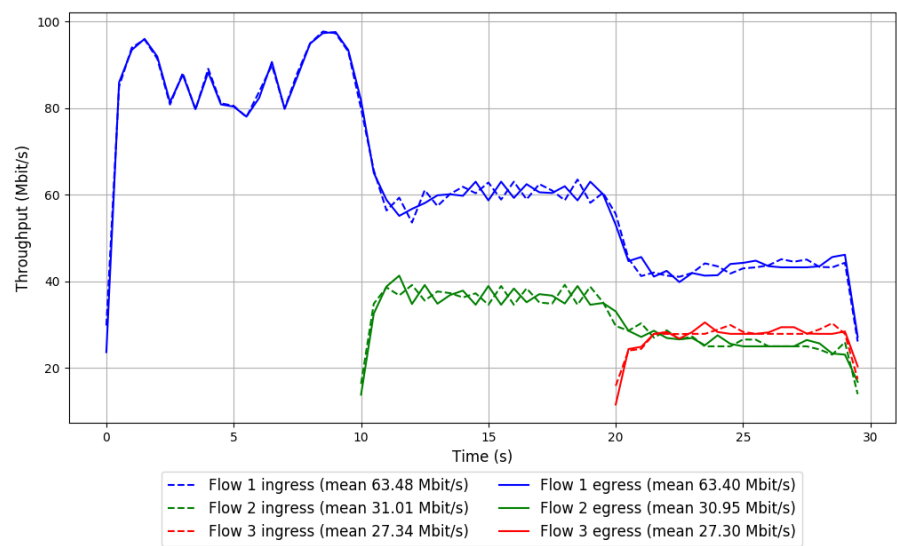


Run 7: Statistics of Indigo

Start at: 2017-12-06 00:28:25  
End at: 2017-12-06 00:28:55  
Local clock offset: -0.521 ms  
Remote clock offset: -3.595 ms

# Below is generated by plot.py at 2017-12-06 02:32:52  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 92.81 Mbit/s  
95th percentile per-packet one-way delay: 41.319 ms  
Loss rate: 0.12%  
-- Flow 1:  
Average throughput: 63.40 Mbit/s  
95th percentile per-packet one-way delay: 38.903 ms  
Loss rate: 0.10%  
-- Flow 2:  
Average throughput: 30.95 Mbit/s  
95th percentile per-packet one-way delay: 44.431 ms  
Loss rate: 0.17%  
-- Flow 3:  
Average throughput: 27.30 Mbit/s  
95th percentile per-packet one-way delay: 43.768 ms  
Loss rate: 0.12%

Run 7: Report of Indigo — Data Link



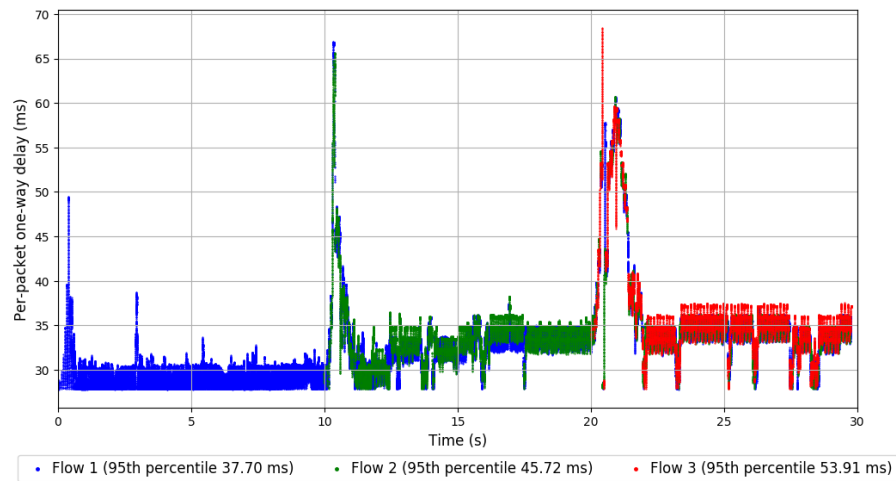
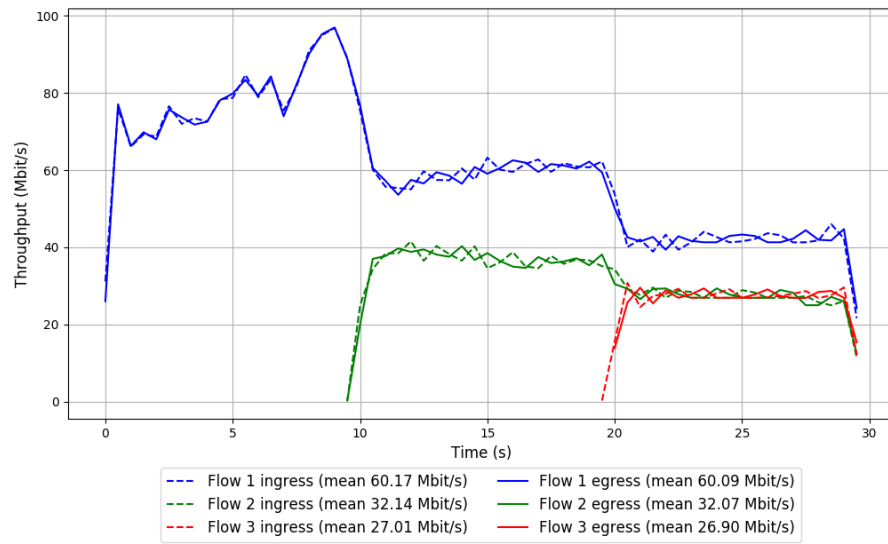
Run 8: Statistics of Indigo

Start at: 2017-12-06 00:49:29  
End at: 2017-12-06 00:49:59  
Local clock offset: -0.66 ms  
Remote clock offset: -2.866 ms

# Below is generated by plot.py at 2017-12-06 02:33:00  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 90.20 Mbit/s  
95th percentile per-packet one-way delay: 41.011 ms  
Loss rate: 0.15%  
-- Flow 1:  
Average throughput: 60.09 Mbit/s  
95th percentile per-packet one-way delay: 37.700 ms  
Loss rate: 0.10%  
-- Flow 2:  
Average throughput: 32.07 Mbit/s  
95th percentile per-packet one-way delay: 45.718 ms  
Loss rate: 0.20%  
-- Flow 3:  
Average throughput: 26.90 Mbit/s  
95th percentile per-packet one-way delay: 53.906 ms  
Loss rate: 0.38%



