

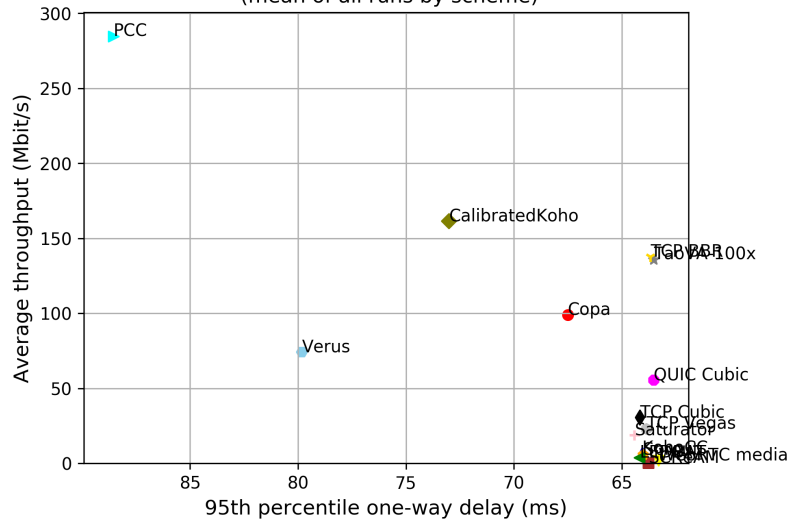
Pantheon Report

Generated at 2017-08-17 09:00:15 (UTC).
Data path: GCE Tokyo Ethernet (*remote*) → GCE Iowa Ethernet (*local*).
Repeated the test of 15 congestion control schemes 10 times.
Each test lasted for 30 seconds running 1 flow.
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**).

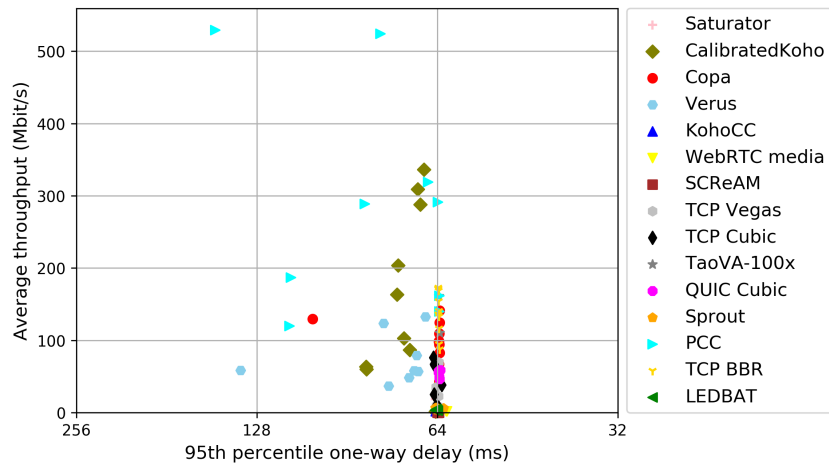
Git summary:

```
branch: master @ e43be7582298d552838afcf6382342bf187fbbd6
third_party/calibrated_koho @ 3cb73c0d1c0322cdfae446ea37a522e53227db50
  M datagrump/sender.cc
third_party/genericCC @ dae96123232f1bcb37725348fa2378691ce26725
third_party/koho_cc @ f0f2e693303aee82ea808e6928eac4f1083a6681
  M datagrump/sender.cc
third_party/libutp @ b3465b942e2826f2b179eaab4a906ce6bb7cf3cf
third_party/pantheon-stimuli @ fc73a85ca16c34366d1888dc8a0d0d88d4ebf2a7
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-quick @ 77961f1a82733a86b42f1bc8143ebc978f3cff42
third_party/scream @ c3370fd7bd17265a79aeb34e4016ad23f5965885
third_party/sourdough @ f1a14bffe749737437f61b1eaaeb30b267cde681
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 GCE Tokyo Ethernet to GCE Iowa Ethernet, 10 runs of 30s each per scheme
(mean of all runs by scheme)



test from GCE Tokyo Ethernet to GCE Iowa Ethernet, 10 runs of 30s each per scheme



scheme	# runs	mean avg tput (Mbit/s) flow 1	mean 95th-%ile delay (ms) flow 1	mean loss rate (%) flow 1
TCP BBR	10	137.78	63.68	3.26
CalibratedKoho	10	161.54	73.01	17.50
Copa	10	98.97	67.51	6.60
TCP Cubic	10	30.68	64.16	2.61
KohoCC	10	7.02	64.06	22.51
LEDBAT	7	3.86	64.18	2.05
PCC	9	284.72	88.54	14.02
QUIC Cubic	10	55.60	63.52	0.51
Saturator	2	18.81	64.41	0.57
SCReAM	9	0.22	63.76	0.39
Sprout	10	5.73	64.02	3.94
TaoVA-100x	2	135.91	63.53	11.98
TCP Vegas	10	23.18	63.87	1.26
Verus	8	74.36	79.82	29.13
WebRTC media	9	2.02	63.29	0.74

Run 1: Statistics of TCP BBR

Start at: 2017-08-17 04:33:58

End at: 2017-08-17 04:34:28

Below is generated by plot.py at 2017-08-17 08:43:28

Datalink statistics

-- Total of 1 flow:

Average throughput: 171.64 Mbit/s

95th percentile per-packet one-way delay: 63.805 ms

Loss rate: 0.44%

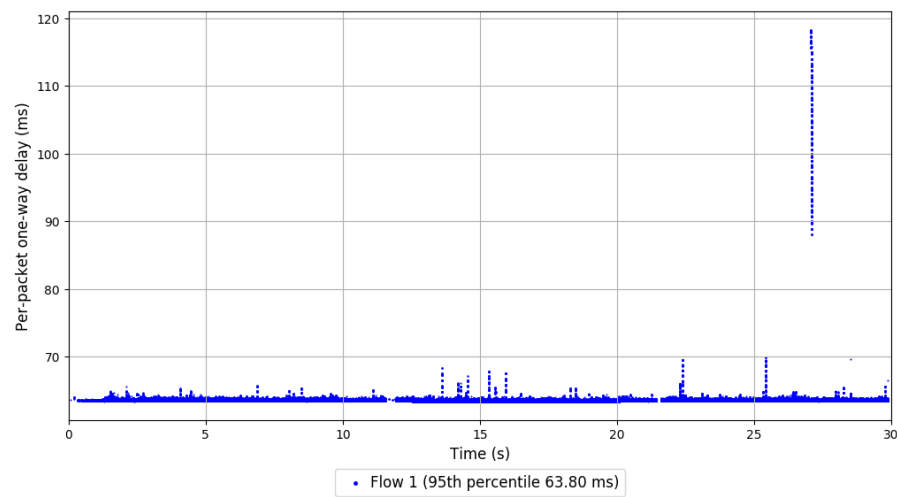
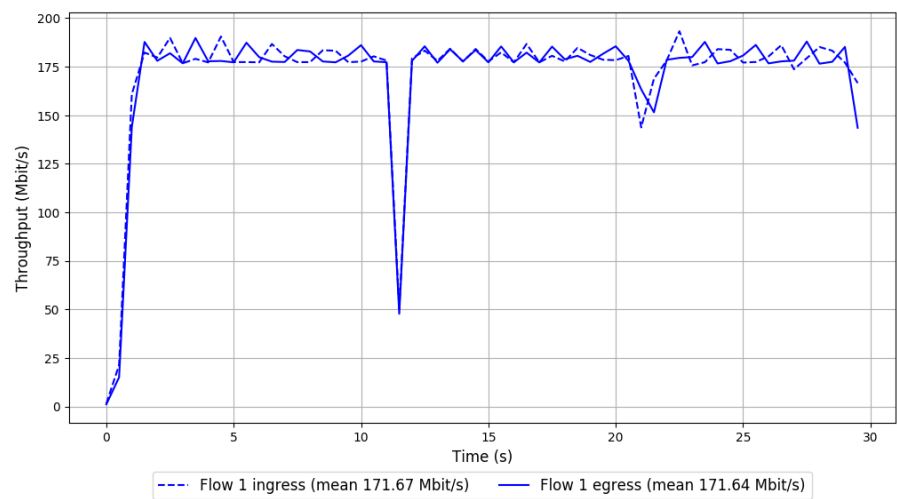
-- Flow 1:

Average throughput: 171.64 Mbit/s

95th percentile per-packet one-way delay: 63.805 ms

Loss rate: 0.44%

Run 1: Report of TCP BBR — Data Link



Run 2: Statistics of TCP BBR

Start at: 2017-08-17 04:44:18

End at: 2017-08-17 04:44:48

Below is generated by plot.py at 2017-08-17 08:43:28

Datalink statistics

-- Total of 1 flow:

Average throughput: 168.83 Mbit/s

95th percentile per-packet one-way delay: 63.710 ms

Loss rate: 0.77%

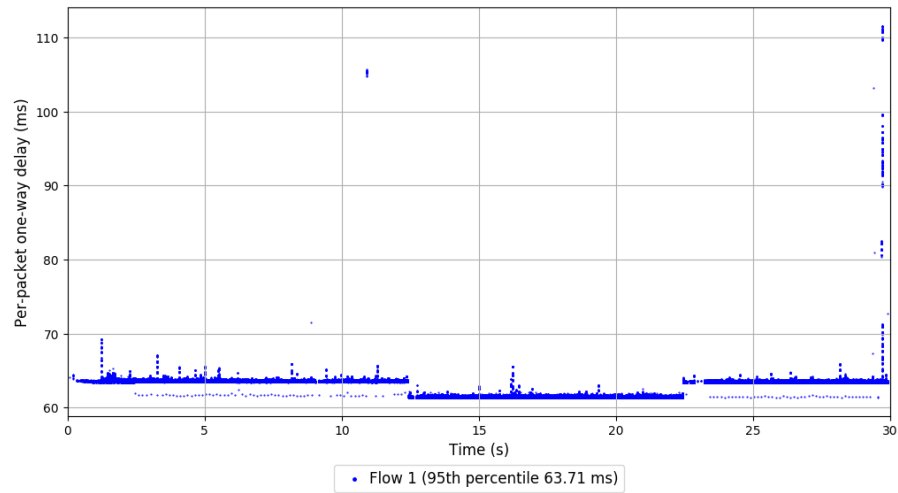
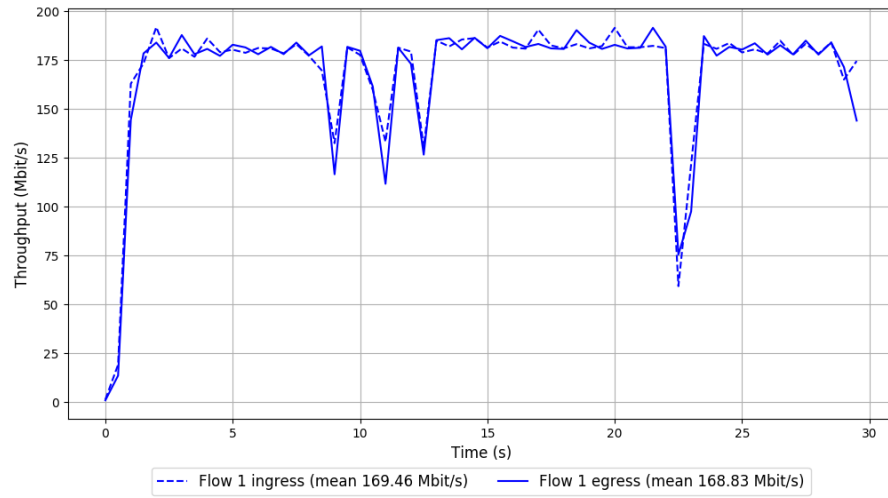
-- Flow 1:

Average throughput: 168.83 Mbit/s

95th percentile per-packet one-way delay: 63.710 ms

Loss rate: 0.77%

Run 2: Report of TCP BBR — Data Link



Run 3: Statistics of TCP BBR

Start at: 2017-08-17 04:54:57

End at: 2017-08-17 04:55:27

Below is generated by plot.py at 2017-08-17 08:43:54

Datalink statistics

-- Total of 1 flow:

Average throughput: 136.42 Mbit/s

95th percentile per-packet one-way delay: 63.774 ms

Loss rate: 0.78%

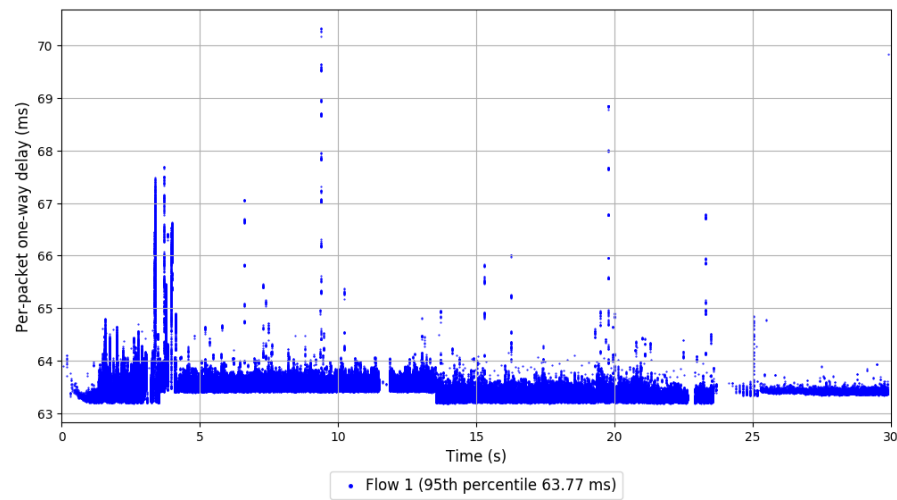
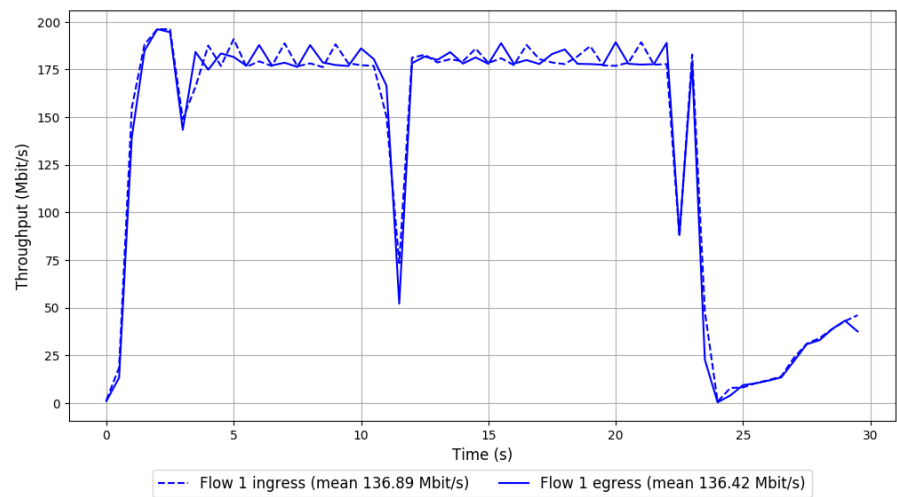
-- Flow 1:

Average throughput: 136.42 Mbit/s

95th percentile per-packet one-way delay: 63.774 ms

Loss rate: 0.78%

Run 3: Report of TCP BBR — Data Link



Run 4: Statistics of TCP BBR

Start at: 2017-08-17 05:05:00

End at: 2017-08-17 05:05:30

Below is generated by plot.py at 2017-08-17 08:43:54

Datalink statistics

-- Total of 1 flow:

Average throughput: 133.17 Mbit/s

95th percentile per-packet one-way delay: 63.639 ms

Loss rate: 4.27%

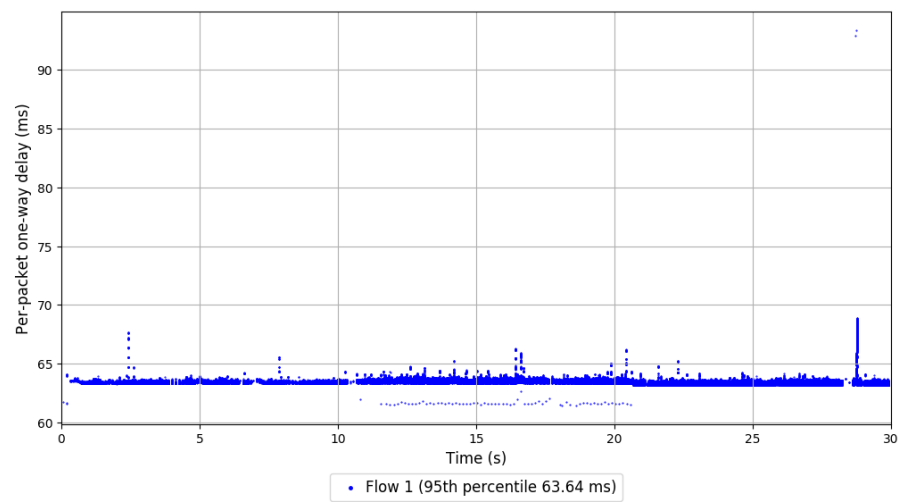
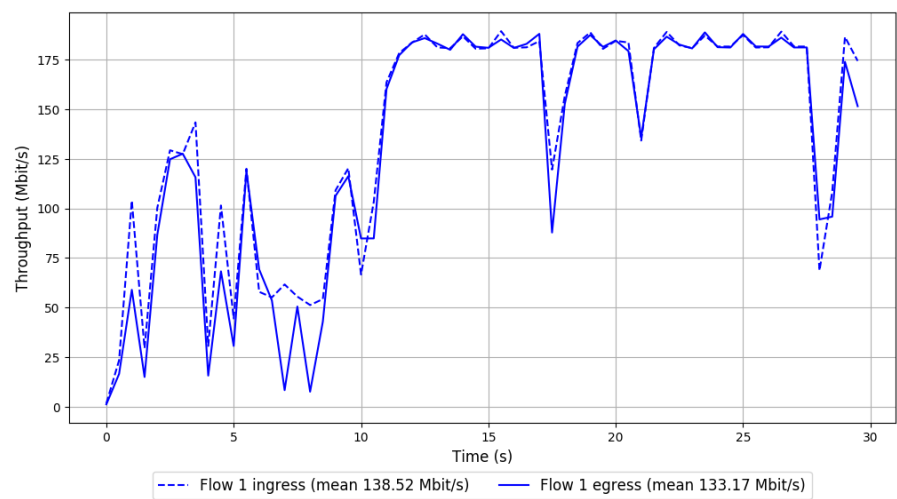
-- Flow 1:

Average throughput: 133.17 Mbit/s

95th percentile per-packet one-way delay: 63.639 ms

Loss rate: 4.27%

Run 4: Report of TCP BBR — Data Link



Run 5: Statistics of TCP BBR

Start at: 2017-08-17 05:15:39

End at: 2017-08-17 05:16:09

Below is generated by plot.py at 2017-08-17 08:44:15

Datalink statistics

-- Total of 1 flow:

Average throughput: 140.54 Mbit/s

95th percentile per-packet one-way delay: 63.658 ms

Loss rate: 2.93%

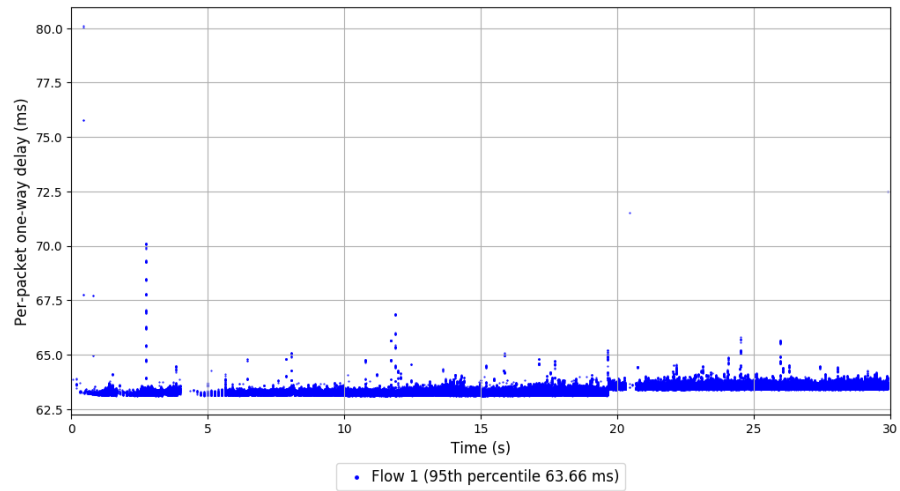
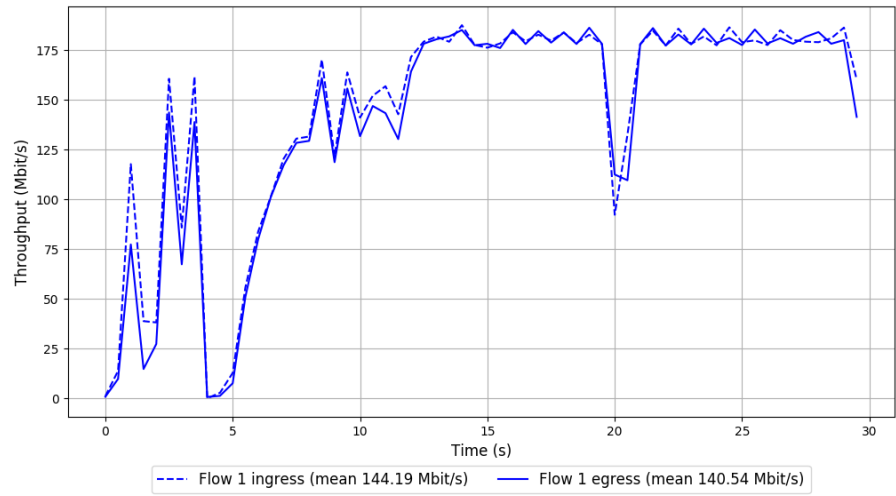
-- Flow 1:

Average throughput: 140.54 Mbit/s

95th percentile per-packet one-way delay: 63.658 ms

Loss rate: 2.93%

Run 5: Report of TCP BBR — Data Link



Run 6: Statistics of TCP BBR

Start at: 2017-08-17 05:25:46

End at: 2017-08-17 05:26:16

Below is generated by plot.py at 2017-08-17 08:44:15

Datalink statistics

-- Total of 1 flow:

Average throughput: 95.04 Mbit/s

95th percentile per-packet one-way delay: 63.643 ms

Loss rate: 7.10%

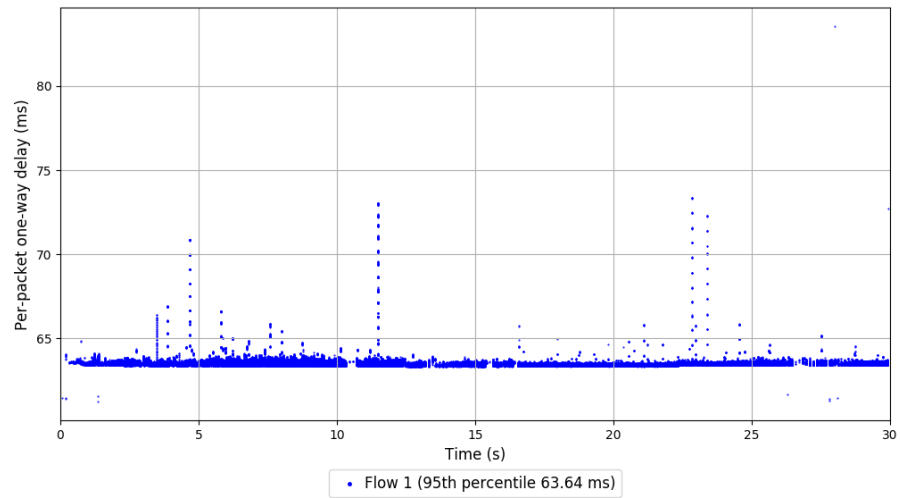
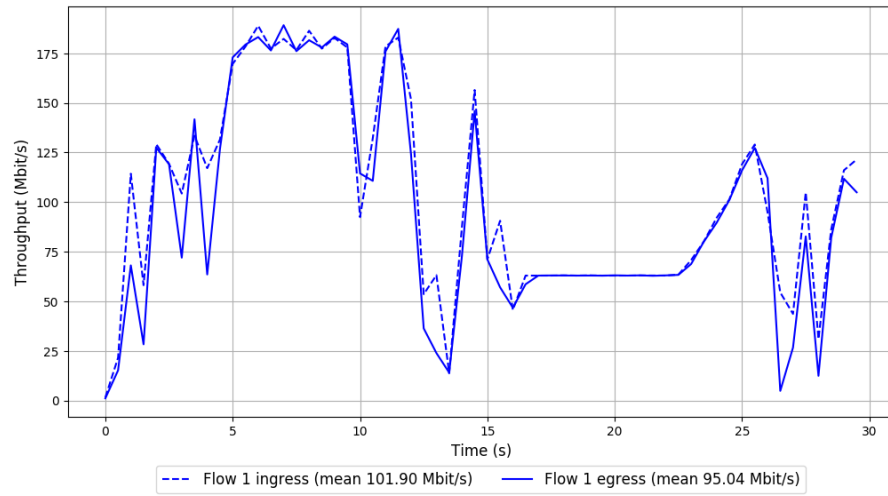
-- Flow 1:

Average throughput: 95.04 Mbit/s

95th percentile per-packet one-way delay: 63.643 ms

Loss rate: 7.10%

Run 6: Report of TCP BBR — Data Link



Run 7: Statistics of TCP BBR

Start at: 2017-08-17 05:36:13

End at: 2017-08-17 05:36:43

Below is generated by plot.py at 2017-08-17 08:44:43

Datalink statistics

-- Total of 1 flow:

Average throughput: 173.10 Mbit/s

95th percentile per-packet one-way delay: 63.780 ms

Loss rate: 0.46%

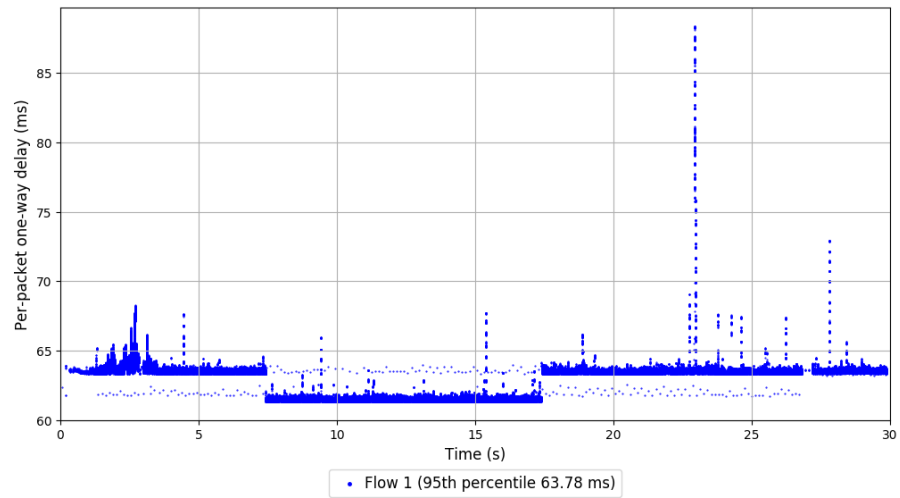
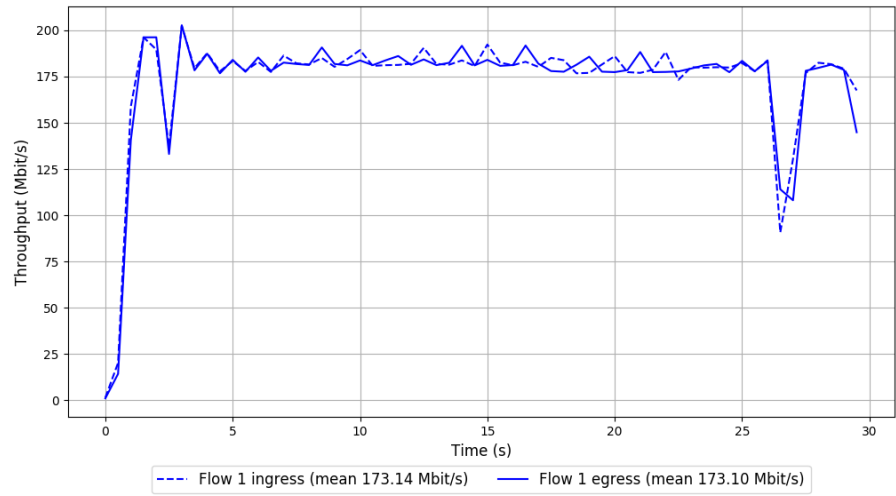
-- Flow 1:

Average throughput: 173.10 Mbit/s

95th percentile per-packet one-way delay: 63.780 ms

Loss rate: 0.46%

Run 7: Report of TCP BBR — Data Link



Run 8: Statistics of TCP BBR

Start at: 2017-08-17 05:46:45

End at: 2017-08-17 05:47:15

Below is generated by plot.py at 2017-08-17 08:44:43

Datalink statistics

-- Total of 1 flow:

Average throughput: 154.29 Mbit/s

95th percentile per-packet one-way delay: 63.701 ms

Loss rate: 1.25%

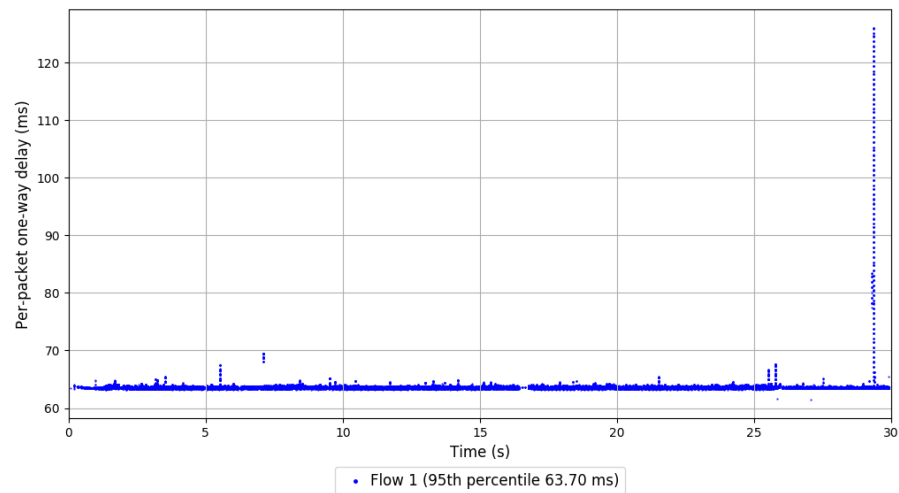
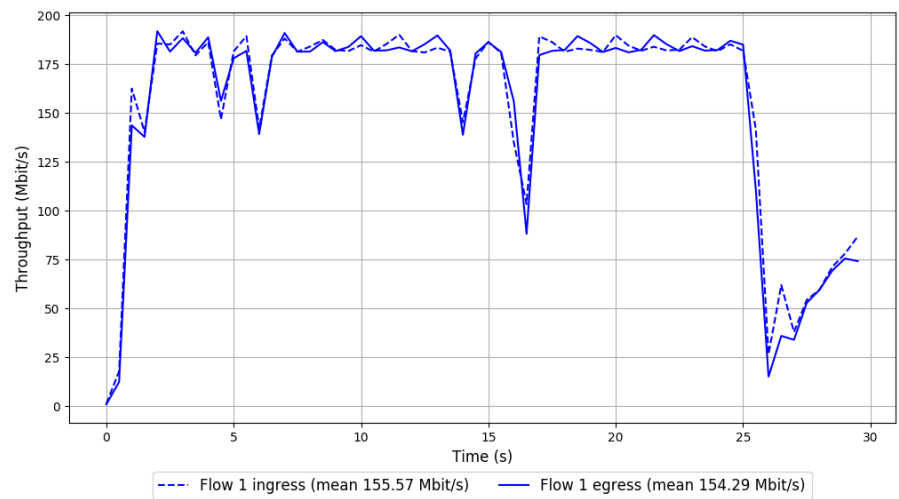
-- Flow 1:

Average throughput: 154.29 Mbit/s

95th percentile per-packet one-way delay: 63.701 ms

Loss rate: 1.25%

Run 8: Report of TCP BBR — Data Link



Run 9: Statistics of TCP BBR

Start at: 2017-08-17 05:57:10

End at: 2017-08-17 05:57:40

Below is generated by plot.py at 2017-08-17 08:45:03

Datalink statistics

-- Total of 1 flow:

Average throughput: 116.79 Mbit/s

95th percentile per-packet one-way delay: 63.618 ms