## Run 8: Report of Indigo — Data Link

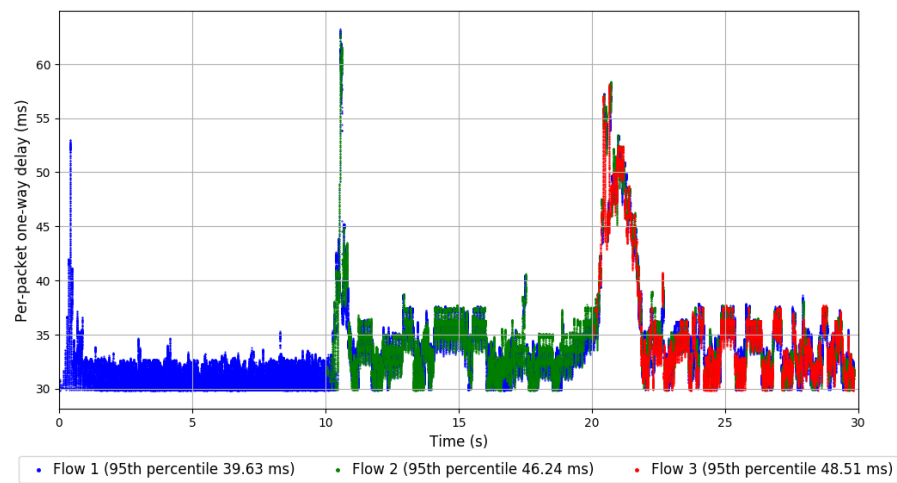
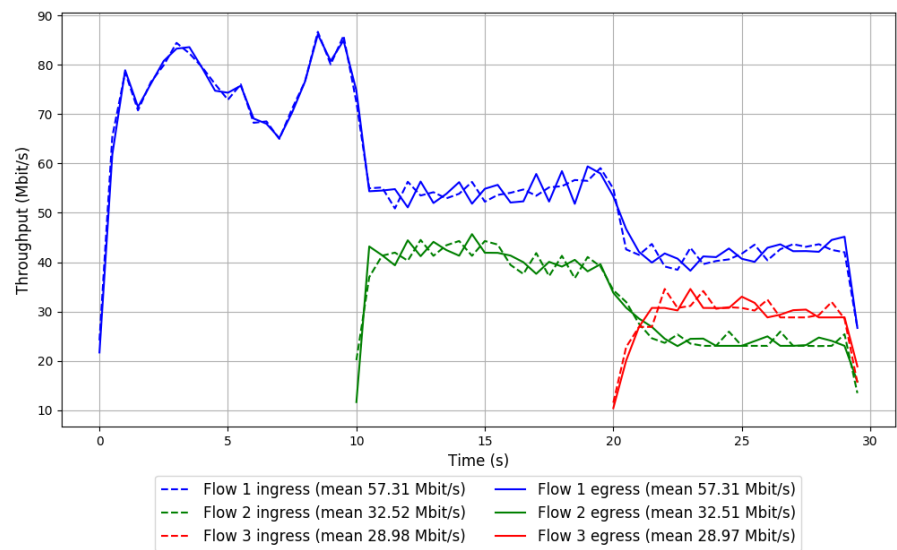


Run 9: Statistics of Indigo

Start at: 2017-12-06 01:13:29  
End at: 2017-12-06 01:13:59  
Local clock offset: -0.825 ms  
Remote clock offset: -0.761 ms

# Below is generated by plot.py at 2017-12-06 02:33:23  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 88.31 Mbit/s  
95th percentile per-packet one-way delay: 43.780 ms  
Loss rate: 0.01%  
-- Flow 1:  
Average throughput: 57.31 Mbit/s  
95th percentile per-packet one-way delay: 39.631 ms  
Loss rate: 0.00%  
-- Flow 2:  
Average throughput: 32.51 Mbit/s  
95th percentile per-packet one-way delay: 46.244 ms  
Loss rate: 0.01%  
-- Flow 3:  
Average throughput: 28.97 Mbit/s  
95th percentile per-packet one-way delay: 48.509 ms  
Loss rate: 0.09%

Run 9: Report of Indigo — Data Link

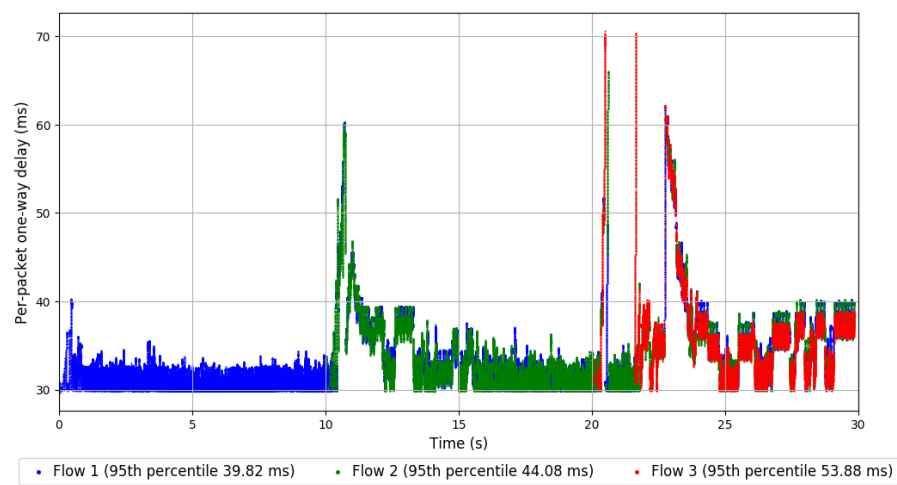
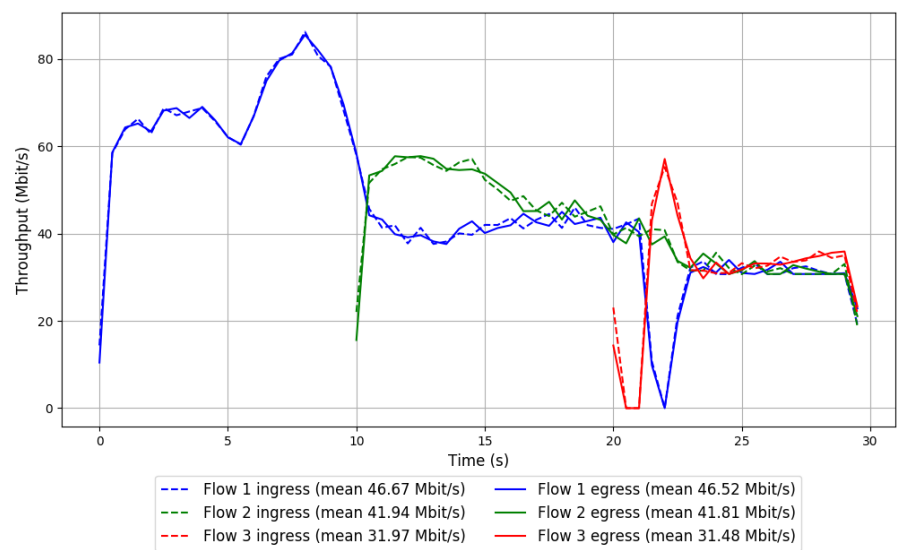


Run 10: Statistics of Indigo

Start at: 2017-12-06 01:38:16  
End at: 2017-12-06 01:38:46  
Local clock offset: -1.084 ms  
Remote clock offset: -1.115 ms

# Below is generated by plot.py at 2017-12-06 02:33:23  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 84.57 Mbit/s  
95th percentile per-packet one-way delay: 42.774 ms  
Loss rate: 0.42%  
-- Flow 1:  
Average throughput: 46.52 Mbit/s  
95th percentile per-packet one-way delay: 39.816 ms  
Loss rate: 0.28%  
-- Flow 2:  
Average throughput: 41.81 Mbit/s  
95th percentile per-packet one-way delay: 44.076 ms  
Loss rate: 0.28%  
-- Flow 3:  
Average throughput: 31.48 Mbit/s  
95th percentile per-packet one-way delay: 53.881 ms  
Loss rate: 1.44%

Run 10: Report of Indigo — Data Link

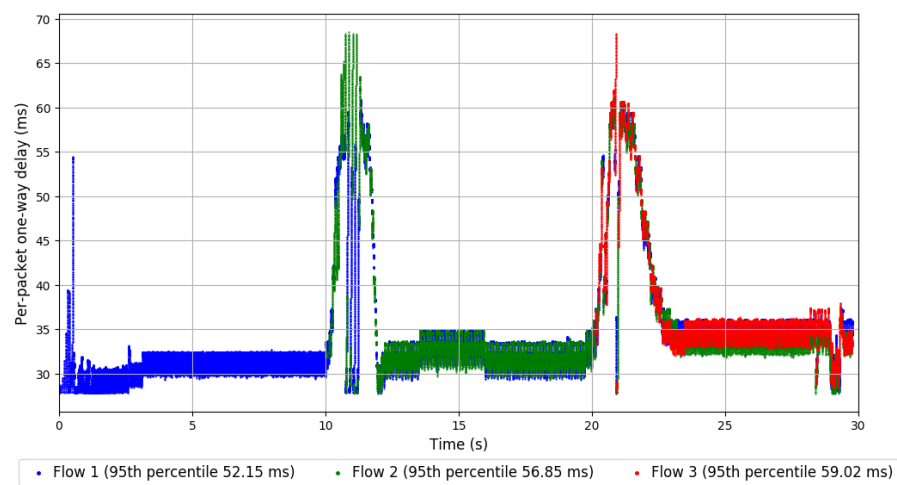
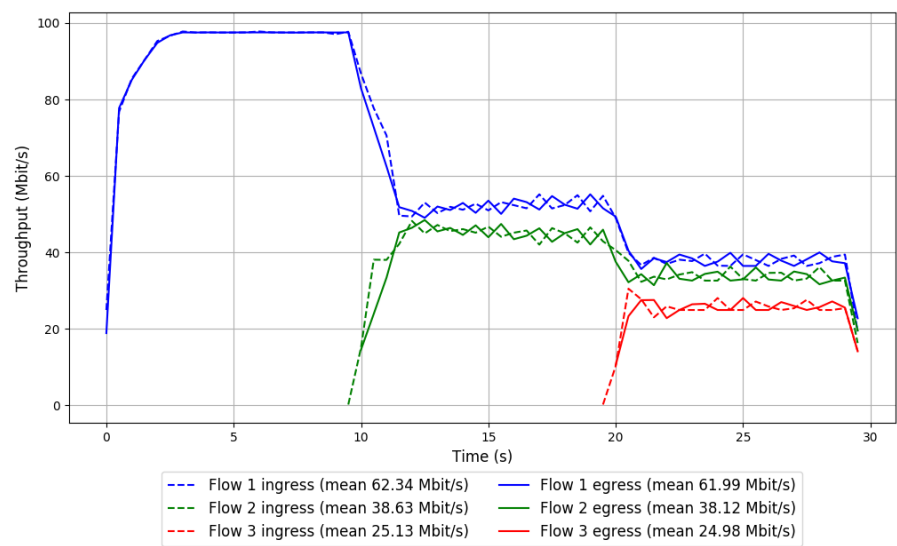


```
Run 1: Statistics of Indigo-calib

Start at: 2017-12-05 22:34:05
End at: 2017-12-05 22:34:35
Local clock offset: -0.282 ms
Remote clock offset: -3.688 ms

# Below is generated by plot.py at 2017-12-06 02:33:34
# Datalink statistics
-- Total of 3 flows:
Average throughput: 95.47 Mbit/s
95th percentile per-packet one-way delay: 54.488 ms
Loss rate: 0.74%
-- Flow 1:
Average throughput: 61.99 Mbit/s
95th percentile per-packet one-way delay: 52.147 ms
Loss rate: 0.53%
-- Flow 2:
Average throughput: 38.12 Mbit/s
95th percentile per-packet one-way delay: 56.849 ms
Loss rate: 1.30%
-- Flow 3:
Average throughput: 24.98 Mbit/s
95th percentile per-packet one-way delay: 59.015 ms
Loss rate: 0.59%
```