Loss rate: 4.71%

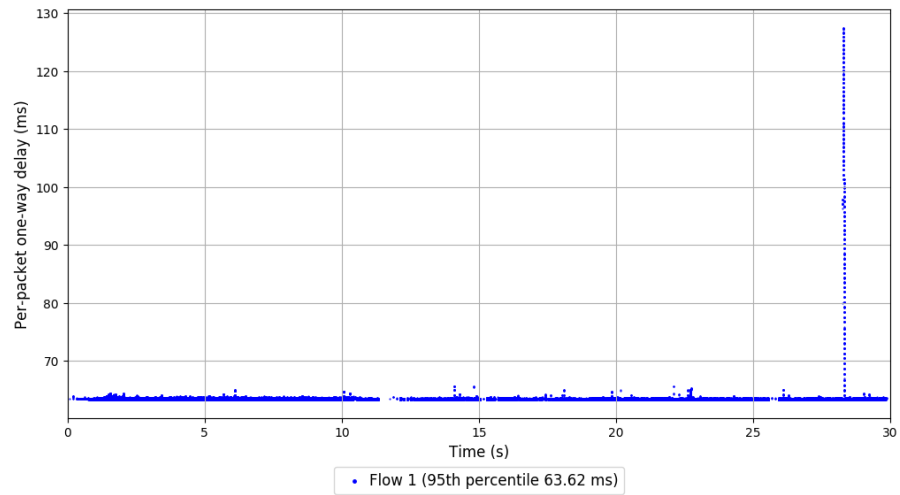
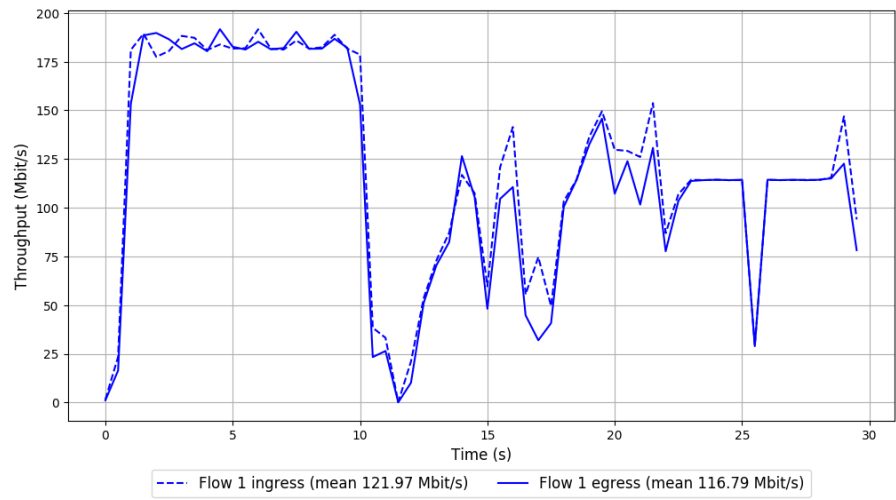
-- Flow 1:

Average throughput: 116.79 Mbit/s

95th percentile per-packet one-way delay: 63.618 ms

Loss rate: 4.71%

Run 9: Report of TCP BBR — Data Link



Run 10: Statistics of TCP BBR

Start at: 2017-08-17 06:07:48

End at: 2017-08-17 06:08:18

Below is generated by plot.py at 2017-08-17 08:45:03

Datalink statistics

-- Total of 1 flow:

Average throughput: 87.95 Mbit/s

95th percentile per-packet one-way delay: 63.462 ms

Loss rate: 9.86%

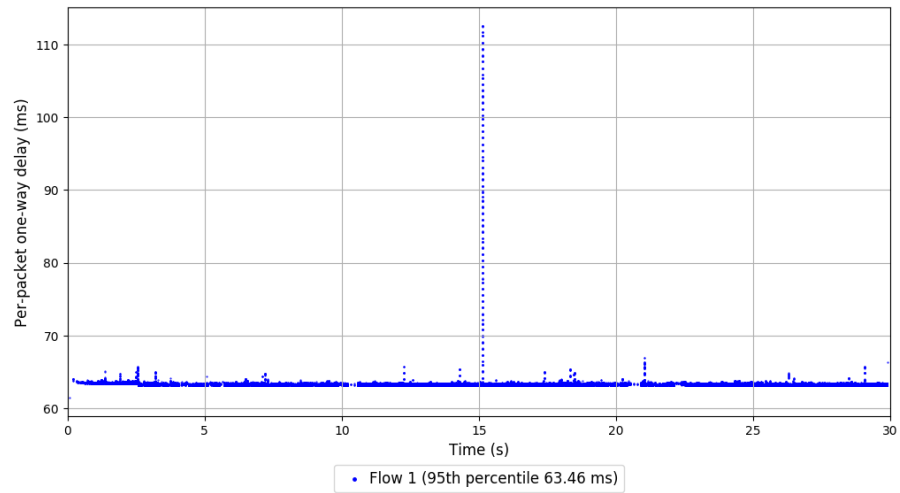
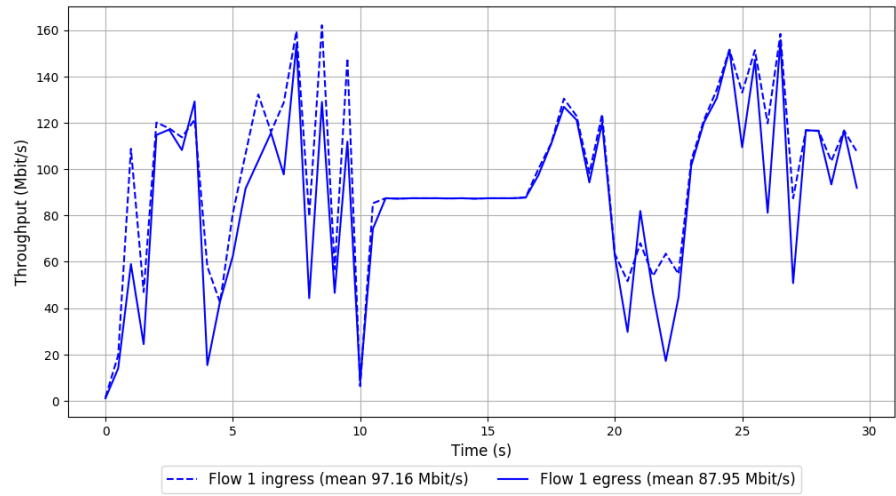
-- Flow 1:

Average throughput: 87.95 Mbit/s

95th percentile per-packet one-way delay: 63.462 ms

Loss rate: 9.86%

Run 10: Report of TCP BBR — Data Link



Run 1: Statistics of CalibratedKoho

Start at: 2017-08-17 04:31:40

End at: 2017-08-17 04:32:10

Below is generated by plot.py at 2017-08-17 08:45:36

Datalink statistics

-- Total of 1 flow:

Average throughput: 203.77 Mbit/s

95th percentile per-packet one-way delay: 74.390 ms

Loss rate: 10.13%

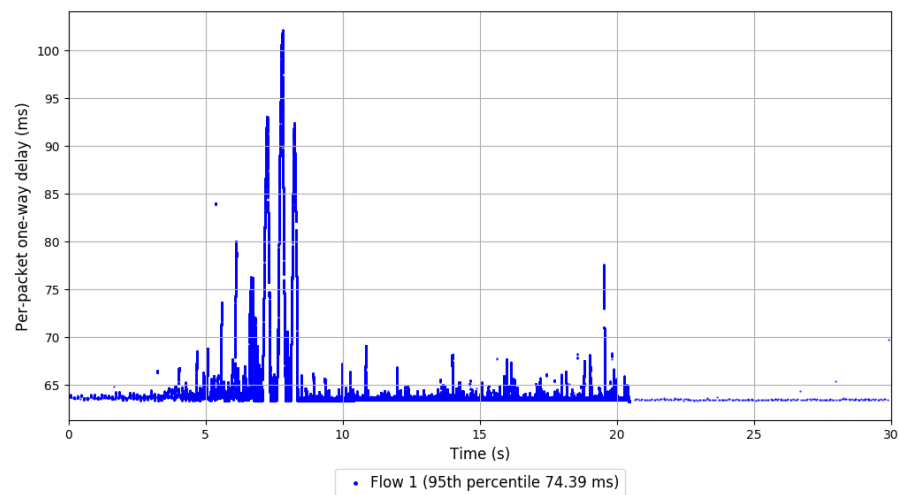
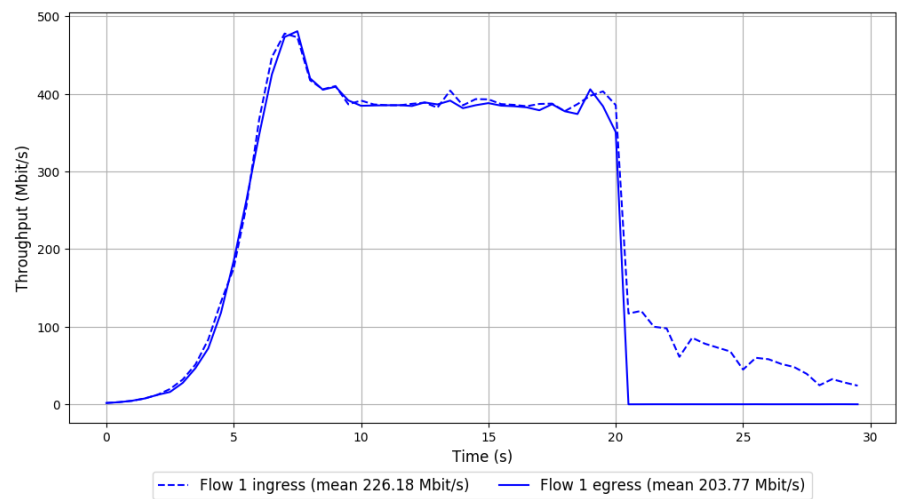
-- Flow 1:

Average throughput: 203.77 Mbit/s

95th percentile per-packet one-way delay: 74.390 ms

Loss rate: 10.13%

Run 1: Report of CalibratedKoho — Data Link



Run 2: Statistics of CalibratedKoho

Start at: 2017-08-17 04:42:04

End at: 2017-08-17 04:42:34

Below is generated by plot.py at 2017-08-17 08:45:36

Datalink statistics

-- Total of 1 flow:

Average throughput: 163.59 Mbit/s

95th percentile per-packet one-way delay: 74.668 ms

Loss rate: 13.18%

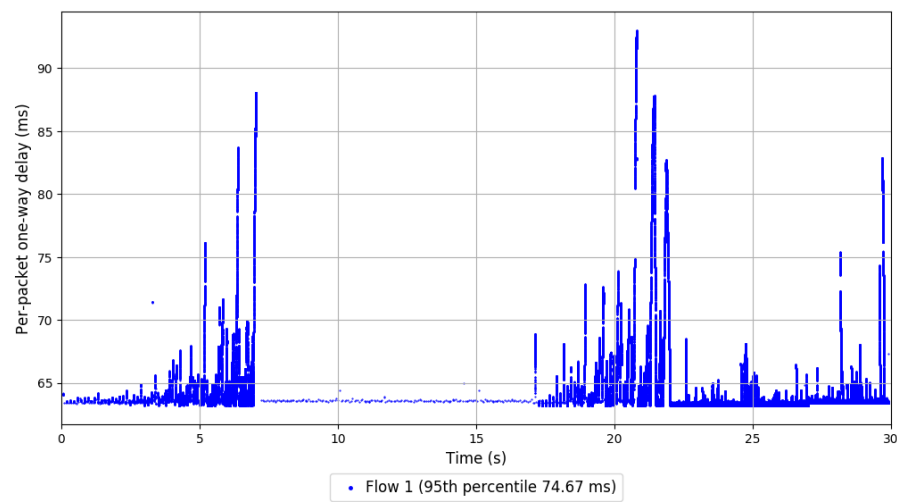
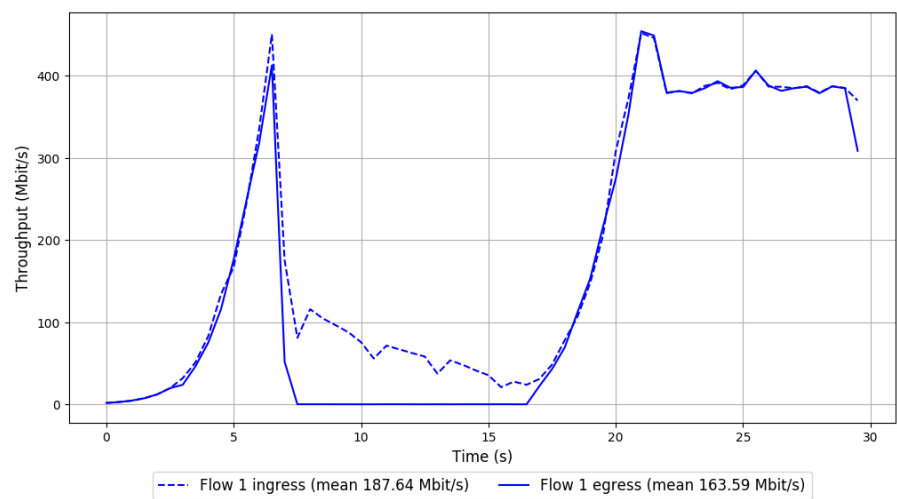
-- Flow 1:

Average throughput: 163.59 Mbit/s

95th percentile per-packet one-way delay: 74.668 ms

Loss rate: 13.18%

Run 2: Report of CalibratedKoho — Data Link



Run 3: Statistics of CalibratedKoho

Start at: 2017-08-17 04:52:34

End at: 2017-08-17 04:53:04

Below is generated by plot.py at 2017-08-17 08:46:17

Datalink statistics

-- Total of 1 flow:

Average throughput: 287.72 Mbit/s

95th percentile per-packet one-way delay: 68.268 ms

Loss rate: 4.04%

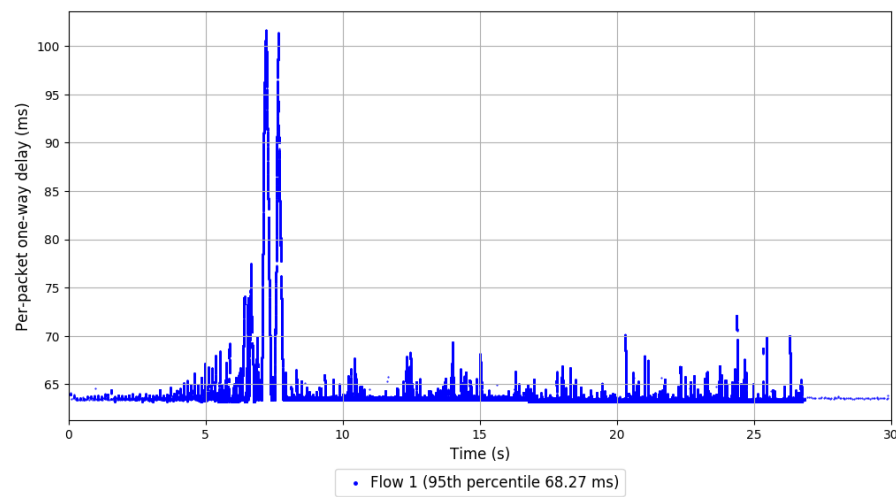
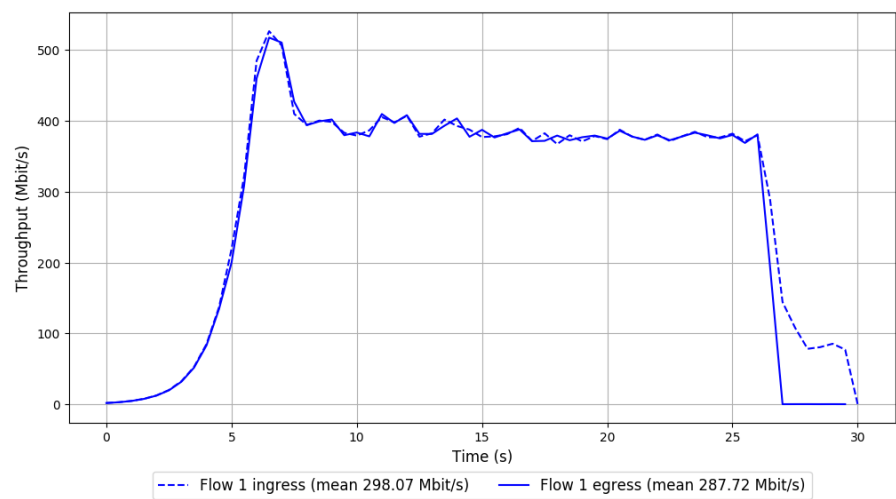
-- Flow 1:

Average throughput: 287.72 Mbit/s

95th percentile per-packet one-way delay: 68.268 ms

Loss rate: 4.04%

Run 3: Report of CalibratedKoho — Data Link



Run 4: Statistics of CalibratedKoho

Start at: 2017-08-17 05:02:52

End at: 2017-08-17 05:03:22

Below is generated by plot.py at 2017-08-17 08:46:17

Datalink statistics

-- Total of 1 flow:

Average throughput: 86.94 Mbit/s

95th percentile per-packet one-way delay: 71.095 ms

Loss rate: 20.71%

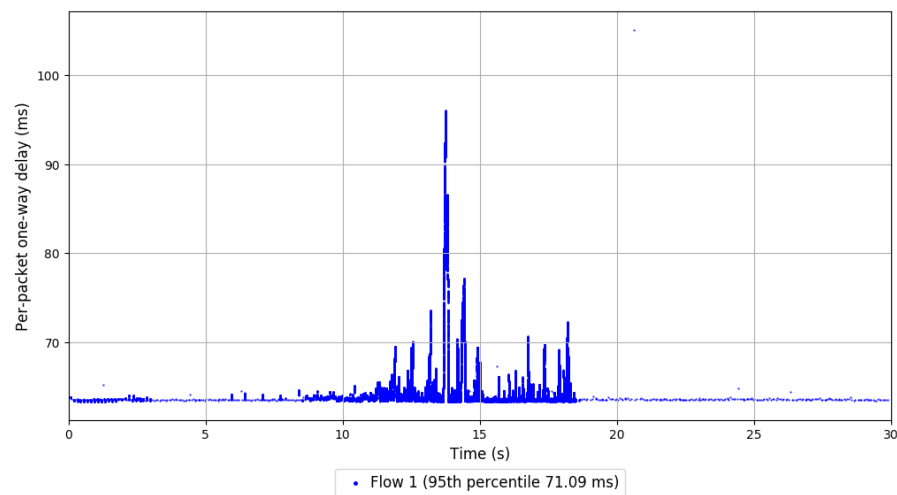
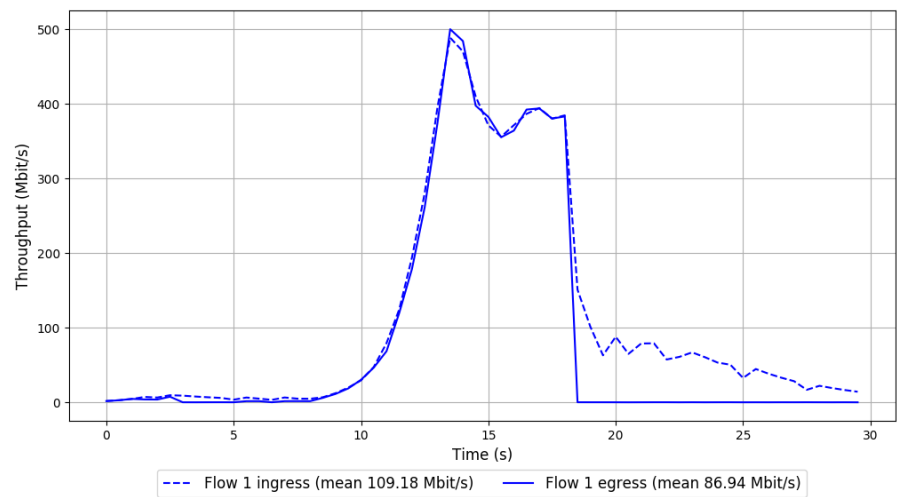
-- Flow 1:

Average throughput: 86.94 Mbit/s

95th percentile per-packet one-way delay: 71.095 ms

Loss rate: 20.71%

Run 4: Report of CalibratedKoho — Data Link



Run 5: Statistics of CalibratedKoho

Start at: 2017-08-17 05:13:07

End at: 2017-08-17 05:13:37

Below is generated by plot.py at 2017-08-17 08:46:54

Datalink statistics

-- Total of 1 flow:

Average throughput: 336.31 Mbit/s

95th percentile per-packet one-way delay: 67.369 ms

Loss rate: 0.62%

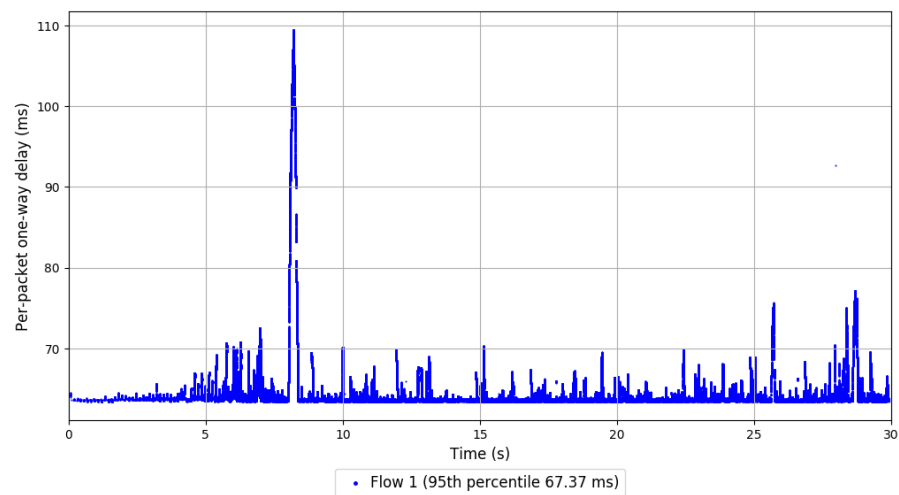
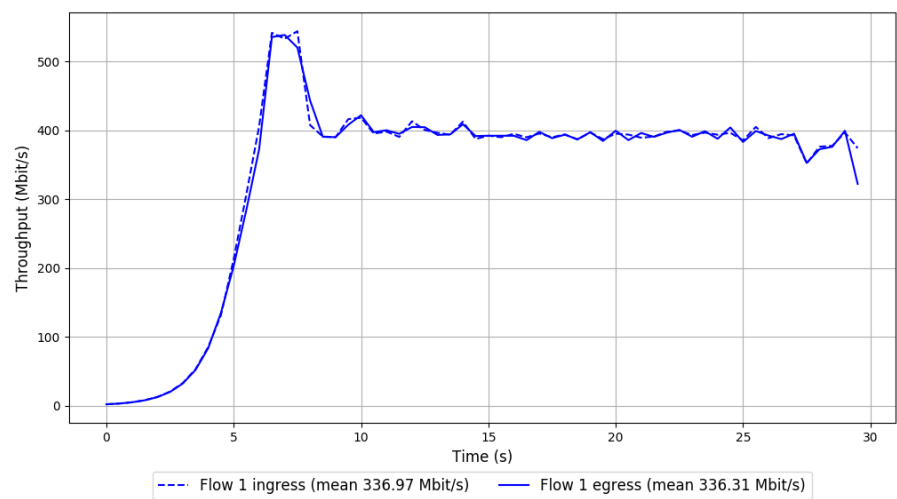
-- Flow 1:

Average throughput: 336.31 Mbit/s

95th percentile per-packet one-way delay: 67.369 ms

Loss rate: 0.62%

Run 5: Report of CalibratedKoho — Data Link



Run 6: Statistics of CalibratedKoho

Start at: 2017-08-17 05:23:39

End at: 2017-08-17 05:24:09

Below is generated by plot.py at 2017-08-17 08:46:54

Datalink statistics

-- Total of 1 flow:

Average throughput: 63.47 Mbit/s

95th percentile per-packet one-way delay: 84.147 ms

Loss rate: 5.93%

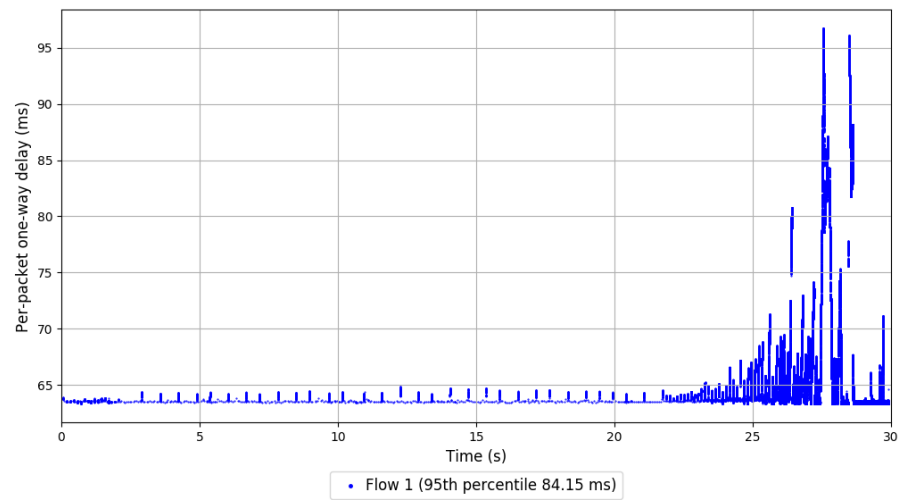
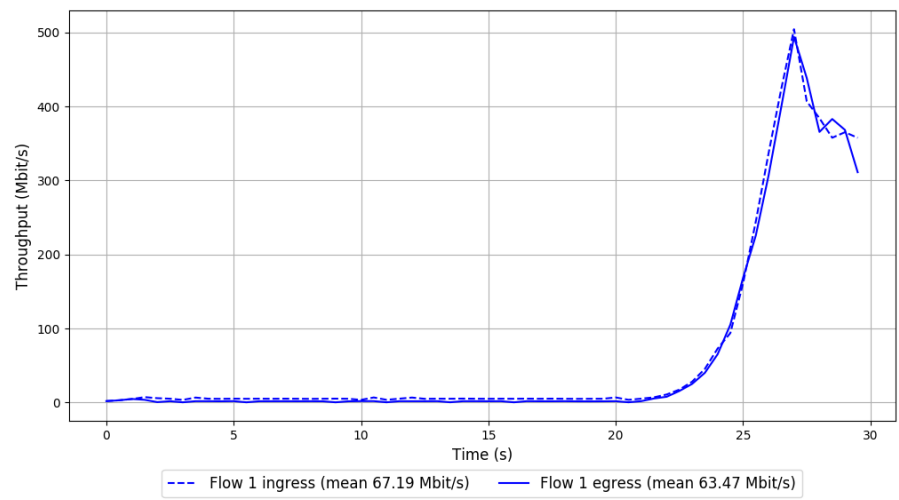
-- Flow 1:

Average throughput: 63.47 Mbit/s

95th percentile per-packet one-way delay: 84.147 ms

Loss rate: 5.93%

Run 6: Report of CalibratedKoho — Data Link



Run 7: Statistics of CalibratedKoho

Start at: 2017-08-17 05:34:05

End at: 2017-08-17 05:34:35

Below is generated by plot.py at 2017-08-17 08:46:54

Datalink statistics

-- Total of 1 flow:

Average throughput: 60.10 Mbit/s

95th percentile per-packet one-way delay: 84.025 ms

Loss rate: 27.91%

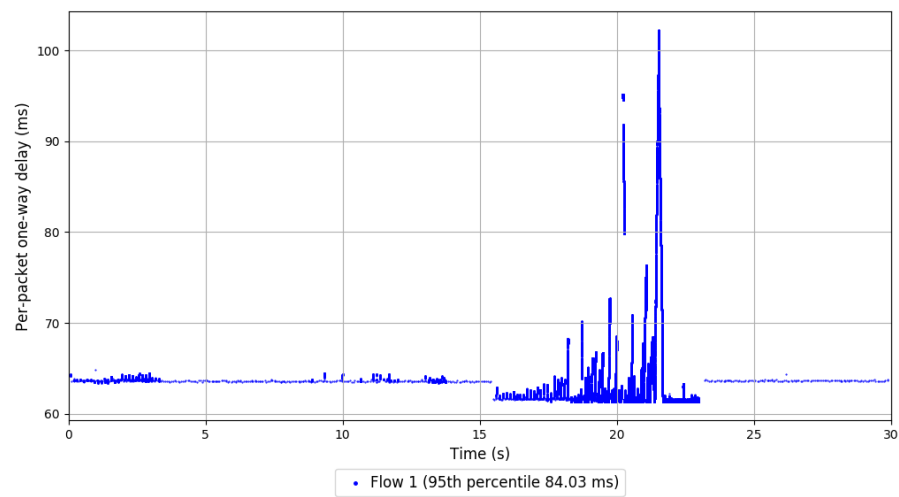
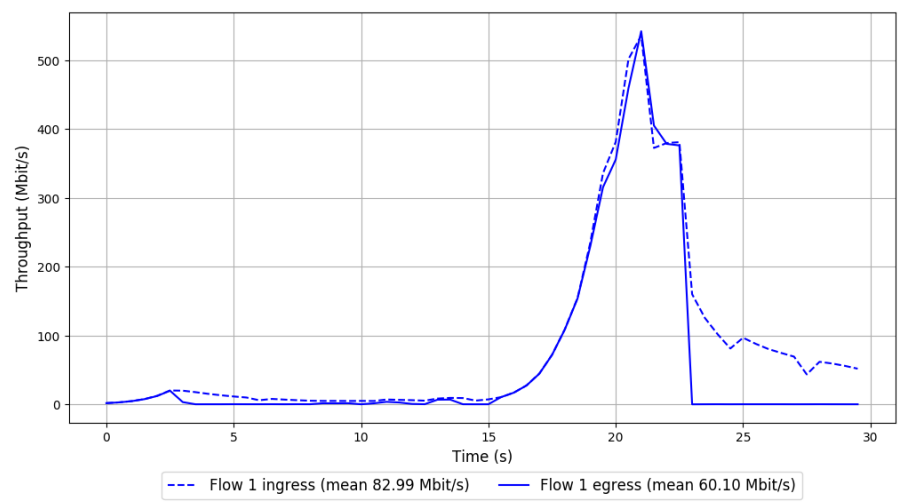
-- Flow 1:

Average throughput: 60.10 Mbit/s

95th percentile per-packet one-way delay: 84.025 ms

Loss rate: 27.91%

Run 7: Report of CalibratedKoho — Data Link



Run 8: Statistics of CalibratedKoho

Start at: 2017-08-17 05:44:19

End at: 2017-08-17 05:44:49

Below is generated by plot.py at 2017-08-17 08:47:40

Datalink statistics

-- Total of 1 flow:

Average throughput: 308.91 Mbit/s

95th percentile per-packet one-way delay: 68.969 ms

Loss rate: 0.61%

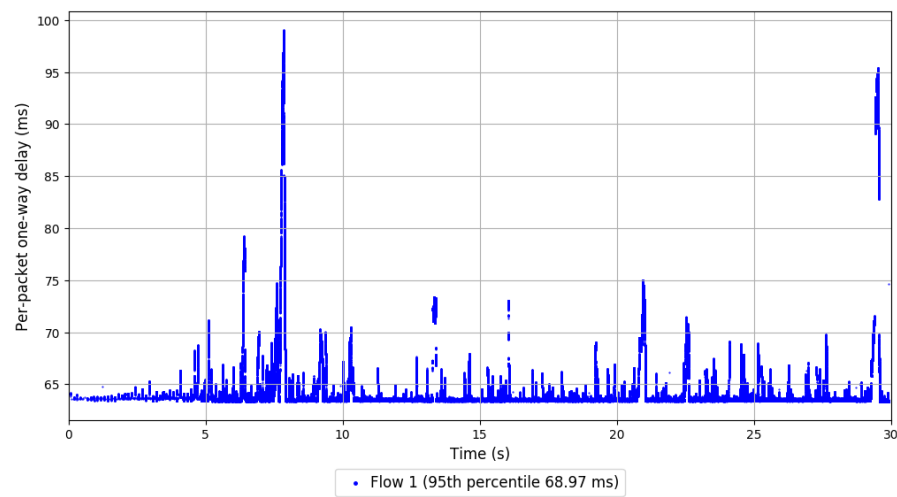
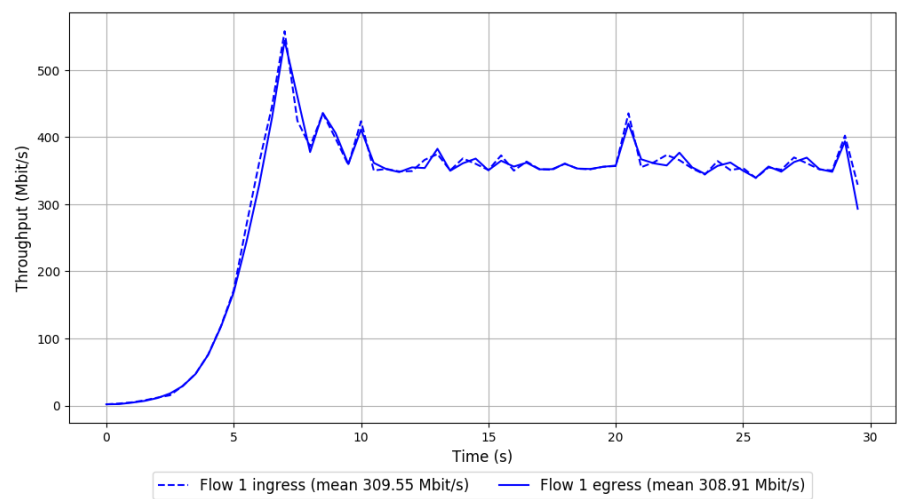
-- Flow 1:

Average throughput: 308.91 Mbit/s

95th percentile per-packet one-way delay: 68.969 ms

Loss rate: 0.61%

Run 8: Report of CalibratedKoho — Data Link



Run 9: Statistics of CalibratedKoho

Start at: 2017-08-17 05:54:55

End at: 2017-08-17 05:55:25

Below is generated by plot.py at 2017-08-17 08:47:40

Datalink statistics

-- Total of 1 flow:

Average throughput: 103.00 Mbit/s

95th percentile per-packet one-way delay: 72.749 ms

Loss rate: 22.32%

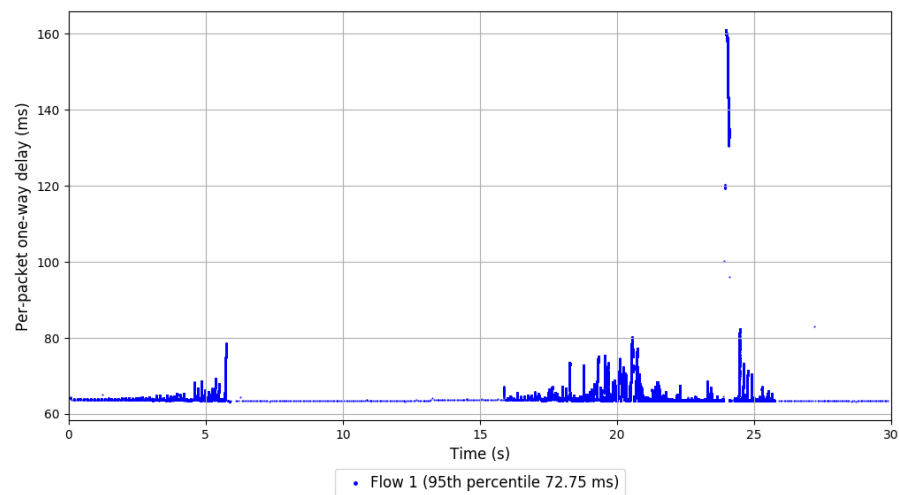
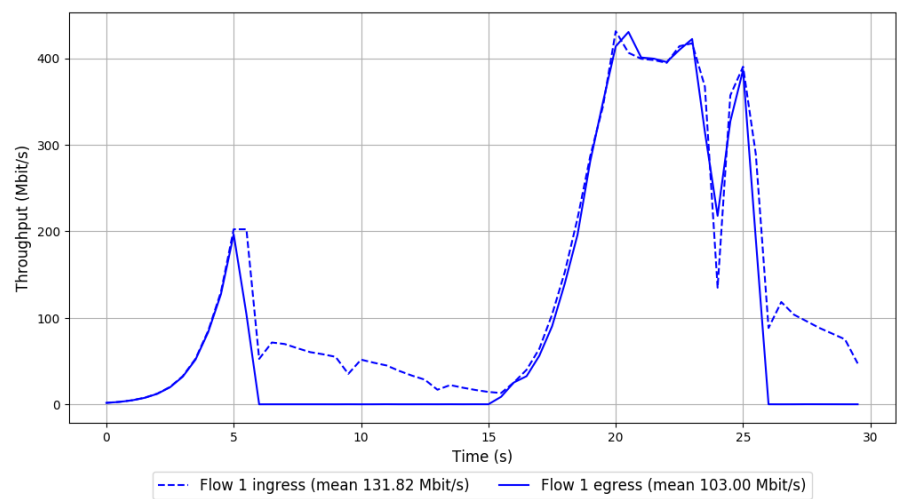
-- Flow 1:

Average throughput: 103.00 Mbit/s

95th percentile per-packet one-way delay: 72.749 ms

Loss rate: 22.32%

Run 9: Report of CalibratedKoho — Data Link



Run 10: Statistics of CalibratedKoho

Start at: 2017-08-17 06:05:47

End at: 2017-08-17 06:06:17

Below is generated by plot.py at 2017-08-17 08:47:40

Datalink statistics

-- Total of 1 flow:

Average throughput: 1.56 Mbit/s

95th percentile per-packet one-way delay: 64.424 ms

Loss rate: 69.54%

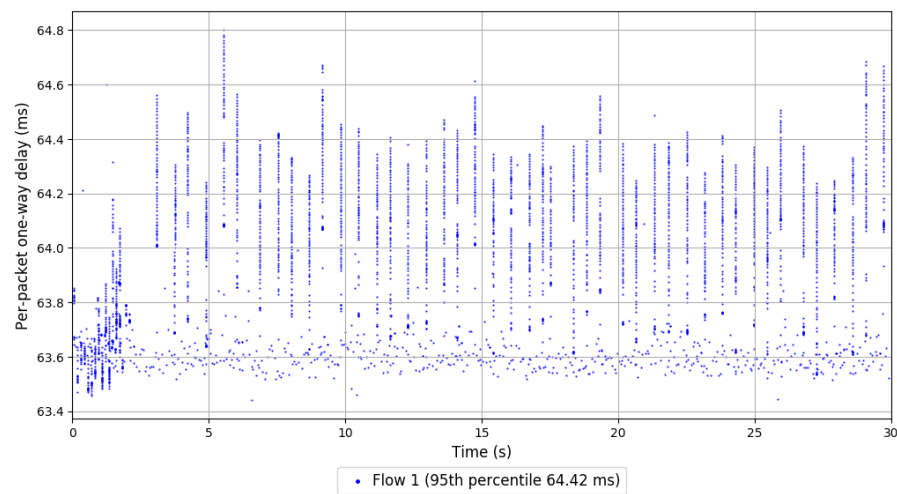
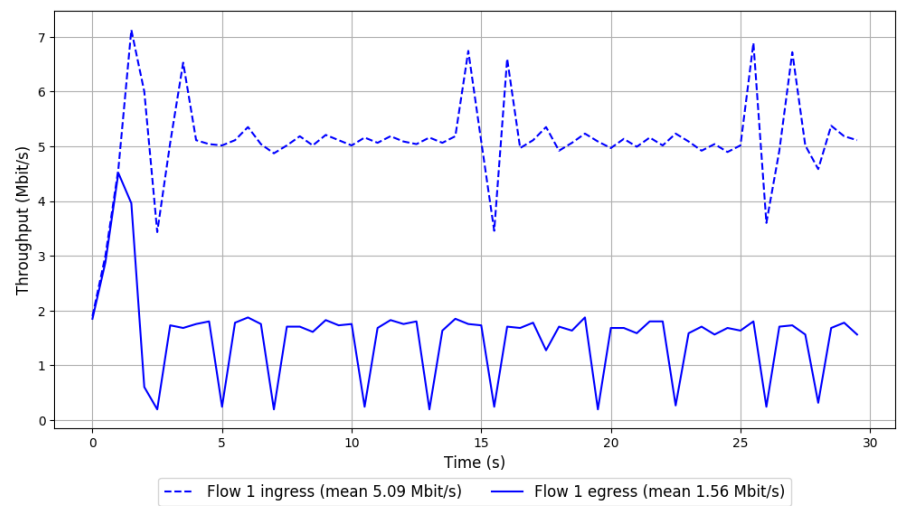
-- Flow 1:

Average throughput: 1.56 Mbit/s

95th percentile per-packet one-way delay: 64.424 ms

Loss rate: 69.54%

Run 10: Report of CalibratedKoho — Data Link

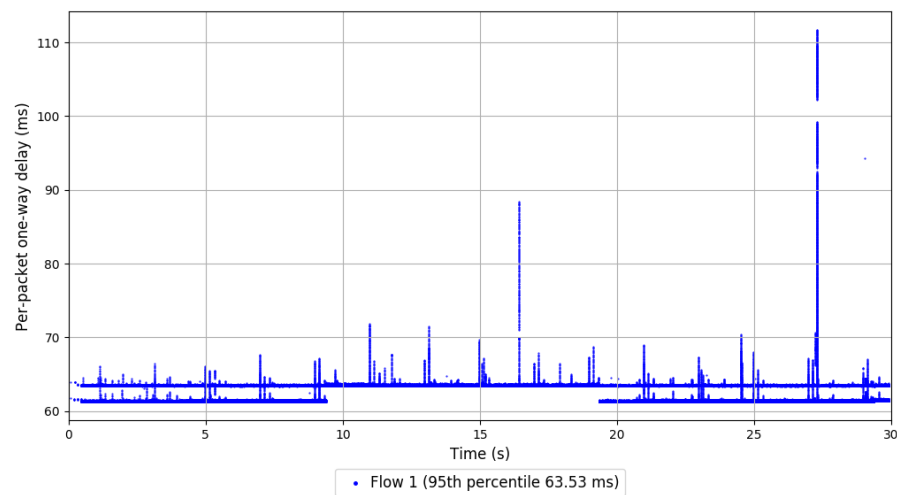
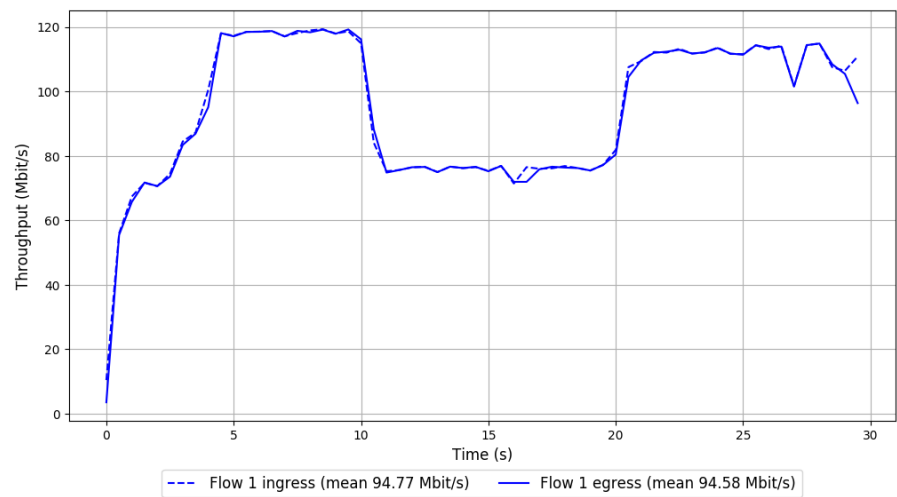