Run 1: Report of Indigo-calib — Data Link



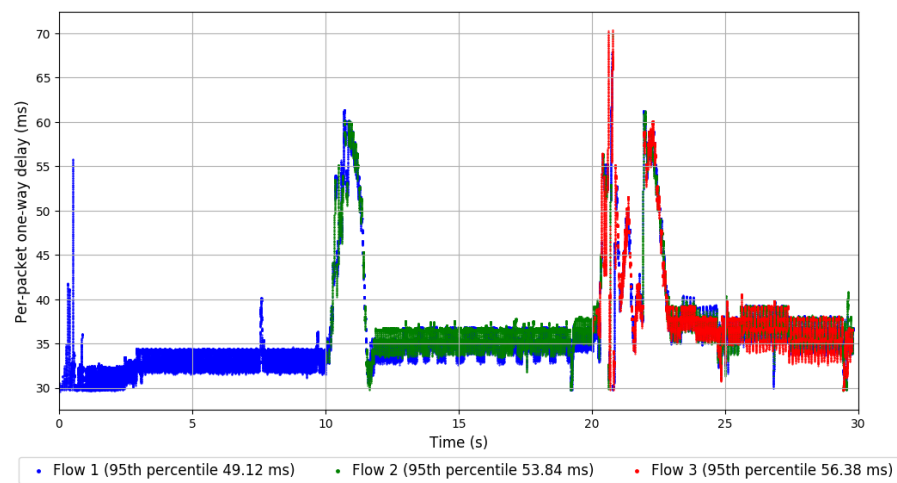
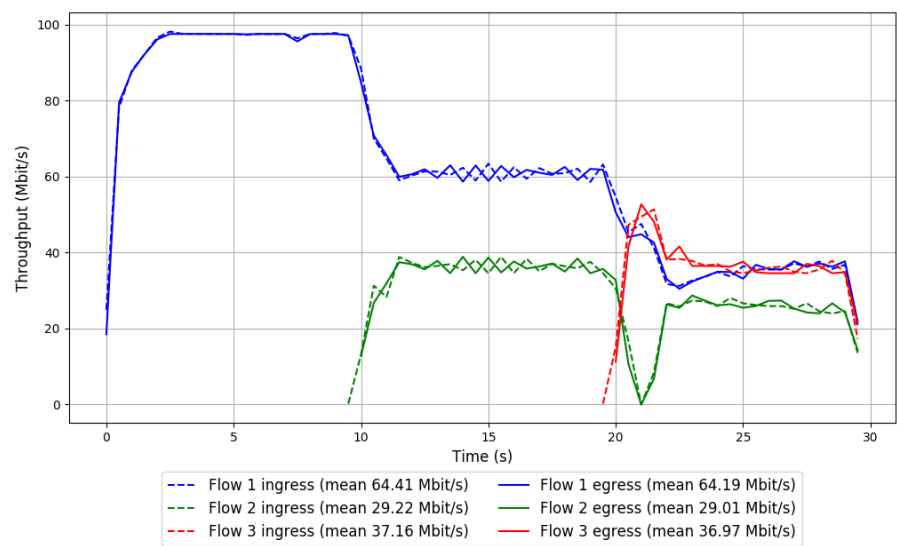
Run 2: Statistics of Indigo-calib

Start at: 2017-12-05 22:54:14  
End at: 2017-12-05 22:54:44  
Local clock offset: -0.265 ms  
Remote clock offset: -1.707 ms

# Below is generated by plot.py at 2017-12-06 02:34:04  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.54 Mbit/s  
95th percentile per-packet one-way delay: 52.520 ms  
Loss rate: 0.42%  
-- Flow 1:  
Average throughput: 64.19 Mbit/s  
95th percentile per-packet one-way delay: 49.122 ms  
Loss rate: 0.32%  
-- Flow 2:  
Average throughput: 29.01 Mbit/s  
95th percentile per-packet one-way delay: 53.845 ms  
Loss rate: 0.70%  
-- Flow 3:  
Average throughput: 36.97 Mbit/s  
95th percentile per-packet one-way delay: 56.377 ms  
Loss rate: 0.51%



Run 2: Report of Indigo-calib — Data Link

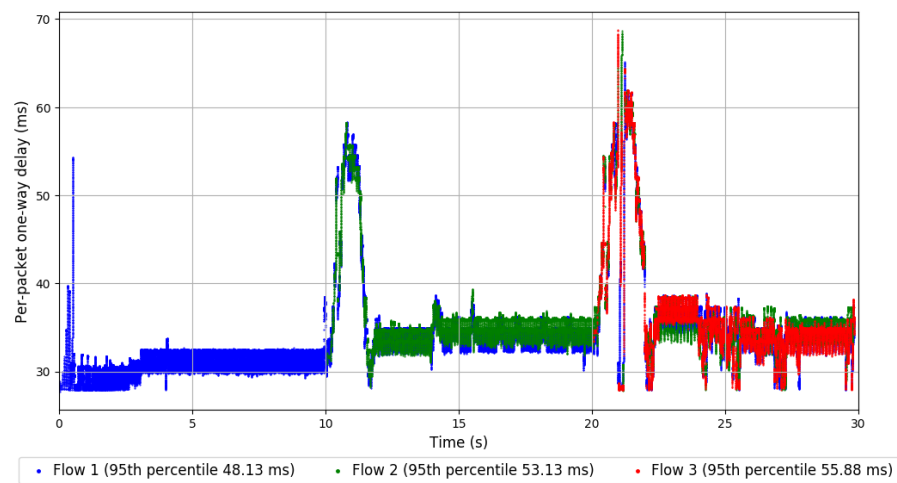
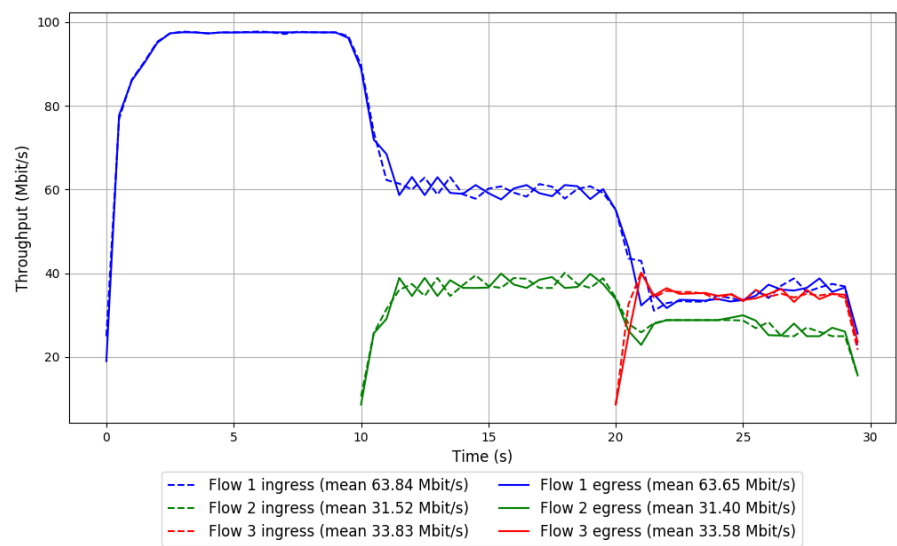


```
Run 3: Statistics of Indigo-calib

Start at: 2017-12-05 23:13:59
End at: 2017-12-05 23:14:29
Local clock offset: -0.332 ms
Remote clock offset: -3.828 ms

# Below is generated by plot.py at 2017-12-06 02:34:05
# Datalink statistics
-- Total of 3 flows:
Average throughput: 95.42 Mbit/s
95th percentile per-packet one-way delay: 51.874 ms
Loss rate: 0.33%
-- Flow 1:
Average throughput: 63.65 Mbit/s
95th percentile per-packet one-way delay: 48.129 ms
Loss rate: 0.26%
-- Flow 2:
Average throughput: 31.40 Mbit/s
95th percentile per-packet one-way delay: 53.127 ms
Loss rate: 0.34%
-- Flow 3:
Average throughput: 33.58 Mbit/s
95th percentile per-packet one-way delay: 55.880 ms
Loss rate: 0.69%
```