```
Run 1: Statistics of Copa

Start at: 2017-08-17 04:33:11
End at: 2017-08-17 04:33:41

# Below is generated by plot.py at 2017-08-17 08:47:45
# Datalink statistics
-- Total of 1 flow:
Average throughput: 94.58 Mbit/s
95th percentile per-packet one-way delay: 63.528 ms
Loss rate: 0.62%
-- Flow 1:
Average throughput: 94.58 Mbit/s
95th percentile per-packet one-way delay: 63.528 ms
Loss rate: 0.62%
```


Run 1: Report of Copa — Data Link



Run 2: Statistics of Copa

Start at: 2017-08-17 04:43:31

End at: 2017-08-17 04:44:01

Below is generated by plot.py at 2017-08-17 08:48:12

Datalink statistics

-- Total of 1 flow:

Average throughput: 98.24 Mbit/s

95th percentile per-packet one-way delay: 63.587 ms

Loss rate: 0.35%

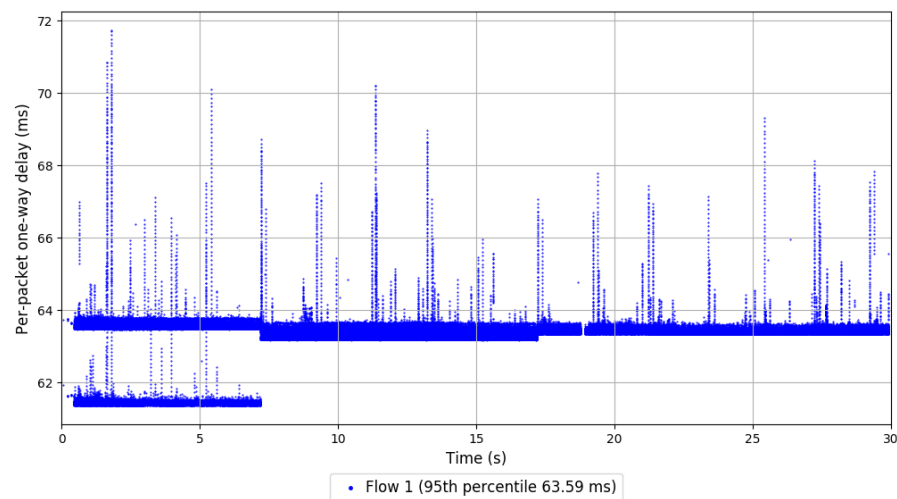
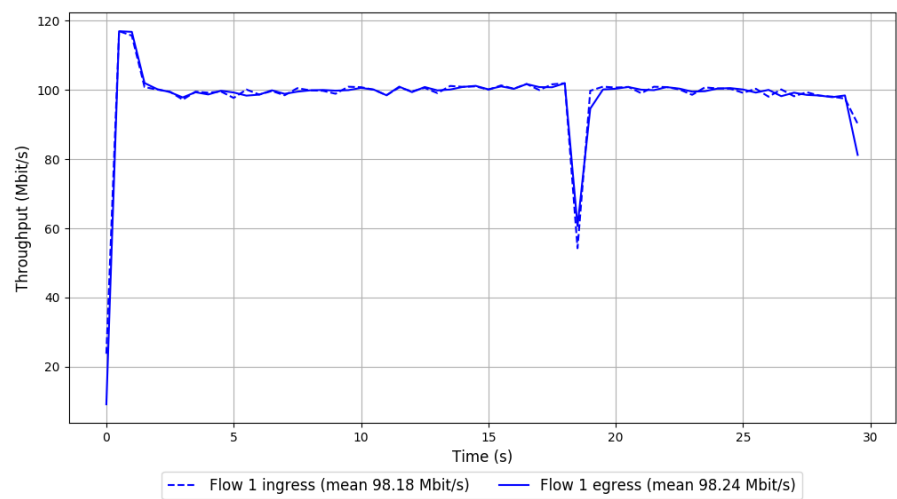
-- Flow 1:

Average throughput: 98.24 Mbit/s

95th percentile per-packet one-way delay: 63.587 ms

Loss rate: 0.35%

Run 2: Report of Copa — Data Link



Run 3: Statistics of Copa

Start at: 2017-08-17 04:54:10

End at: 2017-08-17 04:54:40

Below is generated by plot.py at 2017-08-17 08:48:18

Datalink statistics

-- Total of 1 flow:

Average throughput: 98.98 Mbit/s

95th percentile per-packet one-way delay: 63.623 ms

Loss rate: 0.29%

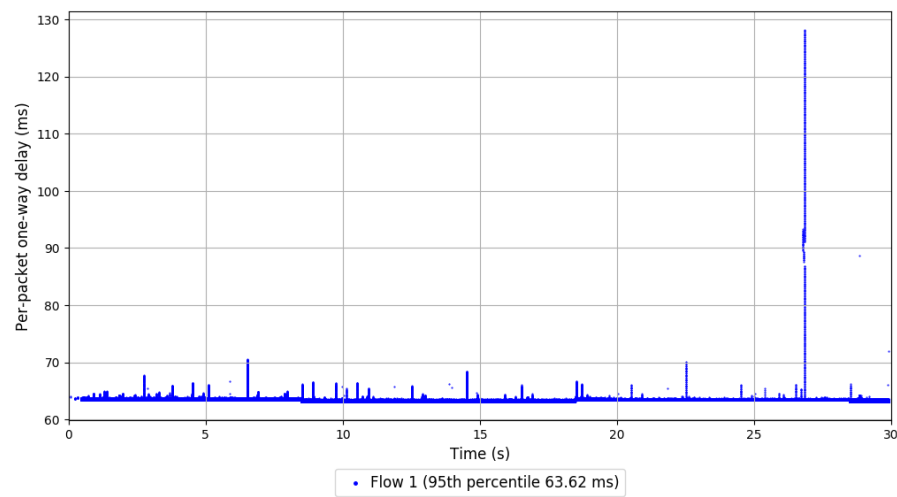
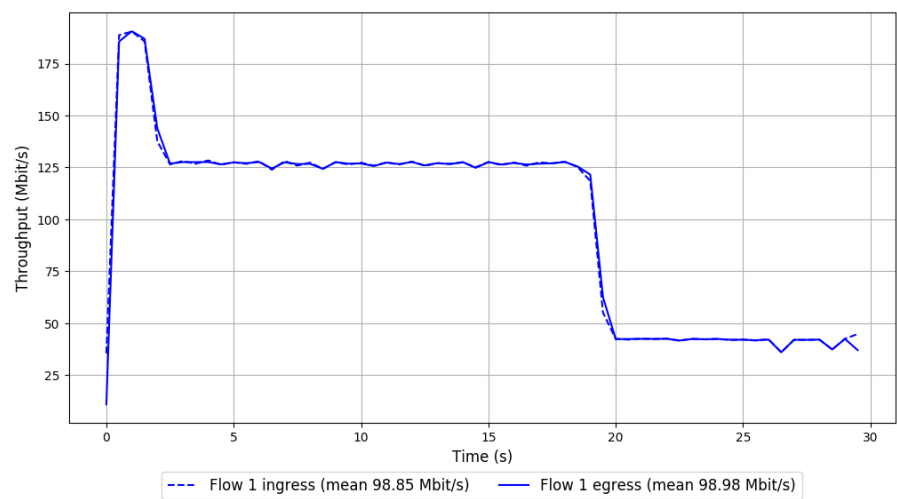
-- Flow 1:

Average throughput: 98.98 Mbit/s

95th percentile per-packet one-way delay: 63.623 ms

Loss rate: 0.29%

Run 3: Report of Copa — Data Link



Run 4: Statistics of Copa

Start at: 2017-08-17 05:04:14

End at: 2017-08-17 05:04:44

Below is generated by plot.py at 2017-08-17 08:48:34

Datalink statistics

-- Total of 1 flow:

Average throughput: 82.90 Mbit/s

95th percentile per-packet one-way delay: 63.467 ms

Loss rate: 0.03%

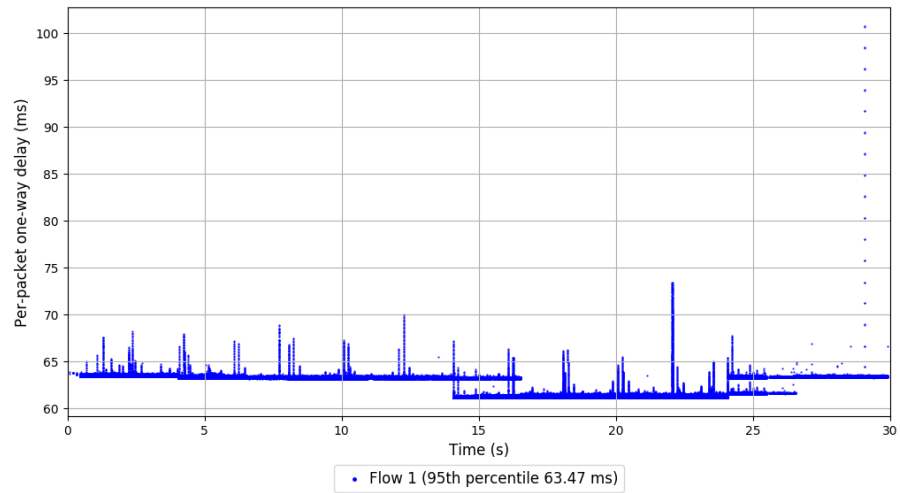
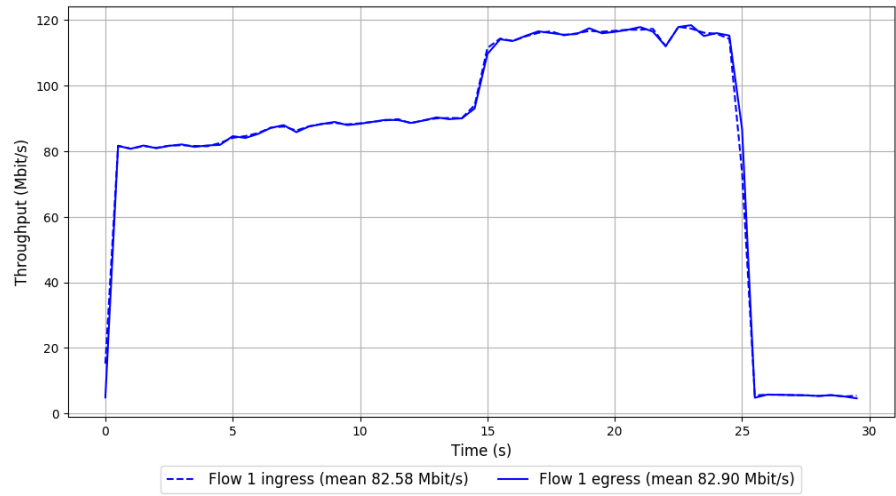
-- Flow 1:

Average throughput: 82.90 Mbit/s

95th percentile per-packet one-way delay: 63.467 ms

Loss rate: 0.03%

Run 4: Report of Copa — Data Link



Run 5: Statistics of Copa

Start at: 2017-08-17 05:14:47

End at: 2017-08-17 05:15:17

Below is generated by plot.py at 2017-08-17 08:49:05

Datalink statistics

-- Total of 1 flow:

Average throughput: 141.27 Mbit/s

95th percentile per-packet one-way delay: 63.464 ms

Loss rate: 0.57%

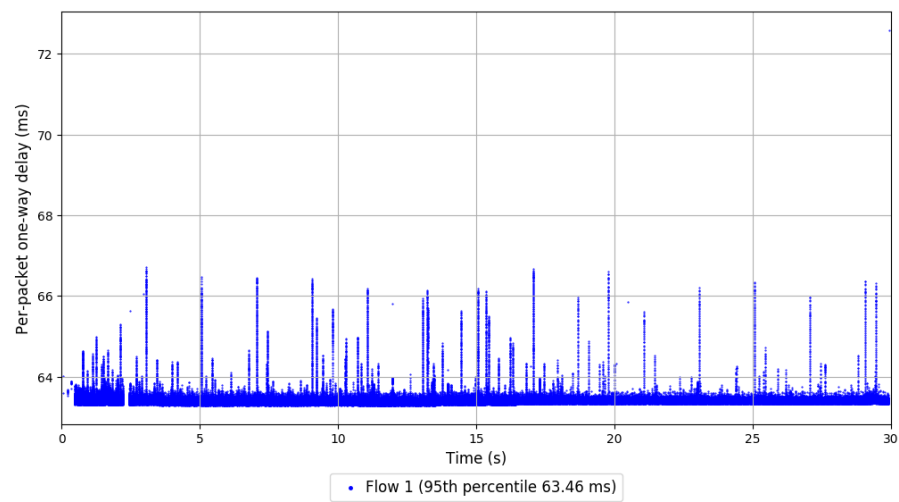
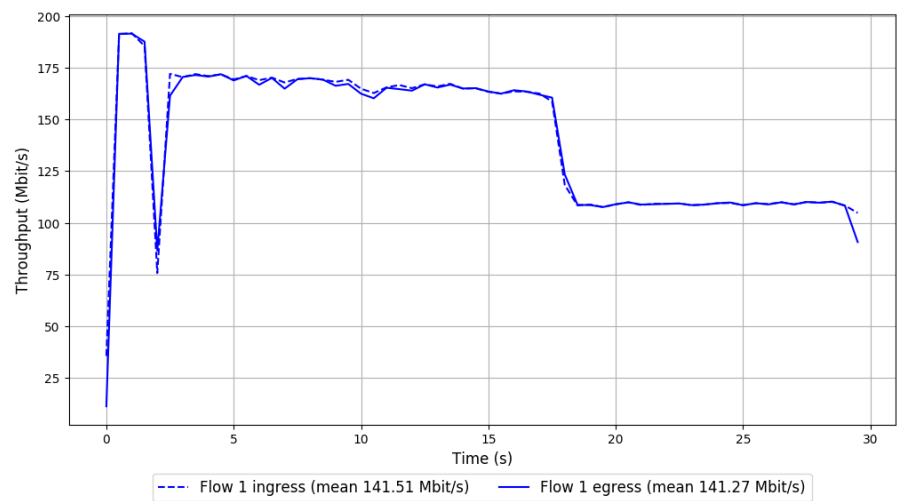
-- Flow 1:

Average throughput: 141.27 Mbit/s

95th percentile per-packet one-way delay: 63.464 ms

Loss rate: 0.57%

Run 5: Report of Copa — Data Link



Run 6: Statistics of Copa

Start at: 2017-08-17 05:25:00

End at: 2017-08-17 05:25:31

Below is generated by plot.py at 2017-08-17 08:49:05

Datalink statistics

-- Total of 1 flow:

Average throughput: 42.90 Mbit/s

95th percentile per-packet one-way delay: 63.544 ms

Loss rate: 62.68%

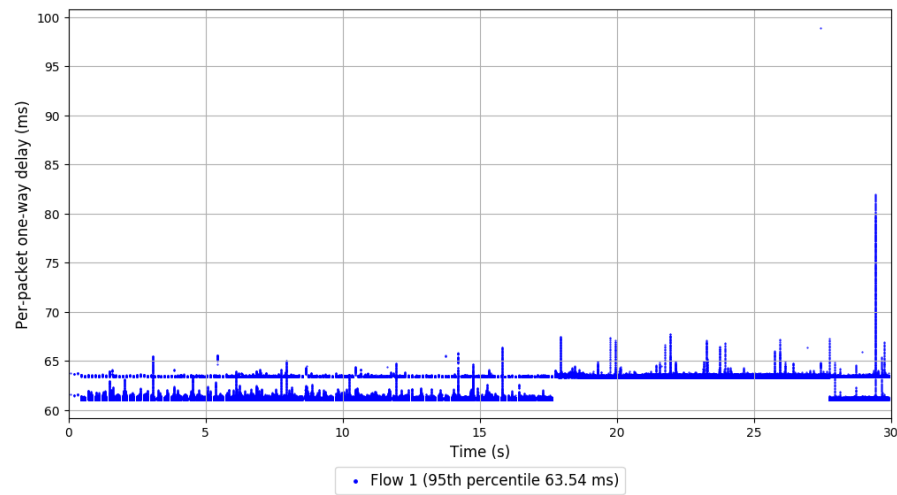
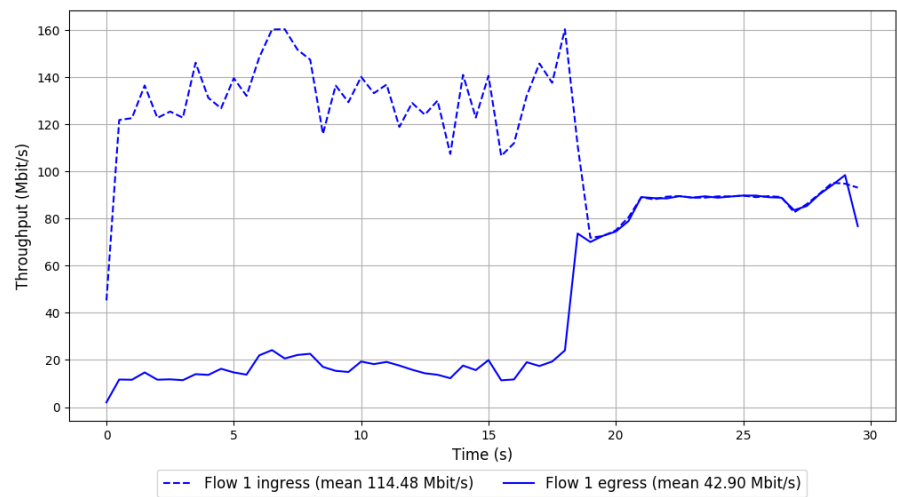
-- Flow 1:

Average throughput: 42.90 Mbit/s

95th percentile per-packet one-way delay: 63.544 ms

Loss rate: 62.68%

Run 6: Report of Copa — Data Link



Run 7: Statistics of Copa

Start at: 2017-08-17 05:35:25

End at: 2017-08-17 05:35:55

Below is generated by plot.py at 2017-08-17 08:49:41

Datalink statistics

-- Total of 1 flow:

Average throughput: 109.46 Mbit/s

95th percentile per-packet one-way delay: 63.528 ms

Loss rate: 0.35%

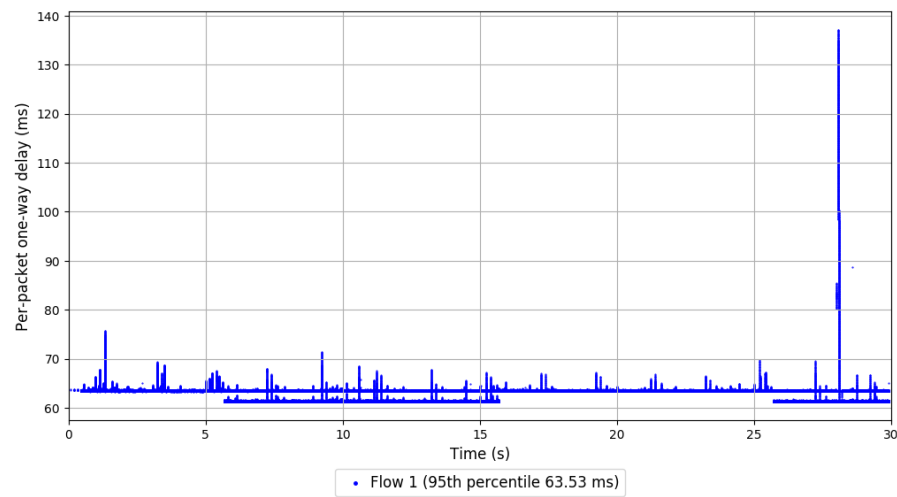
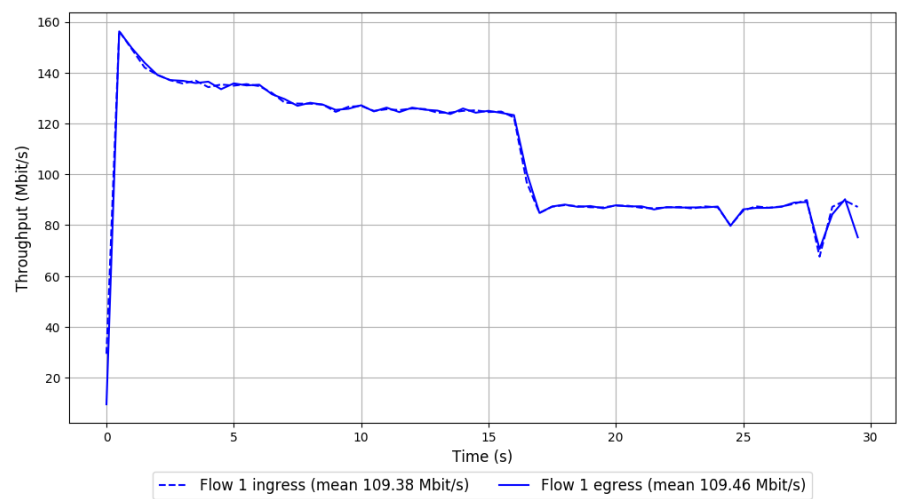
-- Flow 1:

Average throughput: 109.46 Mbit/s

95th percentile per-packet one-way delay: 63.528 ms

Loss rate: 0.35%

Run 7: Report of Copa — Data Link



Run 8: Statistics of Copa

Start at: 2017-08-17 05:45:55

End at: 2017-08-17 05:46:25

Below is generated by plot.py at 2017-08-17 08:49:45

Datalink statistics

-- Total of 1 flow:

Average throughput: 129.45 Mbit/s

95th percentile per-packet one-way delay: 103.287 ms

Loss rate: 0.34%

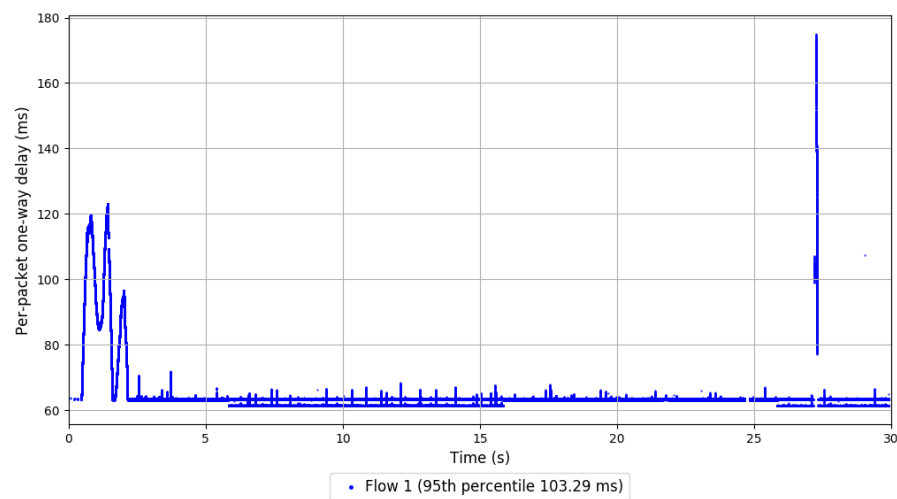
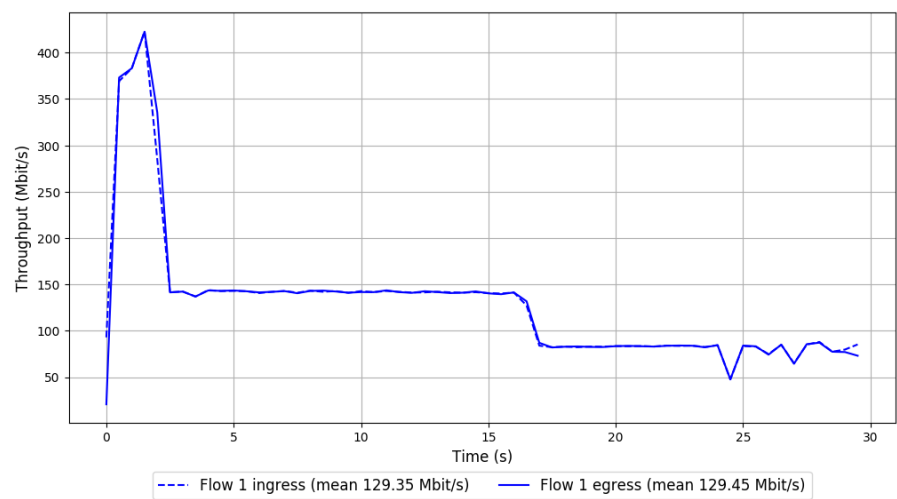
-- Flow 1:

Average throughput: 129.45 Mbit/s

95th percentile per-packet one-way delay: 103.287 ms

Loss rate: 0.34%

Run 8: Report of Copa — Data Link



Run 9: Statistics of Copa

Start at: 2017-08-17 05:56:19

End at: 2017-08-17 05:56:49

Below is generated by plot.py at 2017-08-17 08:50:20

Datalink statistics

-- Total of 1 flow:

Average throughput: 124.67 Mbit/s

95th percentile per-packet one-way delay: 63.428 ms

Loss rate: 0.37%

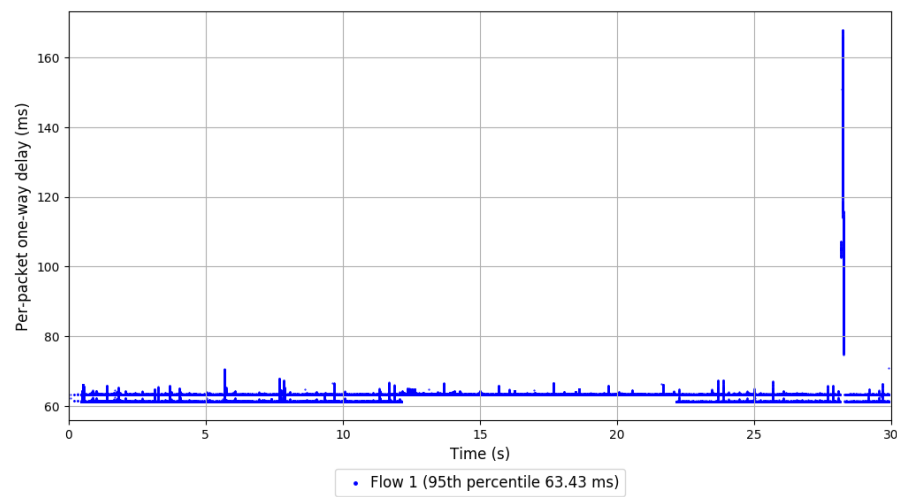
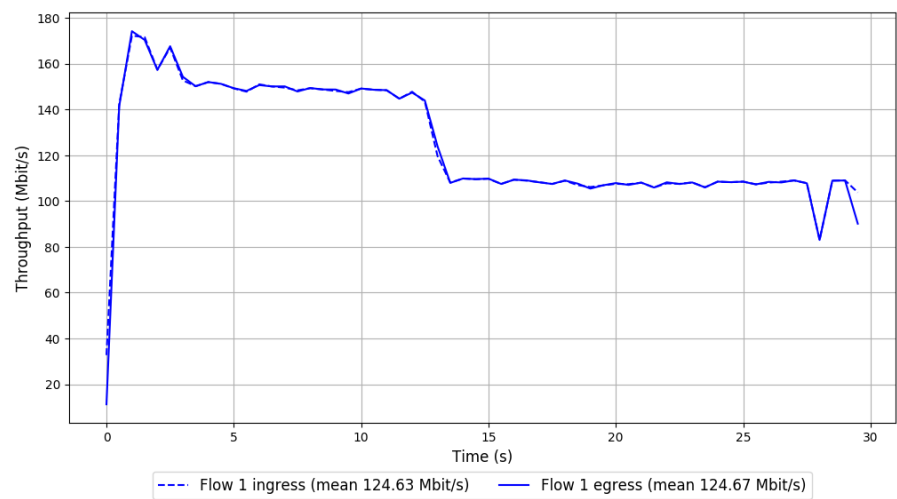
-- Flow 1:

Average throughput: 124.67 Mbit/s

95th percentile per-packet one-way delay: 63.428 ms

Loss rate: 0.37%

Run 9: Report of Copa — Data Link



Run 10: Statistics of Copa

Start at: 2017-08-17 06:07:04

End at: 2017-08-17 06:07:34

Below is generated by plot.py at 2017-08-17 08:50:20

Datalink statistics

-- Total of 1 flow:

Average throughput: 67.27 Mbit/s

95th percentile per-packet one-way delay: 63.598 ms

Loss rate: 0.36%

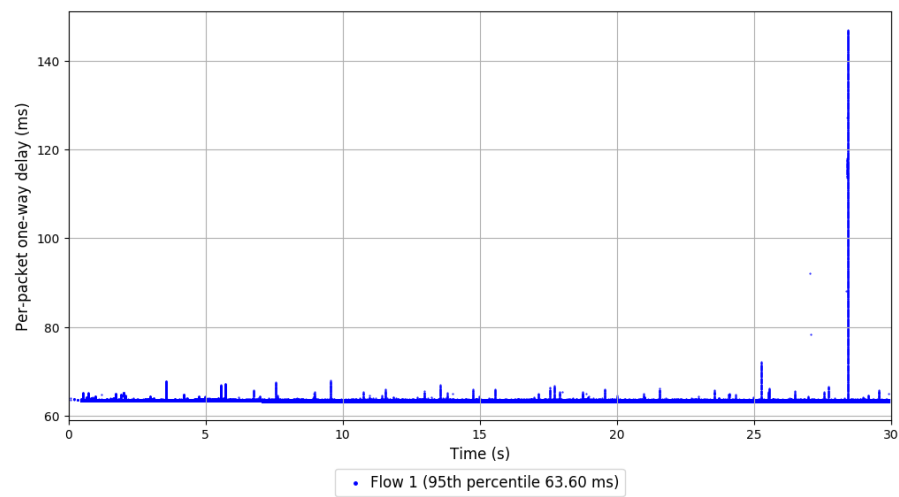
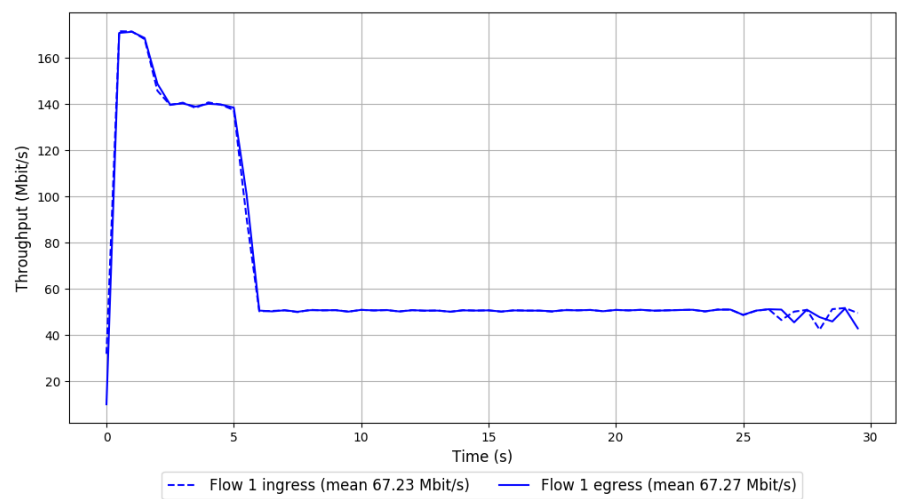
-- Flow 1:

Average throughput: 67.27 Mbit/s

95th percentile per-packet one-way delay: 63.598 ms

Loss rate: 0.36%

Run 10: Report of Copa — Data Link



Run 1: Statistics of TCP Cubic

Start at: 2017-08-17 04:35:24

End at: 2017-08-17 04:35:54

Below is generated by plot.py at 2017-08-17 08:50:22

Datalink statistics

-- Total of 1 flow:

Average throughput: 66.95 Mbit/s

95th percentile per-packet one-way delay: 64.777 ms

Loss rate: 0.55%

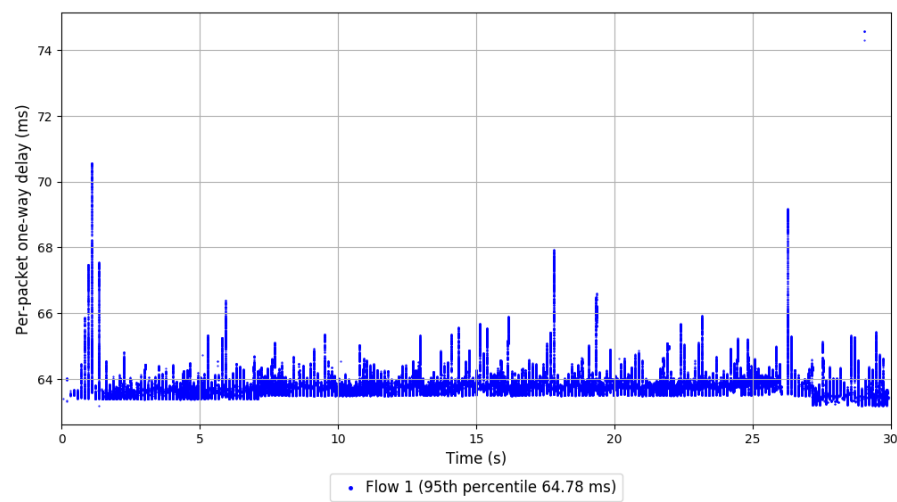
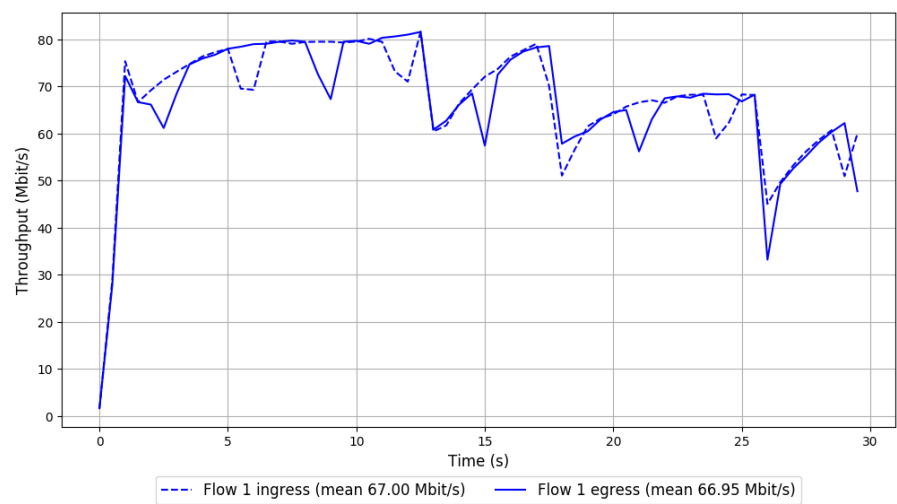
-- Flow 1:

Average throughput: 66.95 Mbit/s

95th percentile per-packet one-way delay: 64.777 ms

Loss rate: 0.55%

Run 1: Report of TCP Cubic — Data Link



Run 2: Statistics of TCP Cubic

Start at: 2017-08-17 04:45:43

End at: 2017-08-17 04:46:13

Below is generated by plot.py at 2017-08-17 08:50:22

Datalink statistics

-- Total of 1 flow:

Average throughput: 8.02 Mbit/s

95th percentile per-packet one-way delay: 64.385 ms

Loss rate: 5.68%

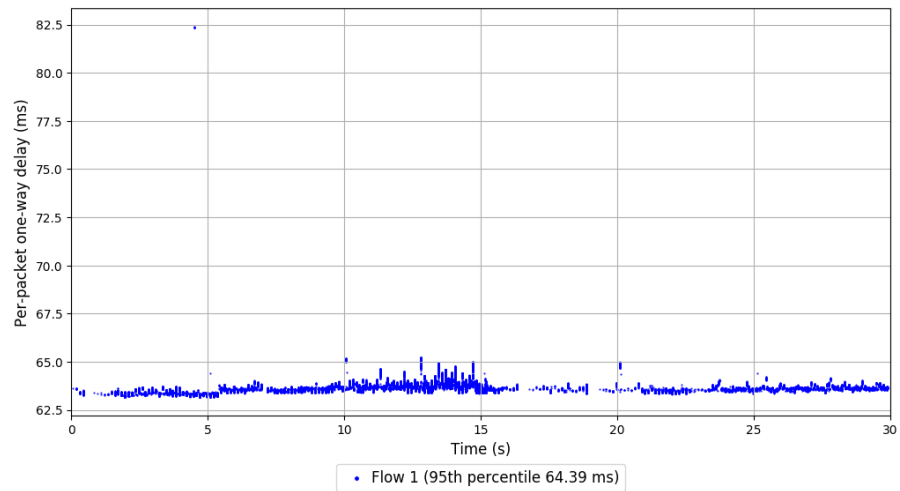
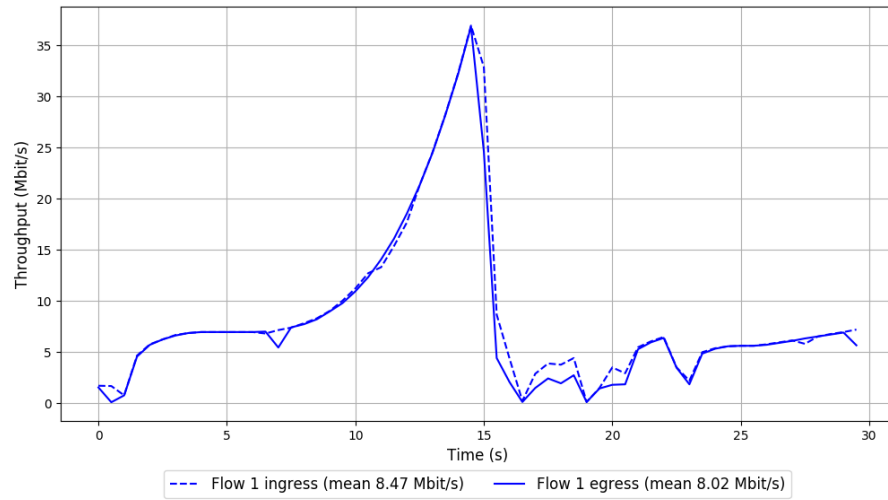
-- Flow 1:

Average throughput: 8.02 Mbit/s

95th percentile per-packet one-way delay: 64.385 ms

Loss rate: 5.68%

Run 2: Report of TCP Cubic — Data Link



Run 3: Statistics of TCP Cubic

Start at: 2017-08-17 04:56:21

End at: 2017-08-17 04:56:51

Below is generated by plot.py at 2017-08-17 08:50:24

Datalink statistics

-- Total of 1 flow:

Average throughput: 7.12 Mbit/s

95th percentile per-packet one-way delay: 63.726 ms

Loss rate: 2.83%

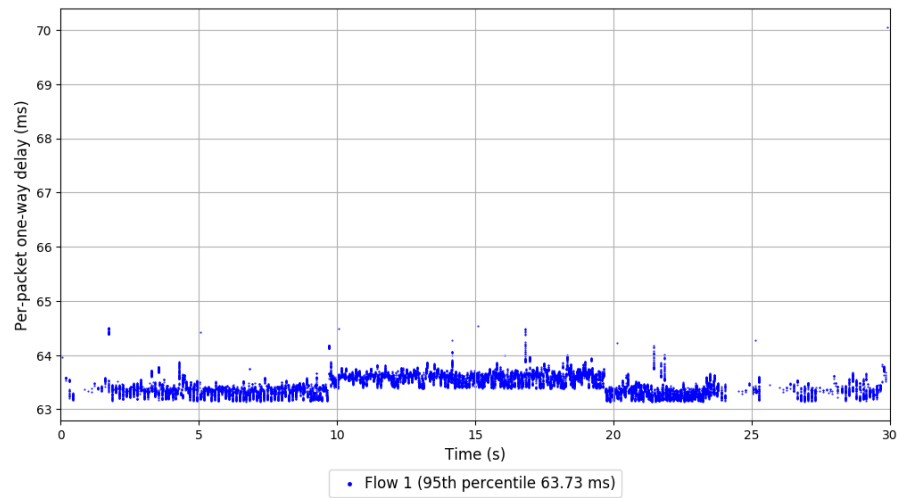
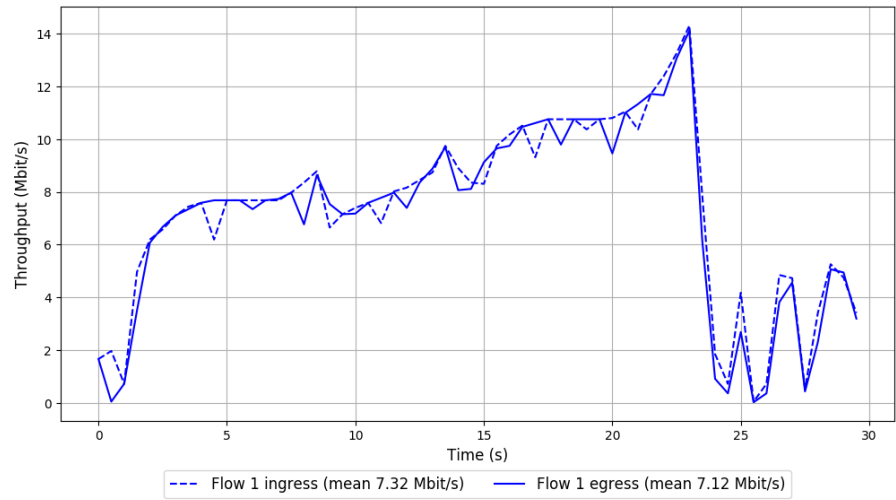
-- Flow 1:

Average throughput: 7.12 Mbit/s

95th percentile per-packet one-way delay: 63.726 ms

Loss rate: 2.83%

Run 3: Report of TCP Cubic — Data Link



Run 4: Statistics of TCP Cubic

Start at: 2017-08-17 05:06:23

End at: 2017-08-17 05:06:53

Below is generated by plot.py at 2017-08-17 08:50:30

Datalink statistics

-- Total of 1 flow:

Average throughput: 25.31 Mbit/s

95th percentile per-packet one-way delay: 64.786 ms

Loss rate: 5.36%

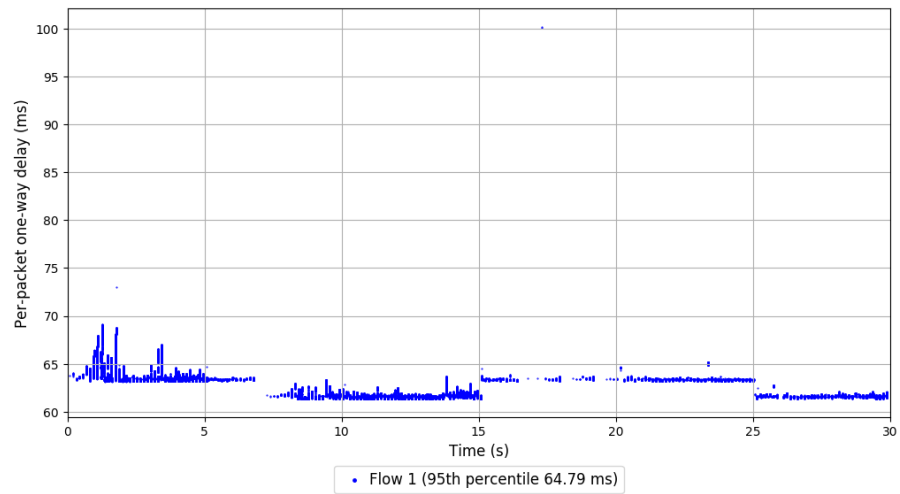
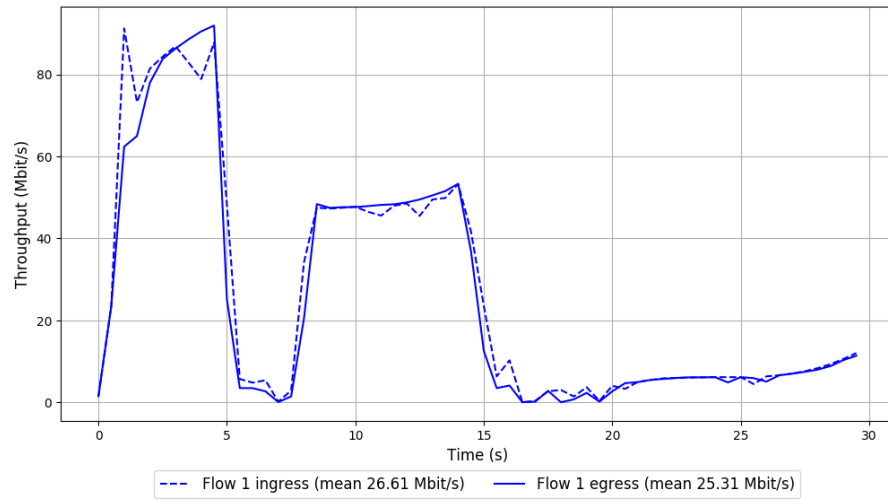
-- Flow 1:

Average throughput: 25.31 Mbit/s

95th percentile per-packet one-way delay: 64.786 ms

Loss rate: 5.36%

Run 4: Report of TCP Cubic — Data Link



Run 5: Statistics of TCP Cubic

Start at: 2017-08-17 05:17:02

End at: 2017-08-17 05:17:32

Below is generated by plot.py at 2017-08-17 08:50:31

Datalink statistics

-- Total of 1 flow:

Average throughput: 38.55 Mbit/s

95th percentile per-packet one-way delay: 62.905 ms

Loss rate: 1.20%

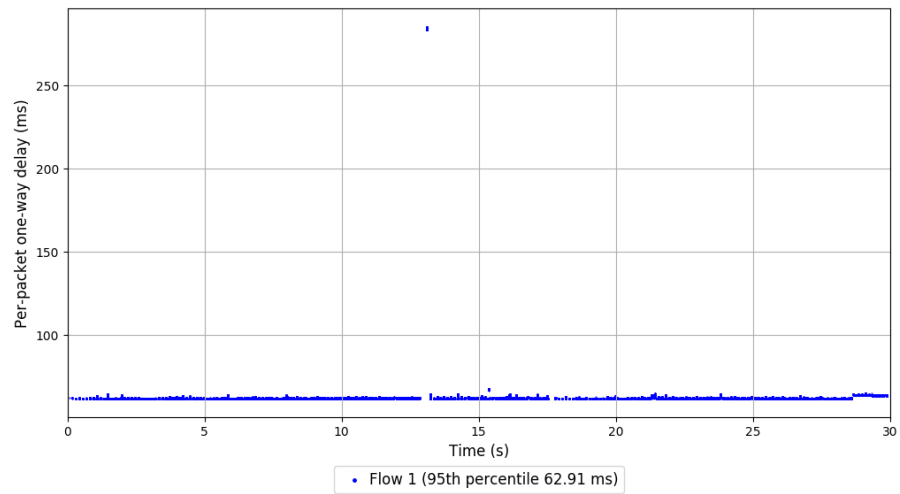
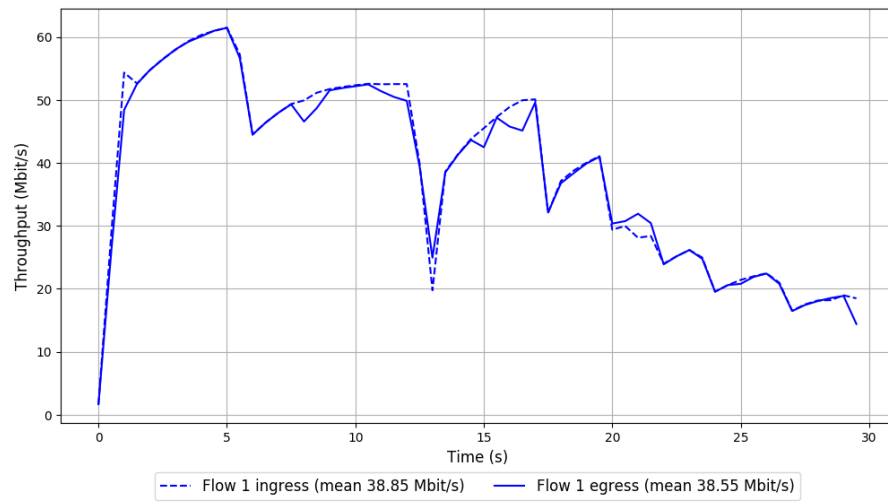
-- Flow 1:

Average throughput: 38.55 Mbit/s

95th percentile per-packet one-way delay: 62.905 ms

Loss rate: 1.20%

Run 5: Report of TCP Cubic — Data Link



Run 6: Statistics of TCP Cubic

Start at: 2017-08-17 05:27:09

End at: 2017-08-17 05:27:39

Below is generated by plot.py at 2017-08-17 08:50:45

Datalink statistics

-- Total of 1 flow:

Average throughput: 65.38 Mbit/s

95th percentile per-packet one-way delay: 64.665 ms

Loss rate: 1.19%

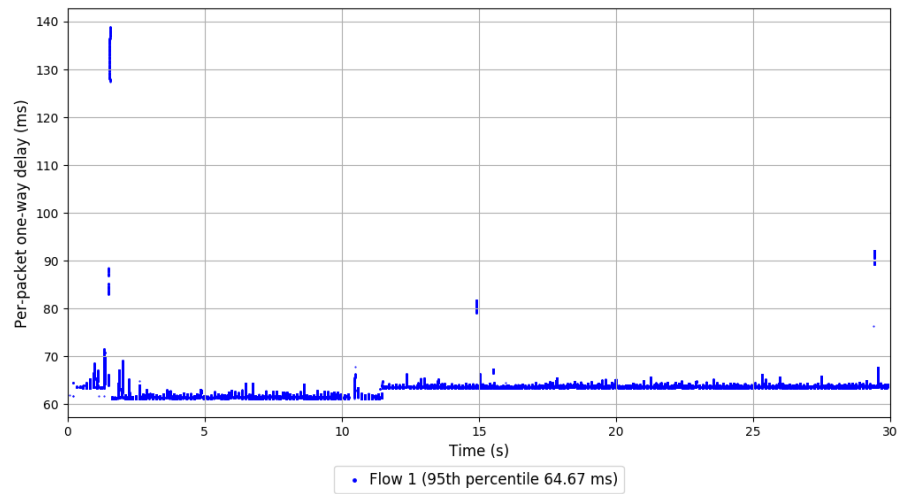
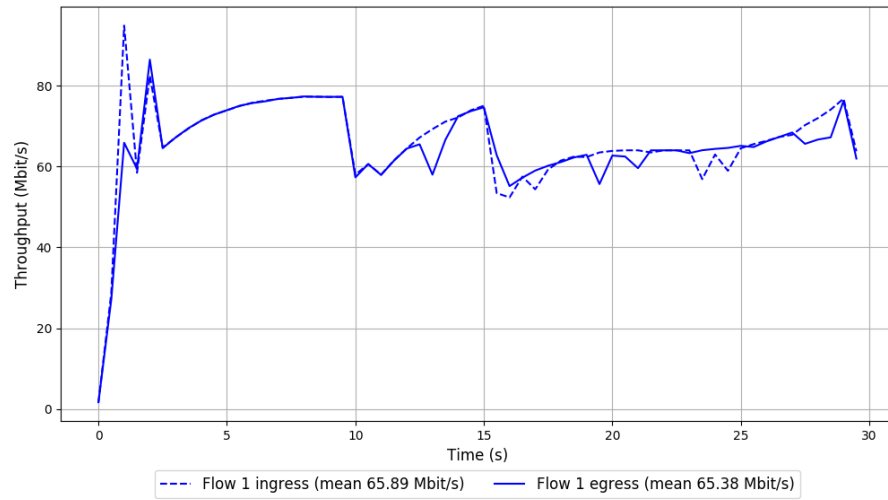
-- Flow 1:

Average throughput: 65.38 Mbit/s

95th percentile per-packet one-way delay: 64.665 ms

Loss rate: 1.19%

Run 6: Report of TCP Cubic — Data Link



Run 7: Statistics of TCP Cubic

Start at: 2017-08-17 05:37:41

End at: 2017-08-17 05:38:11

Below is generated by plot.py at 2017-08-17 08:50:45

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.94 Mbit/s

95th percentile per-packet one-way delay: 63.889 ms

Loss rate: 3.08%

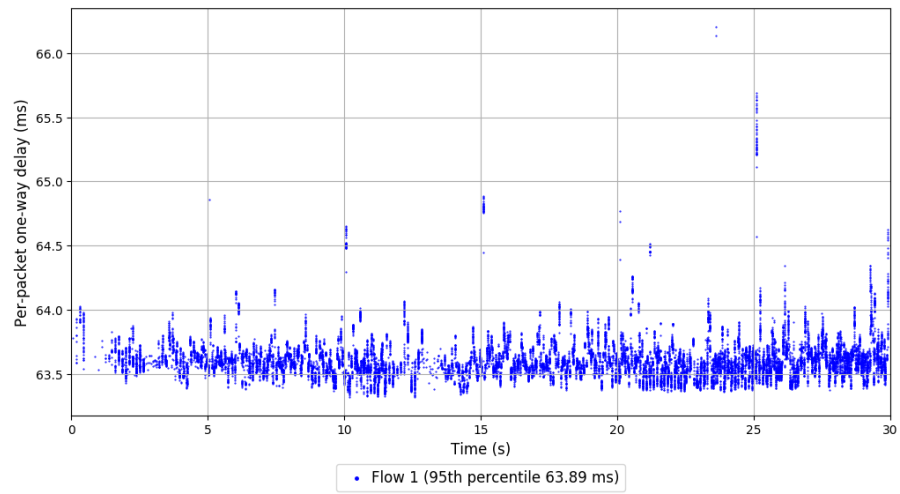
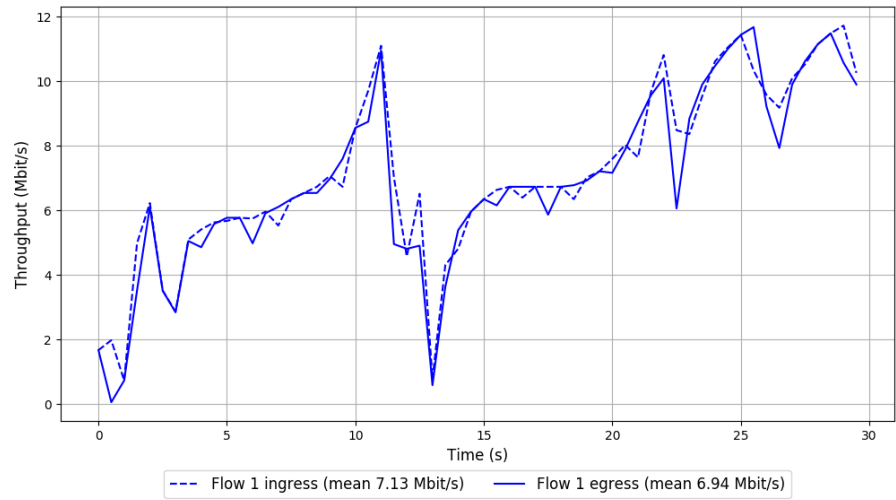
-- Flow 1:

Average throughput: 6.94 Mbit/s

95th percentile per-packet one-way delay: 63.889 ms

Loss rate: 3.08%

Run 7: Report of TCP Cubic — Data Link



Run 8: Statistics of TCP Cubic

Start at: 2017-08-17 05:48:10

End at: 2017-08-17 05:48:40

Below is generated by plot.py at 2017-08-17 08:50:45

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.10 Mbit/s

95th percentile per-packet one-way delay: 63.611 ms

Loss rate: 2.12%

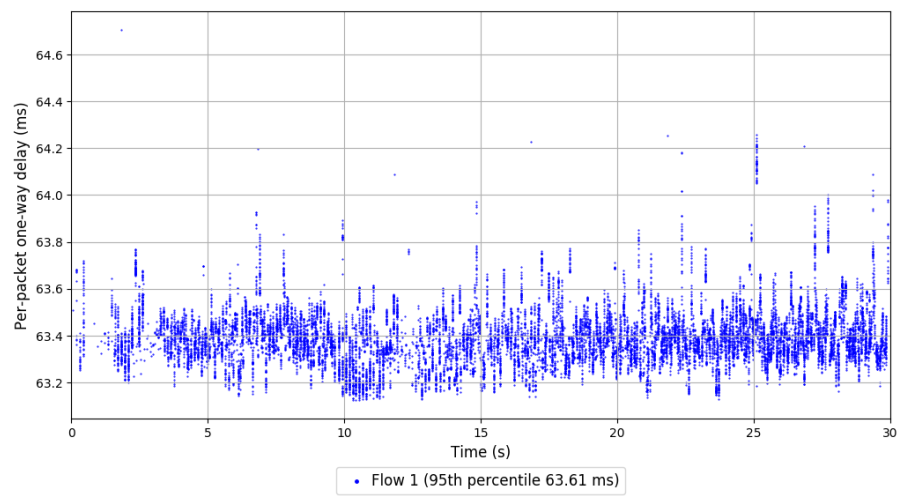
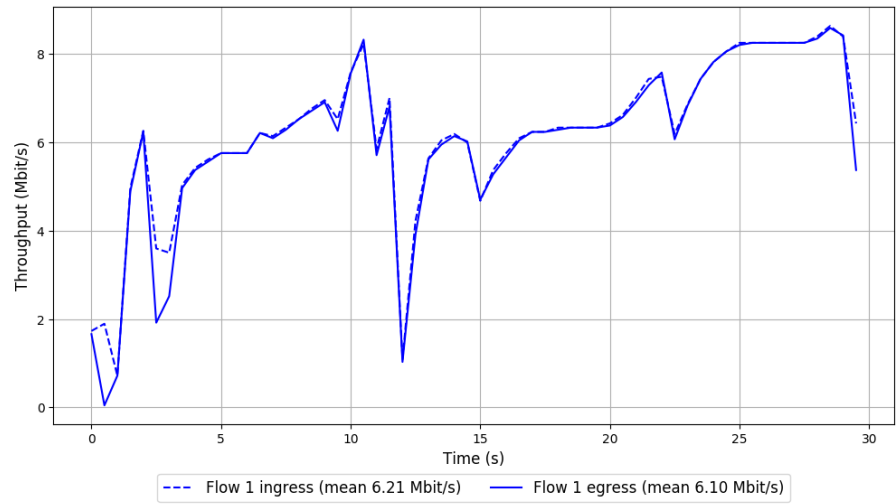
-- Flow 1:

Average throughput: 6.10 Mbit/s

95th percentile per-packet one-way delay: 63.611 ms

Loss rate: 2.12%

Run 8: Report of TCP Cubic — Data Link



Run 9: Statistics of TCP Cubic

Start at: 2017-08-17 05:58:36

End at: 2017-08-17 05:59:06

Below is generated by plot.py at 2017-08-17 08:50:49

Datalink statistics

-- Total of 1 flow:

Average throughput: 76.43 Mbit/s

95th percentile per-packet one-way delay: 64.960 ms

Loss rate: 0.90%

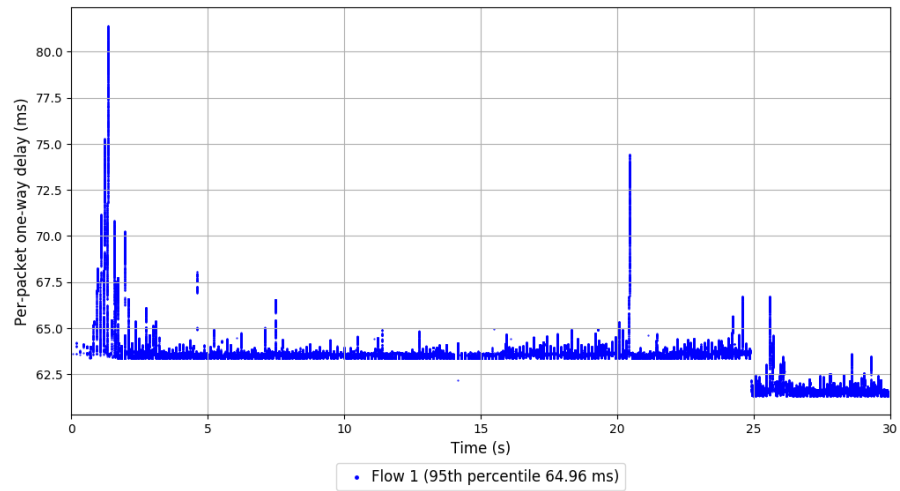
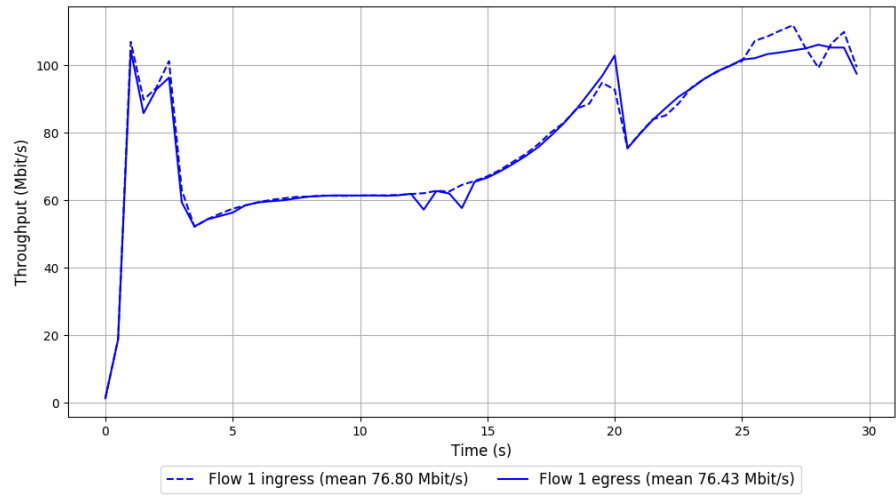
-- Flow 1:

Average throughput: 76.43 Mbit/s

95th percentile per-packet one-way delay: 64.960 ms

Loss rate: 0.90%

Run 9: Report of TCP Cubic — Data Link



Run 10: Statistics of TCP Cubic

Start at: 2017-08-17 06:09:09

End at: 2017-08-17 06:09:39

Below is generated by plot.py at 2017-08-17 08:50:49

Datalink statistics

-- Total of 1 flow:

Average throughput: 5.97 Mbit/s

95th percentile per-packet one-way delay: 63.896 ms

Loss rate: 3.21%

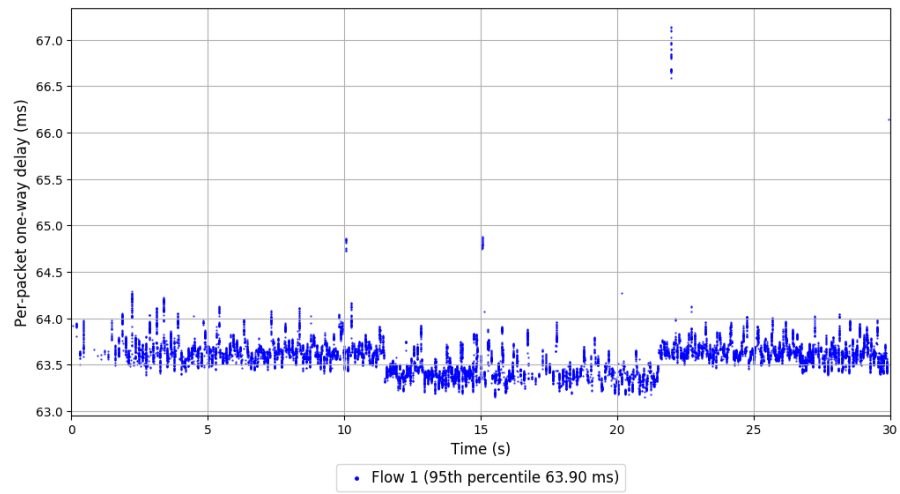
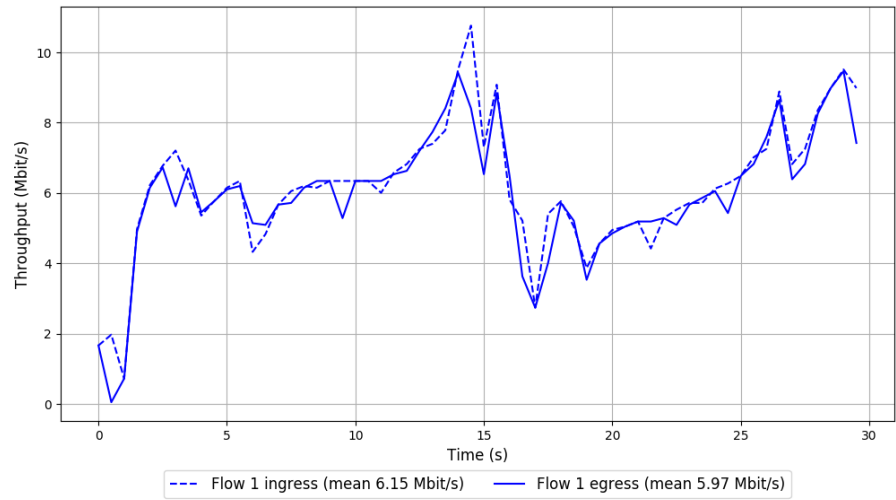
-- Flow 1:

Average throughput: 5.97 Mbit/s

95th percentile per-packet one-way delay: 63.896 ms

Loss rate: 3.21%

Run 10: Report of TCP Cubic — Data Link

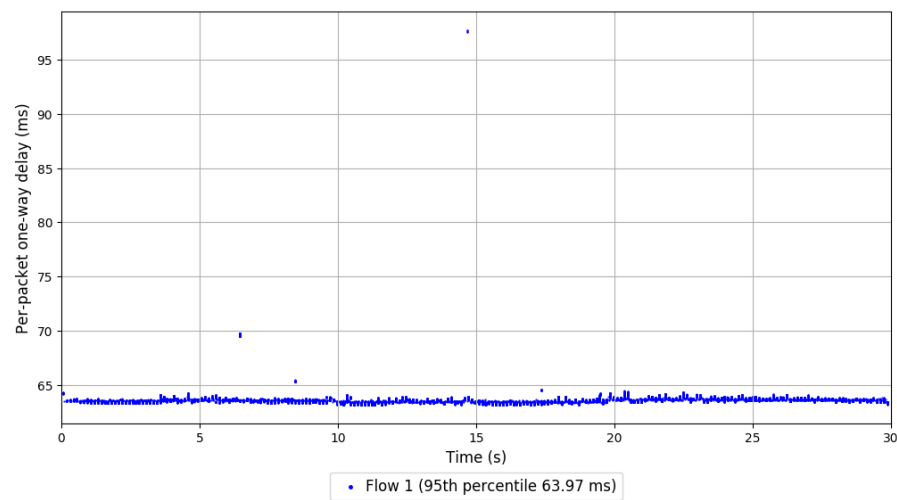
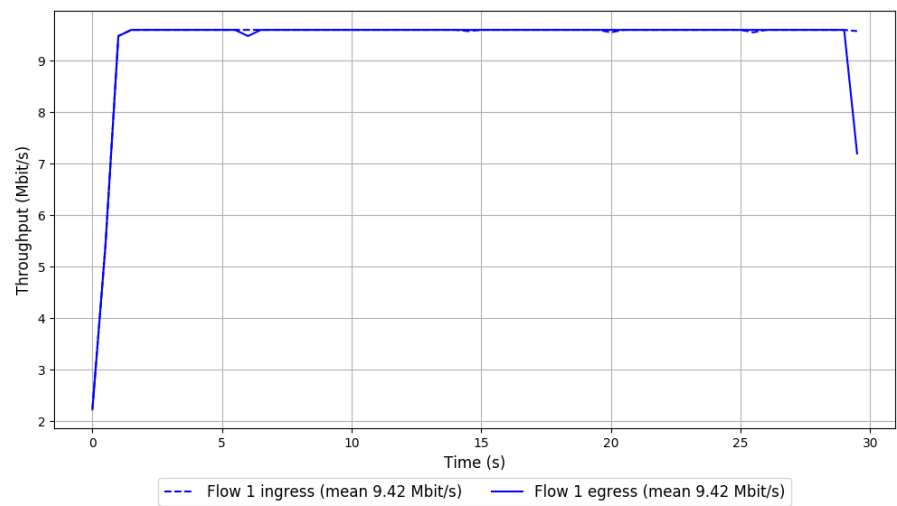


```
Run 1: Statistics of KohoCC

Start at: 2017-08-17 04:30:21
End at: 2017-08-17 04:30:51

# Below is generated by plot.py at 2017-08-17 08:50:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 9.42 Mbit/s
95th percentile per-packet one-way delay: 63.970 ms
Loss rate: 0.43%
-- Flow 1:
Average throughput: 9.42 Mbit/s
95th percentile per-packet one-way delay: 63.970 ms
Loss rate: 0.43%
```


Run 1: Report of KohoCC — Data Link



Run 2: Statistics of KohoCC

Start at: 2017-08-17 04:40:44

End at: 2017-08-17 04:41:14

Below is generated by plot.py at 2017-08-17 08:50:51

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.17 Mbit/s

95th percentile per-packet one-way delay: 64.283 ms

Loss rate: 26.81%

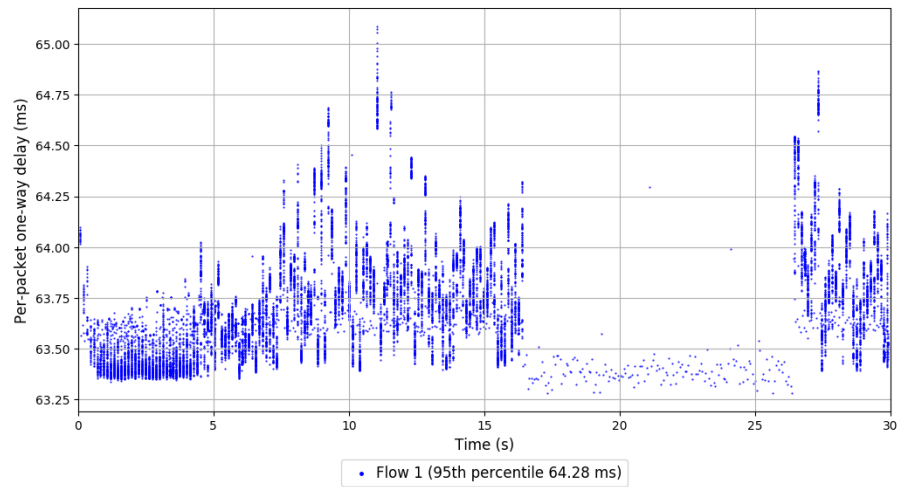
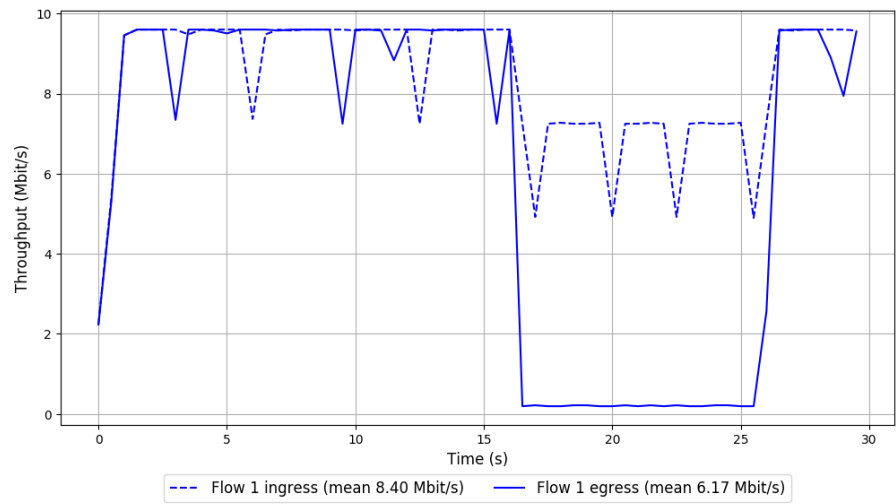
-- Flow 1:

Average throughput: 6.17 Mbit/s

95th percentile per-packet one-way delay: 64.283 ms

Loss rate: 26.81%

Run 2: Report of KohoCC — Data Link



Run 3: Statistics of KohoCC

Start at: 2017-08-17 04:51:15

End at: 2017-08-17 04:51:45

Below is generated by plot.py at 2017-08-17 08:50:52

Datalink statistics

-- Total of 1 flow:

Average throughput: 9.15 Mbit/s

95th percentile per-packet one-way delay: 64.042 ms

Loss rate: 0.85%

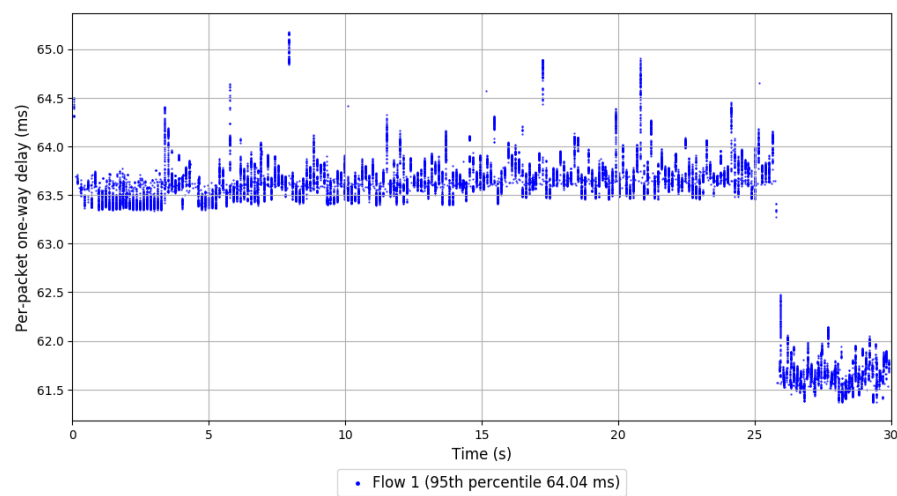
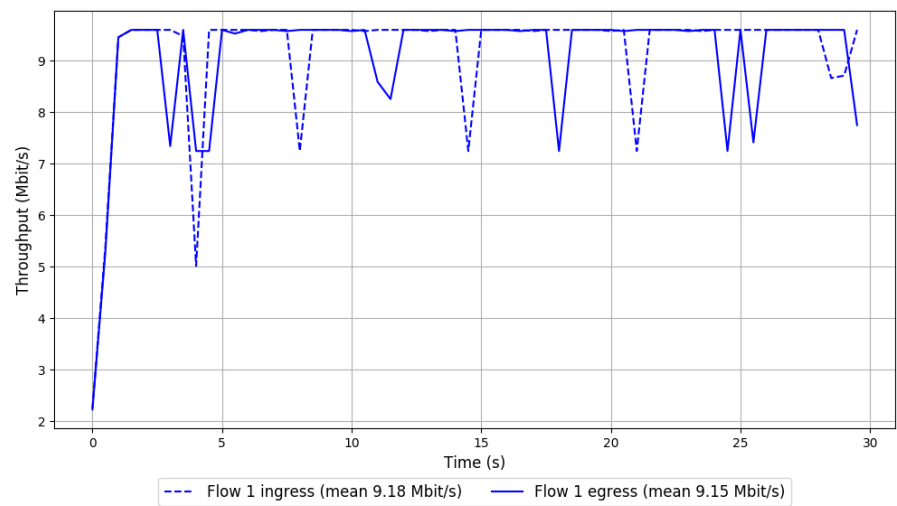
-- Flow 1:

Average throughput: 9.15 Mbit/s

95th percentile per-packet one-way delay: 64.042 ms

Loss rate: 0.85%

Run 3: Report of KohoCC — Data Link



Run 4: Statistics of KohoCC

Start at: 2017-08-17 05:01:33

End at: 2017-08-17 05:02:03

Below is generated by plot.py at 2017-08-17 08:50:52

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.35 Mbit/s

95th percentile per-packet one-way delay: 63.618 ms

Loss rate: 94.77%

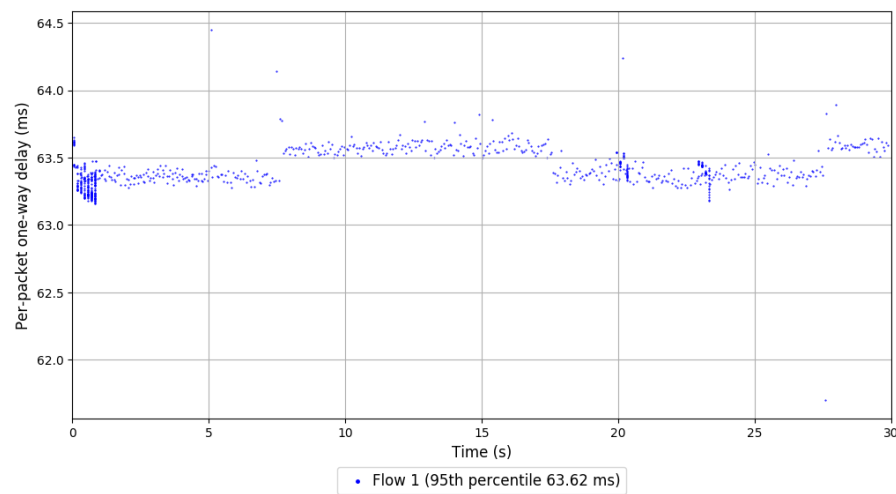
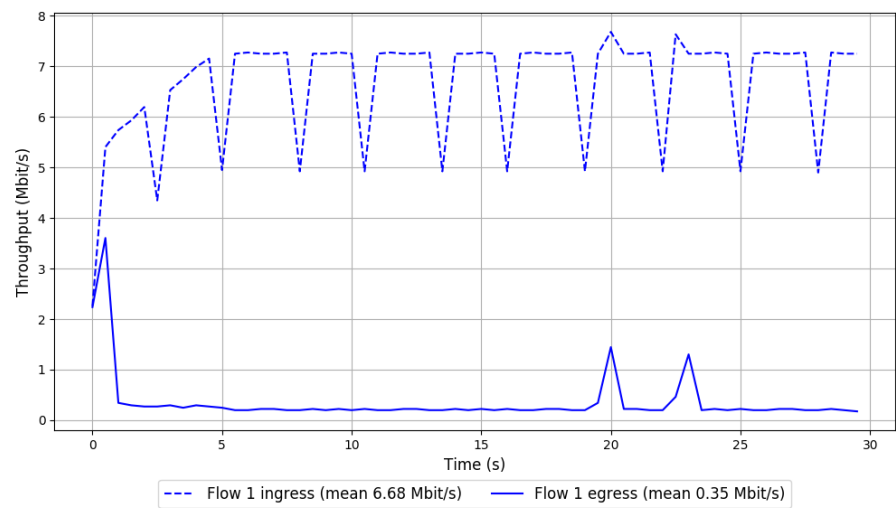
-- Flow 1:

Average throughput: 0.35 Mbit/s

95th percentile per-packet one-way delay: 63.618 ms

Loss rate: 94.77%

Run 4: Report of KohoCC — Data Link



Run 5: Statistics of KohoCC

Start at: 2017-08-17 05:11:48

End at: 2017-08-17 05:12:18

Below is generated by plot.py at 2017-08-17 08:50:55

Datalink statistics

-- Total of 1 flow:

Average throughput: 9.21 Mbit/s

95th percentile per-packet one-way delay: 64.080 ms

Loss rate: 0.52%

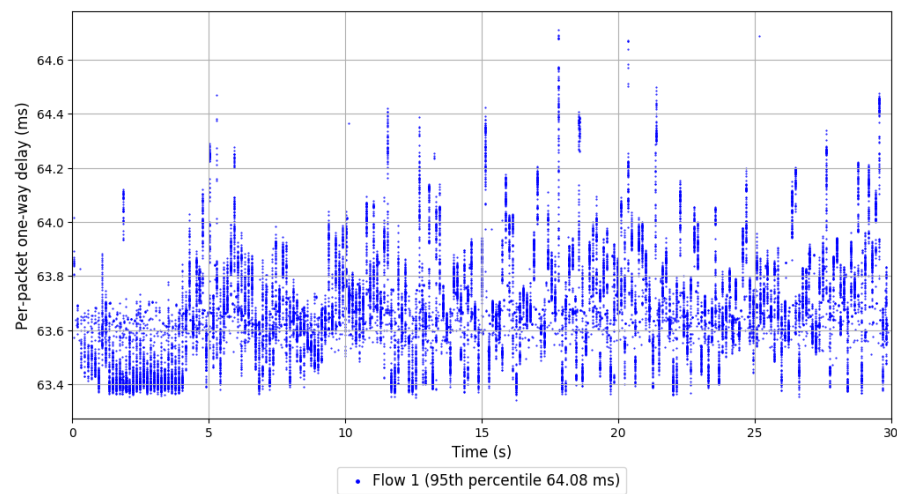
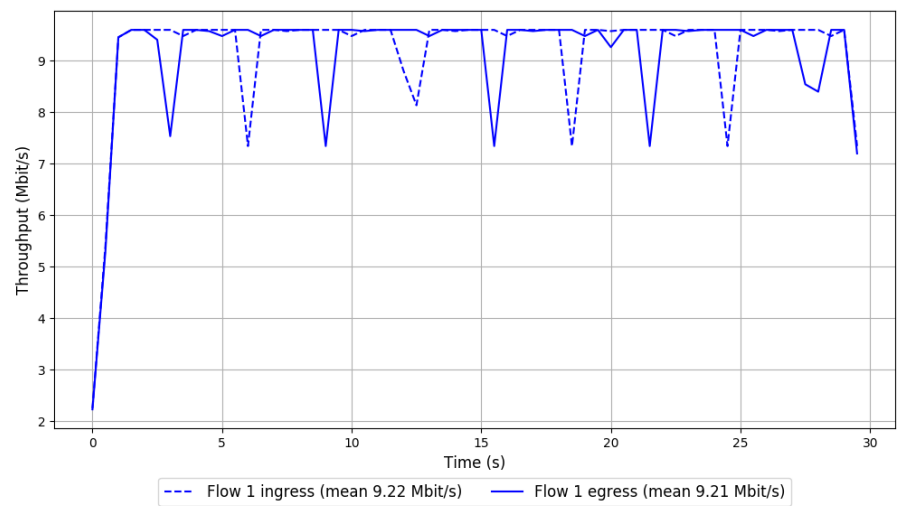
-- Flow 1:

Average throughput: 9.21 Mbit/s

95th percentile per-packet one-way delay: 64.080 ms

Loss rate: 0.52%

Run 5: Report of KohoCC — Data Link



Run 6: Statistics of KohoCC

Start at: 2017-08-17 05:22:20

End at: 2017-08-17 05:22:50

Below is generated by plot.py at 2017-08-17 08:50:55

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.14 Mbit/s

95th percentile per-packet one-way delay: 63.999 ms

Loss rate: 26.85%

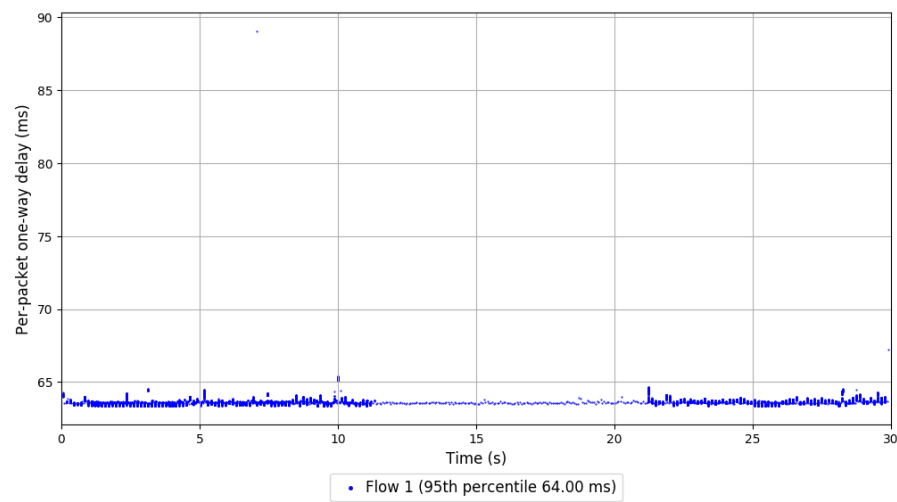
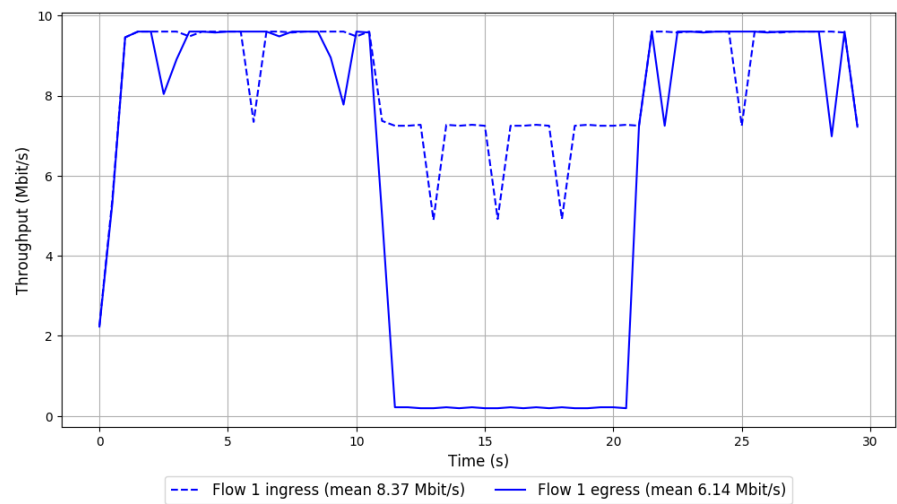
-- Flow 1:

Average throughput: 6.14 Mbit/s

95th percentile per-packet one-way delay: 63.999 ms

Loss rate: 26.85%

Run 6: Report of KohoCC — Data Link



Run 7: Statistics of KohoCC

Start at: 2017-08-17 05:32:46

End at: 2017-08-17 05:33:16

Below is generated by plot.py at 2017-08-17 08:50:58

Datalink statistics

-- Total of 1 flow:

Average throughput: 9.37 Mbit/s

95th percentile per-packet one-way delay: 63.873 ms

Loss rate: 0.43%

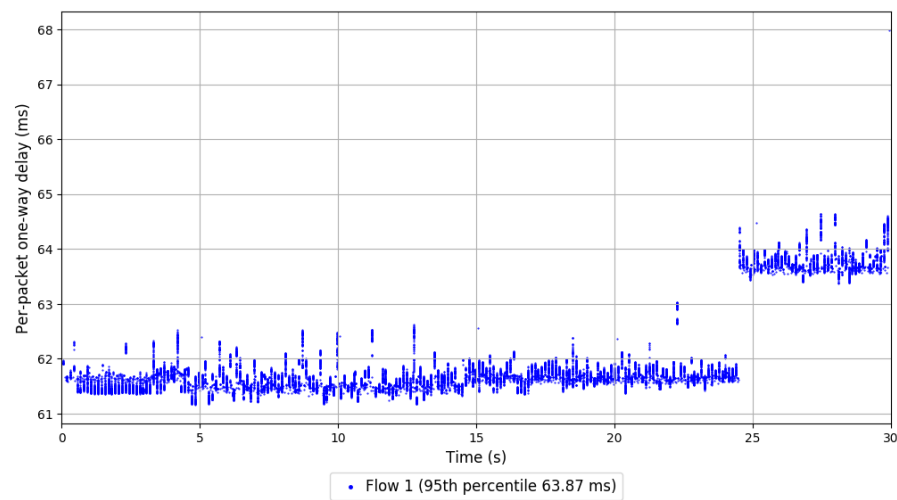
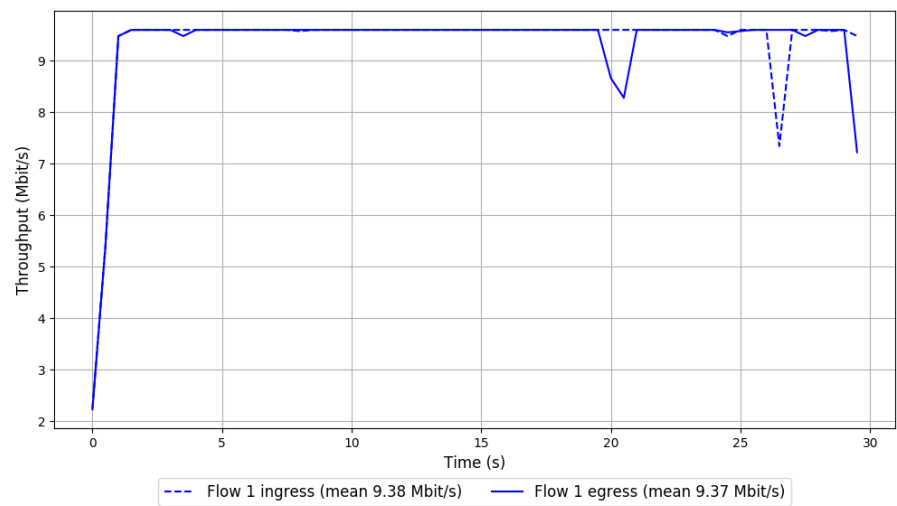
-- Flow 1:

Average throughput: 9.37 Mbit/s

95th percentile per-packet one-way delay: 63.873 ms

Loss rate: 0.43%

Run 7: Report of KohoCC — Data Link



Run 8: Statistics of KohoCC

Start at: 2017-08-17 05:43:00

End at: 2017-08-17 05:43:30

Below is generated by plot.py at 2017-08-17 08:50:58

Datalink statistics

-- Total of 1 flow:

Average throughput: 9.21 Mbit/s

95th percentile per-packet one-way delay: 64.044 ms

Loss rate: 0.64%

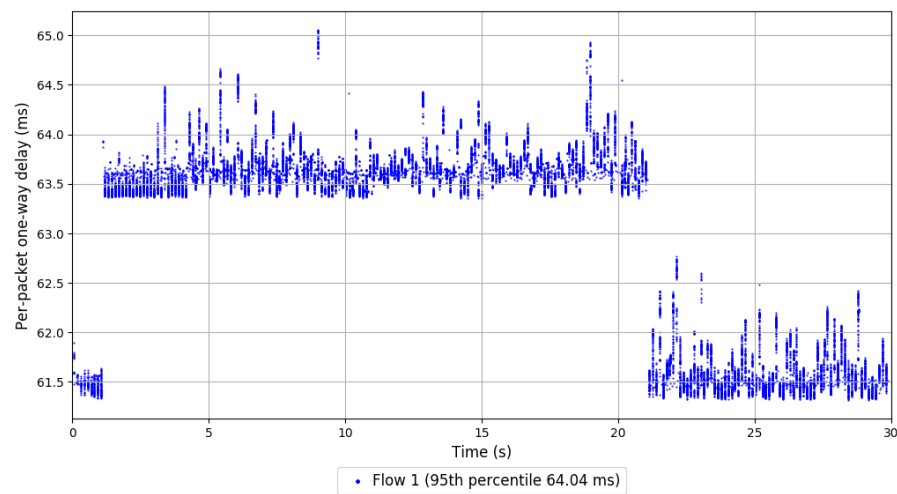
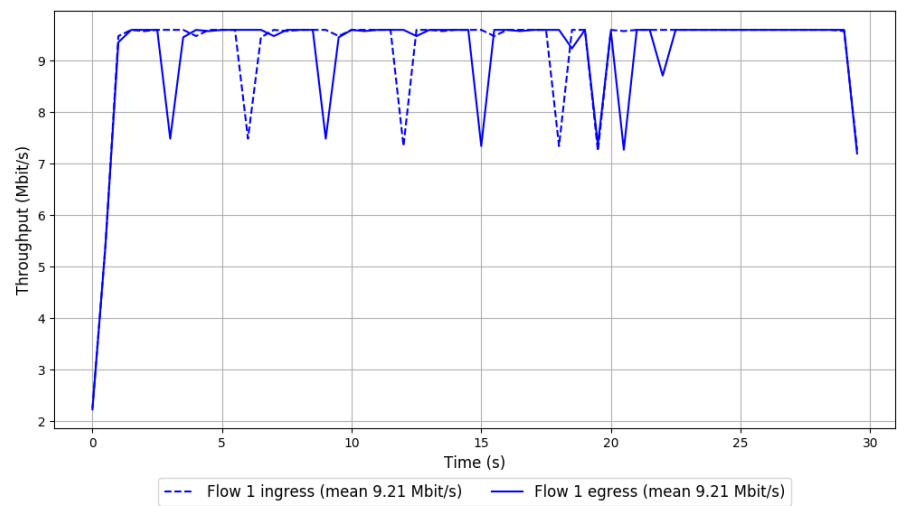
-- Flow 1:

Average throughput: 9.21 Mbit/s

95th percentile per-packet one-way delay: 64.044 ms

Loss rate: 0.64%

Run 8: Report of KohoCC — Data Link



Run 9: Statistics of KohoCC

Start at: 2017-08-17 05:53:36

End at: 2017-08-17 05:54:06

Below is generated by plot.py at 2017-08-17 08:50:59

Datalink statistics

-- Total of 1 flow:

Average throughput: 1.92 Mbit/s

95th percentile per-packet one-way delay: 64.424 ms

Loss rate: 73.32%

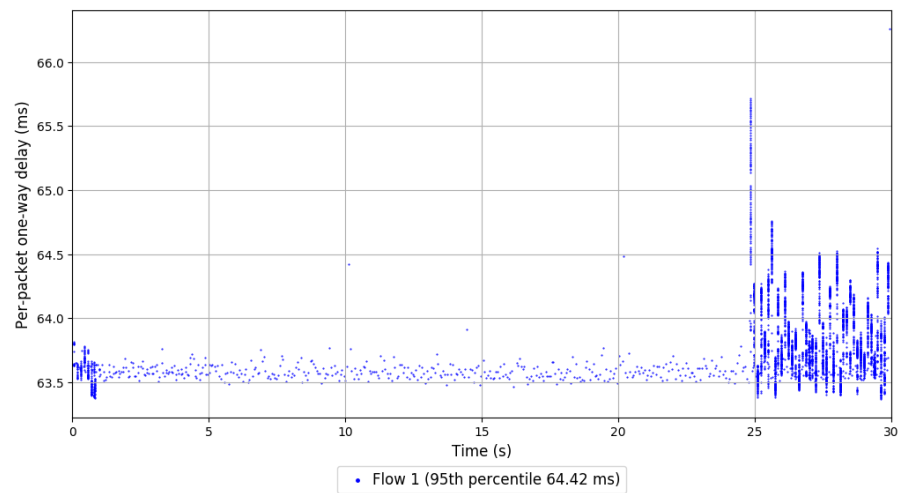
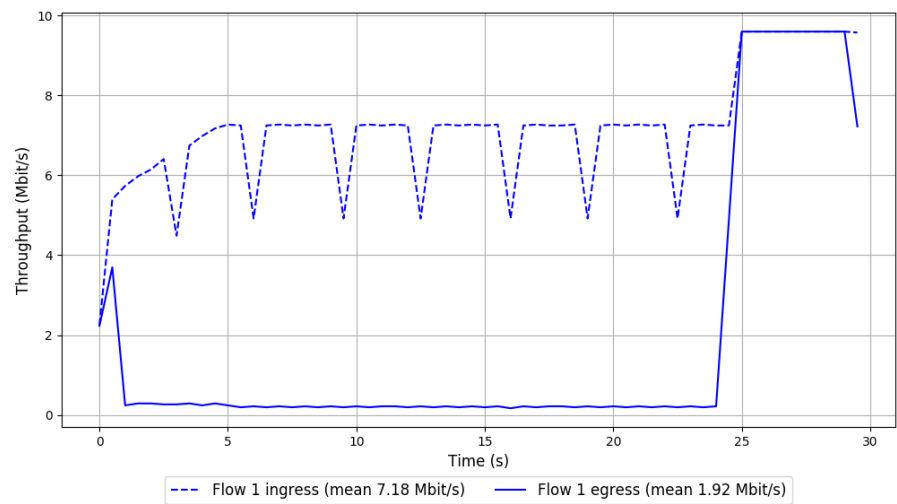
-- Flow 1:

Average throughput: 1.92 Mbit/s

95th percentile per-packet one-way delay: 64.424 ms

Loss rate: 73.32%

Run 9: Report of KohoCC — Data Link



Run 10: Statistics of KohoCC

Start at: 2017-08-17 06:04:27

End at: 2017-08-17 06:04:58

Below is generated by plot.py at 2017-08-17 08:51:02

Datalink statistics

-- Total of 1 flow:

Average throughput: 9.29 Mbit/s

95th percentile per-packet one-way delay: 64.268 ms

Loss rate: 0.52%

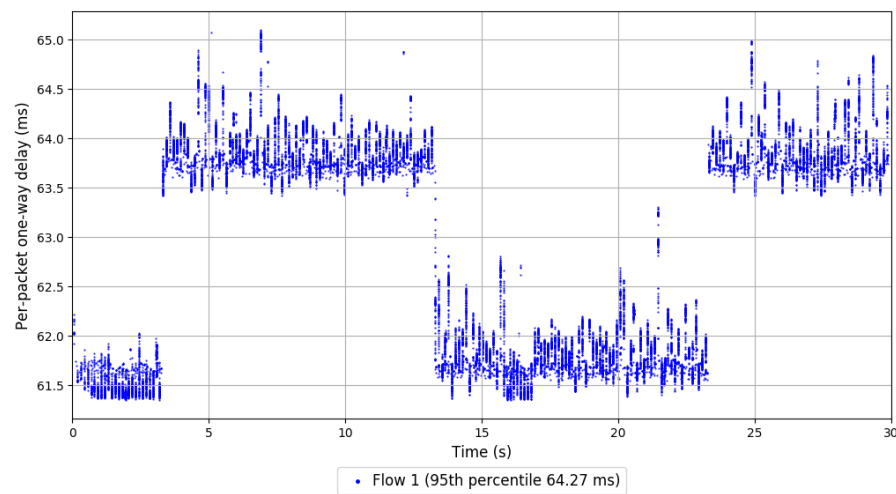
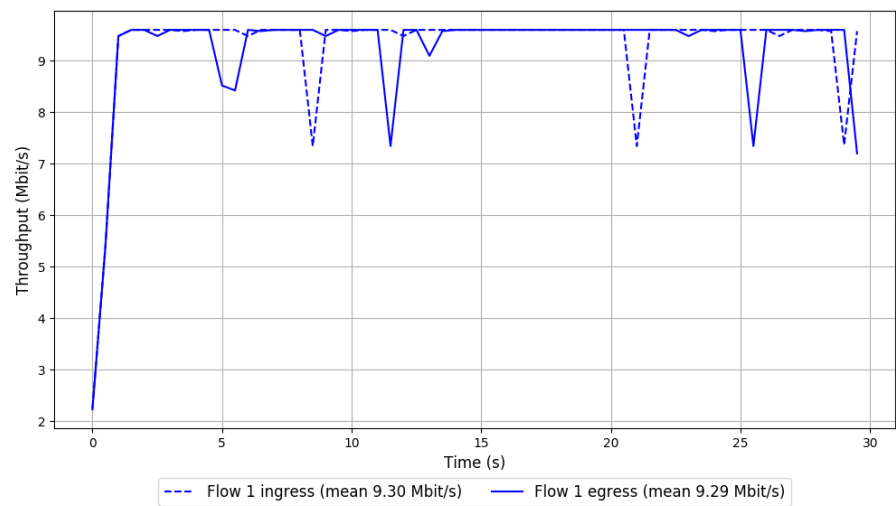
-- Flow 1:

Average throughput: 9.29 Mbit/s

95th percentile per-packet one-way delay: 64.268 ms

Loss rate: 0.52%

Run 10: Report of KohoCC — Data Link

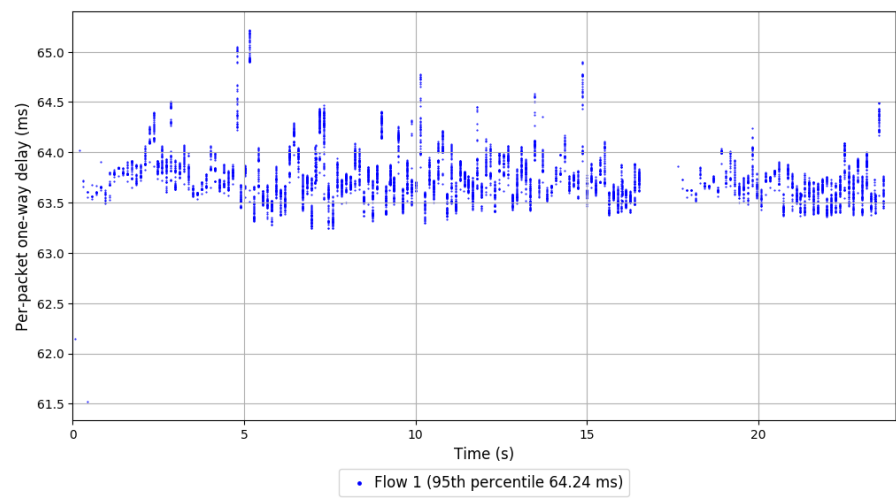
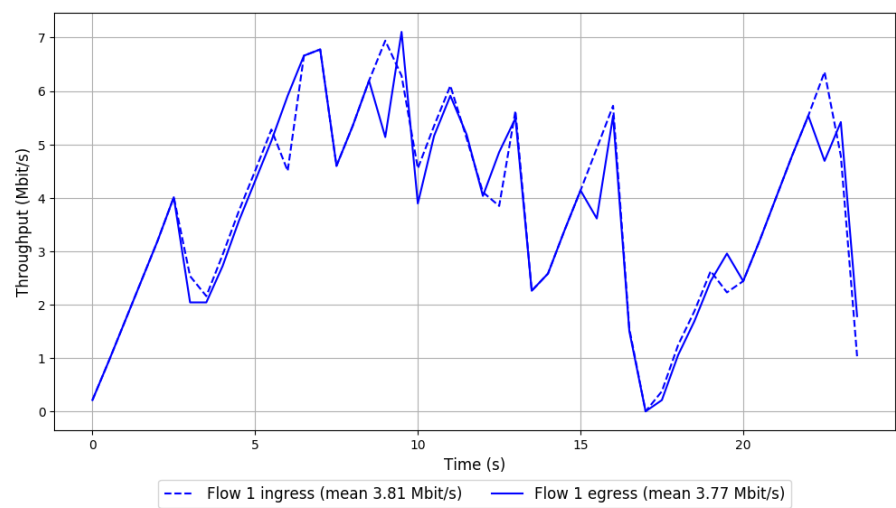


Run 1: Statistics of LEDBAT

Start at: 2017-08-17 04:38:51

End at: 2017-08-17 04:39:21

Run 1: Report of LEDBAT — Data Link

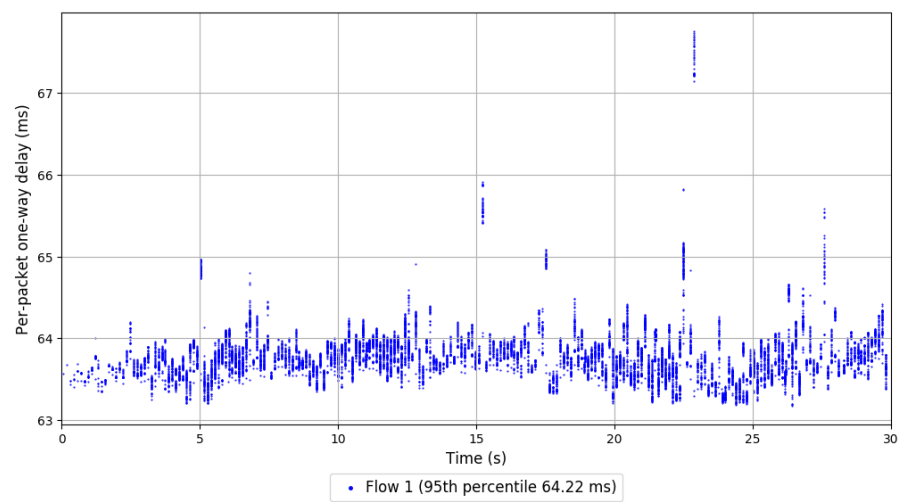
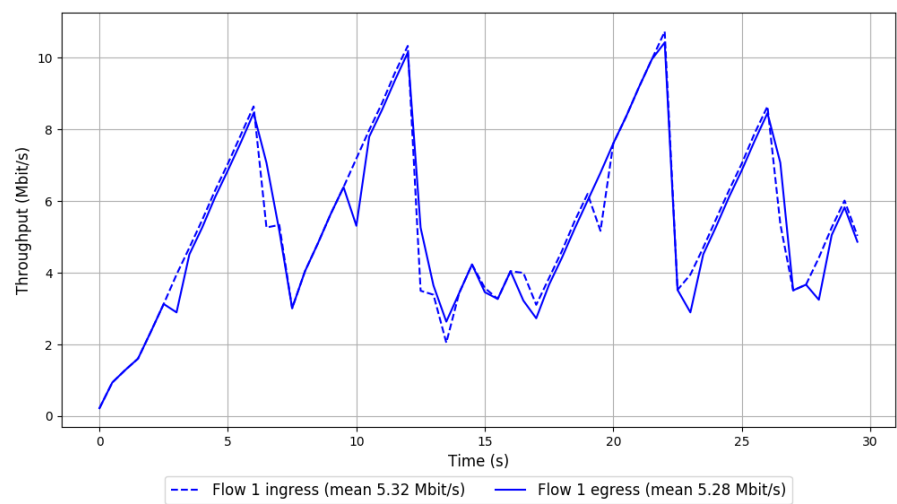


```
Run 2: Statistics of LEDBAT

Start at: 2017-08-17 04:49:21
End at: 2017-08-17 04:49:52

# Below is generated by plot.py at 2017-08-17 08:51:04
# Datalink statistics
-- Total of 1 flow:
Average throughput: 5.28 Mbit/s
95th percentile per-packet one-way delay: 64.224 ms
Loss rate: 1.14%
-- Flow 1:
Average throughput: 5.28 Mbit/s
95th percentile per-packet one-way delay: 64.224 ms
Loss rate: 1.14%
```

Run 2: Report of LEDBAT — Data Link

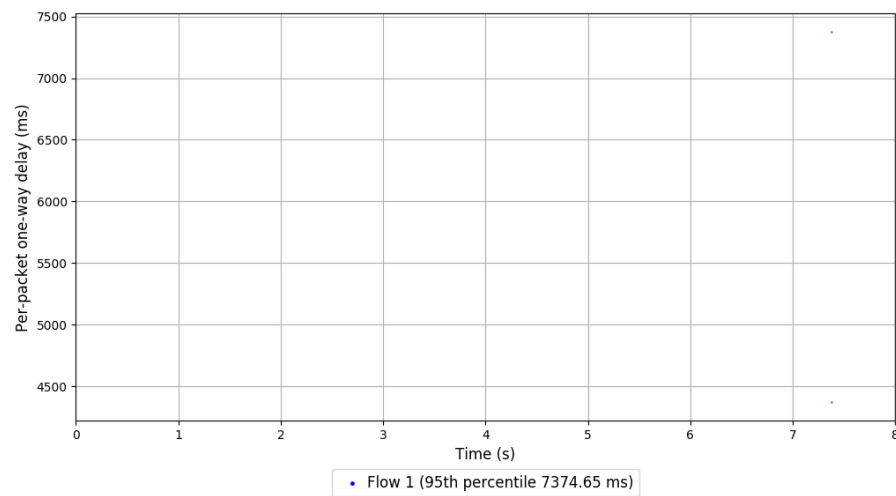
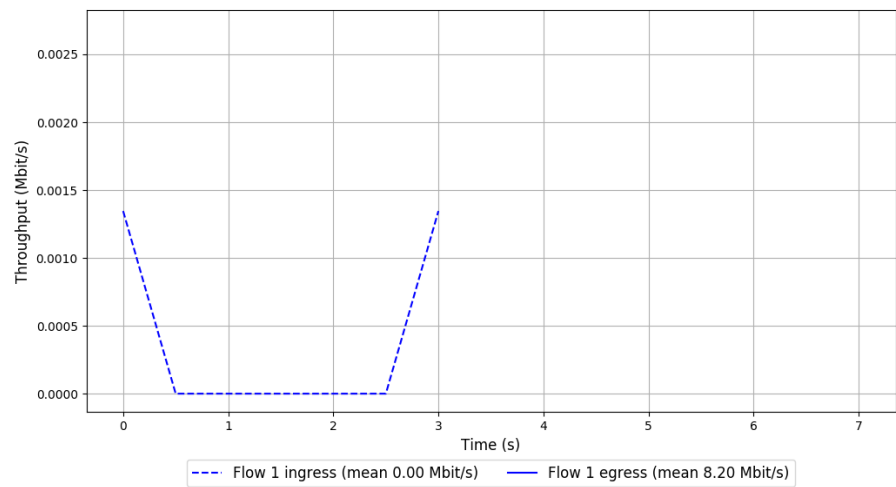


Run 3: Statistics of LEDBAT

Start at: 2017-08-17 04:59:40

End at: 2017-08-17 05:00:10

Run 3: Report of LEDBAT — Data Link



Run 4: Statistics of LEDBAT

Start at: 2017-08-17 05:09:54

End at: 2017-08-17 05:10:24

Below is generated by plot.py at 2017-08-17 08:51:04

Datalink statistics

-- Total of 1 flow:

Average throughput: 3.96 Mbit/s

95th percentile per-packet one-way delay: 64.188 ms

Loss rate: 1.69%

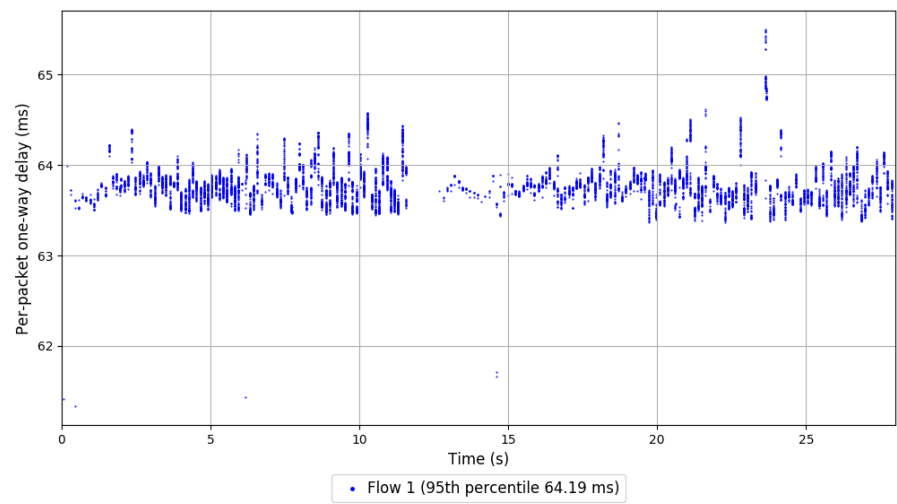
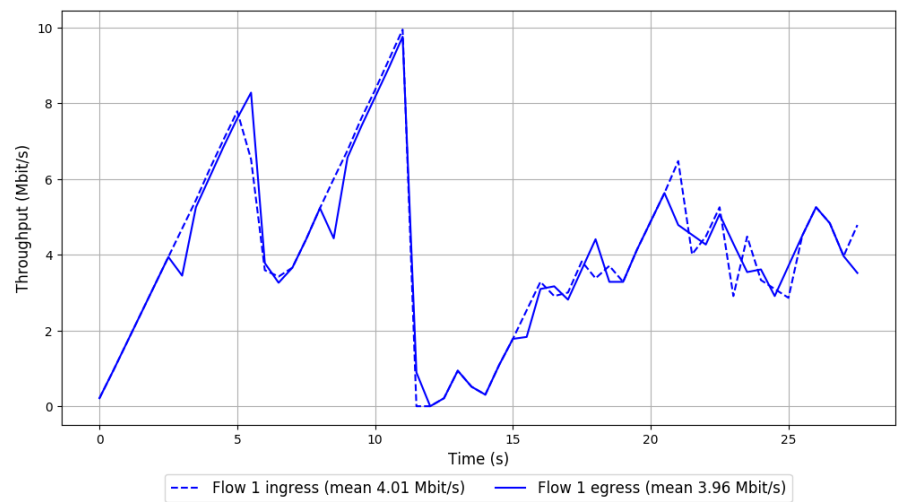
-- Flow 1:

Average throughput: 3.96 Mbit/s

95th percentile per-packet one-way delay: 64.188 ms

Loss rate: 1.69%

Run 4: Report of LEDBAT — Data Link

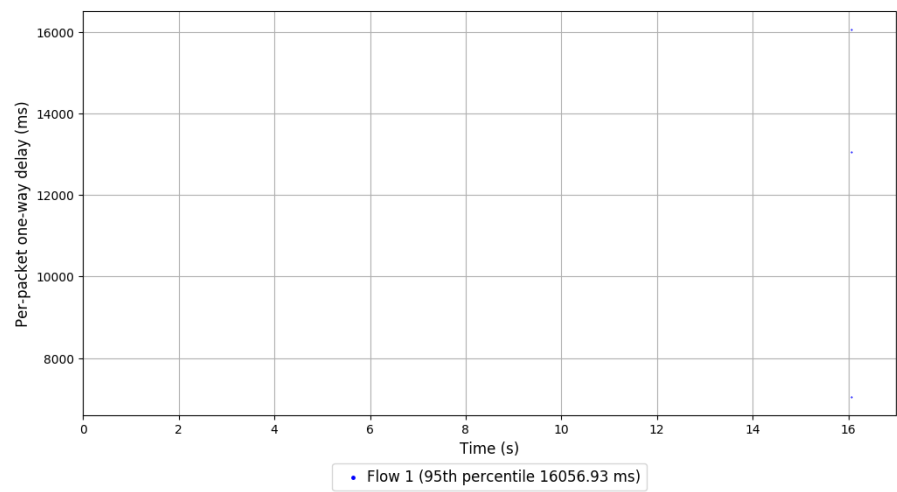
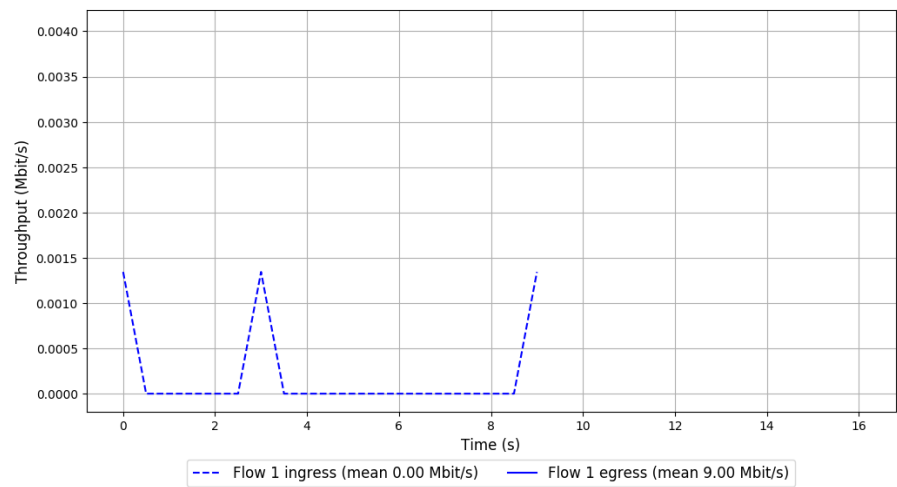


Run 5: Statistics of LEDBAT

Start at: 2017-08-17 05:20:27

End at: 2017-08-17 05:20:57

Run 5: Report of LEDBAT — Data Link



Run 6: Statistics of LEDBAT

Start at: 2017-08-17 05:30:53

End at: 2017-08-17 05:31:23

Below is generated by plot.py at 2017-08-17 08:51:07

Datalink statistics

-- Total of 1 flow:

Average throughput: 3.02 Mbit/s

95th percentile per-packet one-way delay: 64.012 ms

Loss rate: 3.06%

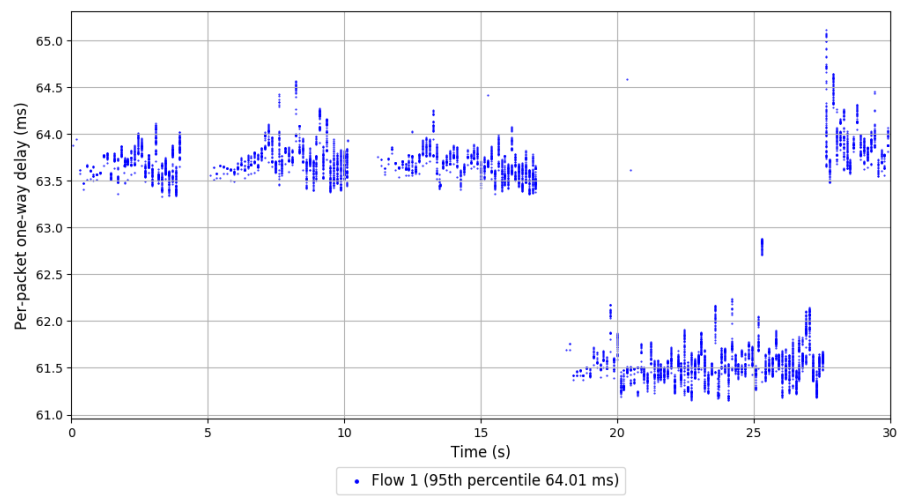
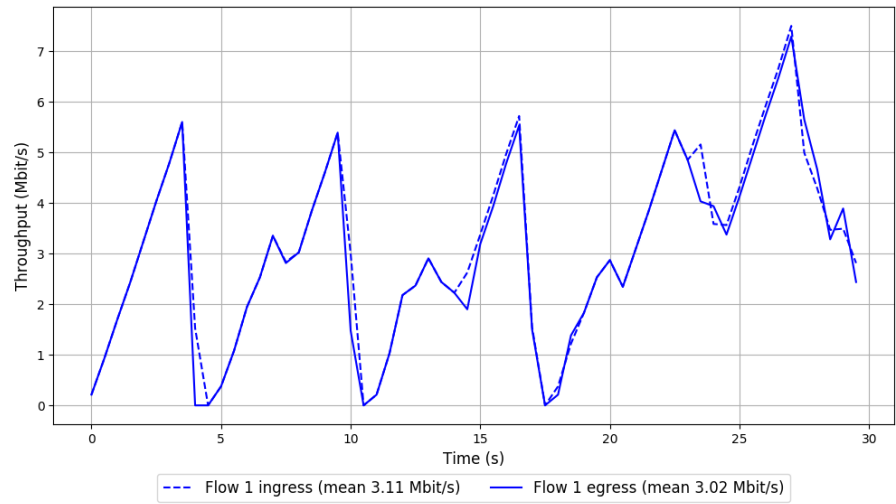
-- Flow 1:

Average throughput: 3.02 Mbit/s

95th percentile per-packet one-way delay: 64.012 ms

Loss rate: 3.06%

Run 6: Report of LEDBAT — Data Link



Run 7: Statistics of LEDBAT

Start at: 2017-08-17 05:41:06

End at: 2017-08-17 05:41:36

Below is generated by plot.py at 2017-08-17 08:51:07

Datalink statistics

-- Total of 1 flow:

Average throughput: 3.47 Mbit/s

95th percentile per-packet one-way delay: 64.254 ms

Loss rate: 1.93%

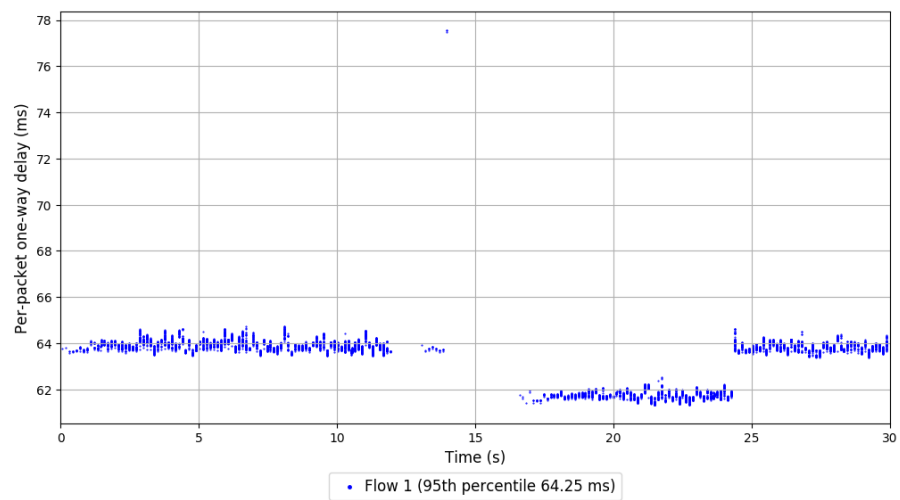
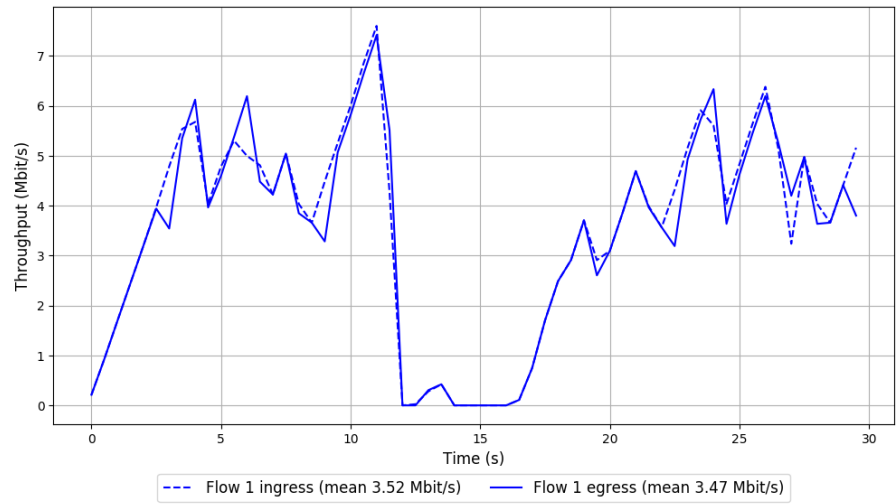
-- Flow 1:

Average throughput: 3.47 Mbit/s

95th percentile per-packet one-way delay: 64.254 ms

Loss rate: 1.93%

Run 7: Report of LEDBAT — Data Link



Run 8: Statistics of LEDBAT

Start at: 2017-08-17 05:51:43

End at: 2017-08-17 05:52:13

Below is generated by plot.py at 2017-08-17 08:51:08

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.95 Mbit/s

95th percentile per-packet one-way delay: 63.847 ms

Loss rate: 2.63%

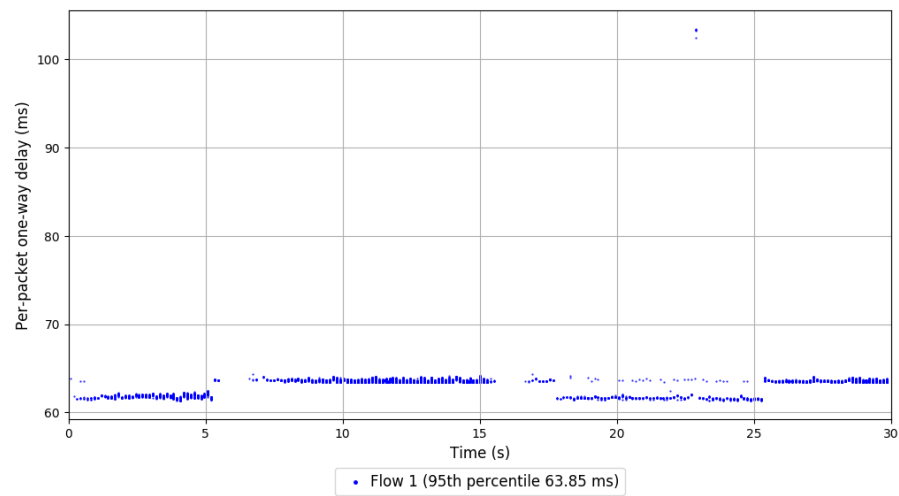
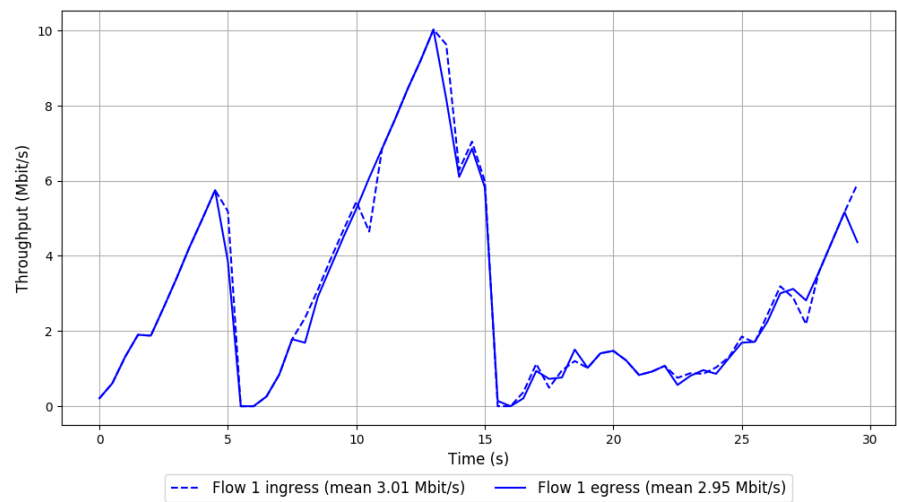
-- Flow 1:

Average throughput: 2.95 Mbit/s

95th percentile per-packet one-way delay: 63.847 ms

Loss rate: 2.63%

Run 8: Report of LEDBAT — Data Link



Run 9: Statistics of LEDBAT

Start at: 2017-08-17 06:02:34

End at: 2017-08-17 06:03:04

Below is generated by plot.py at 2017-08-17 08:51:10

Datalink statistics

-- Total of 1 flow:

Average throughput: 3.72 Mbit/s

95th percentile per-packet one-way delay: 64.555 ms

Loss rate: 2.40%

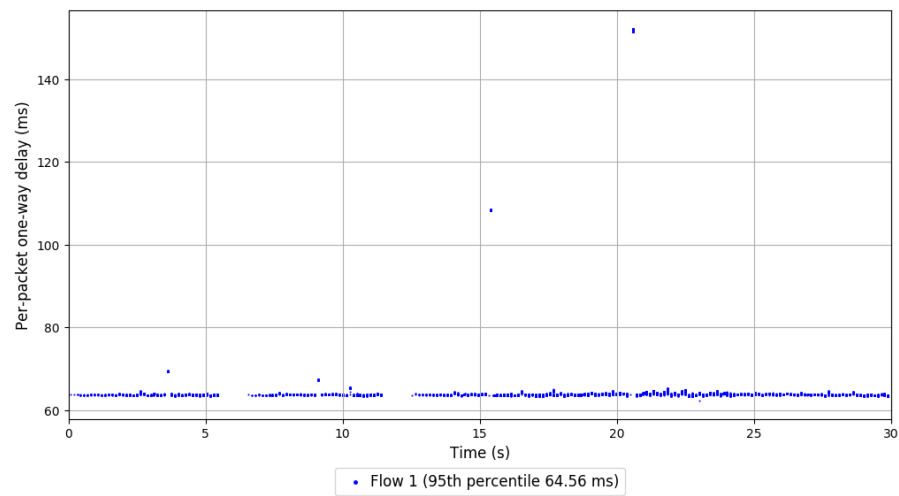
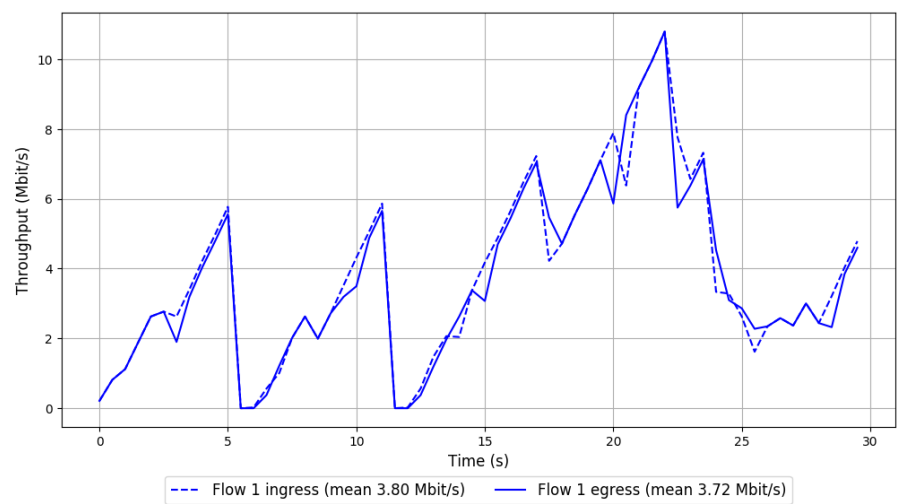
-- Flow 1:

Average throughput: 3.72 Mbit/s

95th percentile per-packet one-way delay: 64.555 ms

Loss rate: 2.40%

Run 9: Report of LEDBAT — Data Link



Run 10: Statistics of LEDBAT

Start at: 2017-08-17 06:12:43

End at: 2017-08-17 06:13:13

Below is generated by plot.py at 2017-08-17 08:51:10

Datalink statistics

-- Total of 1 flow:

Average throughput: 4.61 Mbit/s

95th percentile per-packet one-way delay: 64.156 ms

Loss rate: 1.47%

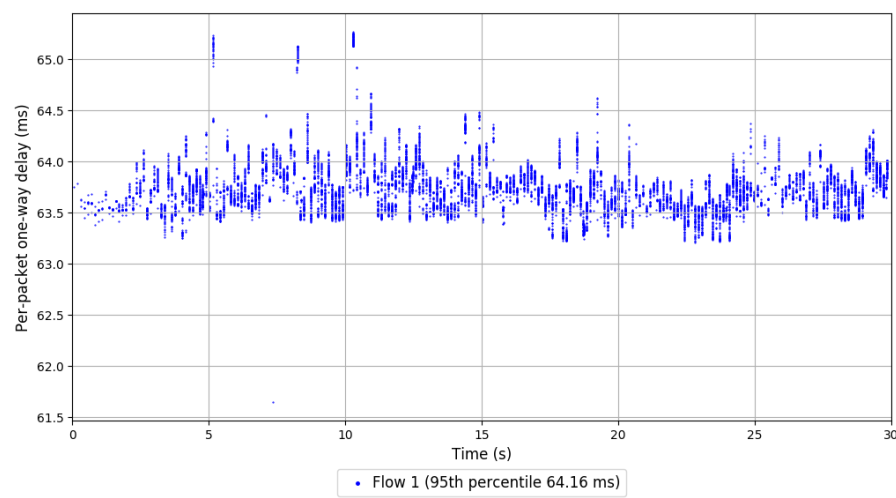
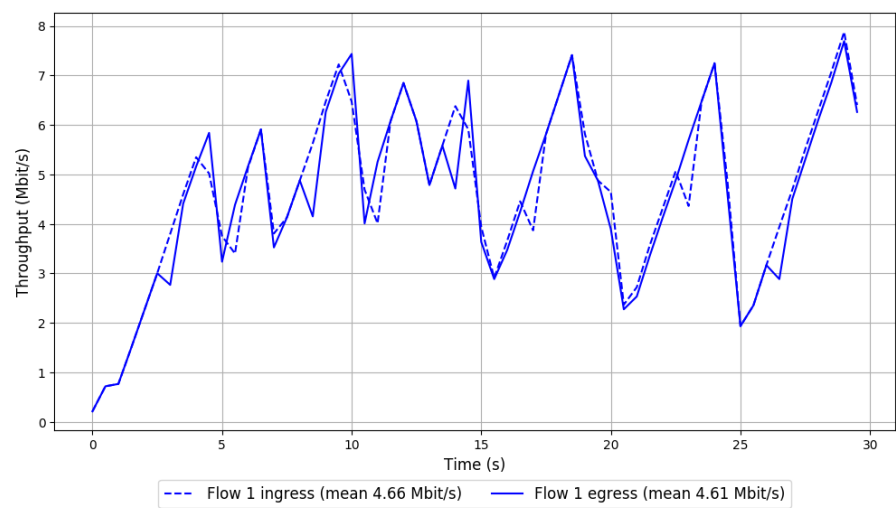
-- Flow 1:

Average throughput: 4.61 Mbit/s

95th percentile per-packet one-way delay: 64.156 ms

Loss rate: 1.47%

Run 10: Report of LEDBAT — Data Link

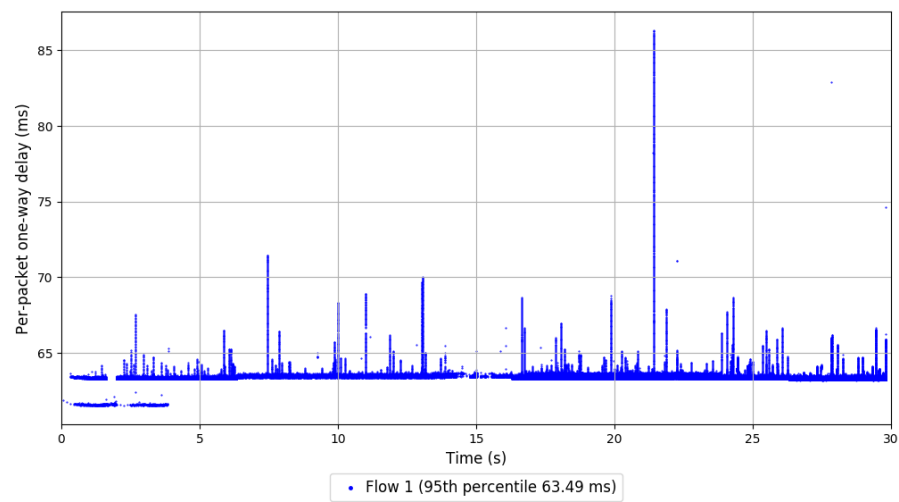
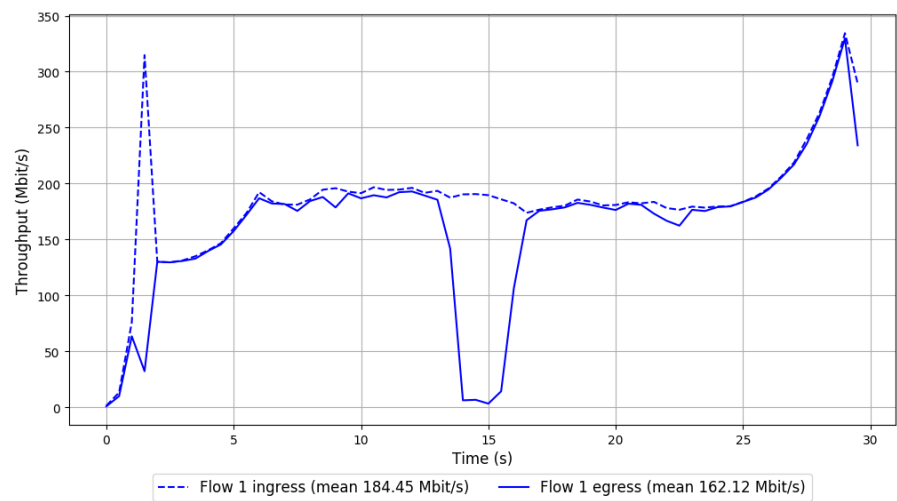