Run 3: Report of Indigo-calib — Data Link

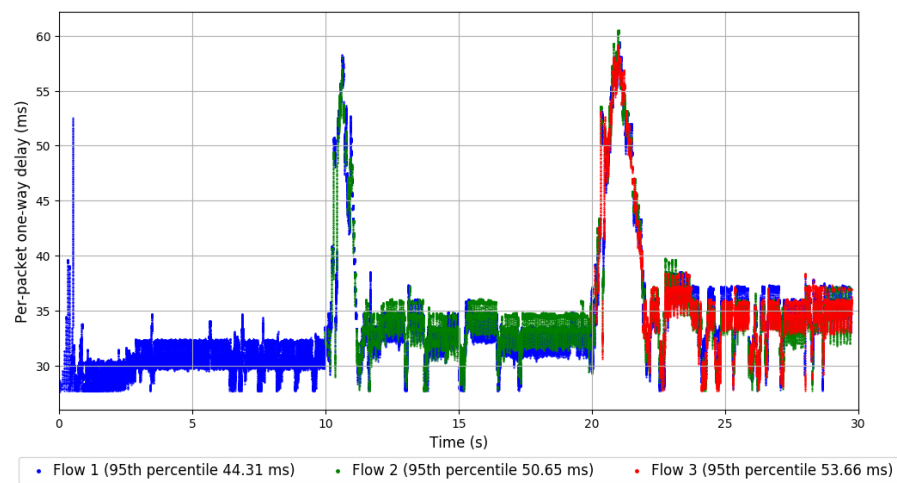
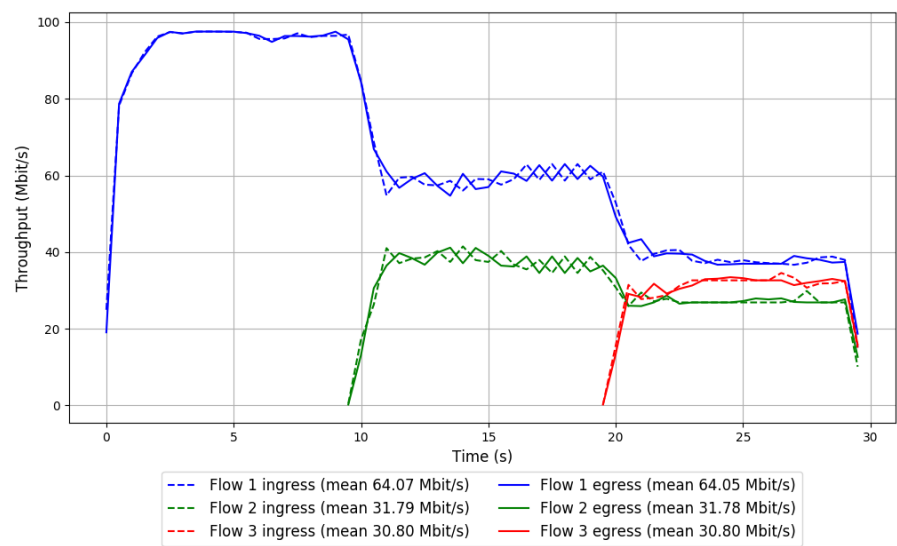


Run 4: Statistics of Indigo-calib

Start at: 2017-12-05 23:34:41  
End at: 2017-12-05 23:35:11  
Local clock offset: -0.354 ms  
Remote clock offset: -4.747 ms

# Below is generated by plot.py at 2017-12-06 02:34:15  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 95.29 Mbit/s  
95th percentile per-packet one-way delay: 49.136 ms  
Loss rate: 0.01%  
-- Flow 1:  
Average throughput: 64.05 Mbit/s  
95th percentile per-packet one-way delay: 44.309 ms  
Loss rate: 0.01%  
-- Flow 2:  
Average throughput: 31.78 Mbit/s  
95th percentile per-packet one-way delay: 50.649 ms  
Loss rate: 0.03%  
-- Flow 3:  
Average throughput: 30.80 Mbit/s  
95th percentile per-packet one-way delay: 53.660 ms  
Loss rate: 0.01%