```
Run 1: Statistics of PCC

Start at: 2017-08-17 04:37:24
End at: 2017-08-17 04:37:54

# Below is generated by plot.py at 2017-08-17 08:51:47
# Datalink statistics
-- Total of 1 flow:
Average throughput: 162.12 Mbit/s
95th percentile per-packet one-way delay: 63.488 ms
Loss rate: 12.45%
-- Flow 1:
Average throughput: 162.12 Mbit/s
95th percentile per-packet one-way delay: 63.488 ms
Loss rate: 12.45%
```


Run 1: Report of PCC — Data Link



Run 2: Statistics of PCC

Start at: 2017-08-17 04:47:48

End at: 2017-08-17 04:48:18

Below is generated by plot.py at 2017-08-17 08:52:03

Datalink statistics

-- Total of 1 flow:

Average throughput: 291.35 Mbit/s

95th percentile per-packet one-way delay: 63.842 ms

Loss rate: 23.64%

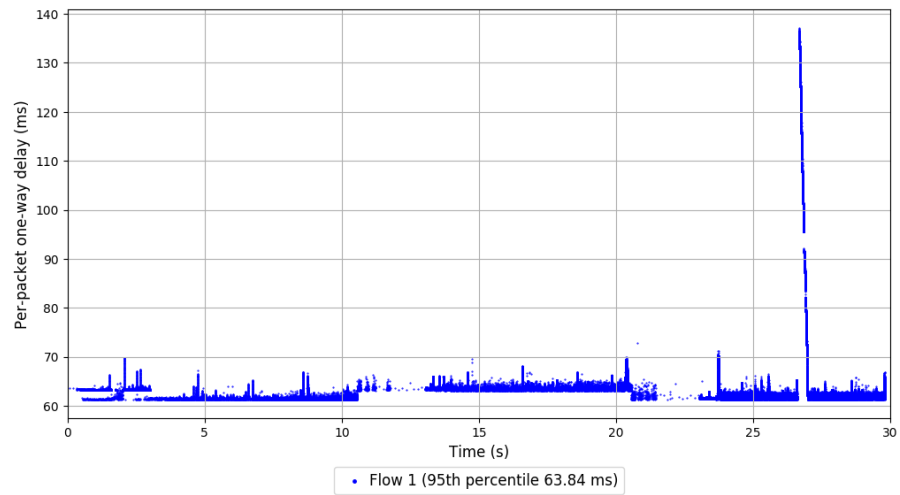
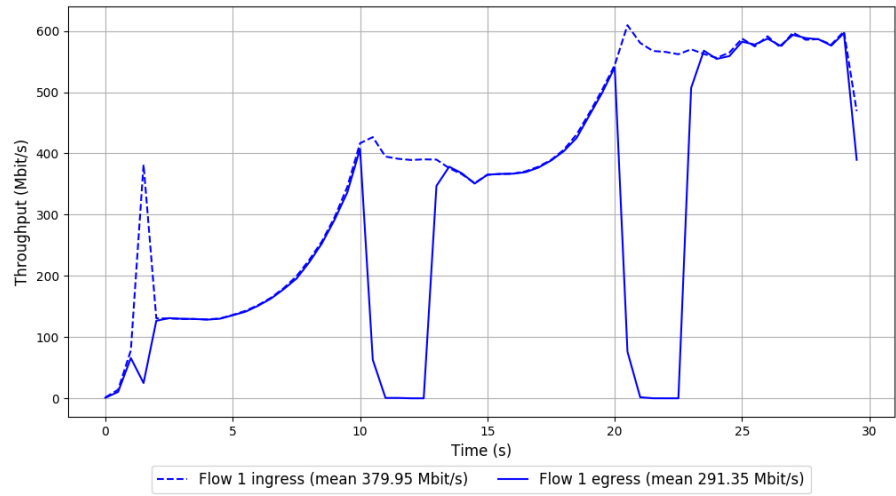
-- Flow 1:

Average throughput: 291.35 Mbit/s

95th percentile per-packet one-way delay: 63.842 ms

Loss rate: 23.64%

Run 2: Report of PCC — Data Link



Run 3: Statistics of PCC

Start at: 2017-08-17 04:58:16

End at: 2017-08-17 04:58:46

Below is generated by plot.py at 2017-08-17 08:52:03

Datalink statistics

-- Total of 1 flow:

Average throughput: 119.82 Mbit/s

95th percentile per-packet one-way delay: 112.938 ms

Loss rate: 16.23%

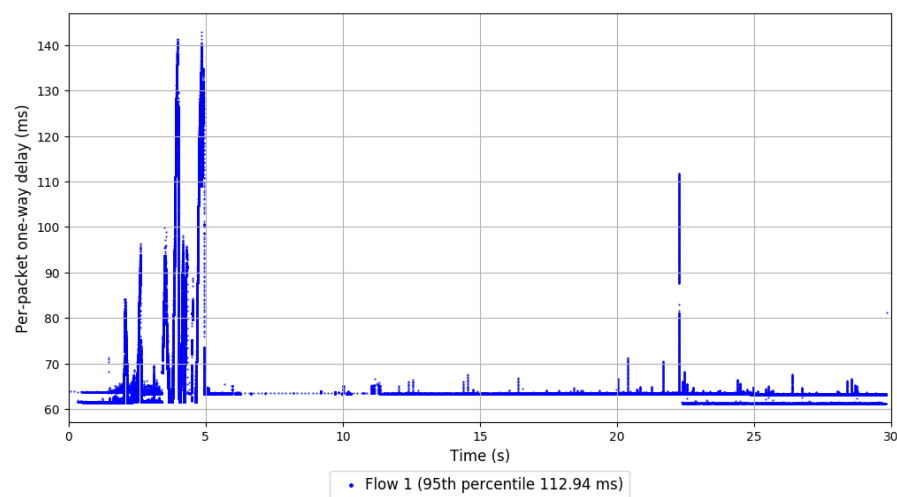
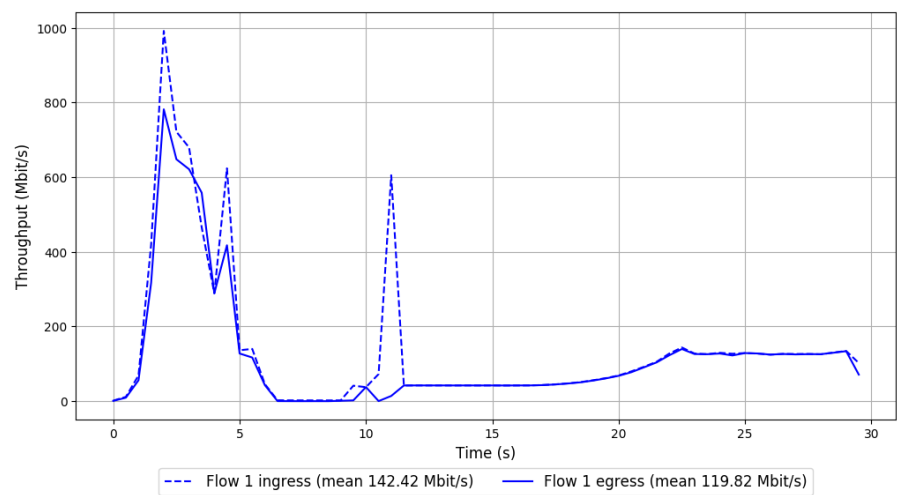
-- Flow 1:

Average throughput: 119.82 Mbit/s

95th percentile per-packet one-way delay: 112.938 ms

Loss rate: 16.23%

Run 3: Report of PCC — Data Link



Run 4: Statistics of PCC

Start at: 2017-08-17 05:08:24

End at: 2017-08-17 05:08:54

Below is generated by plot.py at 2017-08-17 08:52:49

Datalink statistics

-- Total of 1 flow:

Average throughput: 288.99 Mbit/s

95th percentile per-packet one-way delay: 84.601 ms

Loss rate: 3.33%

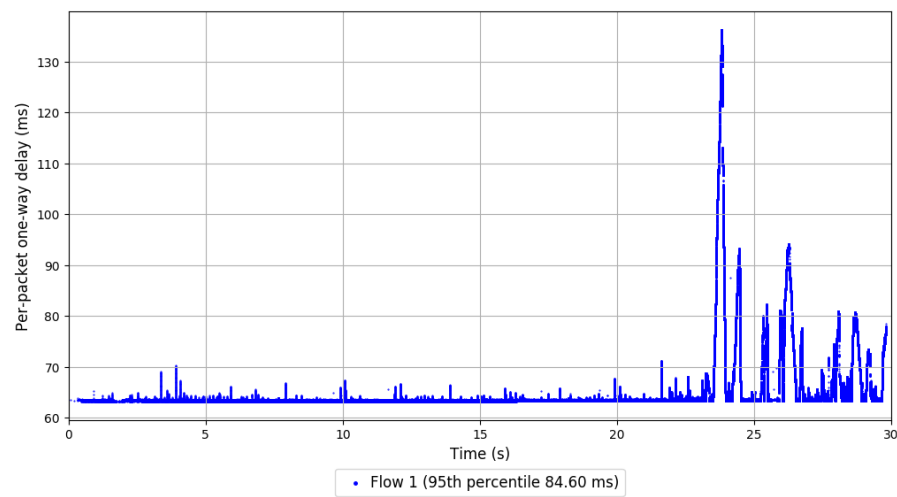
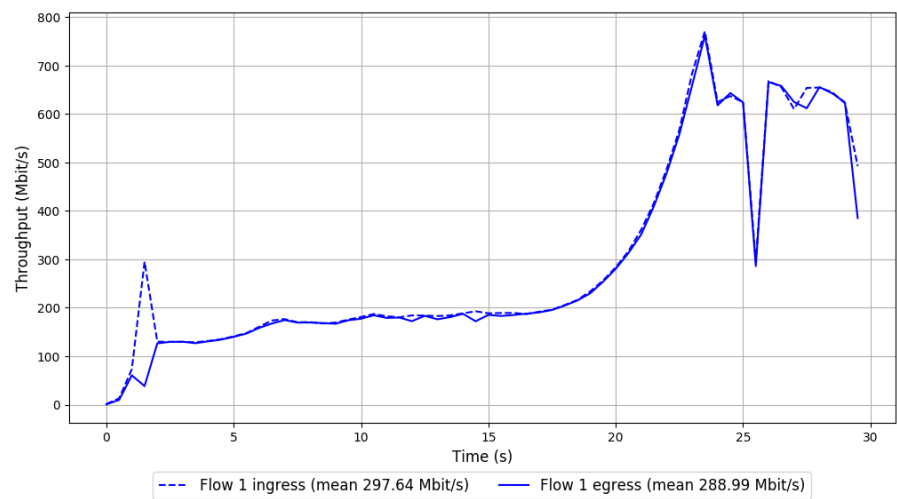
-- Flow 1:

Average throughput: 288.99 Mbit/s

95th percentile per-packet one-way delay: 84.601 ms

Loss rate: 3.33%

Run 4: Report of PCC — Data Link



Run 5: Statistics of PCC

Start at: 2017-08-17 05:19:01

End at: 2017-08-17 05:19:31

Below is generated by plot.py at 2017-08-17 08:52:49

Datalink statistics

-- Total of 1 flow:

Average throughput: 187.26 Mbit/s

95th percentile per-packet one-way delay: 112.342 ms

Loss rate: 5.97%

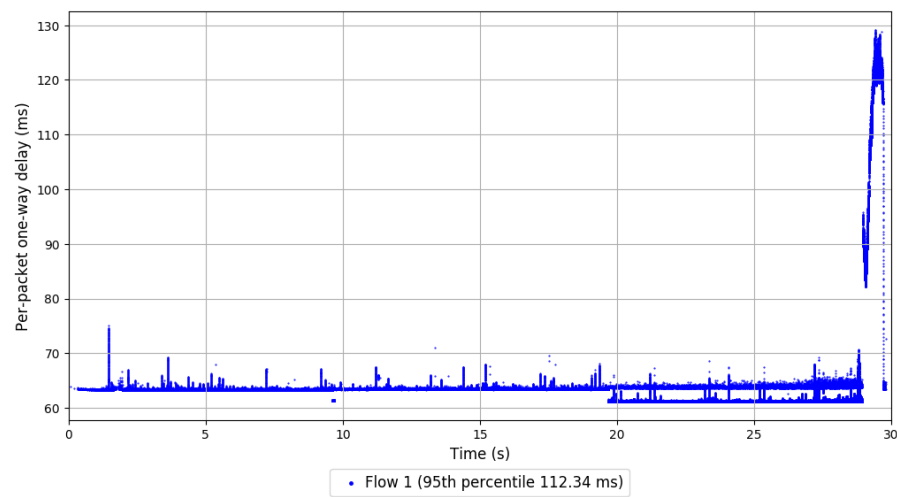
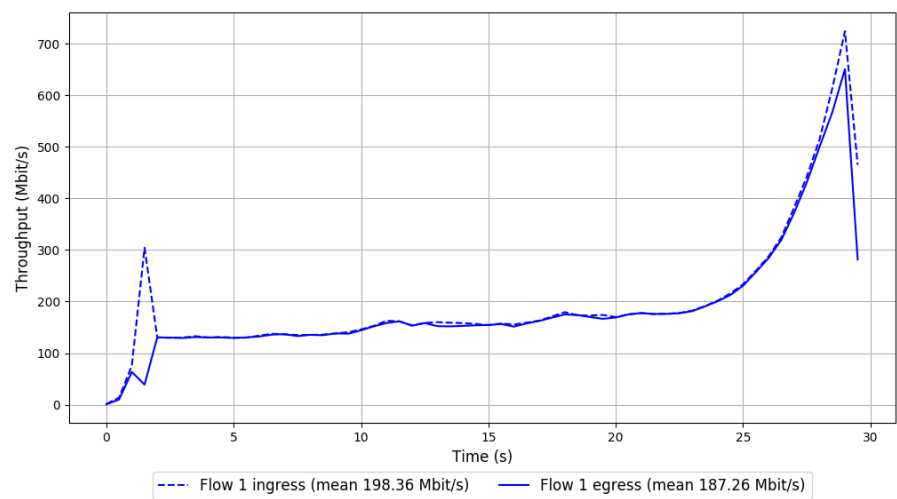
-- Flow 1:

Average throughput: 187.26 Mbit/s

95th percentile per-packet one-way delay: 112.342 ms

Loss rate: 5.97%

Run 5: Report of PCC — Data Link



Run 6: Statistics of PCC

Start at: 2017-08-17 05:29:17

End at: 2017-08-17 05:29:47

Below is generated by plot.py at 2017-08-17 08:53:38

Datalink statistics

-- Total of 1 flow:

Average throughput: 319.13 Mbit/s

95th percentile per-packet one-way delay: 66.367 ms

Loss rate: 38.28%

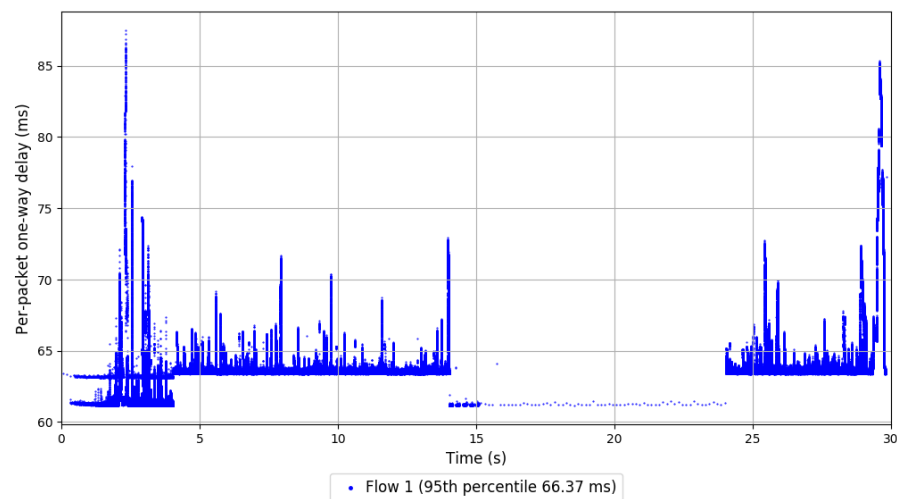
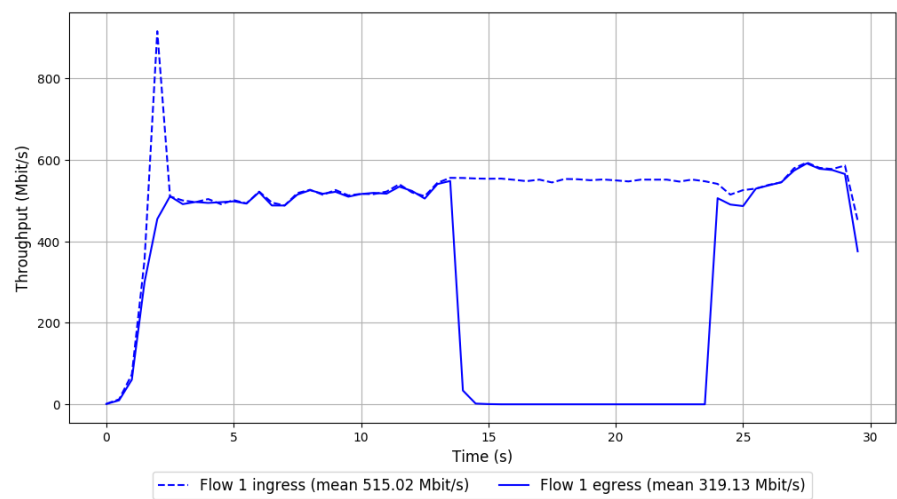
-- Flow 1:

Average throughput: 319.13 Mbit/s

95th percentile per-packet one-way delay: 66.367 ms

Loss rate: 38.28%

Run 6: Report of PCC — Data Link



Run 7: Statistics of PCC

Start at: 2017-08-17 05:39:36

End at: 2017-08-17 05:40:06

Below is generated by plot.py at 2017-08-17 08:53:38

Datalink statistics

-- Total of 1 flow:

Average throughput: 140.27 Mbit/s

95th percentile per-packet one-way delay: 63.486 ms

Loss rate: 16.89%

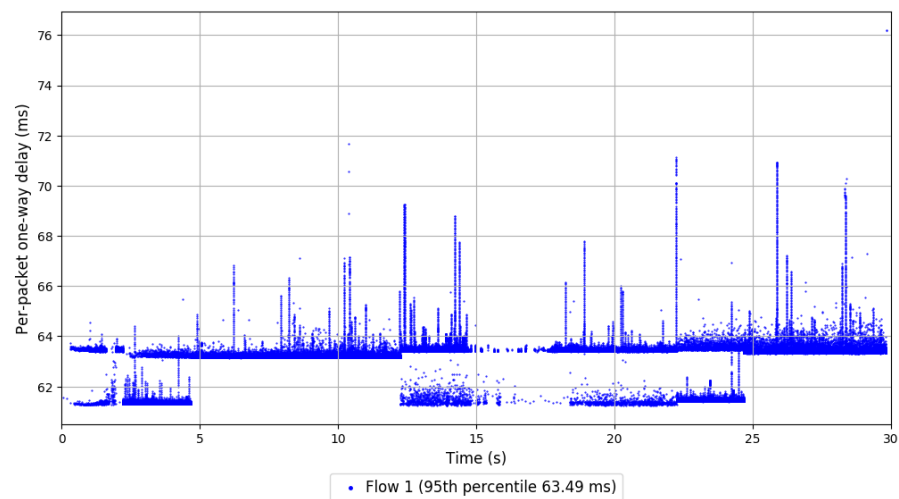
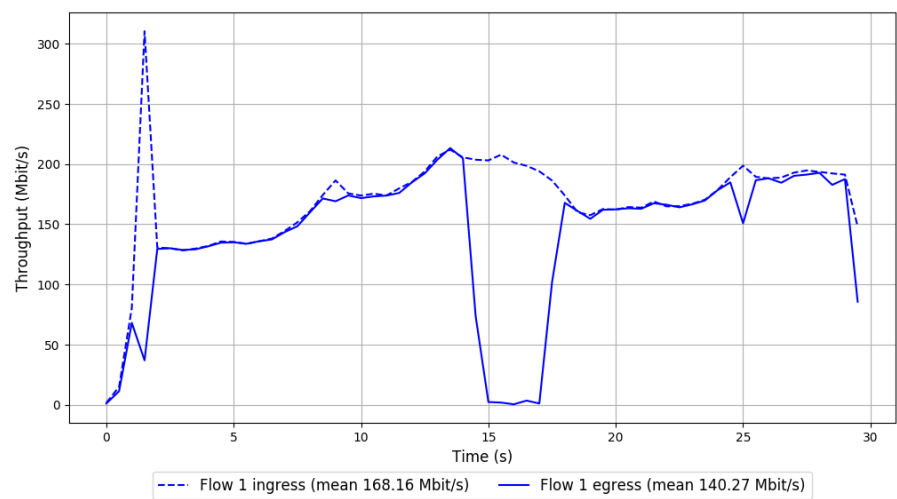
-- Flow 1:

Average throughput: 140.27 Mbit/s

95th percentile per-packet one-way delay: 63.486 ms

Loss rate: 16.89%

Run 7: Report of PCC — Data Link



Run 8: Statistics of PCC

Start at: 2017-08-17 05:50:05

End at: 2017-08-17 05:50:35

Below is generated by plot.py at 2017-08-17 08:54:54

Datalink statistics

-- Total of 1 flow:

Average throughput: 524.32 Mbit/s

95th percentile per-packet one-way delay: 79.639 ms

Loss rate: 1.29%

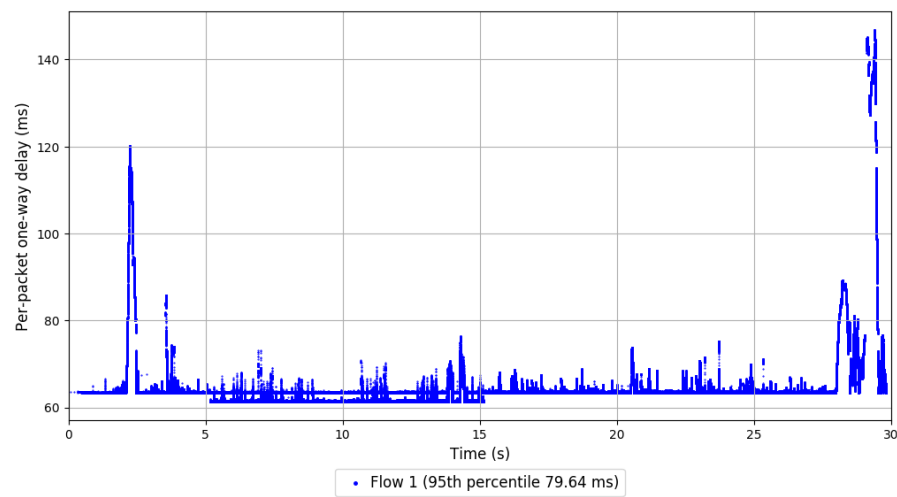
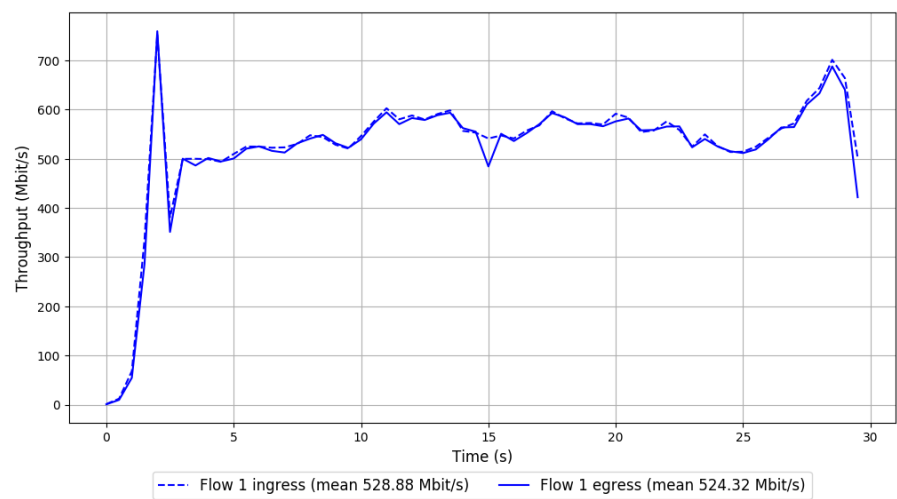
-- Flow 1:

Average throughput: 524.32 Mbit/s

95th percentile per-packet one-way delay: 79.639 ms

Loss rate: 1.29%

Run 8: Report of PCC — Data Link



Run 9: Statistics of PCC

Start at: 2017-08-17 06:00:50

End at: 2017-08-17 06:01:20

Below is generated by plot.py at 2017-08-17 08:55:15

Datalink statistics

-- Total of 1 flow:

Average throughput: 529.19 Mbit/s

95th percentile per-packet one-way delay: 150.188 ms

Loss rate: 8.07%

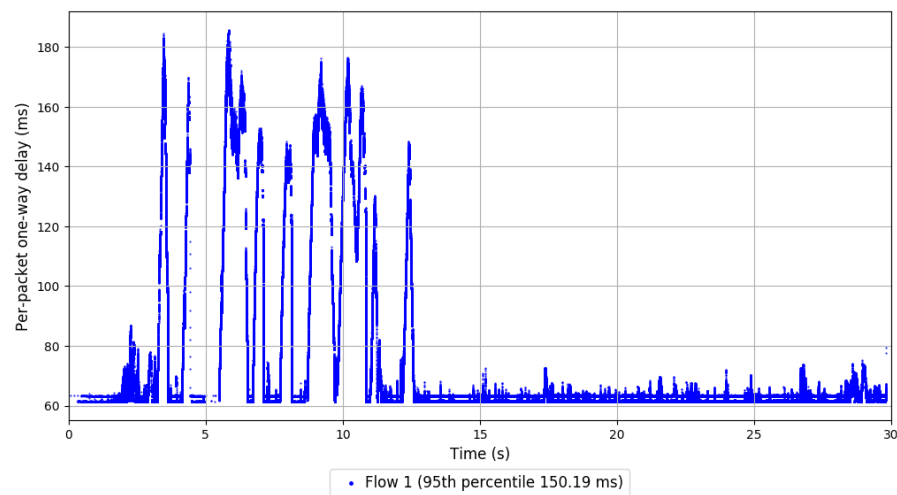
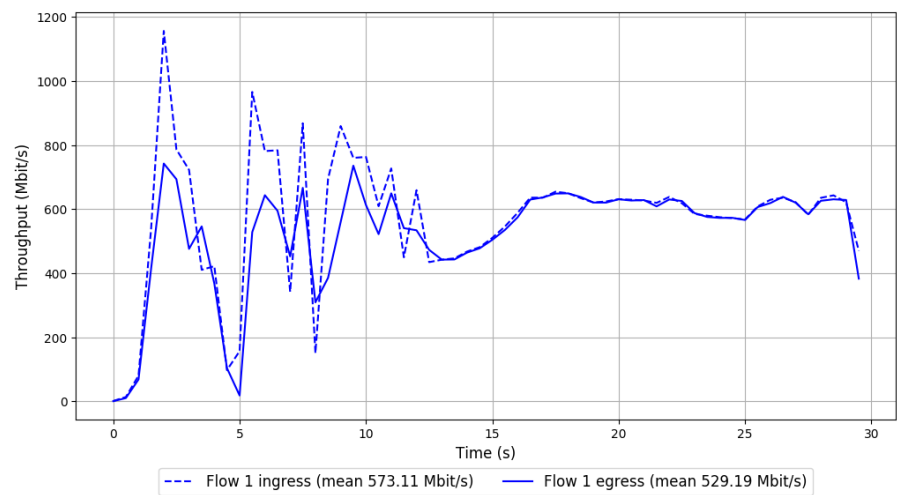
-- Flow 1:

Average throughput: 529.19 Mbit/s

95th percentile per-packet one-way delay: 150.188 ms

Loss rate: 8.07%

Run 9: Report of PCC — Data Link

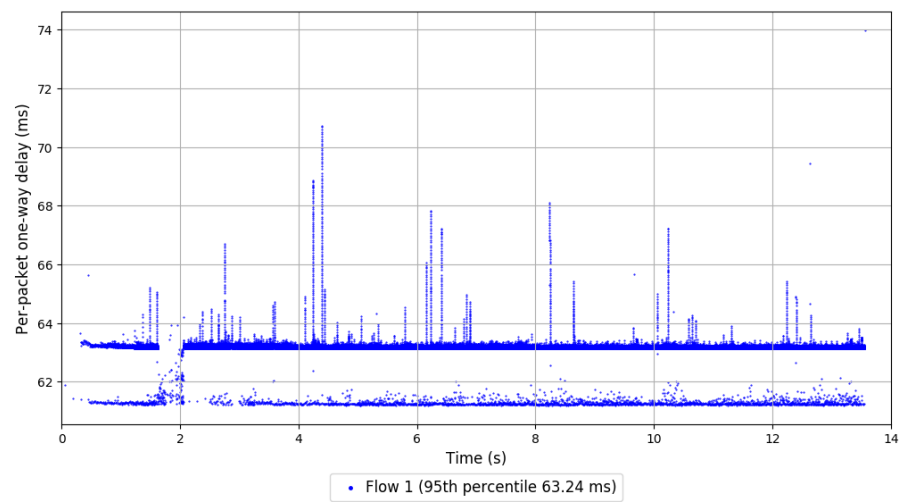
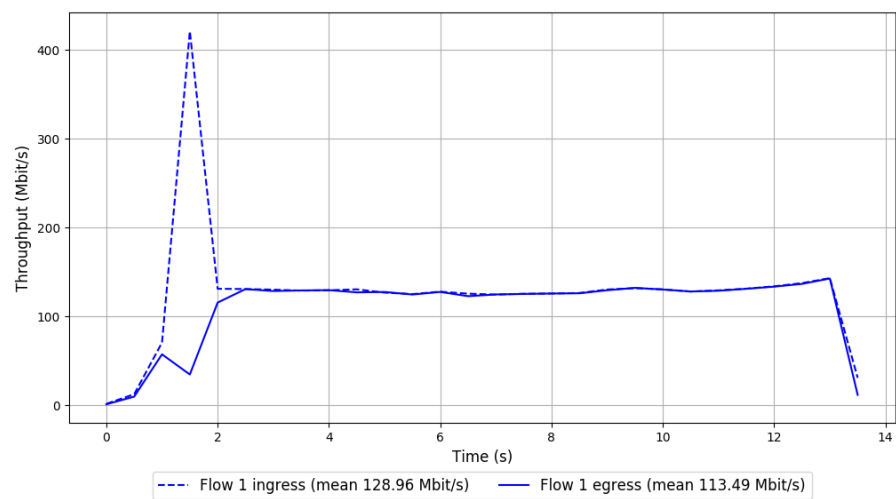


Run 10: Statistics of PCC

Start at: 2017-08-17 06:11:20

End at: 2017-08-17 06:11:50

Run 10: Report of PCC — Data Link

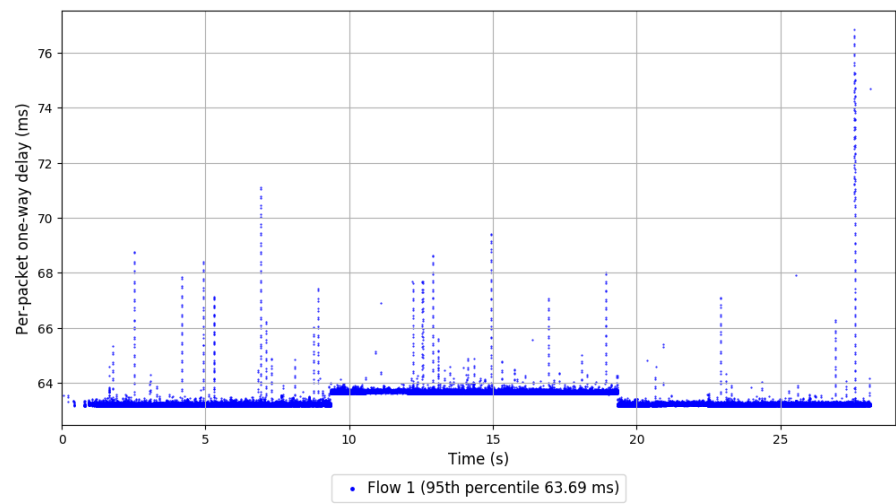
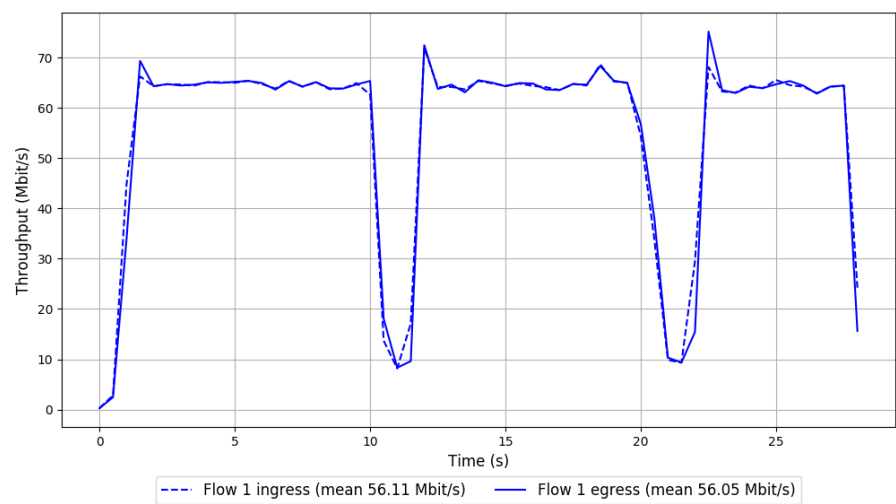


```
Run 1: Statistics of QUIC Cubic

Start at: 2017-08-17 04:31:00
End at: 2017-08-17 04:31:30

# Below is generated by plot.py at 2017-08-17 08:55:15
# Datalink statistics
-- Total of 1 flow:
Average throughput: 56.05 Mbit/s
95th percentile per-packet one-way delay: 63.693 ms
Loss rate: 0.53%
-- Flow 1:
Average throughput: 56.05 Mbit/s
95th percentile per-packet one-way delay: 63.693 ms
Loss rate: 0.53%
```

Run 1: Report of QUIC Cubic — Data Link



Run 2: Statistics of QUIC Cubic

Start at: 2017-08-17 04:41:23

End at: 2017-08-17 04:41:53

Below is generated by plot.py at 2017-08-17 08:55:17

Datalink statistics

-- Total of 1 flow:

Average throughput: 59.28 Mbit/s

95th percentile per-packet one-way delay: 63.272 ms

Loss rate: 0.46%

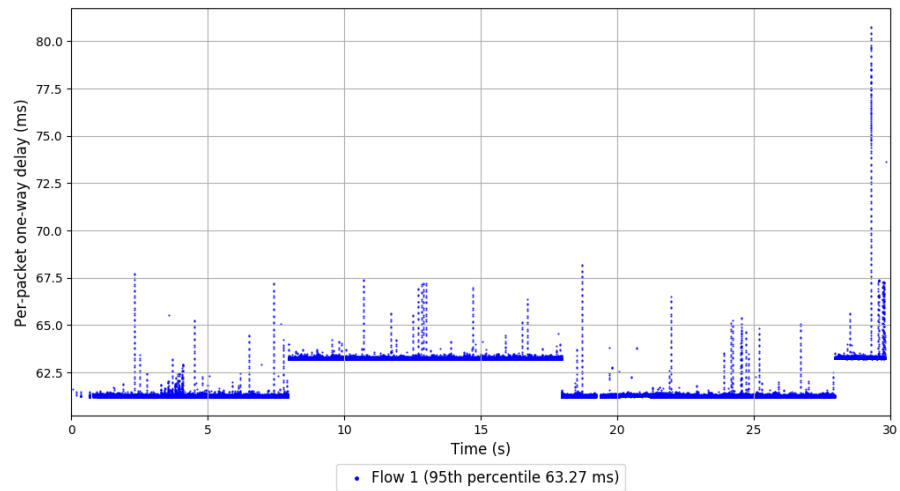
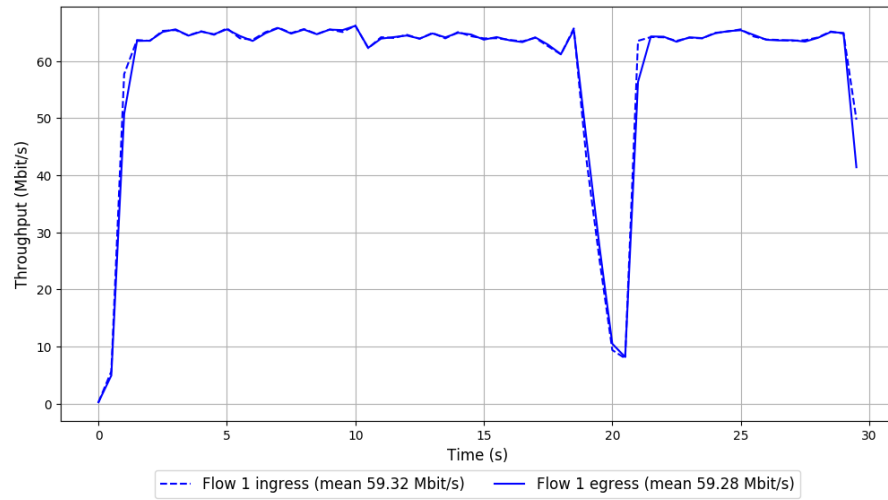
-- Flow 1:

Average throughput: 59.28 Mbit/s

95th percentile per-packet one-way delay: 63.272 ms

Loss rate: 0.46%

Run 2: Report of QUIC Cubic — Data Link



Run 3: Statistics of QUIC Cubic

Start at: 2017-08-17 04:51:53

End at: 2017-08-17 04:52:24

Below is generated by plot.py at 2017-08-17 08:55:24

Datalink statistics

-- Total of 1 flow:

Average throughput: 46.64 Mbit/s

95th percentile per-packet one-way delay: 63.480 ms

Loss rate: 0.59%

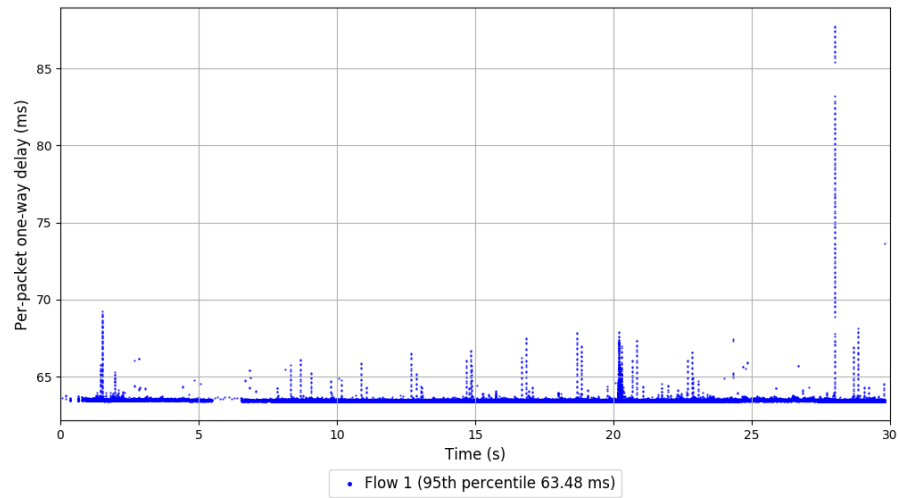
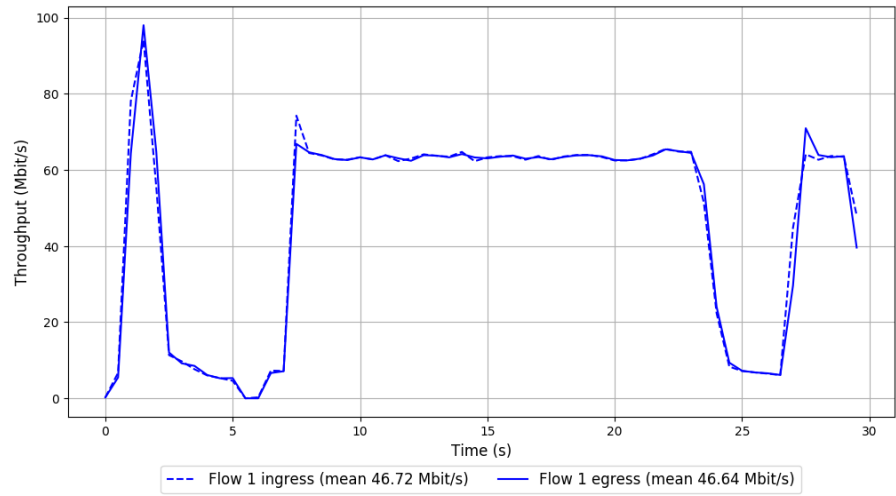
-- Flow 1:

Average throughput: 46.64 Mbit/s

95th percentile per-packet one-way delay: 63.480 ms

Loss rate: 0.59%

Run 3: Report of QUIC Cubic — Data Link



Run 4: Statistics of QUIC Cubic

Start at: 2017-08-17 05:02:11

End at: 2017-08-17 05:02:41

Below is generated by plot.py at 2017-08-17 08:55:32

Datalink statistics

-- Total of 1 flow:

Average throughput: 57.67 Mbit/s

95th percentile per-packet one-way delay: 63.459 ms

Loss rate: 0.47%

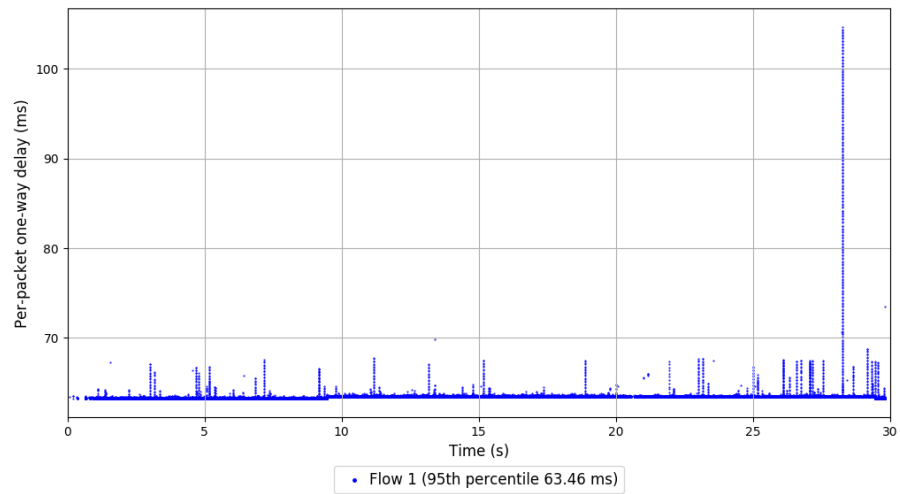
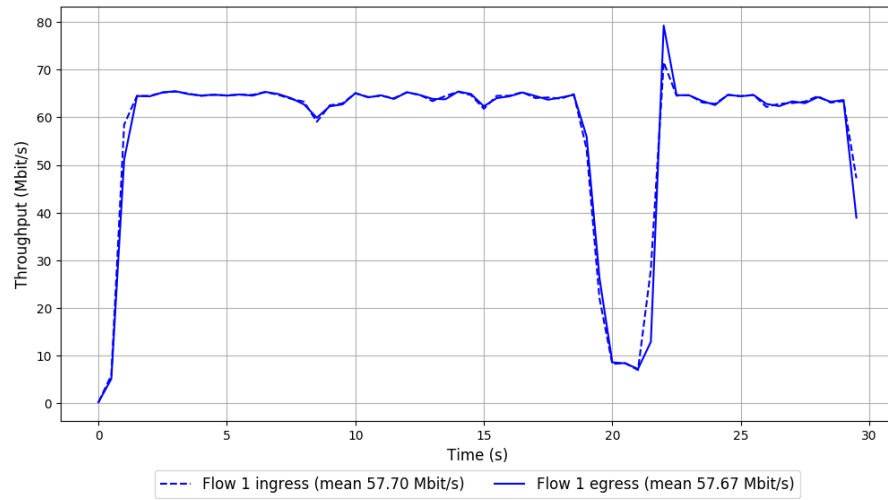
-- Flow 1:

Average throughput: 57.67 Mbit/s

95th percentile per-packet one-way delay: 63.459 ms

Loss rate: 0.47%

Run 4: Report of QUIC Cubic — Data Link



Run 5: Statistics of QUIC Cubic

Start at: 2017-08-17 05:12:26

End at: 2017-08-17 05:12:56

Below is generated by plot.py at 2017-08-17 08:55:34

Datalink statistics

-- Total of 1 flow:

Average throughput: 58.52 Mbit/s

95th percentile per-packet one-way delay: 63.465 ms

Loss rate: 0.45%

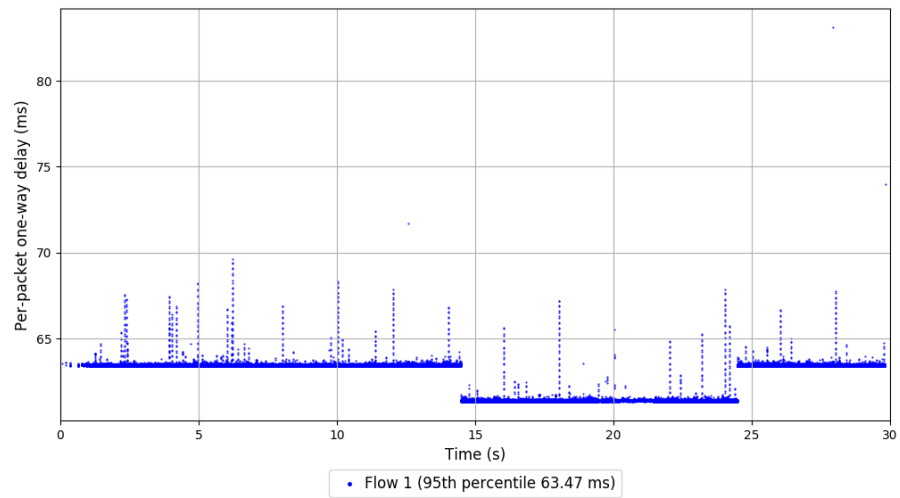
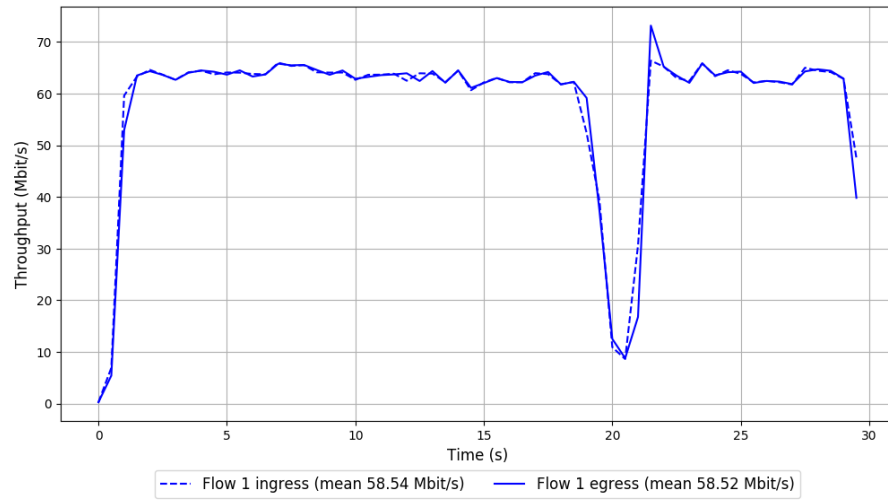
-- Flow 1:

Average throughput: 58.52 Mbit/s

95th percentile per-packet one-way delay: 63.465 ms

Loss rate: 0.45%

Run 5: Report of QUIC Cubic — Data Link



Run 6: Statistics of QUIC Cubic

Start at: 2017-08-17 05:22:58

End at: 2017-08-17 05:23:28

Below is generated by plot.py at 2017-08-17 08:55:43

Datalink statistics

-- Total of 1 flow:

Average throughput: 58.09 Mbit/s

95th percentile per-packet one-way delay: 63.530 ms

Loss rate: 0.48%

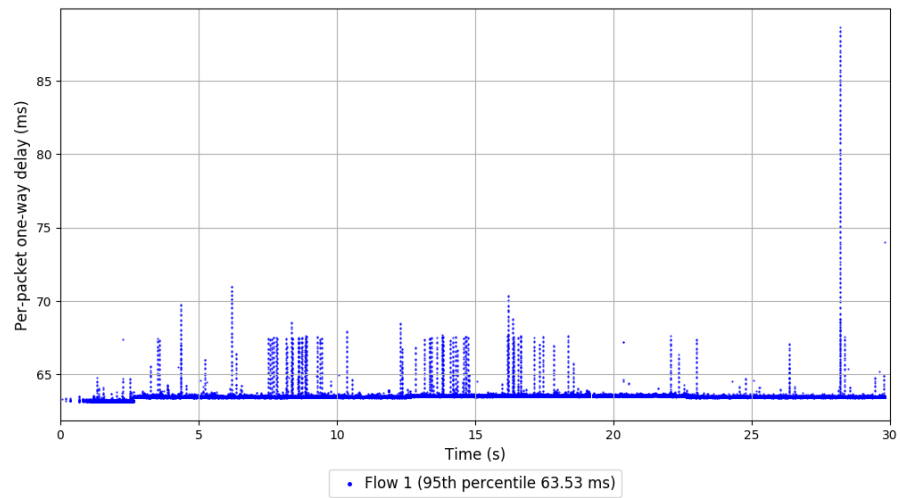
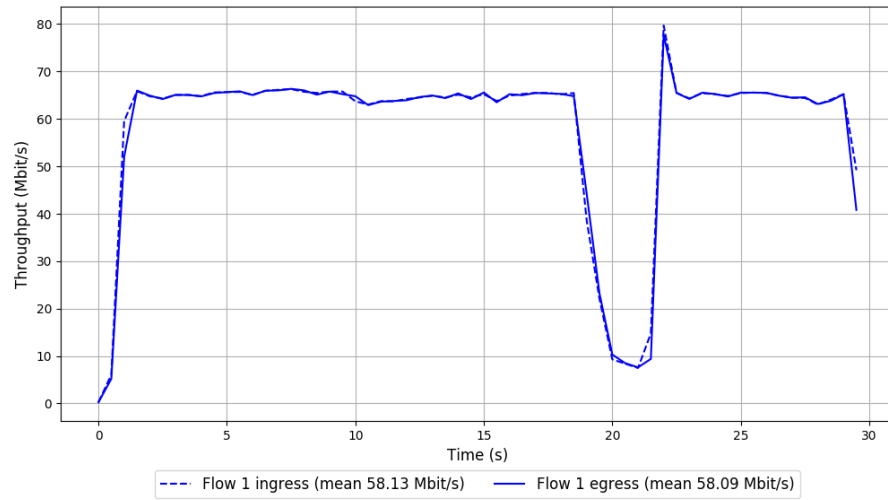
-- Flow 1:

Average throughput: 58.09 Mbit/s

95th percentile per-packet one-way delay: 63.530 ms

Loss rate: 0.48%

Run 6: Report of QUIC Cubic — Data Link



Run 7: Statistics of QUIC Cubic

Start at: 2017-08-17 05:33:25

End at: 2017-08-17 05:33:55

Below is generated by plot.py at 2017-08-17 08:55:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 49.00 Mbit/s

95th percentile per-packet one-way delay: 63.516 ms

Loss rate: 0.58%

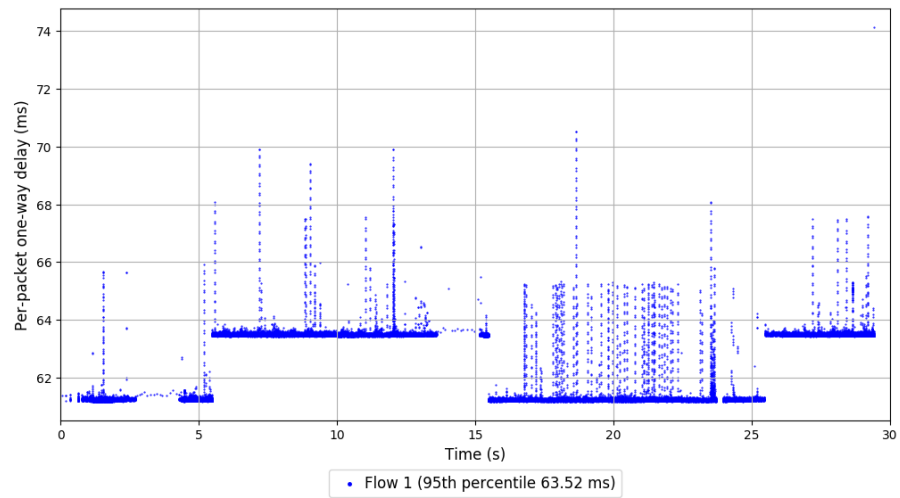
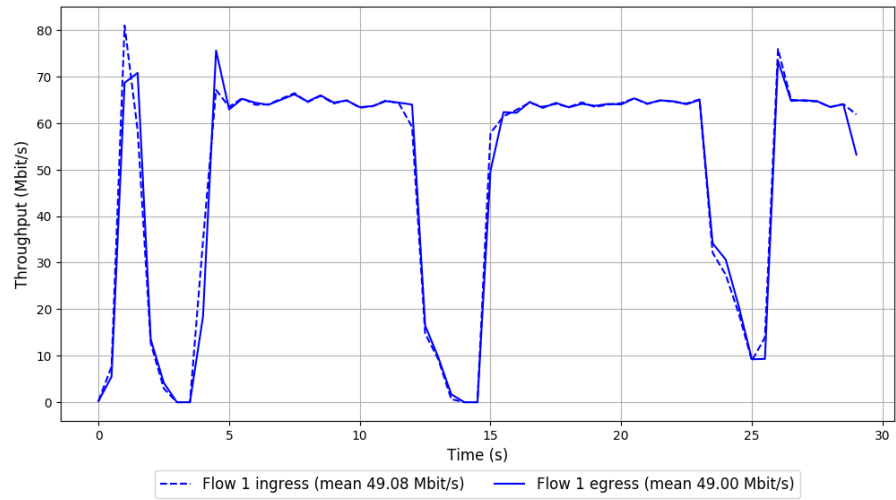
-- Flow 1:

Average throughput: 49.00 Mbit/s

95th percentile per-packet one-way delay: 63.516 ms

Loss rate: 0.58%

Run 7: Report of QUIC Cubic — Data Link



Run 8: Statistics of QUIC Cubic

Start at: 2017-08-17 05:43:38

End at: 2017-08-17 05:44:08

Below is generated by plot.py at 2017-08-17 08:55:56

Datalink statistics

-- Total of 1 flow:

Average throughput: 56.71 Mbit/s

95th percentile per-packet one-way delay: 63.537 ms

Loss rate: 0.51%

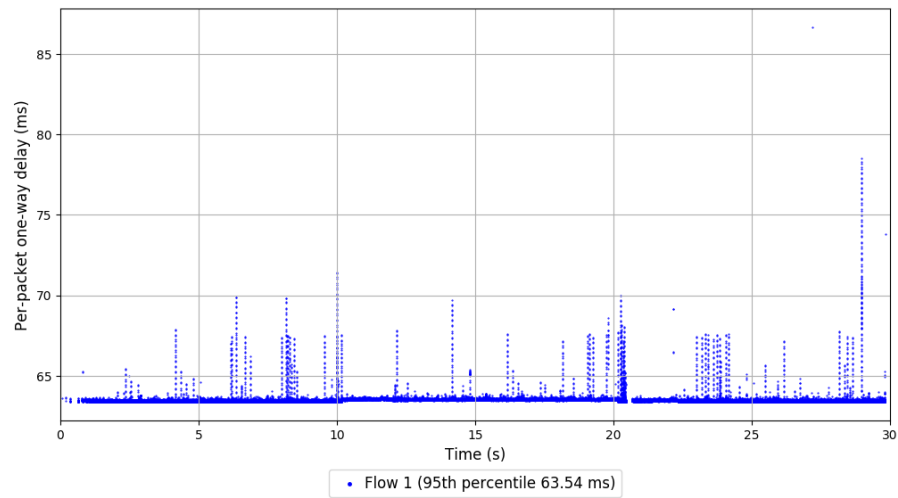
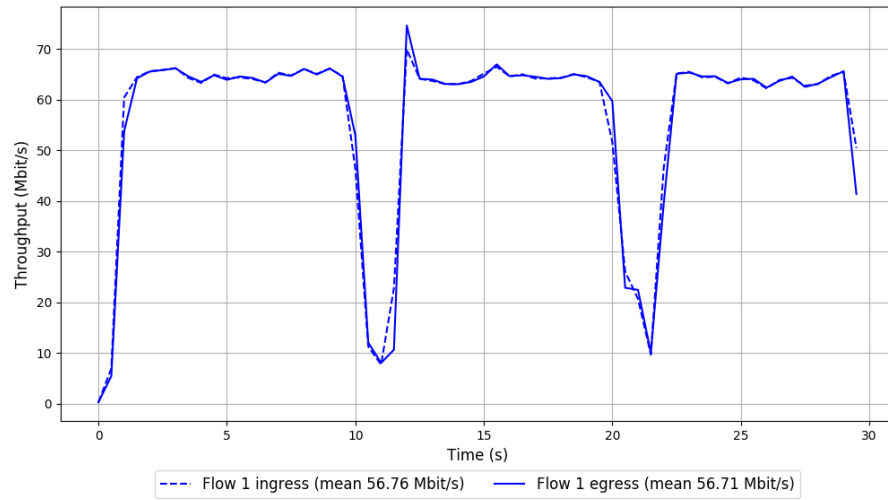
-- Flow 1:

Average throughput: 56.71 Mbit/s

95th percentile per-packet one-way delay: 63.537 ms

Loss rate: 0.51%

Run 8: Report of QUIC Cubic — Data Link



Run 9: Statistics of QUIC Cubic

Start at: 2017-08-17 05:54:14

End at: 2017-08-17 05:54:44

Below is generated by plot.py at 2017-08-17 08:55:57

Datalink statistics

-- Total of 1 flow:

Average throughput: 56.30 Mbit/s

95th percentile per-packet one-way delay: 63.500 ms

Loss rate: 0.48%

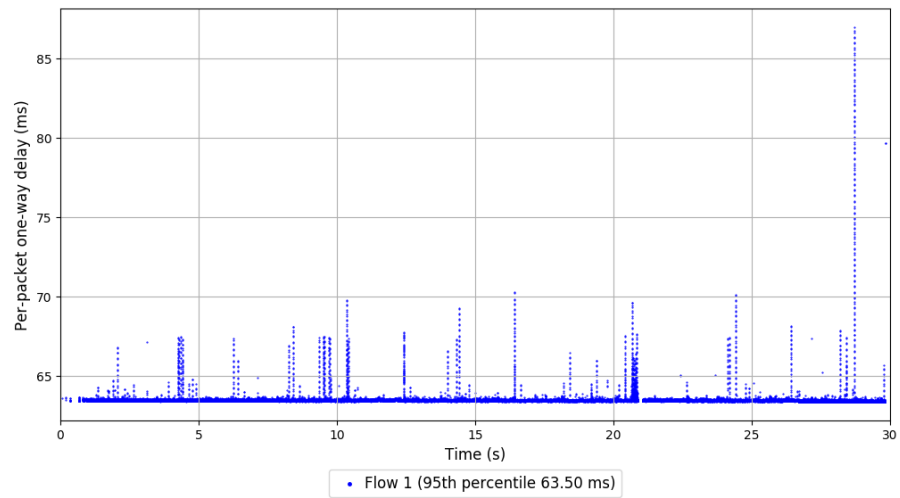
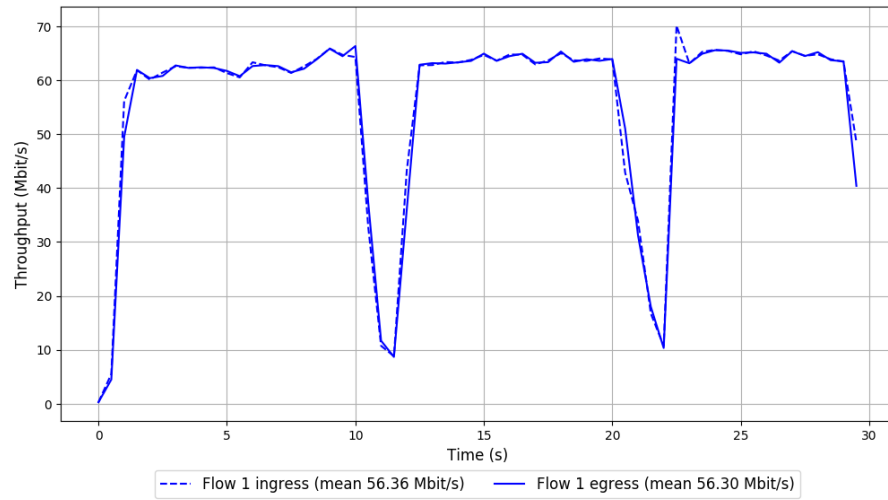
-- Flow 1:

Average throughput: 56.30 Mbit/s

95th percentile per-packet one-way delay: 63.500 ms

Loss rate: 0.48%

Run 9: Report of QUIC Cubic — Data Link

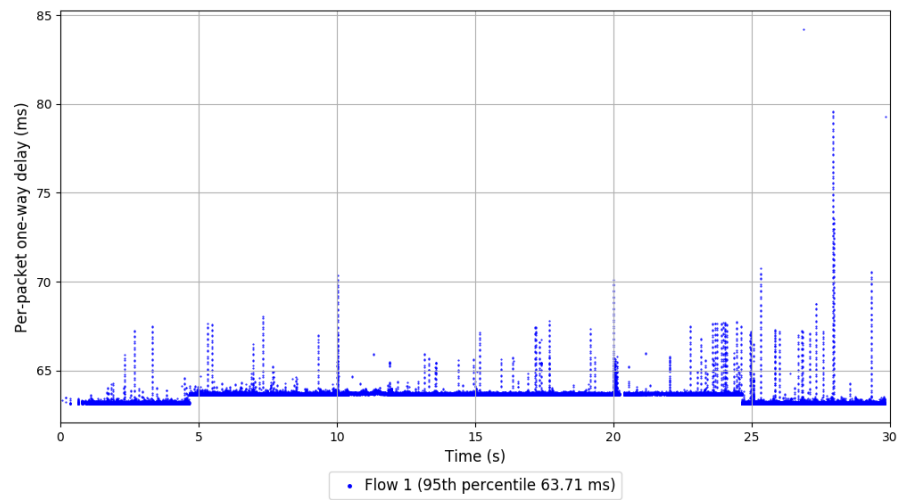
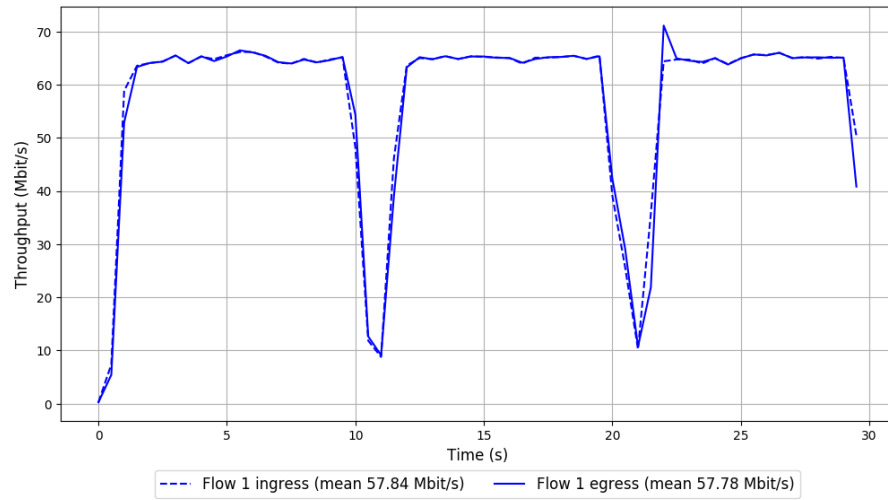


```
Run 10: Statistics of QUIC Cubic

Start at: 2017-08-17 06:05:06
End at: 2017-08-17 06:05:36

# Below is generated by plot.py at 2017-08-17 08:56:08
# Datalink statistics
-- Total of 1 flow:
Average throughput: 57.78 Mbit/s
95th percentile per-packet one-way delay: 63.709 ms
Loss rate: 0.51%
-- Flow 1:
Average throughput: 57.78 Mbit/s
95th percentile per-packet one-way delay: 63.709 ms
Loss rate: 0.51%
```

Run 10: Report of QUIC Cubic — Data Link

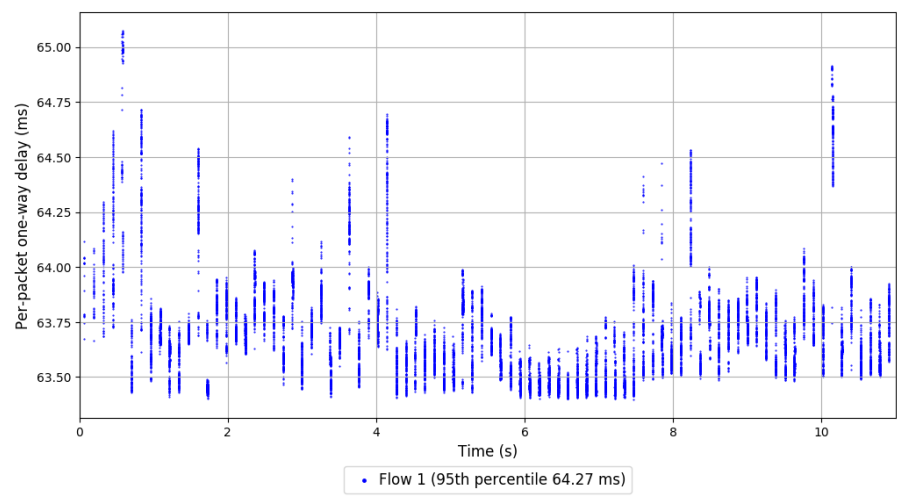
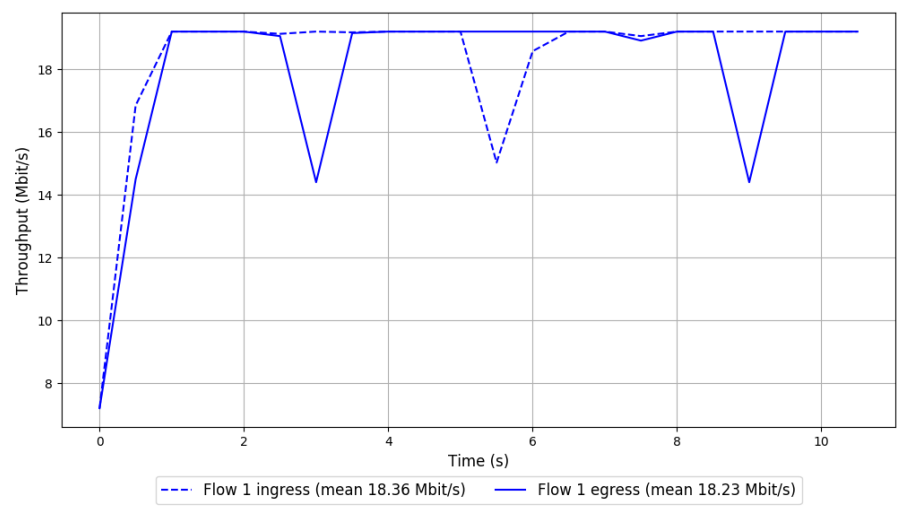


Run 1: Statistics of Saturator

Start at: 2017-08-17 04:32:33

End at: 2017-08-17 04:33:03

Run 1: Report of Saturator — Data Link

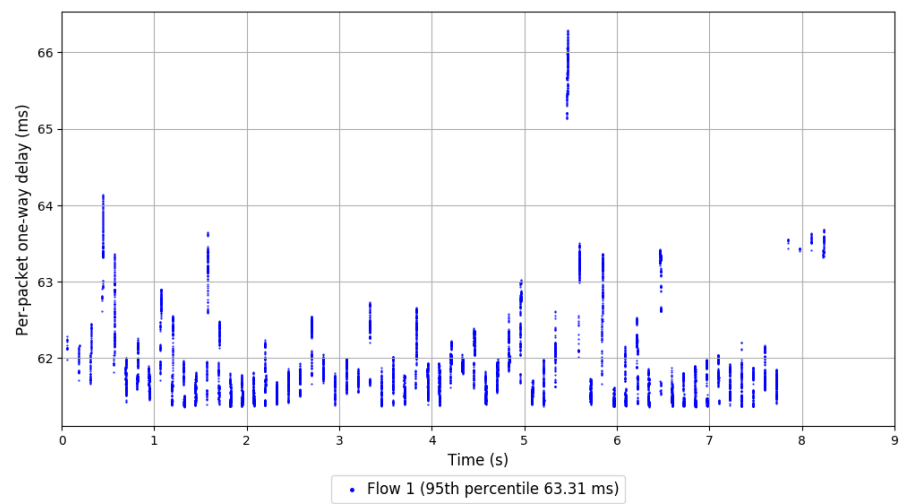
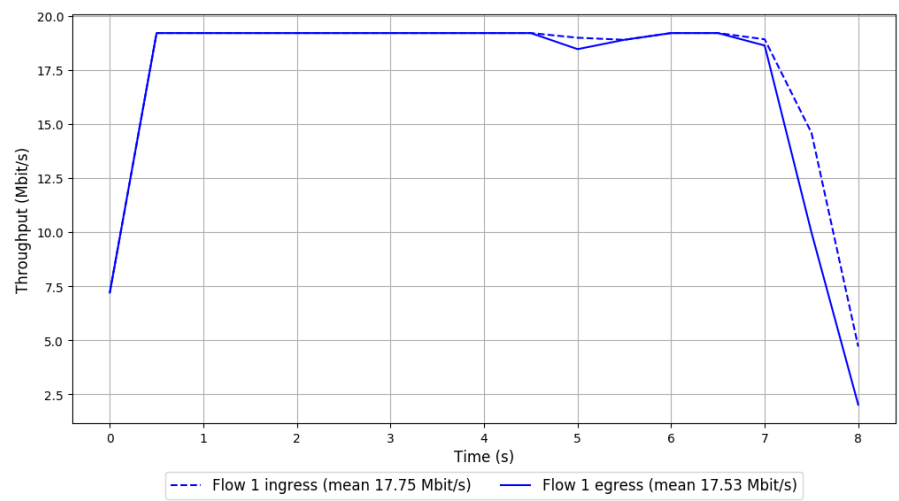


Run 2: Statistics of Saturator

Start at: 2017-08-17 04:42:53

End at: 2017-08-17 04:43:23

Run 2: Report of Saturator — Data Link

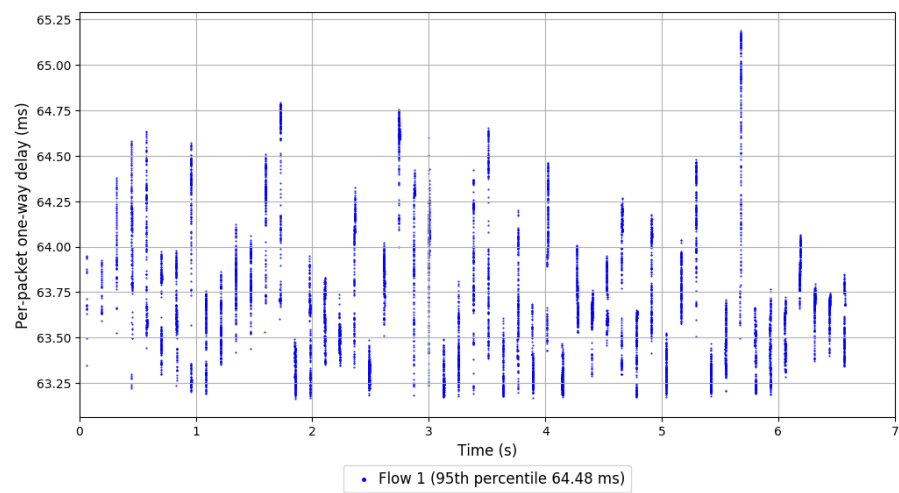
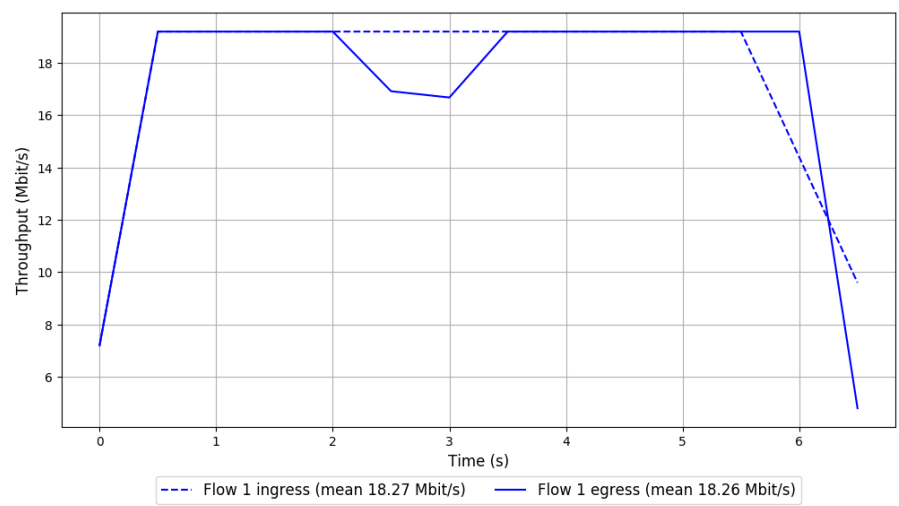


Run 3: Statistics of Saturator

Start at: 2017-08-17 04:53:32

End at: 2017-08-17 04:54:02

Run 3: Report of Saturator — Data Link

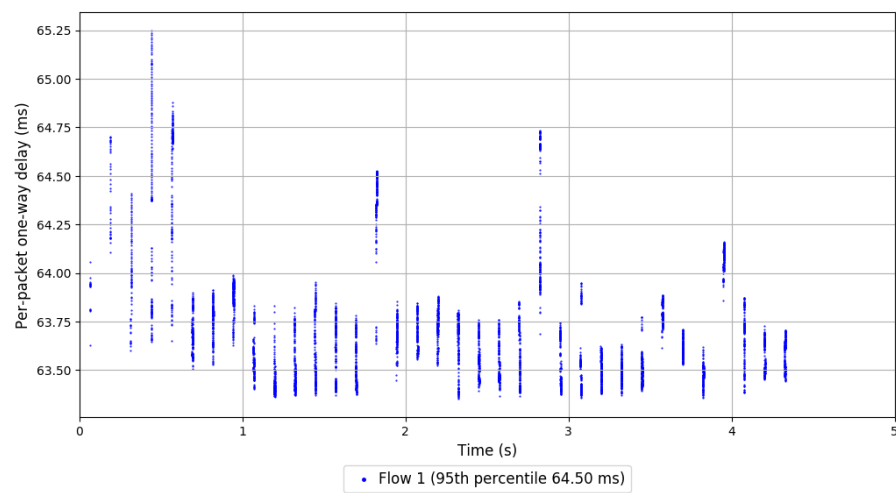
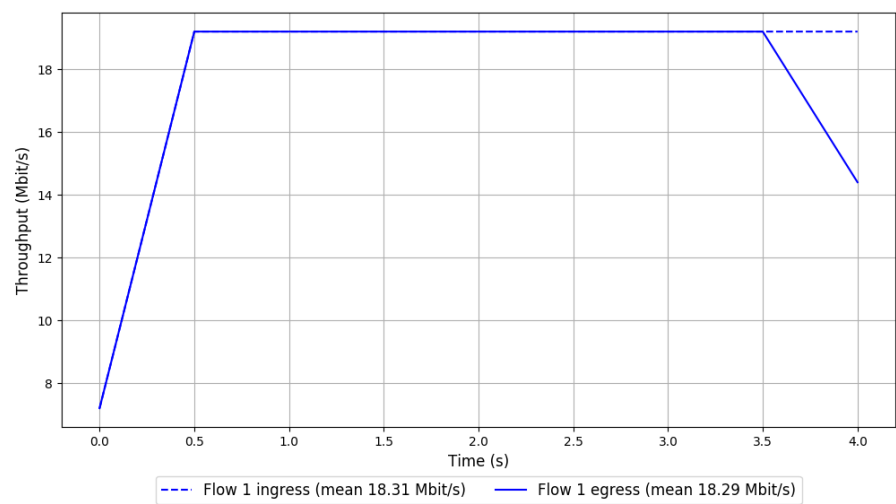


Run 4: Statistics of Saturator

Start at: 2017-08-17 05:03:36

End at: 2017-08-17 05:04:06

Run 4: Report of Saturator — Data Link



Run 5: Statistics of Saturator

Start at: 2017-08-17 05:14:08

End at: 2017-08-17 05:14:38

Below is generated by plot.py at 2017-08-17 08:56:08

Datalink statistics

-- Total of 1 flow:

Average throughput: 18.53 Mbit/s

95th percentile per-packet one-way delay: 64.490 ms

Loss rate: 0.48%

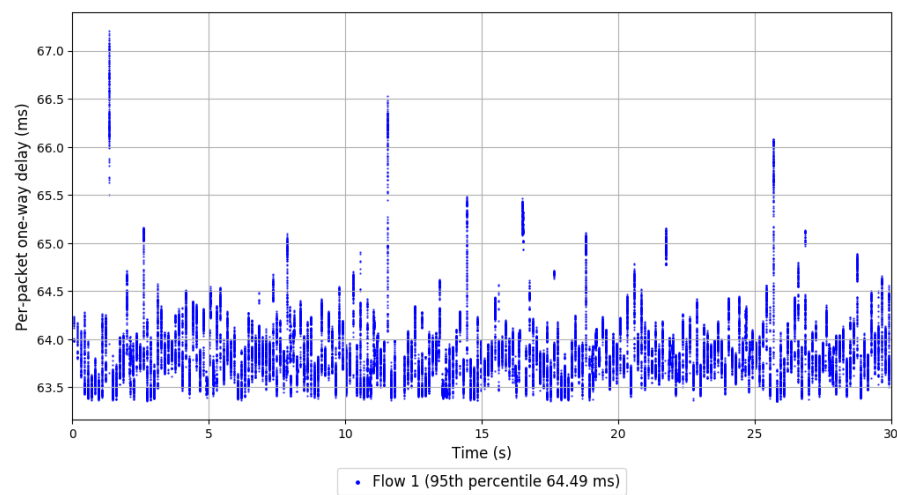
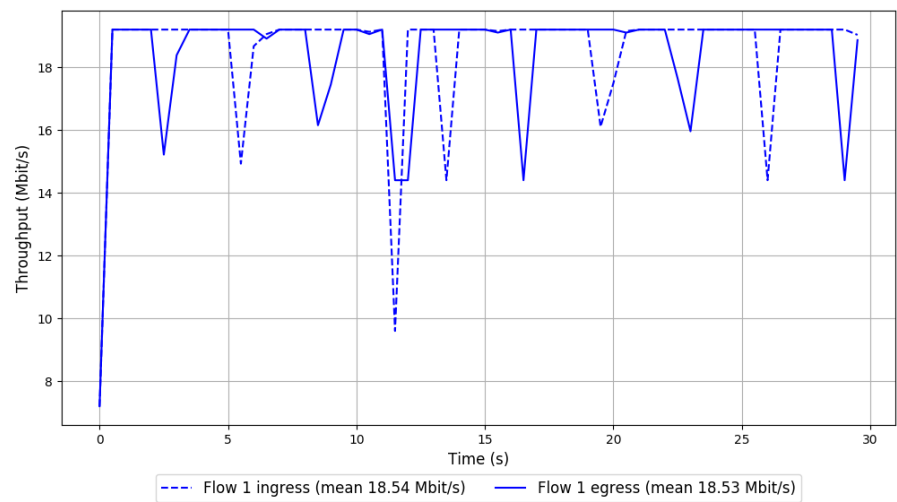
-- Flow 1:

Average throughput: 18.53 Mbit/s

95th percentile per-packet one-way delay: 64.490 ms

Loss rate: 0.48%

Run 5: Report of Saturator — Data Link



Run 6: Statistics of Saturator

Start at: 2017-08-17 05:24:21

End at: 2017-08-17 05:24:51

Below is generated by plot.py at 2017-08-17 08:56:14

Datalink statistics

-- Total of 1 flow:

Average throughput: 19.09 Mbit/s

95th percentile per-packet one-way delay: 64.334 ms

Loss rate: 0.66%

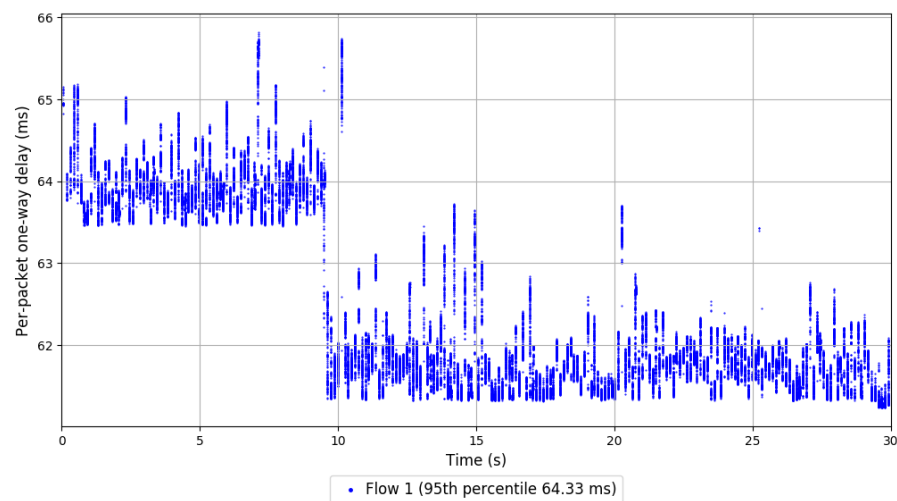
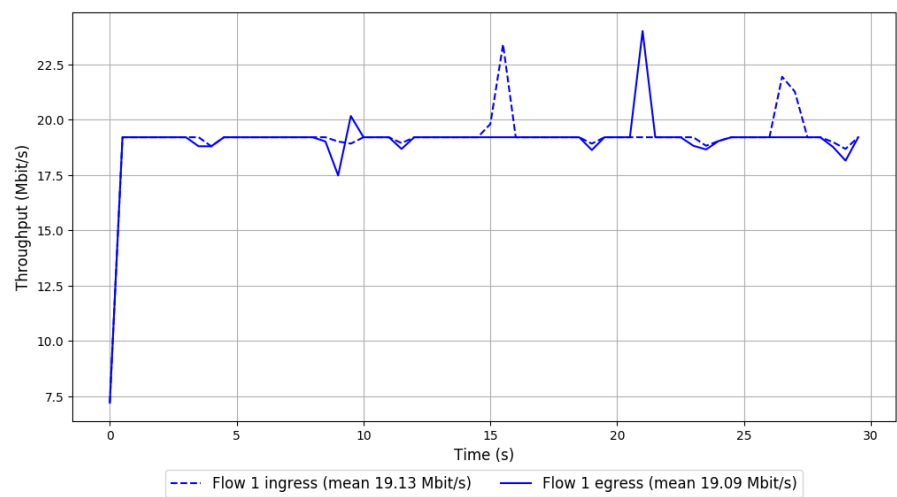
-- Flow 1:

Average throughput: 19.09 Mbit/s

95th percentile per-packet one-way delay: 64.334 ms

Loss rate: 0.66%

Run 6: Report of Saturator — Data Link

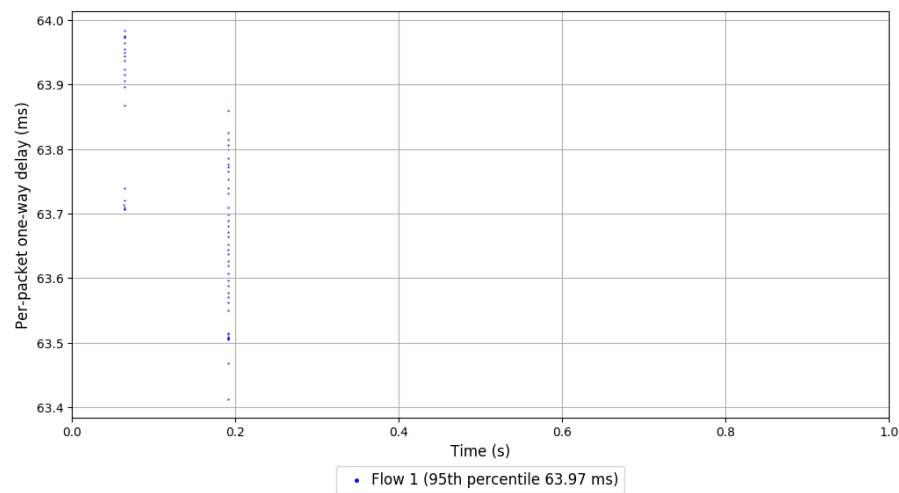
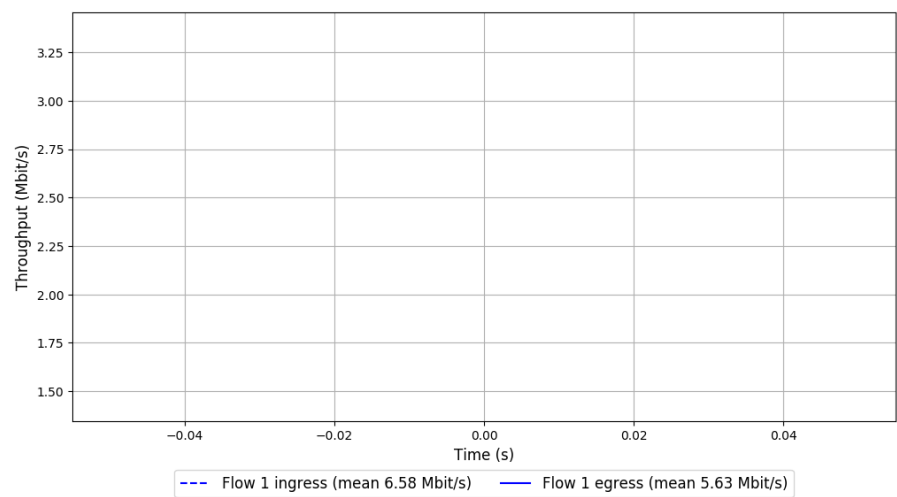


Run 7: Statistics of Saturator

Start at: 2017-08-17 05:34:48

End at: 2017-08-17 05:35:18

Run 7: Report of Saturator — Data Link

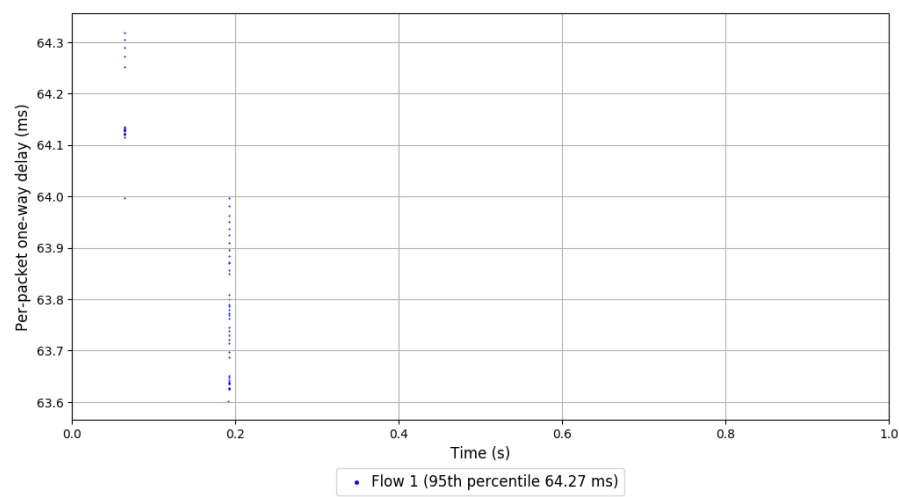
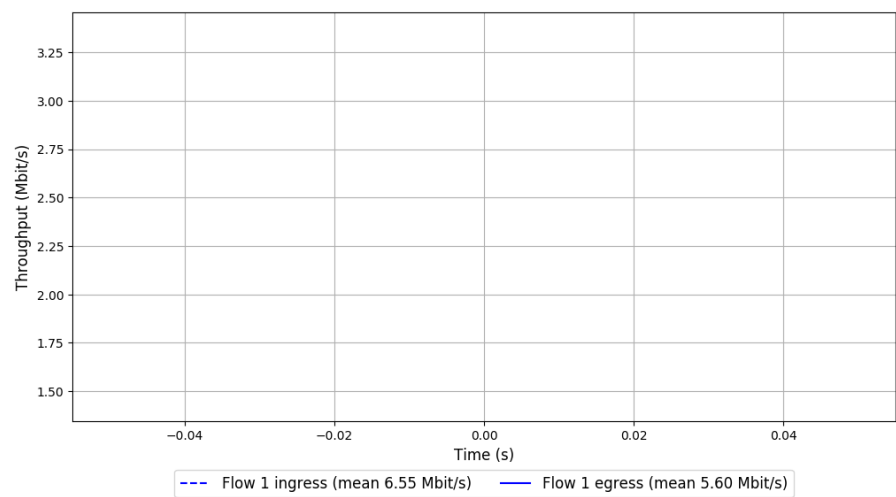


Run 8: Statistics of Saturator

Start at: 2017-08-17 05:45:17

End at: 2017-08-17 05:45:47

Run 8: Report of Saturator — Data Link

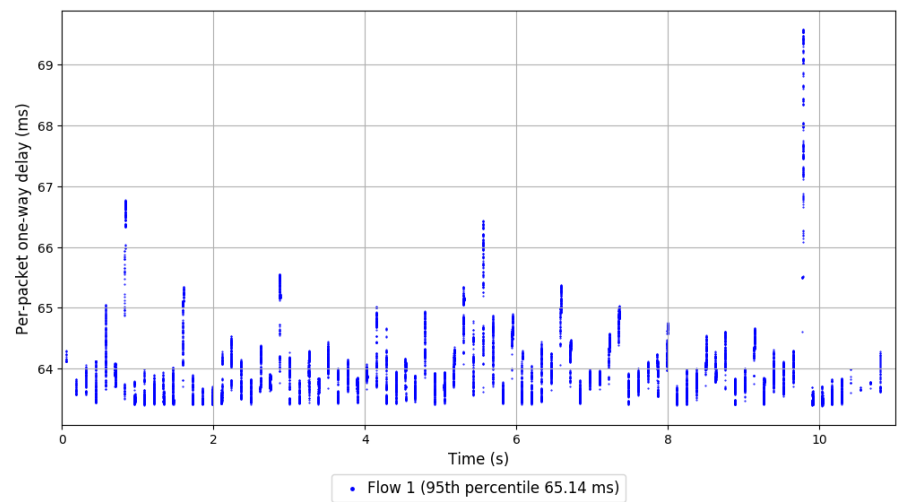
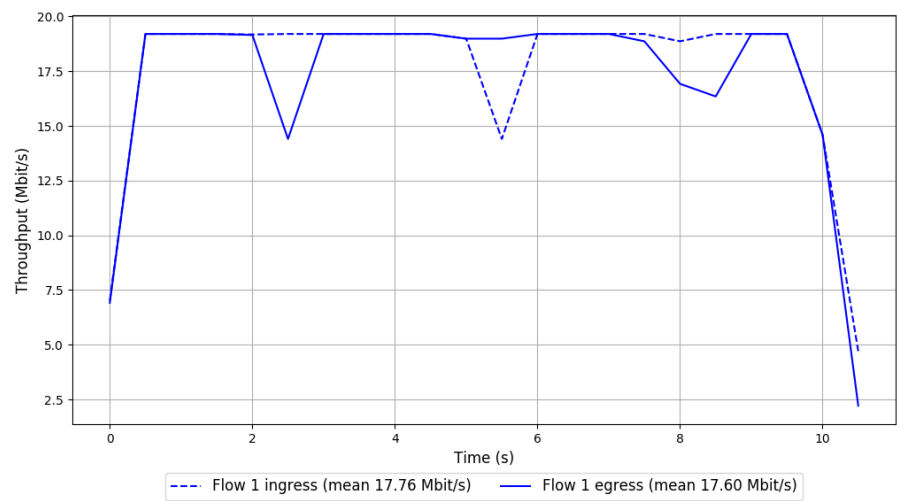


Run 9: Statistics of Saturator

Start at: 2017-08-17 05:55:40

End at: 2017-08-17 05:56:10

Run 9: Report of Saturator — Data Link

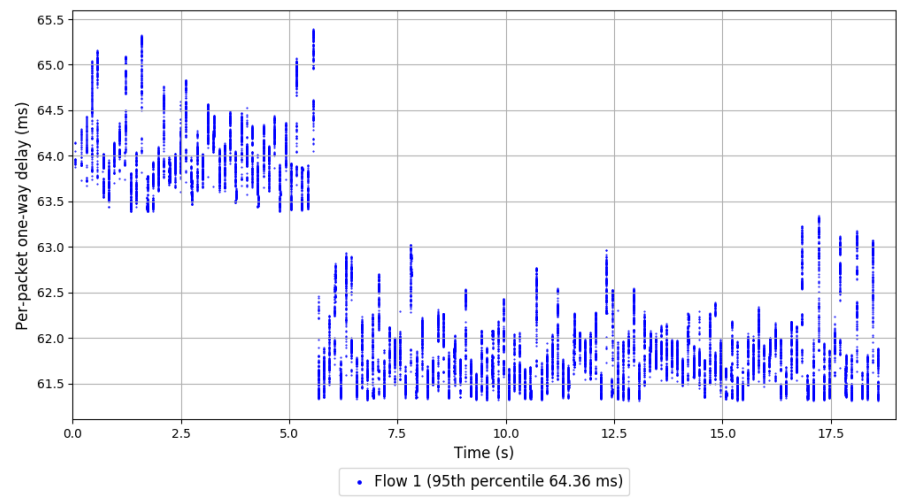
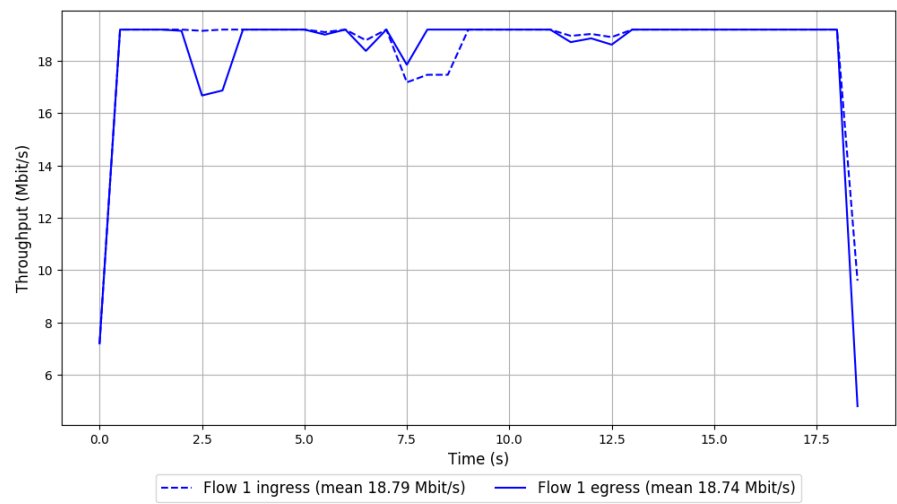


Run 10: Statistics of Saturator

Start at: 2017-08-17 06:06:25

End at: 2017-08-17 06:06:55

Run 10: Report of Saturator — Data Link

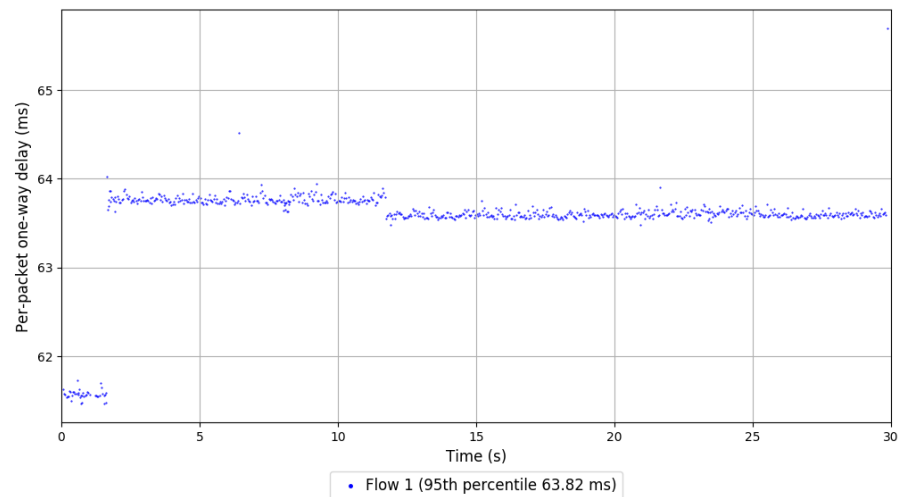
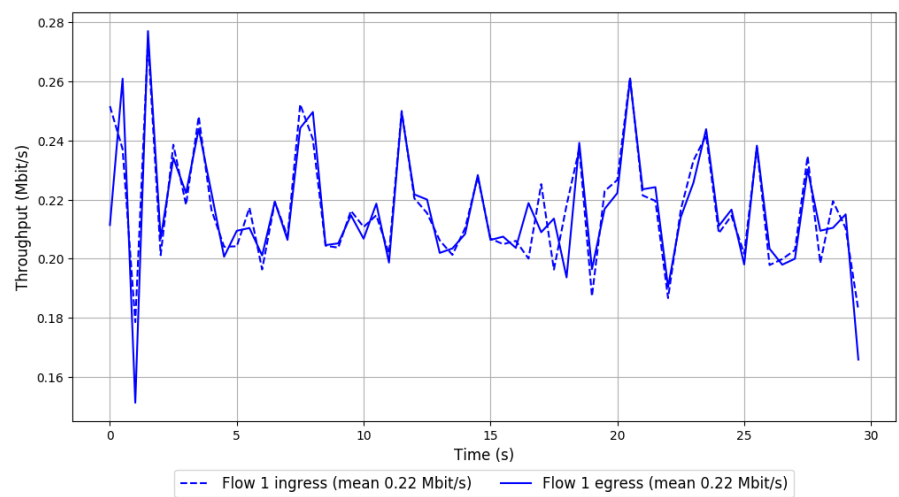