Run 4: Report of Indigo-calib — Data Link

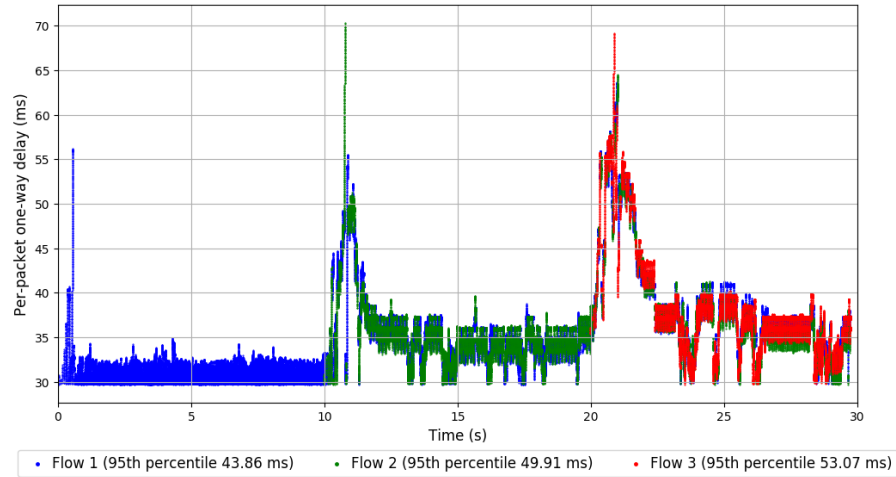
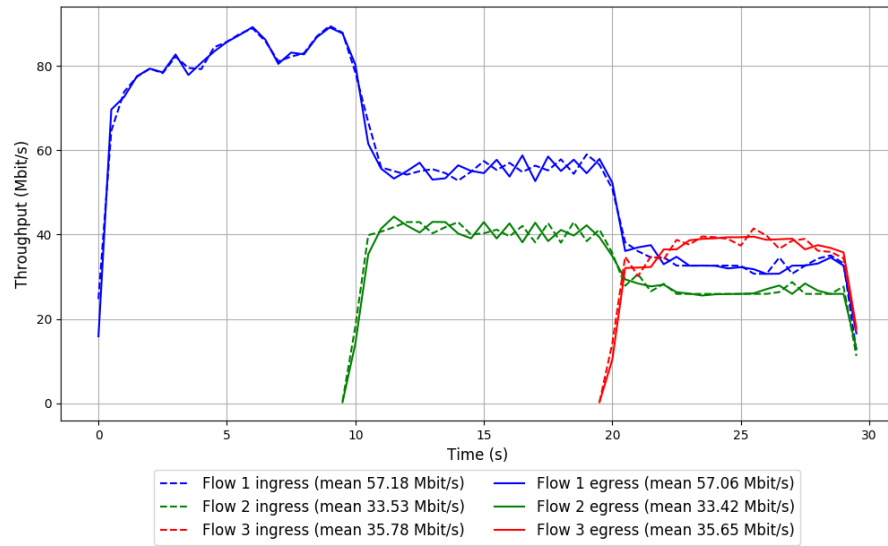


Run 5: Statistics of Indigo-calib

Start at: 2017-12-05 23:56:41  
End at: 2017-12-05 23:57:11  
Local clock offset: -0.304 ms  
Remote clock offset: -2.474 ms

# Below is generated by plot.py at 2017-12-06 02:34:15  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 90.93 Mbit/s  
95th percentile per-packet one-way delay: 48.273 ms  
Loss rate: 0.25%  
-- Flow 1:  
Average throughput: 57.06 Mbit/s  
95th percentile per-packet one-way delay: 43.859 ms  
Loss rate: 0.21%  
-- Flow 2:  
Average throughput: 33.42 Mbit/s  
95th percentile per-packet one-way delay: 49.908 ms  
Loss rate: 0.30%  
-- Flow 3:  
Average throughput: 35.65 Mbit/s  
95th percentile per-packet one-way delay: 53.070 ms  
Loss rate: 0.35%

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



Run 6: Statistics of Indigo-calib

Start at: 2017-12-06 00:19:01

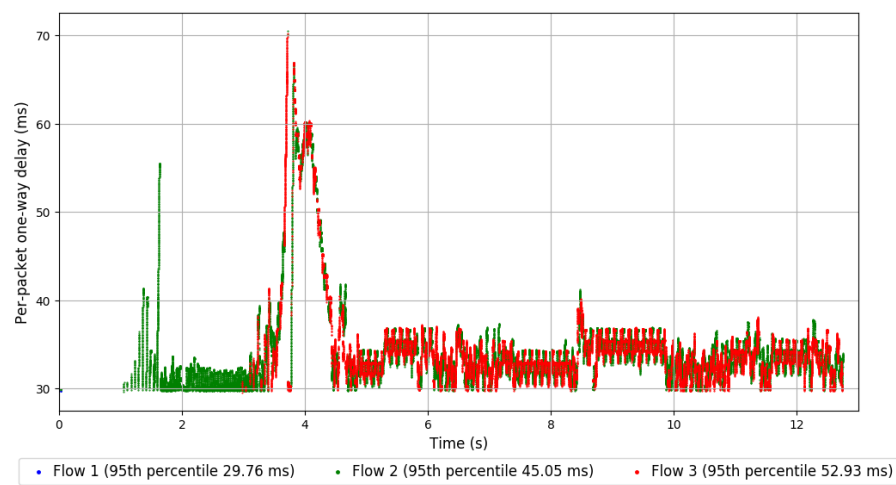
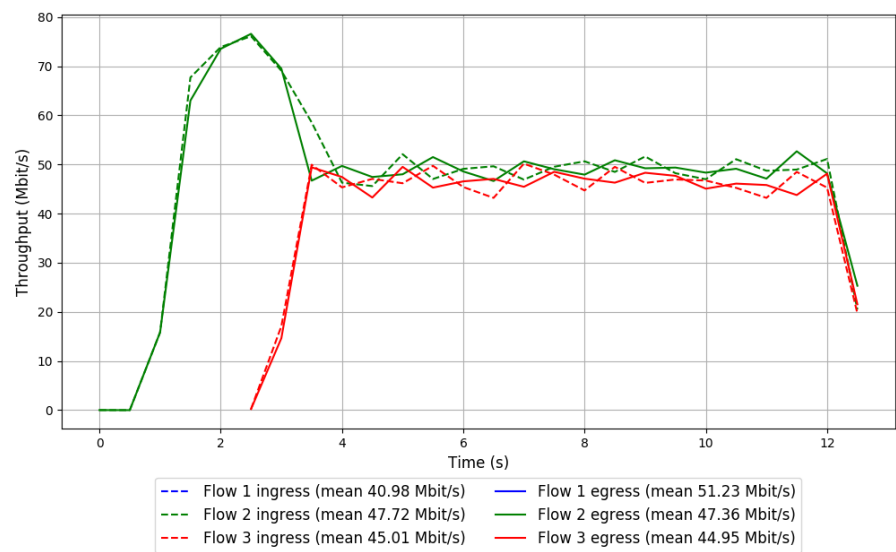
End at: 2017-12-06 00:19:31