```
Run 1: Statistics of SCReAM

Start at: 2017-08-17 04:39:29
End at: 2017-08-17 04:39:59

# Below is generated by plot.py at 2017-08-17 08:56:16
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 63.822 ms
Loss rate: 0.38%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 63.822 ms
Loss rate: 0.38%
```

Run 1: Report of SReAM — Data Link

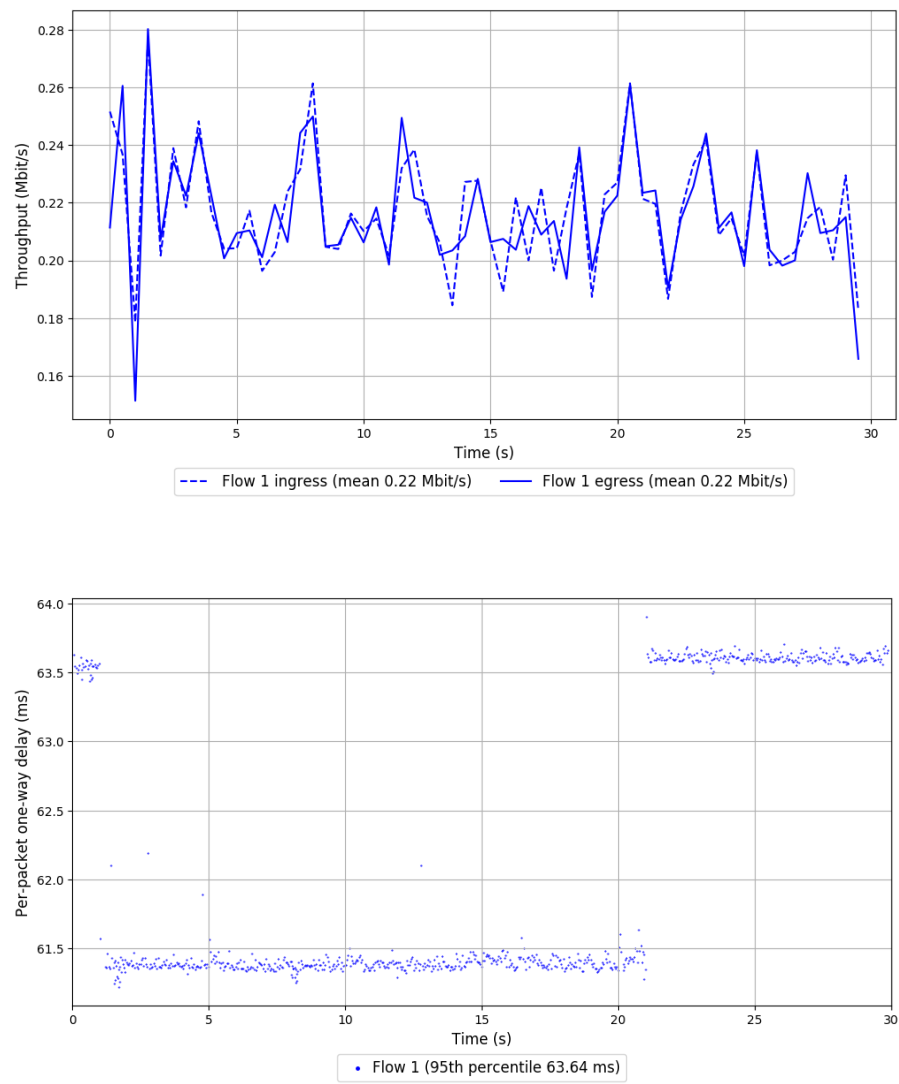


```
Run 2: Statistics of SCReAM

Start at: 2017-08-17 04:50:00
End at: 2017-08-17 04:50:30

# Below is generated by plot.py at 2017-08-17 08:56:16
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 63.639 ms
Loss rate: 0.38%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 63.639 ms
Loss rate: 0.38%
```

Run 2: Report of SReAM — Data Link



Run 3: Statistics of SCReAM

Start at: 2017-08-17 05:00:18

End at: 2017-08-17 05:00:48

Below is generated by plot.py at 2017-08-17 08:56:17

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.681 ms

Loss rate: 0.38%

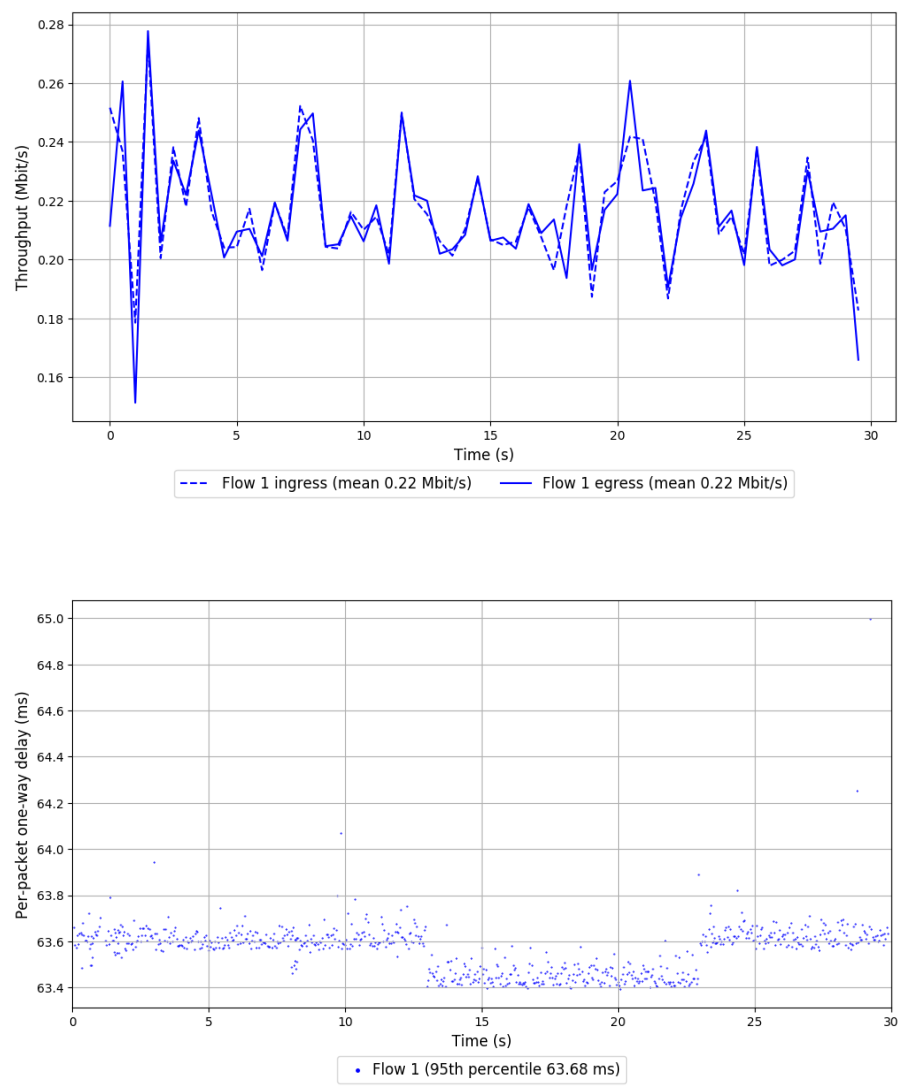
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.681 ms

Loss rate: 0.38%

Run 3: Report of SReAM — Data Link



Run 4: Statistics of SCReAM

Start at: 2017-08-17 05:10:32

End at: 2017-08-17 05:11:02

Below is generated by plot.py at 2017-08-17 08:56:18

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.728 ms

Loss rate: 0.51%

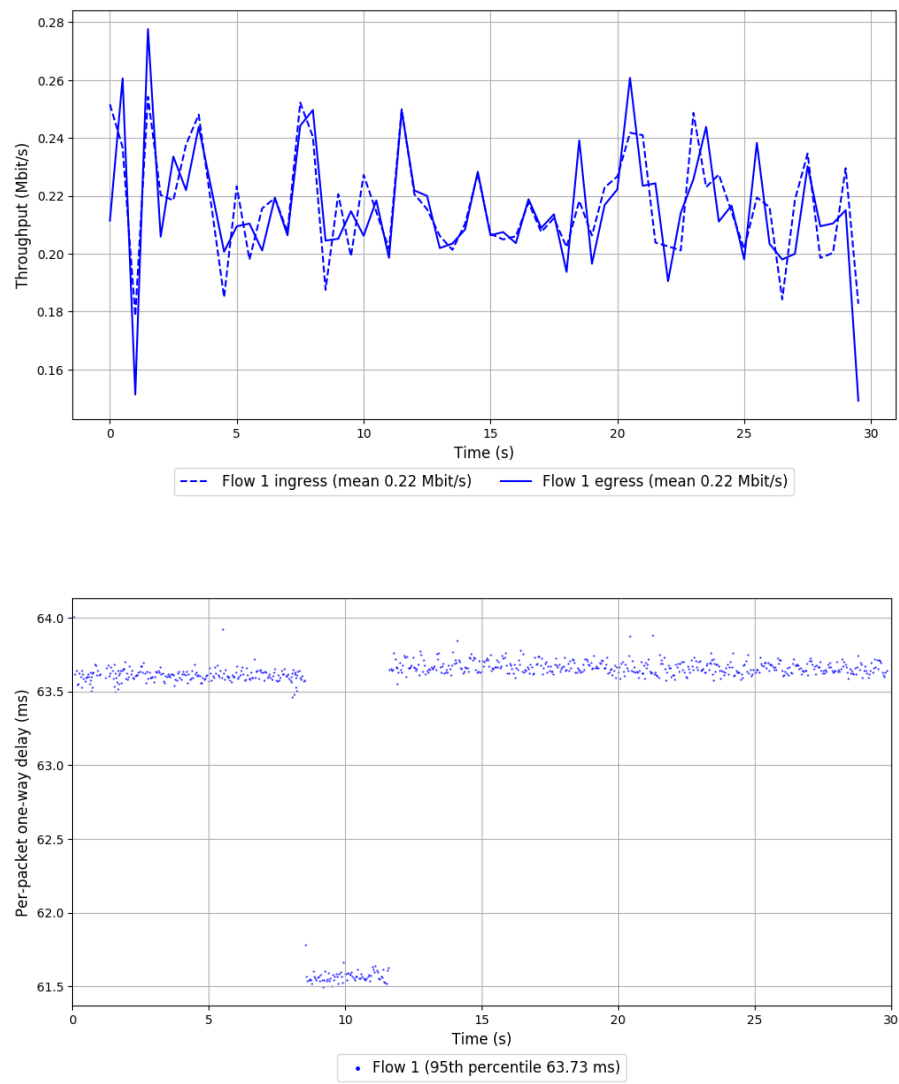
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.728 ms

Loss rate: 0.51%

Run 4: Report of SReAM — Data Link



Run 5: Statistics of SCReAM

Start at: 2017-08-17 05:21:04

End at: 2017-08-17 05:21:34

Below is generated by plot.py at 2017-08-17 08:56:19

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.736 ms

Loss rate: 0.38%

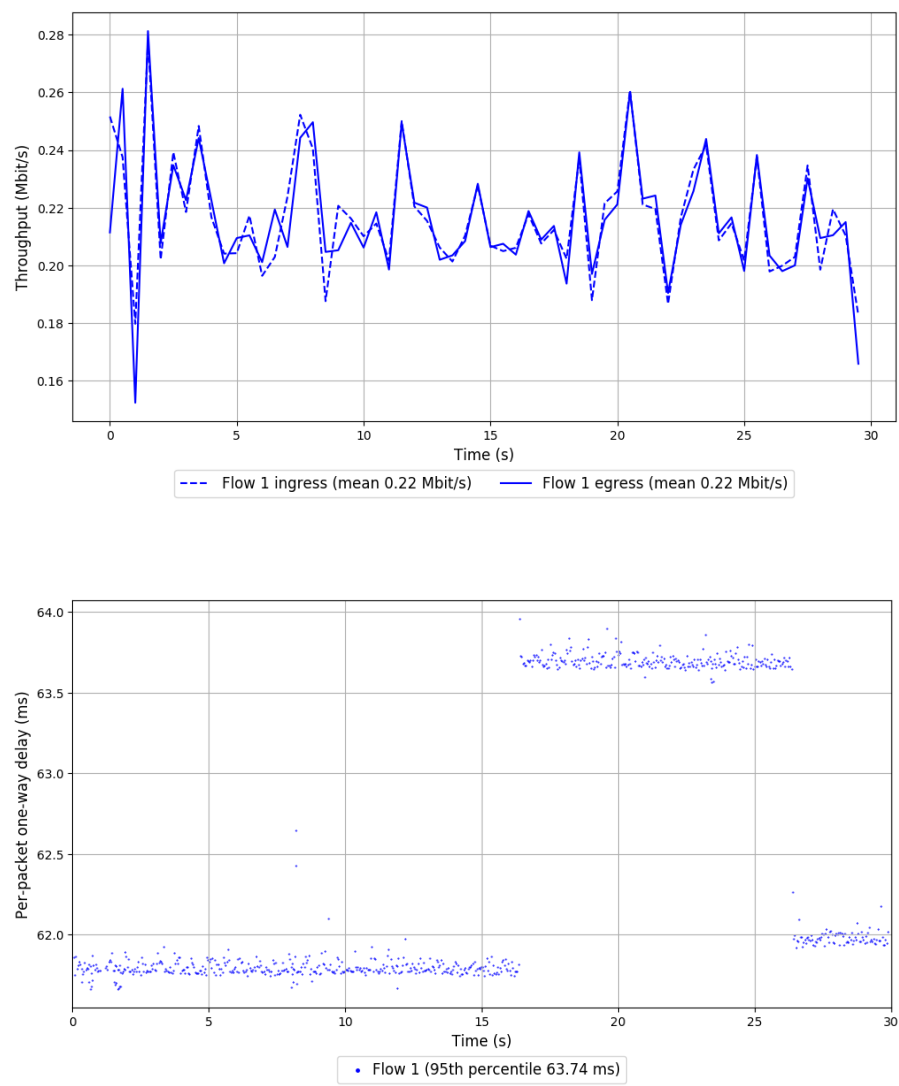
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.736 ms

Loss rate: 0.38%

Run 5: Report of SReAM — Data Link

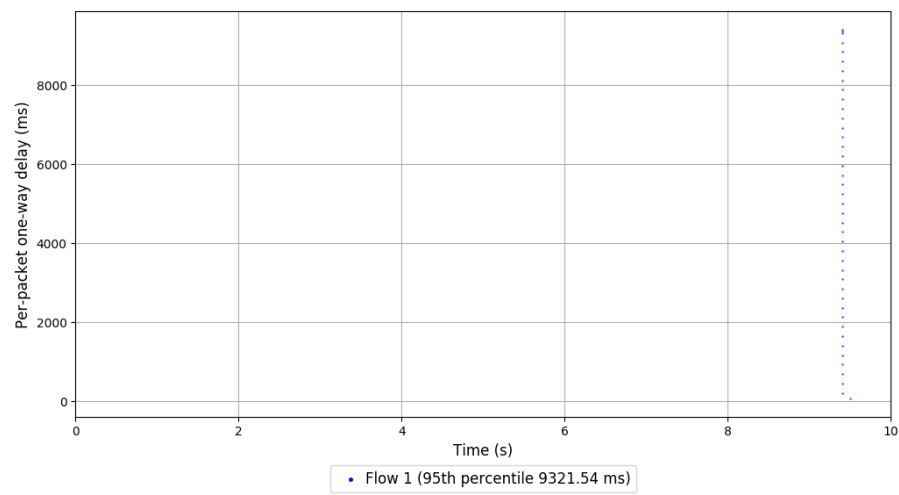
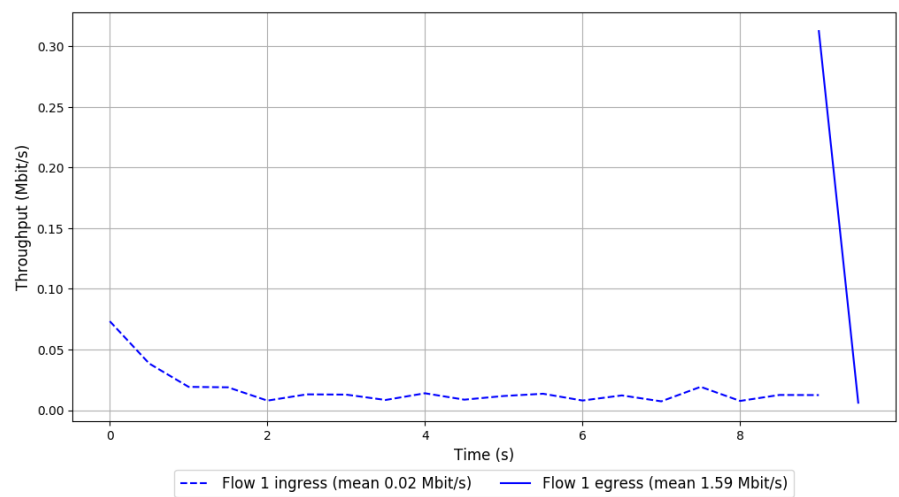


Run 6: Statistics of SReAM

Start at: 2017-08-17 05:31:31

End at: 2017-08-17 05:32:01

Run 6: Report of SReAM — Data Link



Run 7: Statistics of SCReAM

Start at: 2017-08-17 05:41:44

End at: 2017-08-17 05:42:14

Below is generated by plot.py at 2017-08-17 08:56:20

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.697 ms

Loss rate: 0.38%

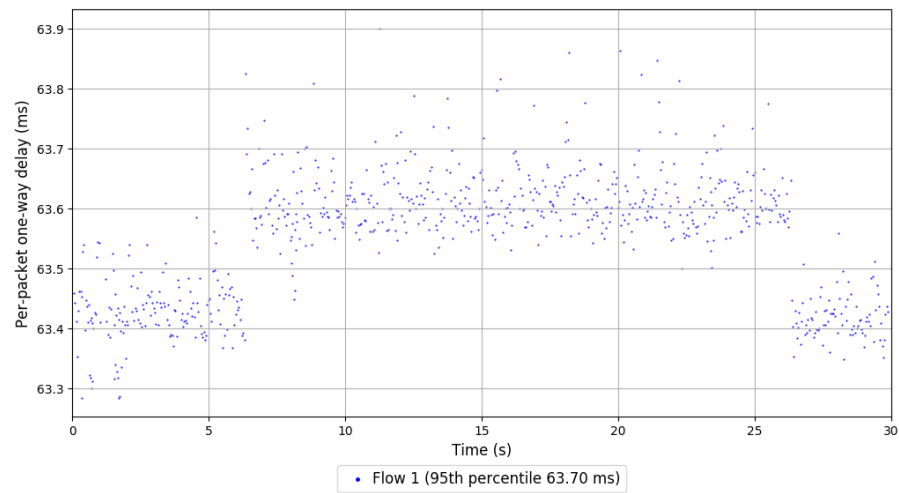
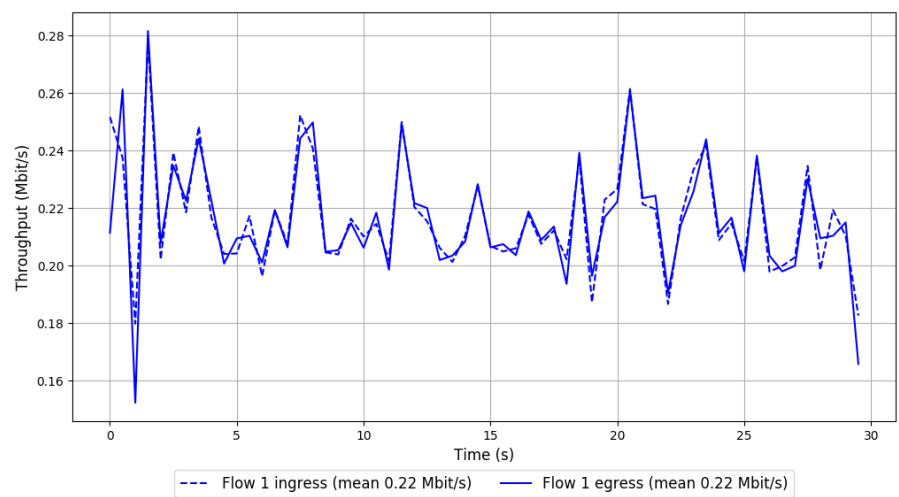
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.697 ms

Loss rate: 0.38%

Run 7: Report of SReAM — Data Link



Run 8: Statistics of SCReAM

Start at: 2017-08-17 05:52:21

End at: 2017-08-17 05:52:51

Below is generated by plot.py at 2017-08-17 08:56:20

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.793 ms

Loss rate: 0.38%

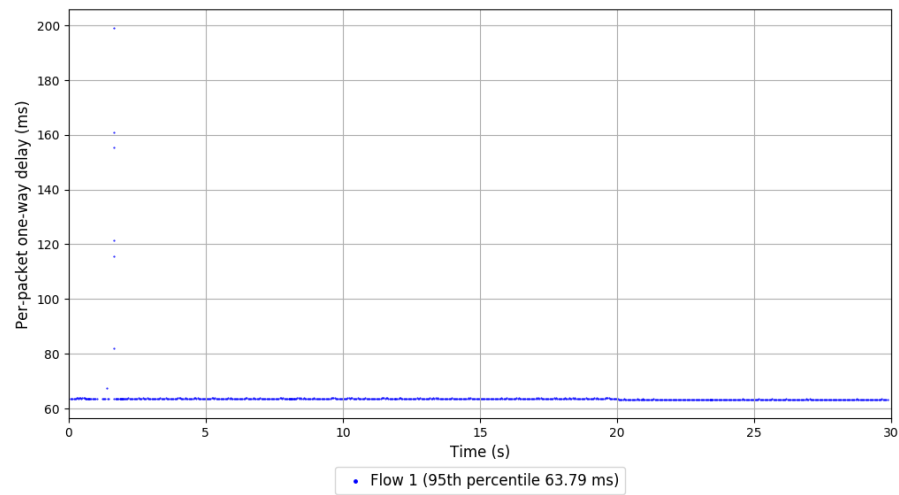
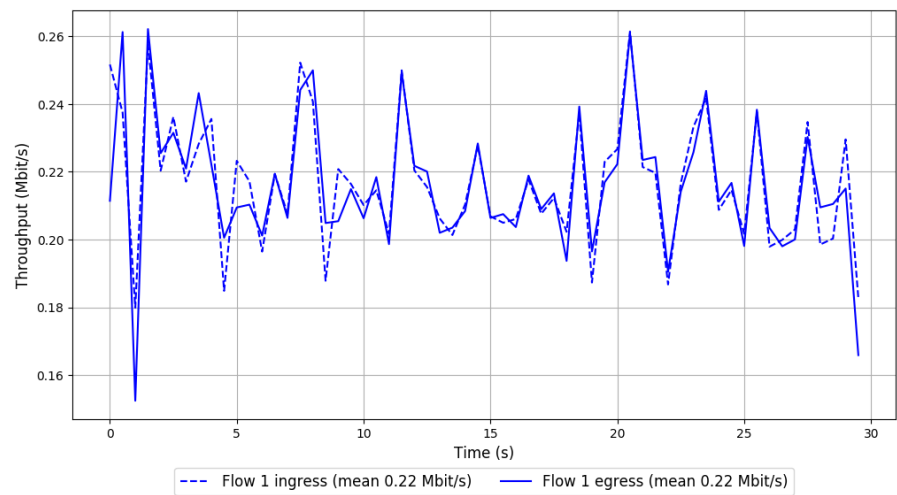
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.793 ms

Loss rate: 0.38%

Run 8: Report of SReAM — Data Link



Run 9: Statistics of SCReAM

Start at: 2017-08-17 06:03:12

End at: 2017-08-17 06:03:42

Below is generated by plot.py at 2017-08-17 08:56:22

Datalink statistics

-- Total of 1 flow:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.946 ms

Loss rate: 0.38%

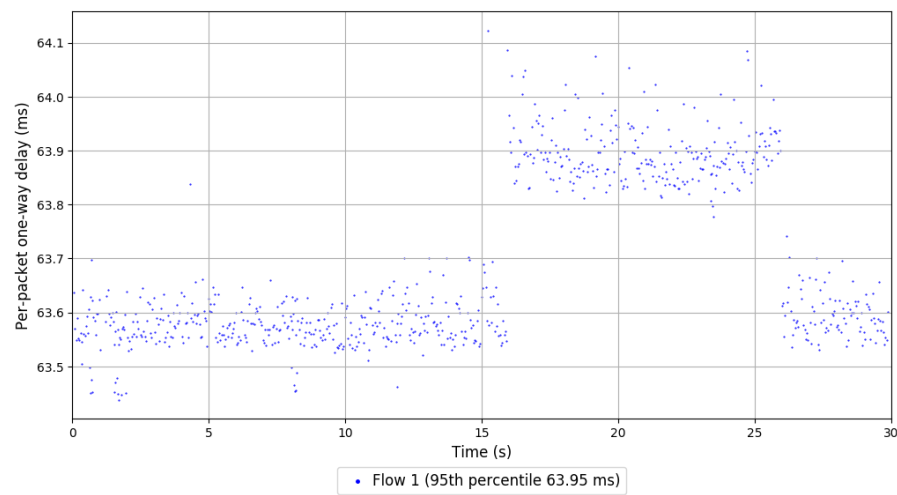
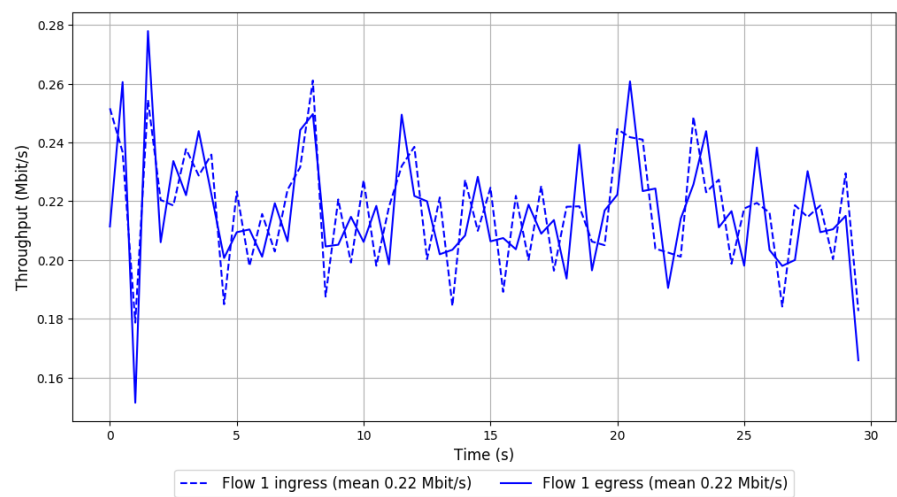
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 63.946 ms

Loss rate: 0.38%

Run 9: Report of SReAM — Data Link

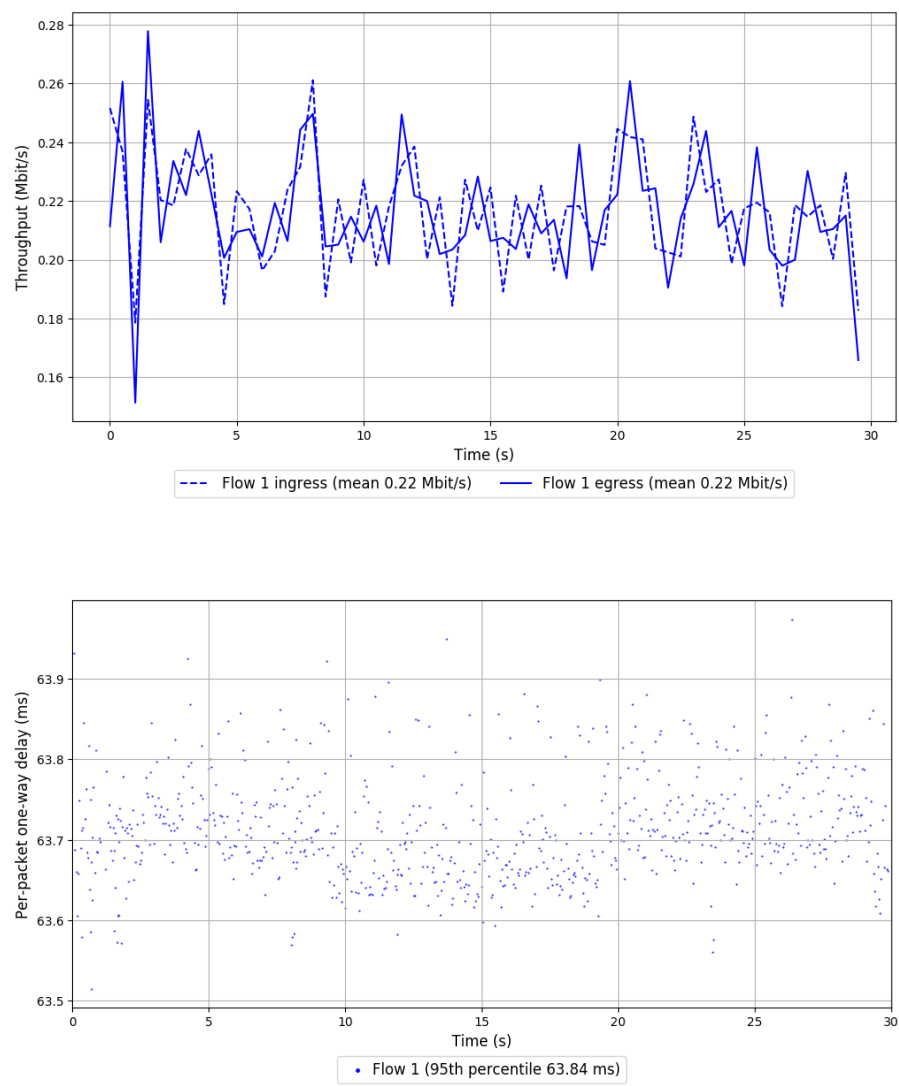