Local clock offset: -0.416 ms

Remote clock offset: -1.929 ms



Run 6: Report of Indigo-calib — Data Link

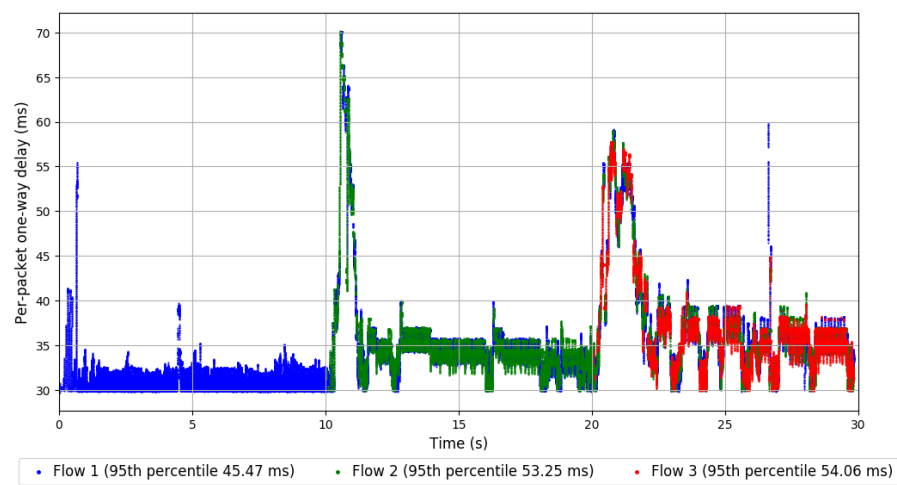
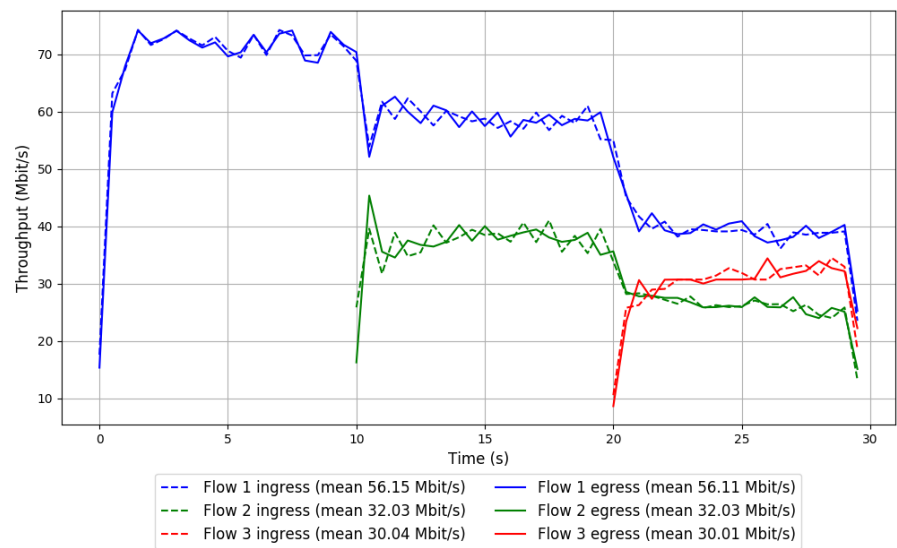


Run 7: Statistics of Indigo-calib

Start at: 2017-12-06 00:40:10  
End at: 2017-12-06 00:40:40  
Local clock offset: -0.6 ms  
Remote clock offset: -1.075 ms

# Below is generated by plot.py at 2017-12-06 02:34:27  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 87.19 Mbit/s  
95th percentile per-packet one-way delay: 50.840 ms  
Loss rate: 0.05%  
-- Flow 1:  
Average throughput: 56.11 Mbit/s  
95th percentile per-packet one-way delay: 45.474 ms  
Loss rate: 0.06%  
-- Flow 2:  
Average throughput: 32.03 Mbit/s  
95th percentile per-packet one-way delay: 53.253 ms  
Loss rate: 0.01%  
-- Flow 3:  
Average throughput: 30.01 Mbit/s  
95th percentile per-packet one-way delay: 54.061 ms  
Loss rate: 0.12%

Run 7: Report of Indigo-calib — Data Link



Run 8: Statistics of Indigo-calib

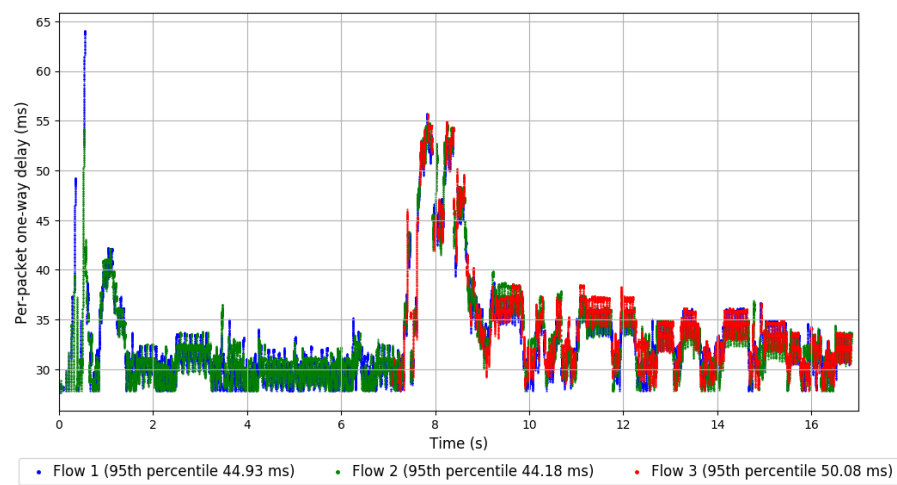
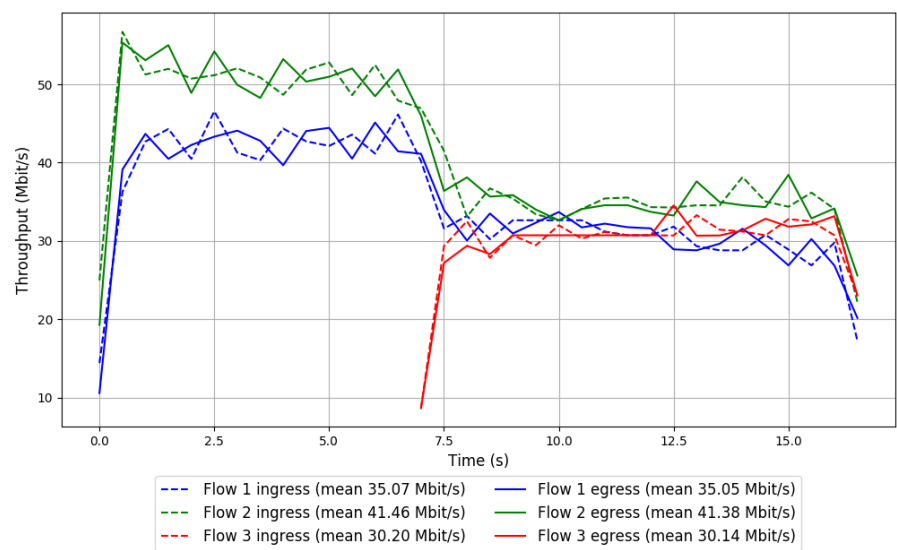
Start at: 2017-12-06 01:01:54

End at: 2017-12-06 01:02:24

Local clock offset: -0.659 ms

Remote clock offset: -2.679 ms

Run 8: Report of Indigo-calib — Data Link



Run 9: Statistics of Indigo-calib

Start at: 2017-12-06 01:27:05

End at: 2017-12-06 01:27:35

Local clock offset: -0.879 ms

Remote clock offset: -0.87 ms

# Below is generated by plot.py at 2017-12-06 02:34:28

# Datalink statistics

-- Total of 3 flows:

Average throughput: 88.43 Mbit/s

95th percentile per-packet one-way delay: 51.597 ms

Loss rate: 0.19%

-- Flow 1:

Average throughput: 47.92 Mbit/s

95th percentile per-packet one-way delay: 48.694 ms

Loss rate: 0.12%

-- Flow 2:

Average throughput: 33.51 Mbit/s

95th percentile per-packet one-way delay: 52.623 ms

Loss rate: 0.40%

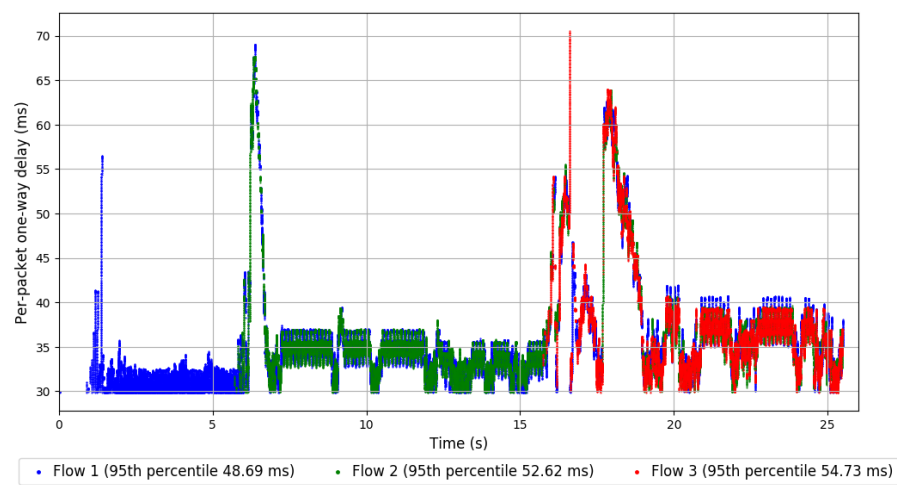
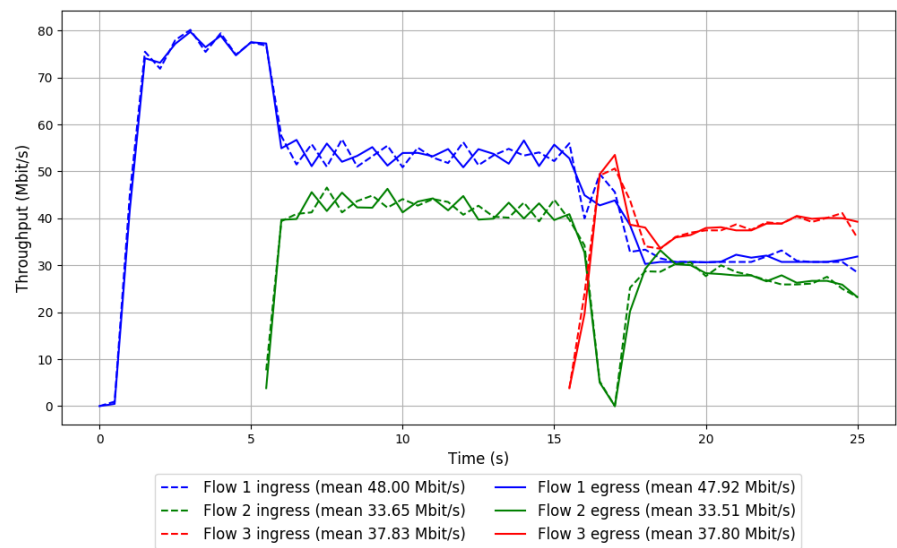
-- Flow 3:

Average throughput: 37.80 Mbit/s

95th percentile per-packet one-way delay: 54.729 ms

Loss rate: 0.04%

Run 9: Report of Indigo-calib — Data Link



Run 10: Statistics of Indigo-calib

Start at: 2017-12-06 01:51:55  
End at: 2017-12-06 01:52:25  
Local clock offset: -1.118 ms  
Remote clock offset: -3.362 ms

# Below is generated by plot.py at 2017-12-06 02:34:28  
# Datalink statistics  
-- Total of 3 flows:  
Average throughput: 83.34 Mbit/s  
95th percentile per-packet one-way delay: 48.142 ms  
Loss rate: 0.24%  
-- Flow 1:  
Average throughput: 48.63 Mbit/s  
95th percentile per-packet one-way delay: 43.338 ms  
Loss rate: 0.14%  
-- Flow 2:  
Average throughput: 32.74 Mbit/s  
95th percentile per-packet one-way delay: 49.213 ms  
Loss rate: 0.37%  
-- Flow 3:  
Average throughput: 29.63 Mbit/s  
95th percentile per-packet one-way delay: 52.754 ms  
Loss rate: 0.38%



Run 10: Report of Indigo-calib — Data Link