```
Run 10: Statistics of SReAM

Start at: 2017-08-17 06:13:21
End at: 2017-08-17 06:13:51

# Below is generated by plot.py at 2017-08-17 08:56:22
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 63.841 ms
Loss rate: 0.38%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 63.841 ms
Loss rate: 0.38%
```

Run 10: Report of SReAM — Data Link



Run 1: Statistics of Sprout

Start at: 2017-08-17 04:36:46

End at: 2017-08-17 04:37:16

Below is generated by plot.py at 2017-08-17 08:56:24

Datalink statistics

-- Total of 1 flow:

Average throughput: 4.95 Mbit/s

95th percentile per-packet one-way delay: 64.185 ms

Loss rate: 5.95%

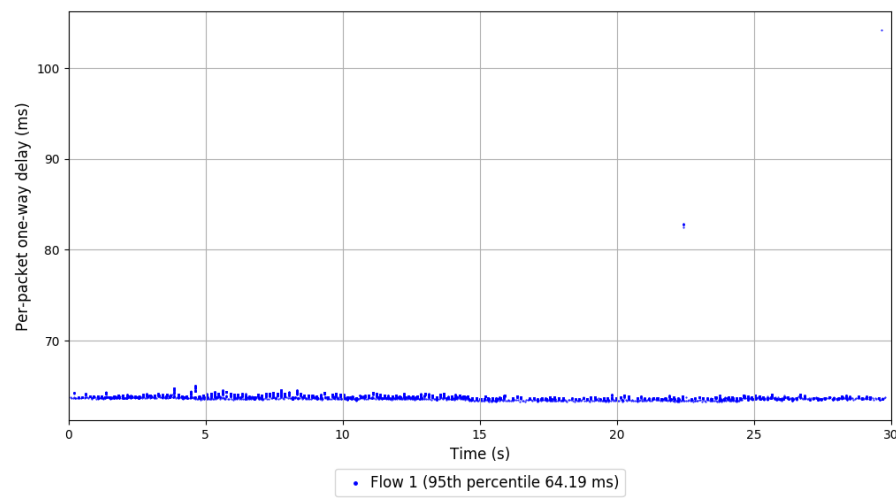
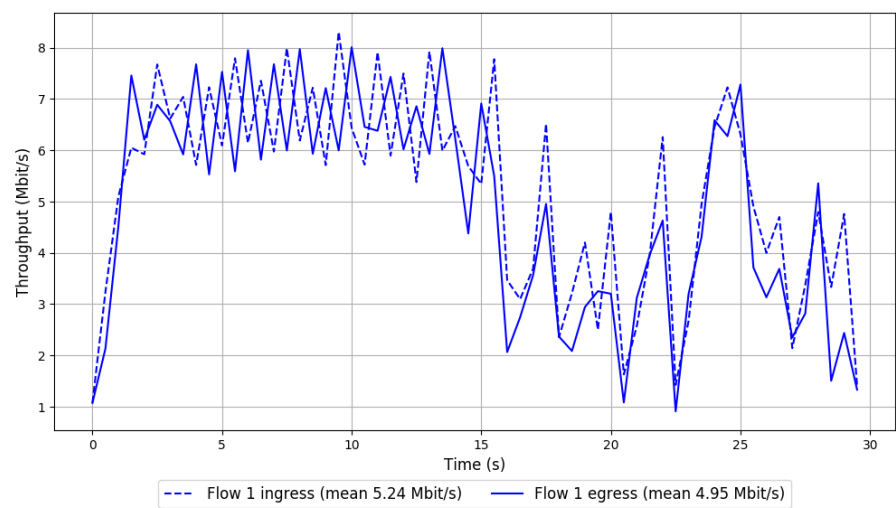
-- Flow 1:

Average throughput: 4.95 Mbit/s

95th percentile per-packet one-way delay: 64.185 ms

Loss rate: 5.95%

Run 1: Report of Sprout — Data Link



Run 2: Statistics of Sprout

Start at: 2017-08-17 04:47:10

End at: 2017-08-17 04:47:40

Below is generated by plot.py at 2017-08-17 08:56:24

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.49 Mbit/s

95th percentile per-packet one-way delay: 64.346 ms

Loss rate: 0.69%

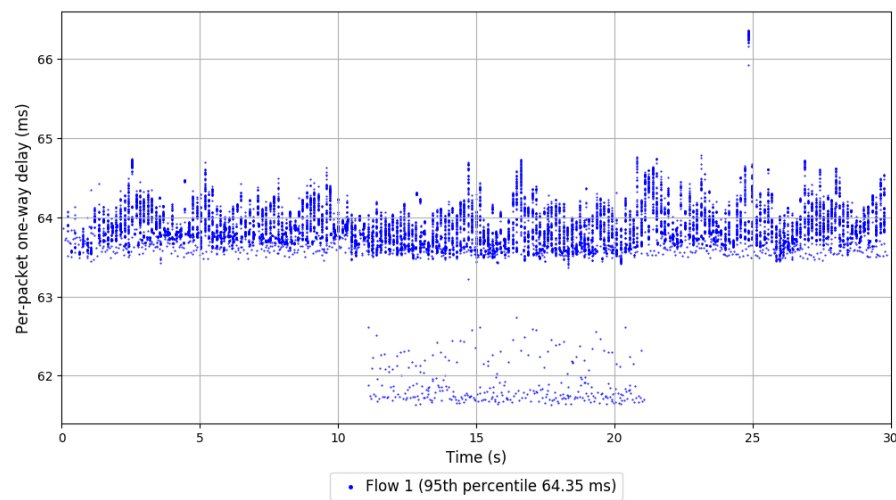
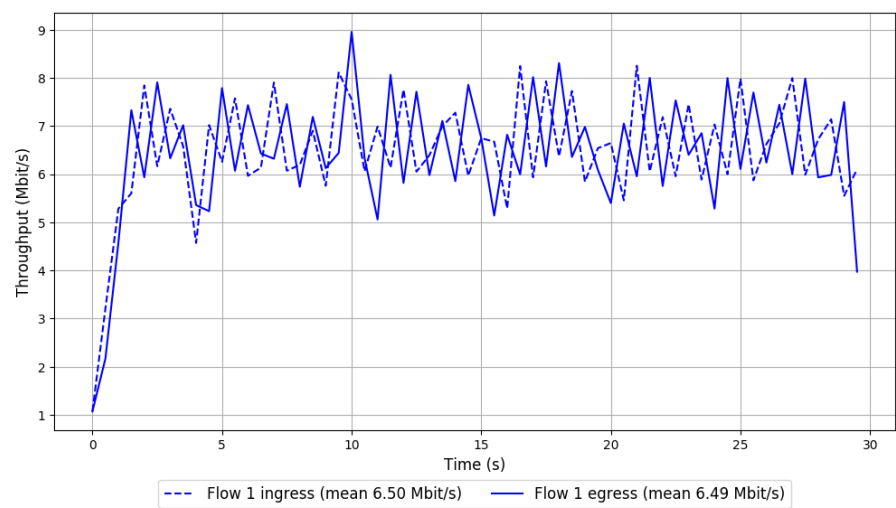
-- Flow 1:

Average throughput: 6.49 Mbit/s

95th percentile per-packet one-way delay: 64.346 ms

Loss rate: 0.69%

Run 2: Report of Sprout — Data Link



Run 3: Statistics of Sprout

Start at: 2017-08-17 04:57:38

End at: 2017-08-17 04:58:08

Below is generated by plot.py at 2017-08-17 08:56:25

Datalink statistics

-- Total of 1 flow:

Average throughput: 4.26 Mbit/s

95th percentile per-packet one-way delay: 64.128 ms

Loss rate: 9.51%

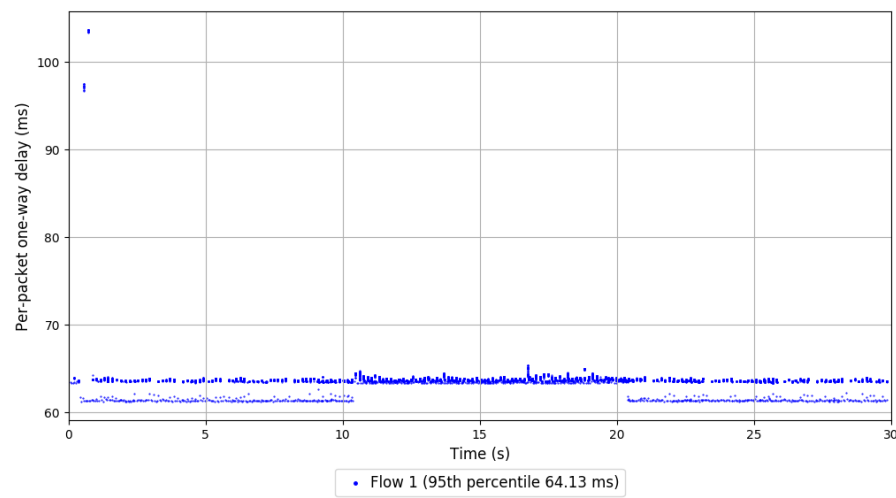
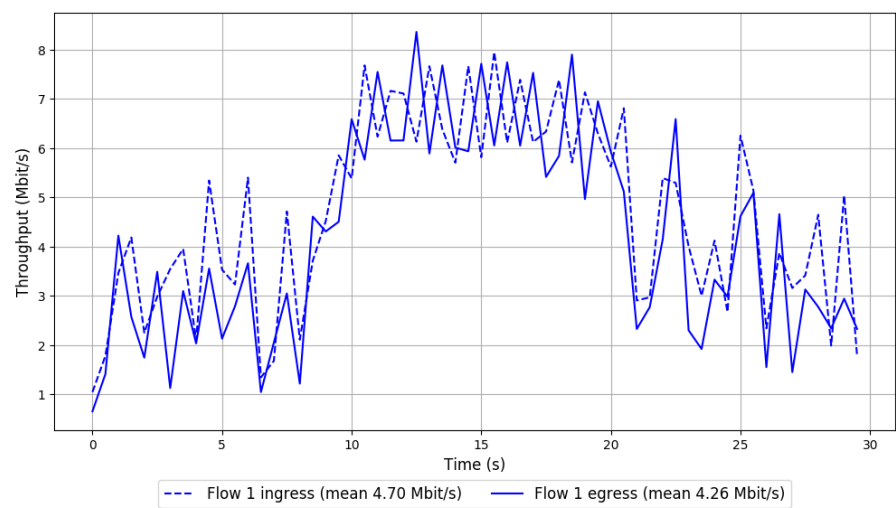
-- Flow 1:

Average throughput: 4.26 Mbit/s

95th percentile per-packet one-way delay: 64.128 ms

Loss rate: 9.51%

Run 3: Report of Sprout — Data Link



Run 4: Statistics of Sprout

Start at: 2017-08-17 05:07:46

End at: 2017-08-17 05:08:16

Below is generated by plot.py at 2017-08-17 08:56:27

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.32 Mbit/s

95th percentile per-packet one-way delay: 64.011 ms

Loss rate: 1.38%

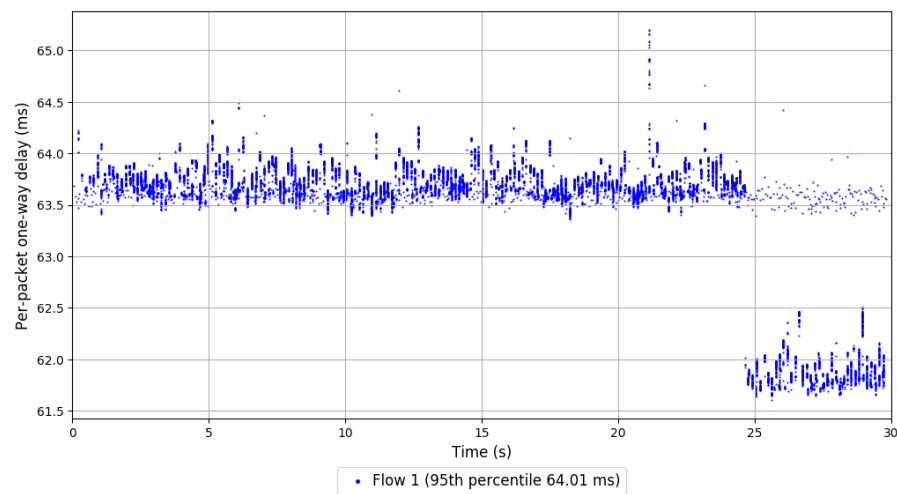
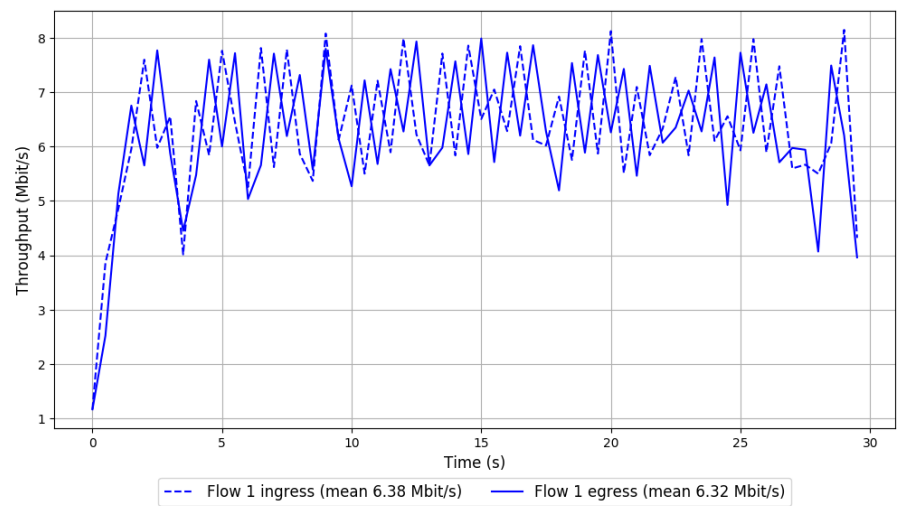
-- Flow 1:

Average throughput: 6.32 Mbit/s

95th percentile per-packet one-way delay: 64.011 ms

Loss rate: 1.38%

Run 4: Report of Sprout — Data Link



Run 5: Statistics of Sprout

Start at: 2017-08-17 05:18:23

End at: 2017-08-17 05:18:53

Below is generated by plot.py at 2017-08-17 08:56:28

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.29 Mbit/s

95th percentile per-packet one-way delay: 62.480 ms

Loss rate: 2.38%

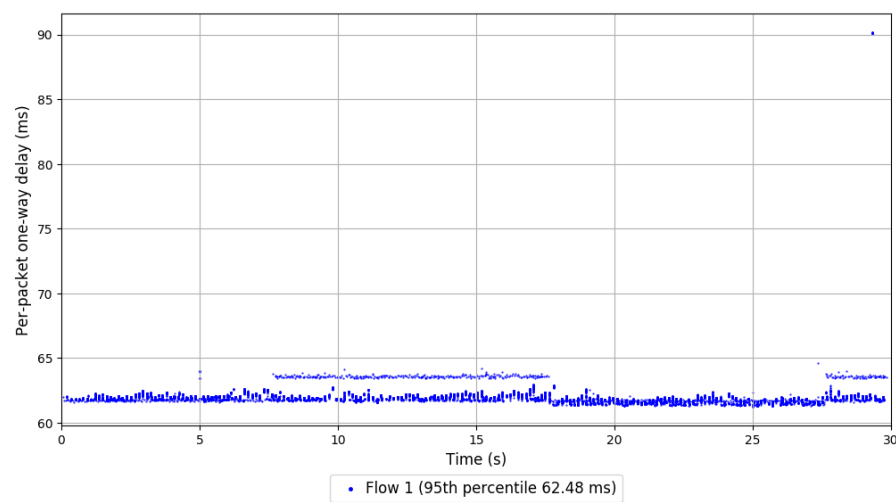
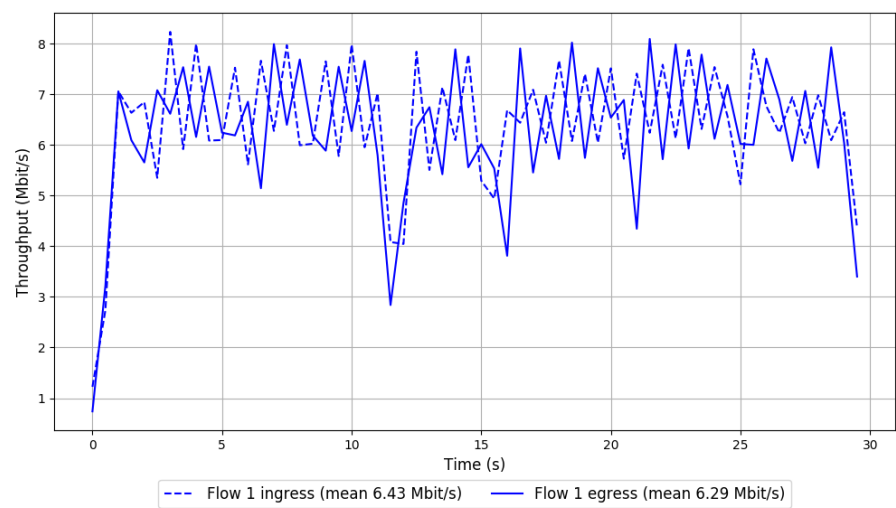
-- Flow 1:

Average throughput: 6.29 Mbit/s

95th percentile per-packet one-way delay: 62.480 ms

Loss rate: 2.38%

Run 5: Report of Sprout — Data Link



Run 6: Statistics of Sprout

Start at: 2017-08-17 05:28:39

End at: 2017-08-17 05:29:09

Below is generated by plot.py at 2017-08-17 08:56:29

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.38 Mbit/s

95th percentile per-packet one-way delay: 64.006 ms

Loss rate: 1.45%

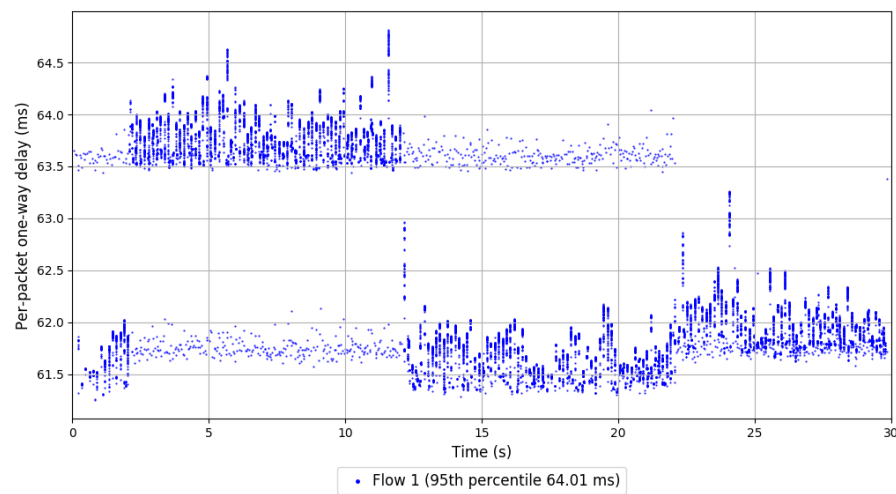
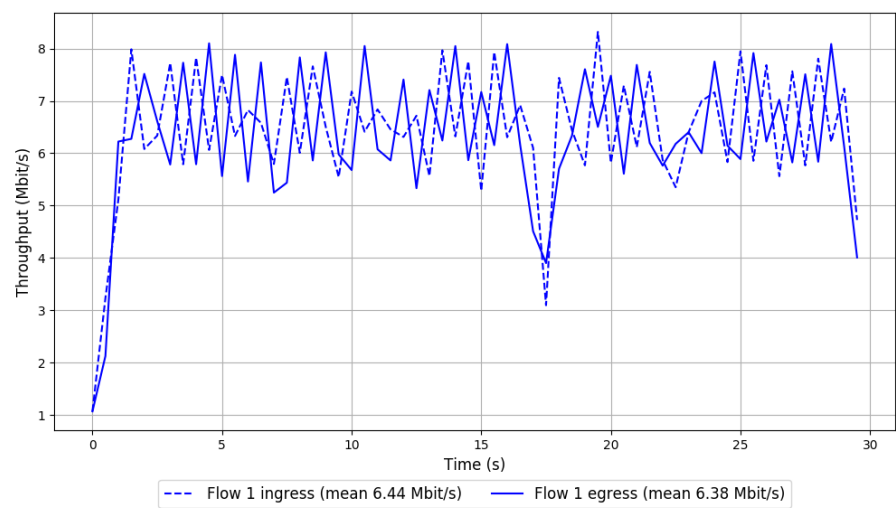
-- Flow 1:

Average throughput: 6.38 Mbit/s

95th percentile per-packet one-way delay: 64.006 ms

Loss rate: 1.45%

Run 6: Report of Sprout — Data Link



Run 7: Statistics of Sprout

Start at: 2017-08-17 05:38:58

End at: 2017-08-17 05:39:28

Below is generated by plot.py at 2017-08-17 08:56:31

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.65 Mbit/s

95th percentile per-packet one-way delay: 64.283 ms

Loss rate: 0.53%

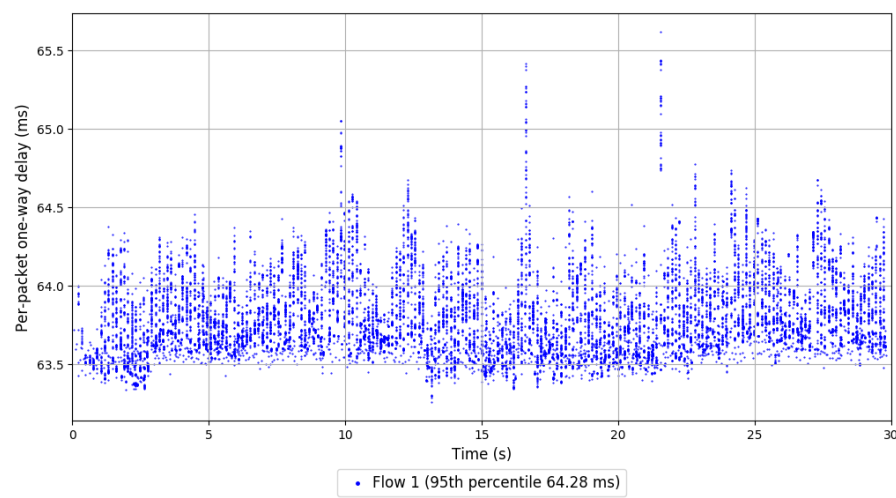
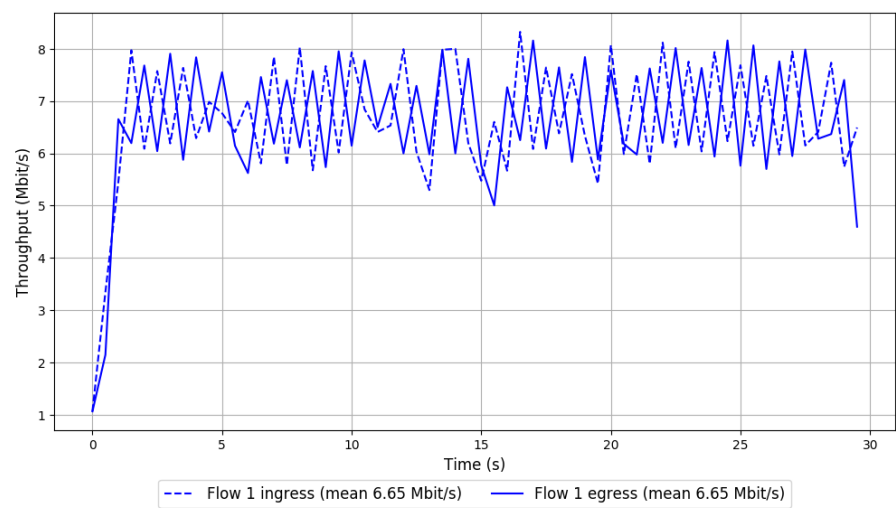
-- Flow 1:

Average throughput: 6.65 Mbit/s

95th percentile per-packet one-way delay: 64.283 ms

Loss rate: 0.53%

Run 7: Report of Sprout — Data Link



Run 8: Statistics of Sprout

Start at: 2017-08-17 05:49:27

End at: 2017-08-17 05:49:57

Below is generated by plot.py at 2017-08-17 08:56:31

Datalink statistics

-- Total of 1 flow:

Average throughput: 4.28 Mbit/s

95th percentile per-packet one-way delay: 64.070 ms

Loss rate: 10.89%

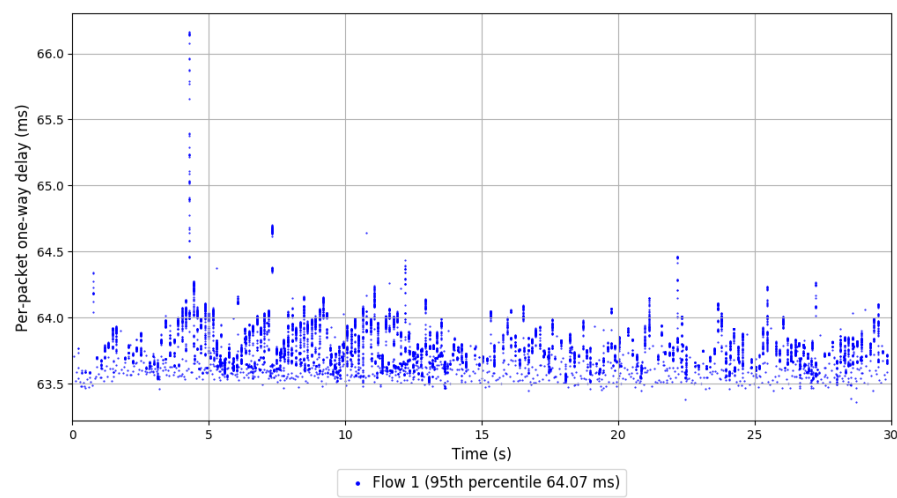
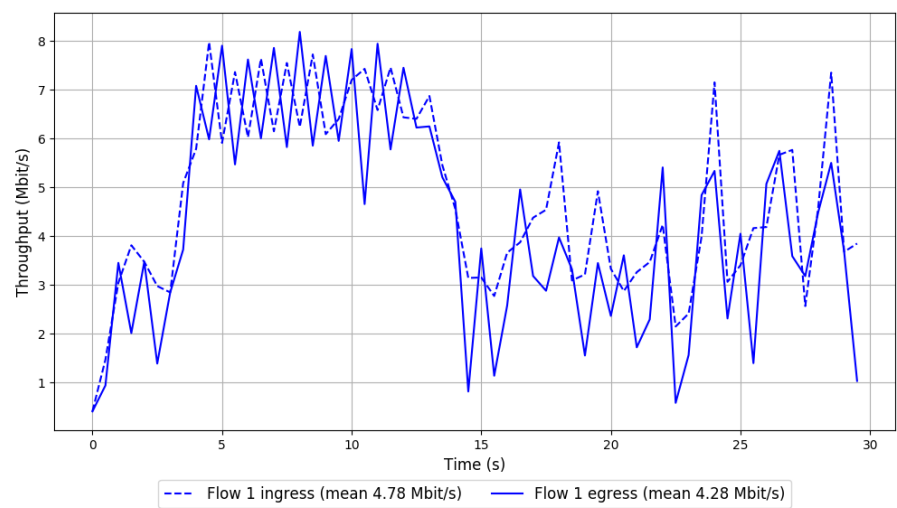
-- Flow 1:

Average throughput: 4.28 Mbit/s

95th percentile per-packet one-way delay: 64.070 ms

Loss rate: 10.89%

Run 8: Report of Sprout — Data Link



Run 9: Statistics of Sprout

Start at: 2017-08-17 06:00:12

End at: 2017-08-17 06:00:42

Below is generated by plot.py at 2017-08-17 08:56:33

Datalink statistics

-- Total of 1 flow:

Average throughput: 5.13 Mbit/s

95th percentile per-packet one-way delay: 64.162 ms

Loss rate: 6.13%

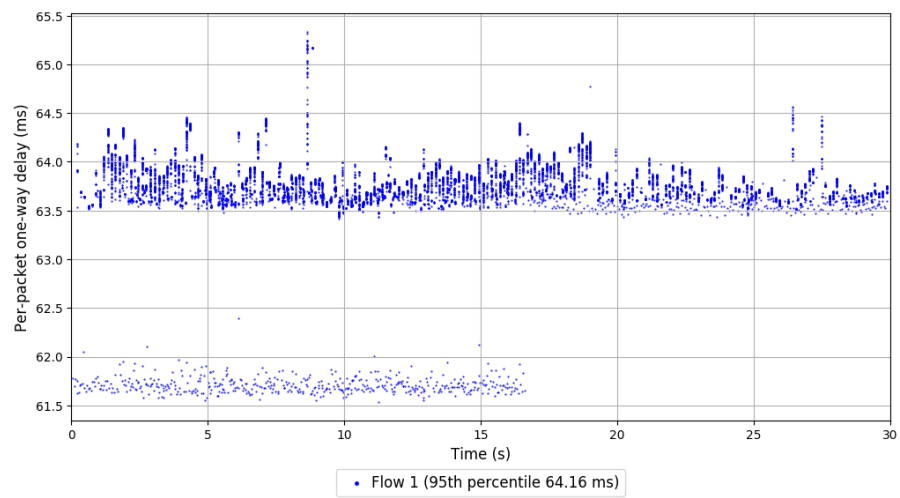
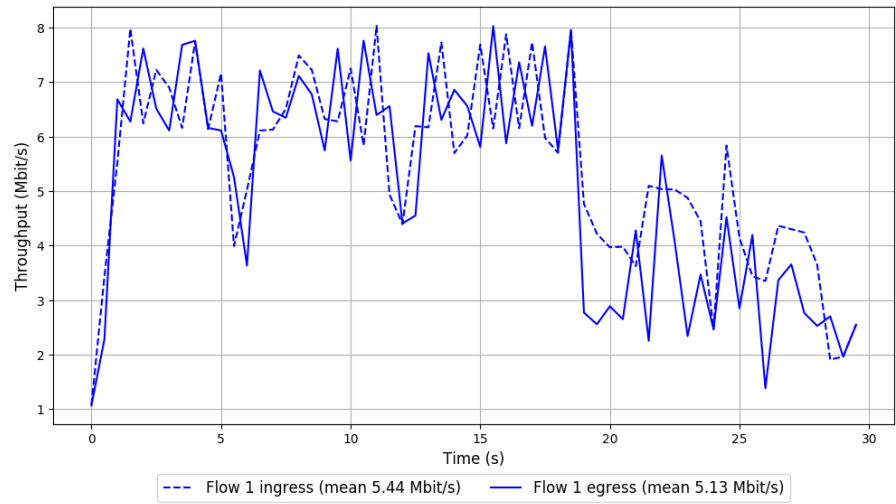
-- Flow 1:

Average throughput: 5.13 Mbit/s

95th percentile per-packet one-way delay: 64.162 ms

Loss rate: 6.13%

Run 9: Report of Sprout — Data Link



Run 10: Statistics of Sprout

Start at: 2017-08-17 06:10:42

End at: 2017-08-17 06:11:12

Below is generated by plot.py at 2017-08-17 08:56:34

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.57 Mbit/s

95th percentile per-packet one-way delay: 64.504 ms

Loss rate: 0.53%

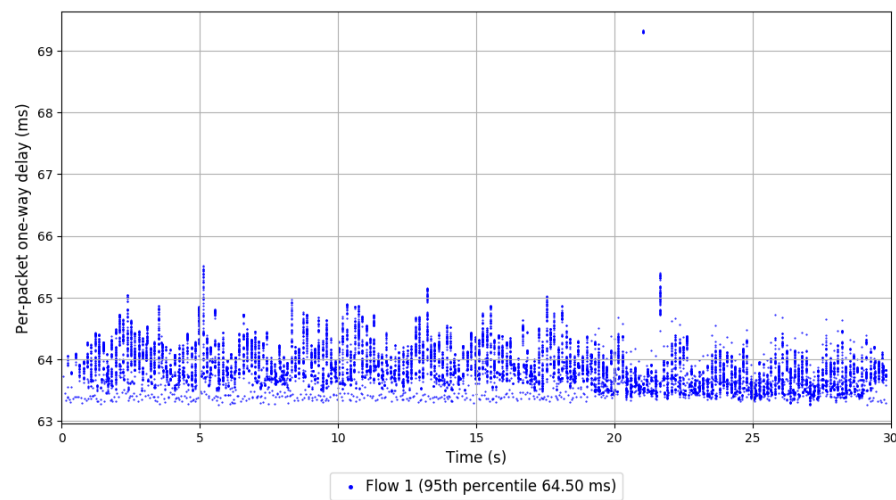
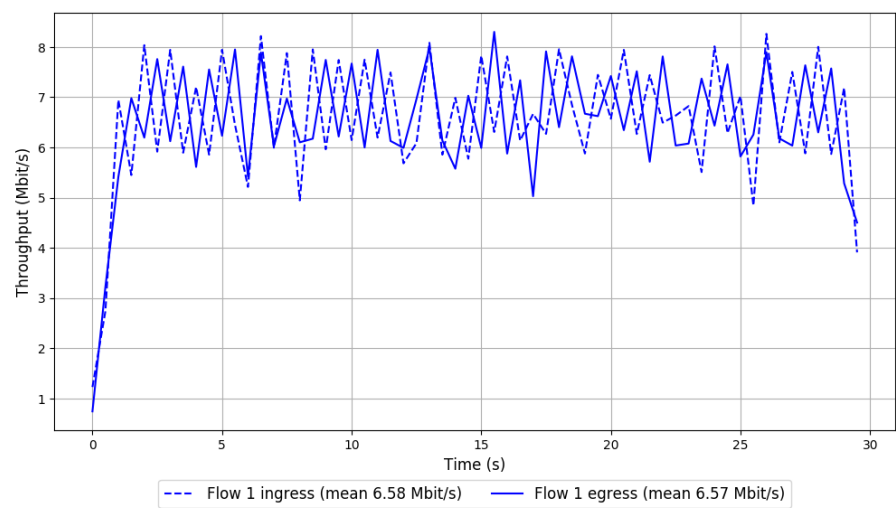
-- Flow 1:

Average throughput: 6.57 Mbit/s

95th percentile per-packet one-way delay: 64.504 ms

Loss rate: 0.53%

Run 10: Report of Sprout — Data Link

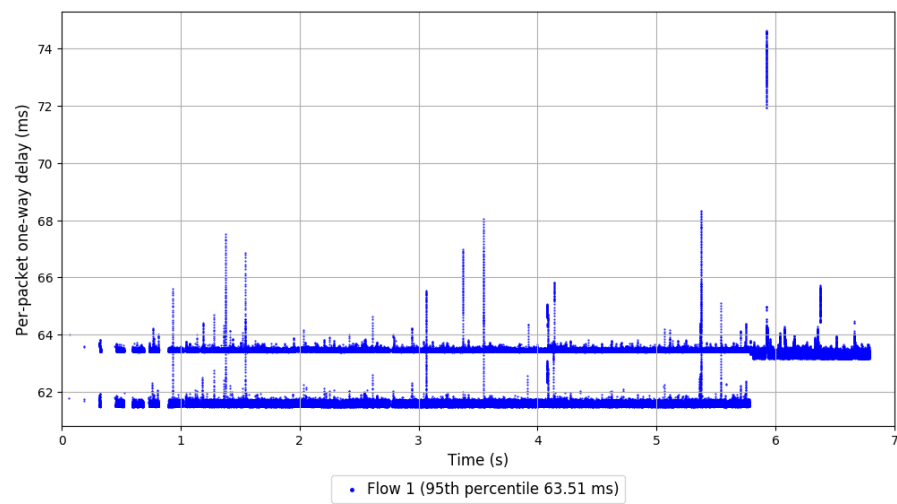
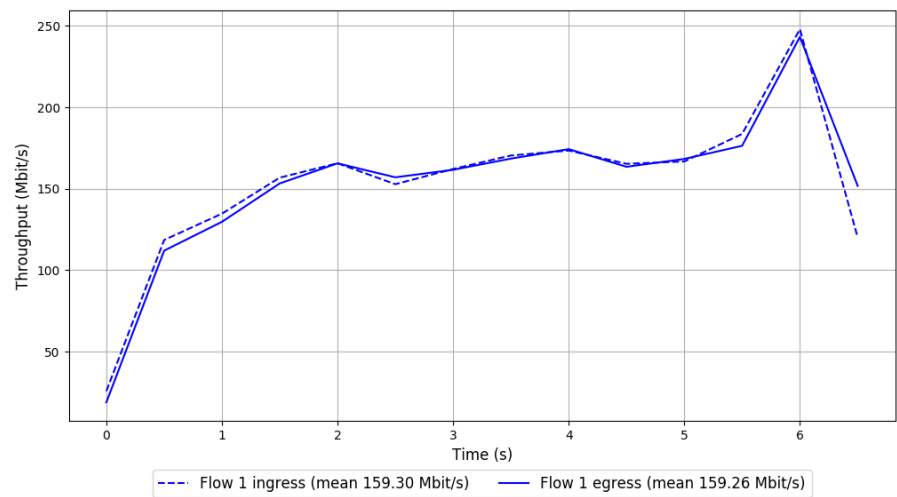


Run 1: Statistics of TaoVA-100x

Start at: 2017-08-17 04:36:05

End at: 2017-08-17 04:36:35

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

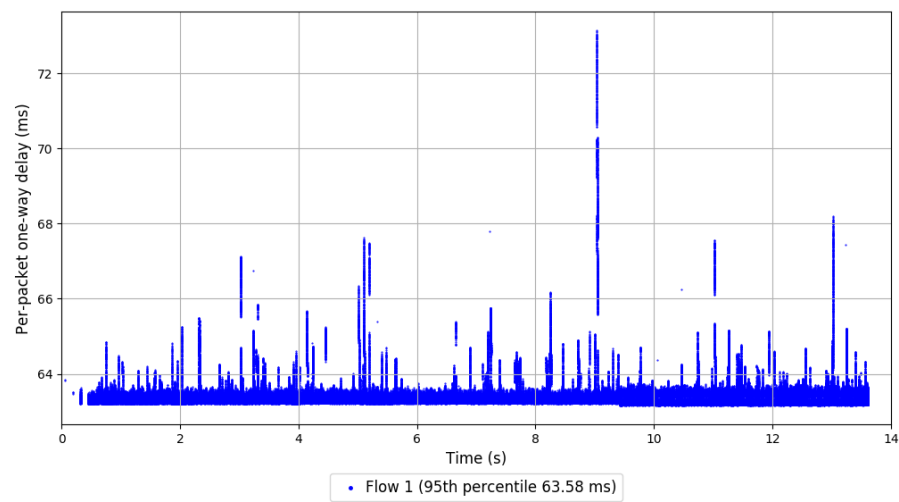
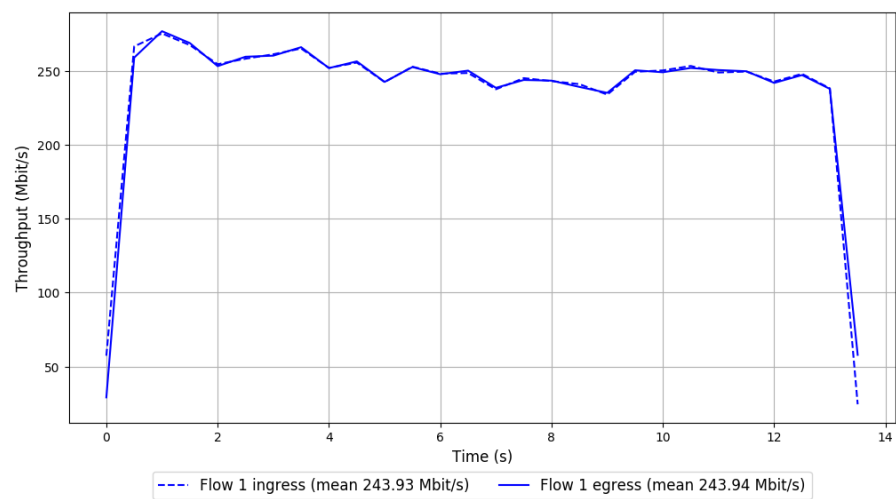


Run 2: Statistics of TaoVA-100x

Start at: 2017-08-17 04:46:21

End at: 2017-08-17 04:46:51

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

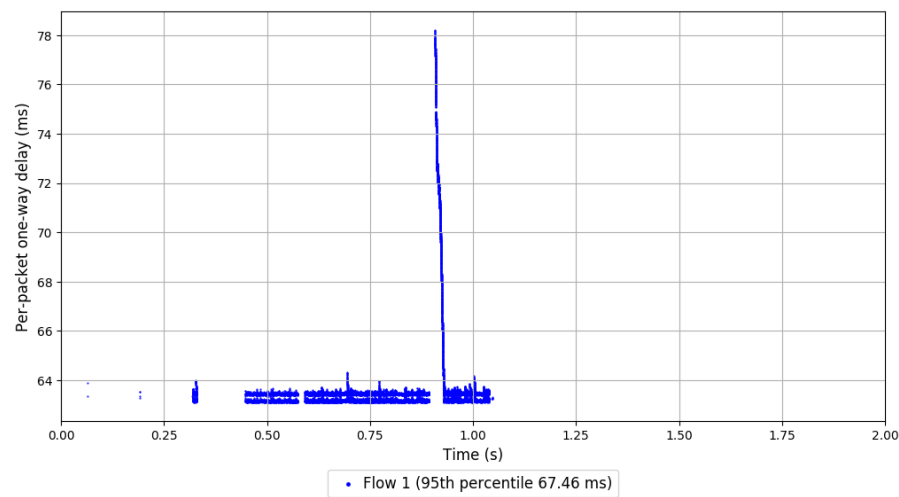
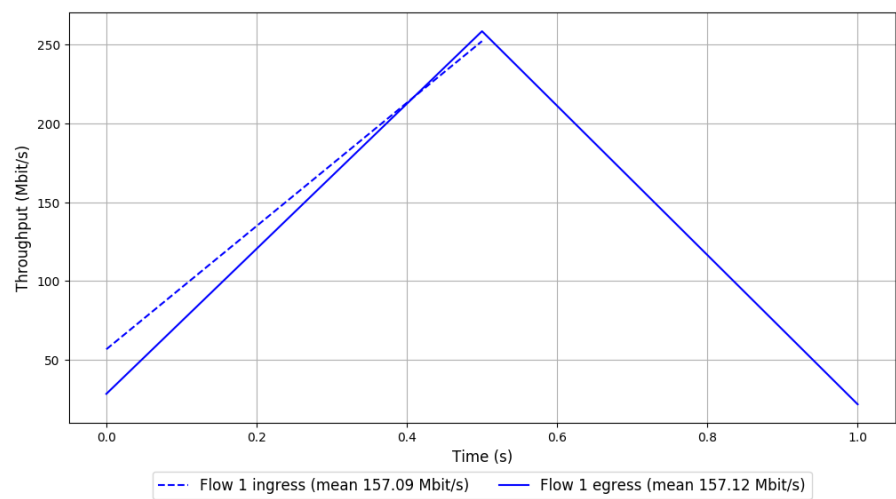


Run 3: Statistics of TaoVA-100x

Start at: 2017-08-17 04:56:59

End at: 2017-08-17 04:57:29

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

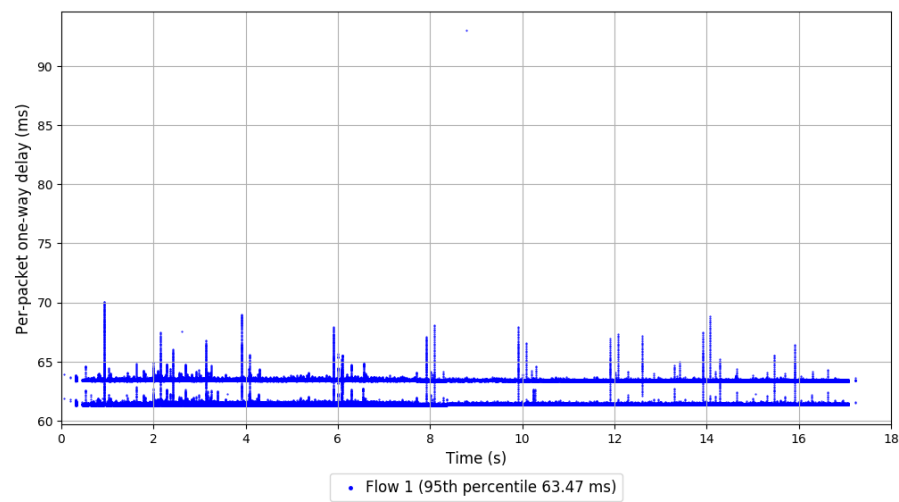
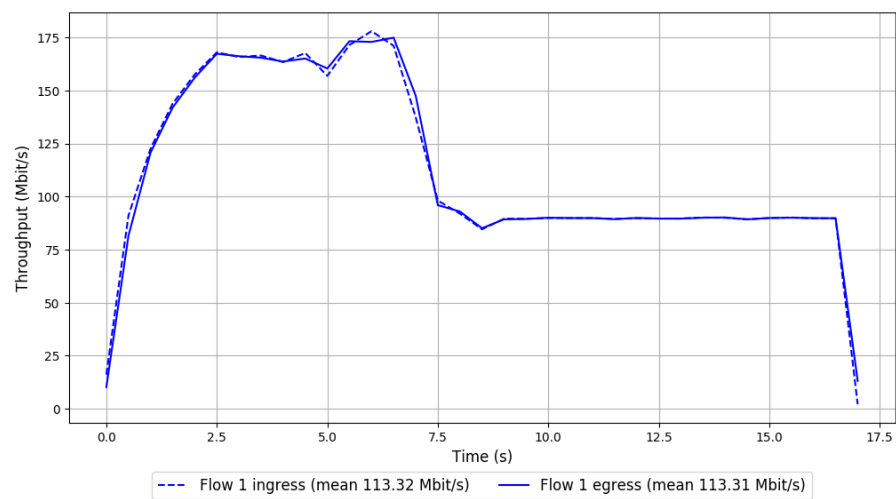


Run 4: Statistics of TaoVA-100x

Start at: 2017-08-17 05:07:02

End at: 2017-08-17 05:07:32

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

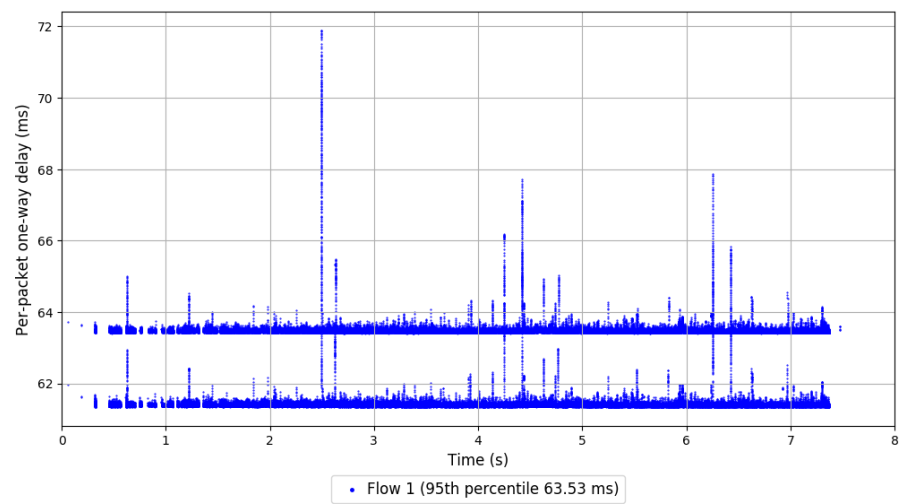
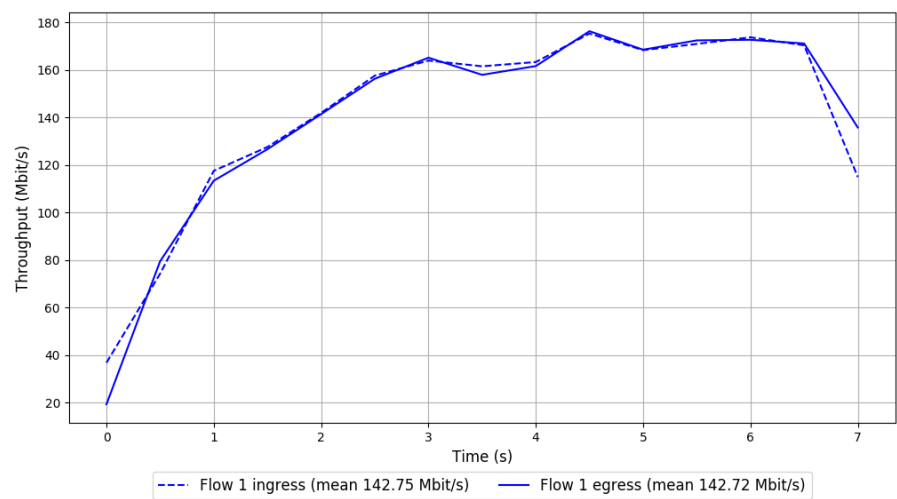


Run 5: Statistics of TaoVA-100x

Start at: 2017-08-17 05:17:42

End at: 2017-08-17 05:18:12

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



Run 6: Statistics of TaoVA-100x

Start at: 2017-08-17 05:27:50

End at: 2017-08-17 05:28:20

Below is generated by plot.py at 2017-08-17 08:57:46

Datalink statistics

-- Total of 1 flow:

Average throughput: 110.51 Mbit/s

95th percentile per-packet one-way delay: 63.473 ms

Loss rate: 10.47%

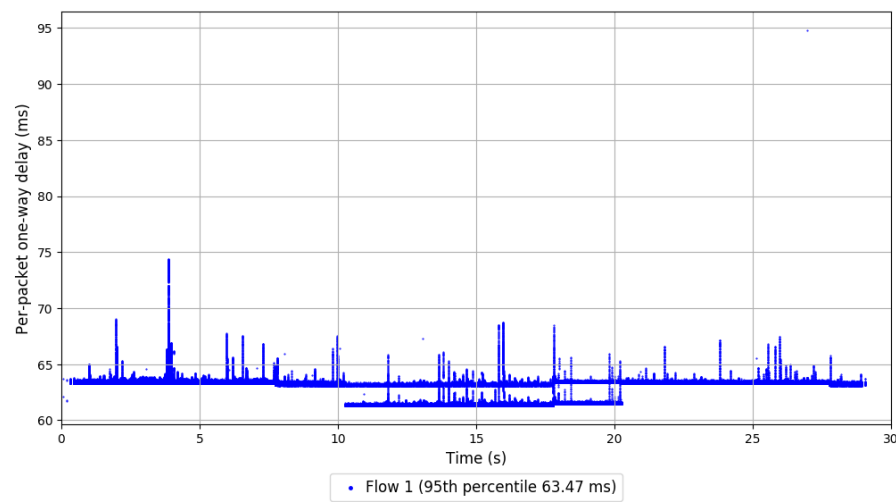
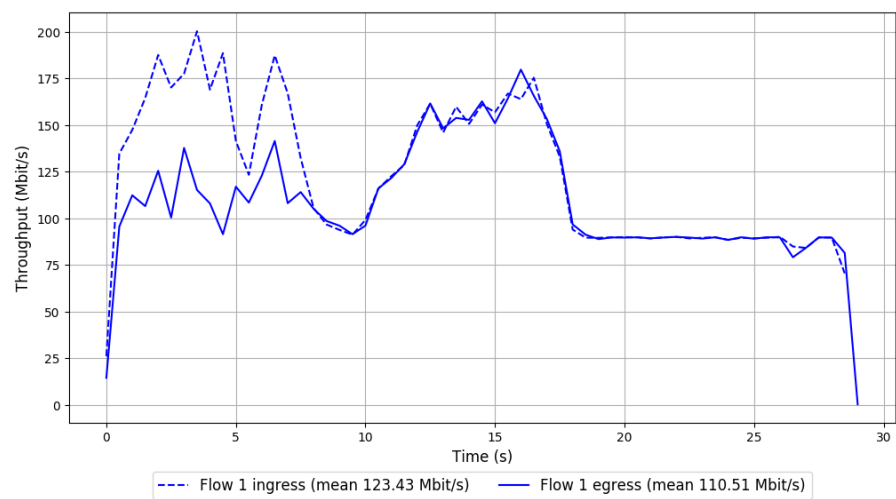
-- Flow 1:

Average throughput: 110.51 Mbit/s

95th percentile per-packet one-way delay: 63.473 ms

Loss rate: 10.47%

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

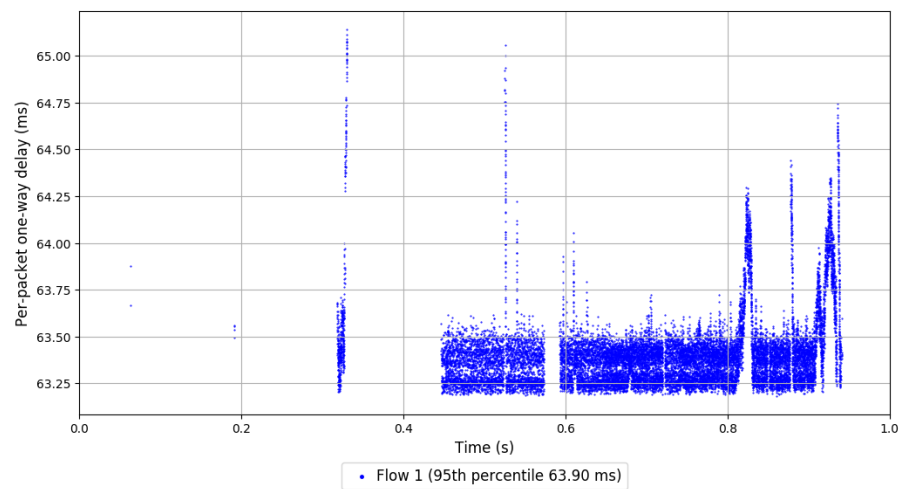
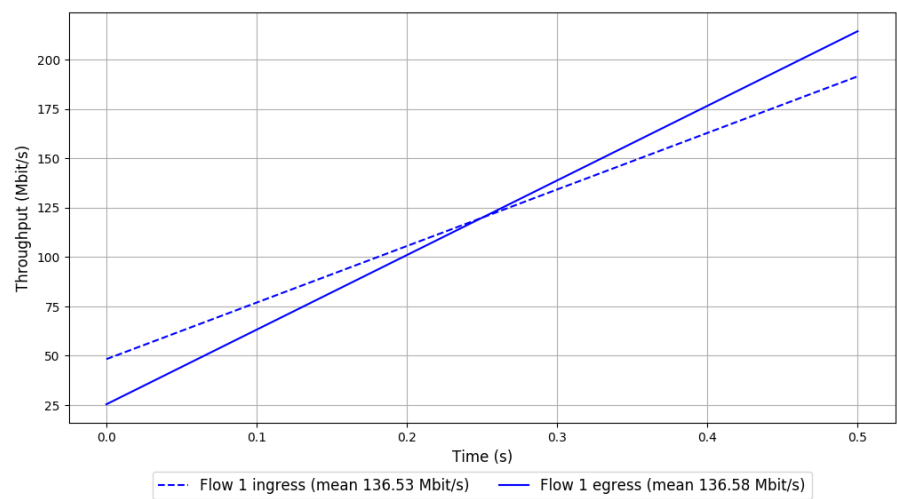


Run 7: Statistics of TaoVA-100x

Start at: 2017-08-17 05:38:20

End at: 2017-08-17 05:38:50

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

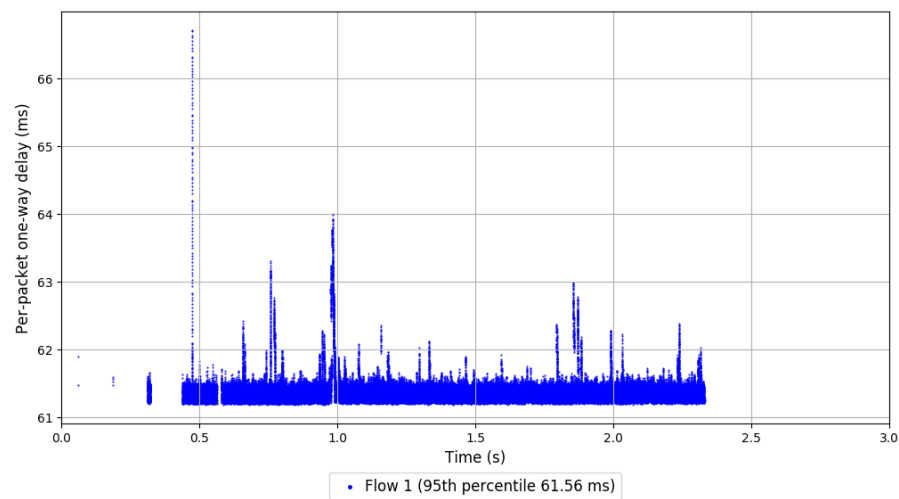
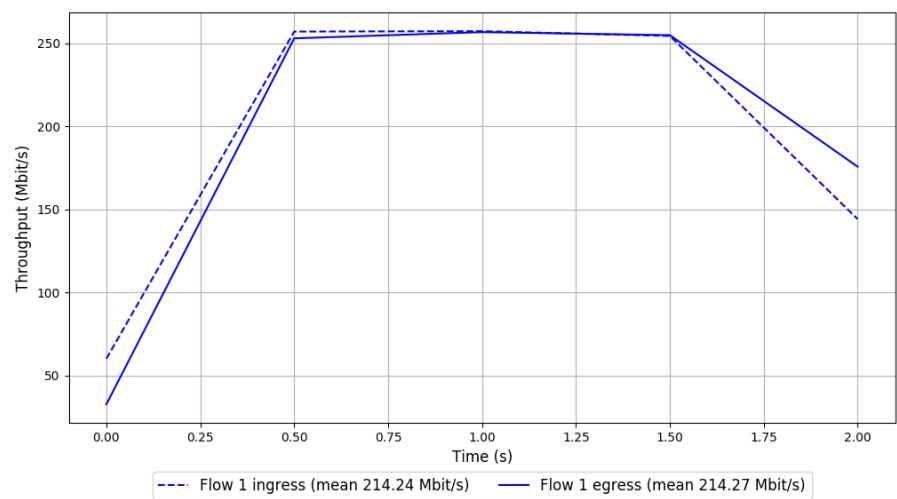


Run 8: Statistics of TaoVA-100x

Start at: 2017-08-17 05:48:48

End at: 2017-08-17 05:49:18

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

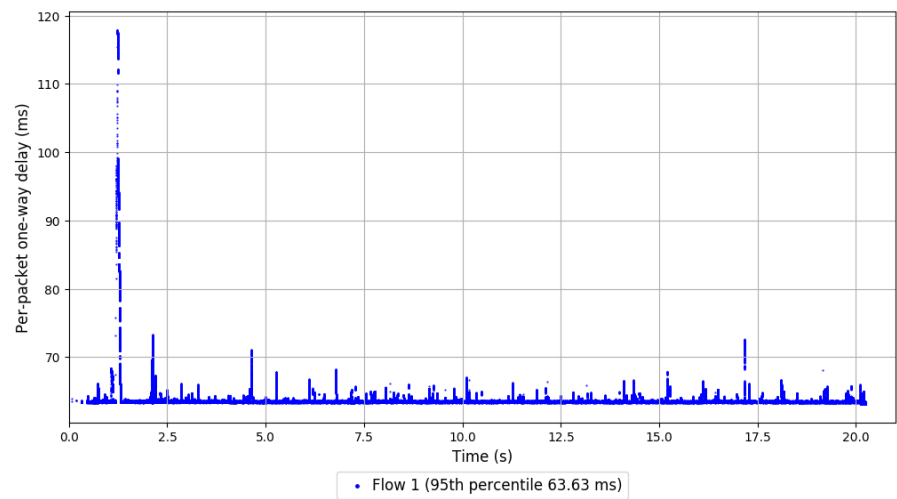
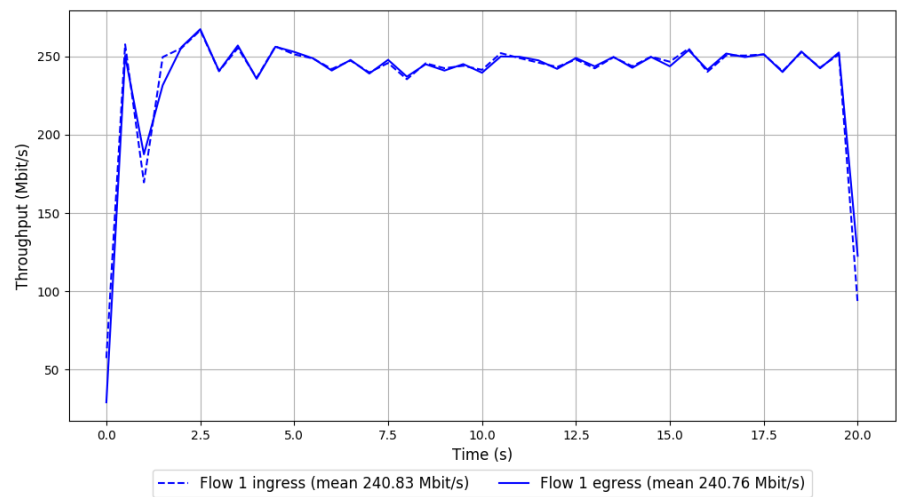


Run 9: Statistics of TaoVA-100x

Start at: 2017-08-17 05:59:18

End at: 2017-08-17 05:59:48

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

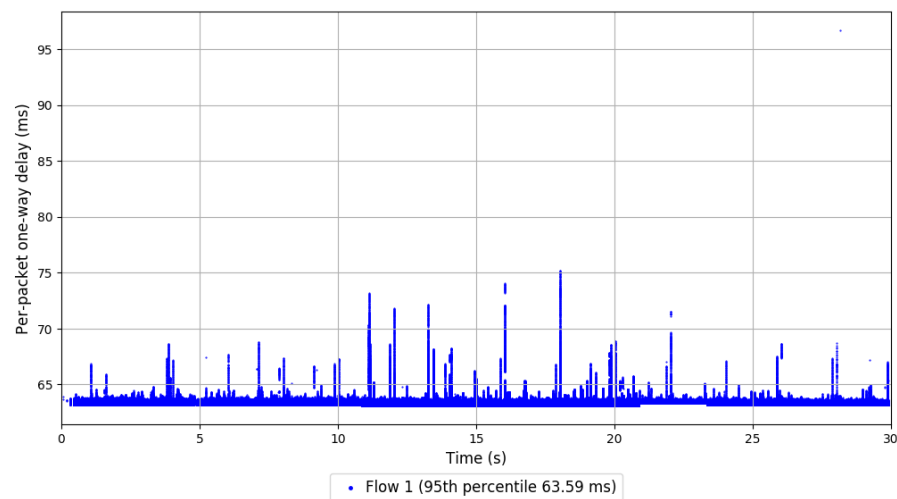
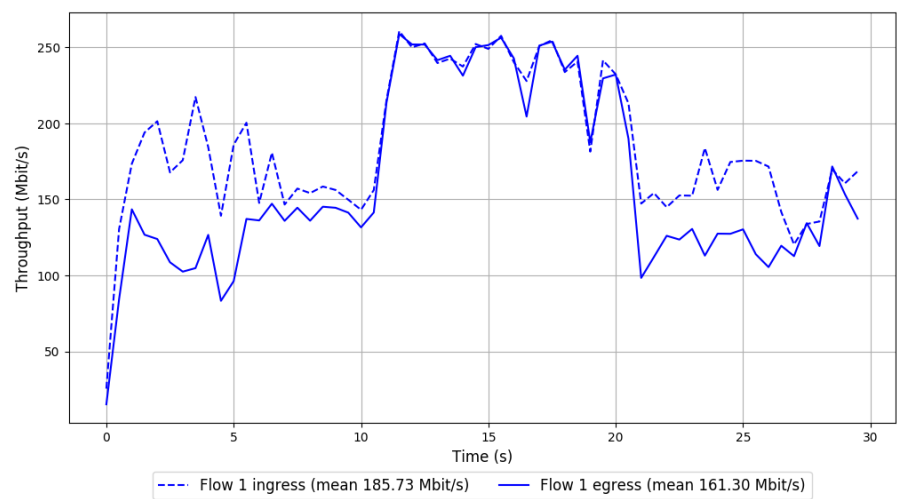


```
Run 10: Statistics of TaoVA-100x

Start at: 2017-08-17 06:09:47
End at: 2017-08-17 06:10:17

# Below is generated by plot.py at 2017-08-17 08:58:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 161.30 Mbit/s
95th percentile per-packet one-way delay: 63.591 ms
Loss rate: 13.48%
-- Flow 1:
Average throughput: 161.30 Mbit/s
95th percentile per-packet one-way delay: 63.591 ms
Loss rate: 13.48%
```

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



Run 1: Statistics of TCP Vegas

Start at: 2017-08-17 04:34:45

End at: 2017-08-17 04:35:15

Below is generated by plot.py at 2017-08-17 08:58:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 9.62 Mbit/s

95th percentile per-packet one-way delay: 64.229 ms

Loss rate: 1.03%

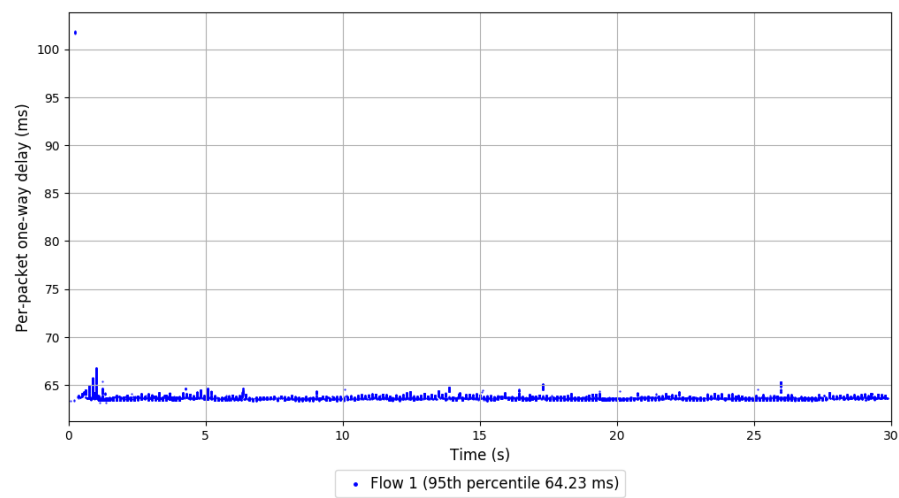
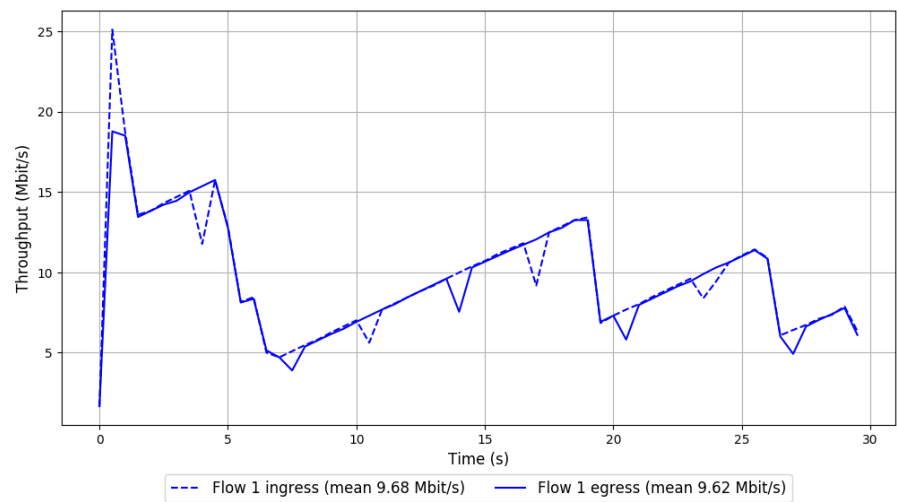
-- Flow 1:

Average throughput: 9.62 Mbit/s

95th percentile per-packet one-way delay: 64.229 ms

Loss rate: 1.03%

Run 1: Report of TCP Vegas — Data Link



Run 2: Statistics of TCP Vegas

Start at: 2017-08-17 04:45:05

End at: 2017-08-17 04:45:35

Below is generated by plot.py at 2017-08-17 08:58:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.15 Mbit/s

95th percentile per-packet one-way delay: 63.605 ms

Loss rate: 2.32%

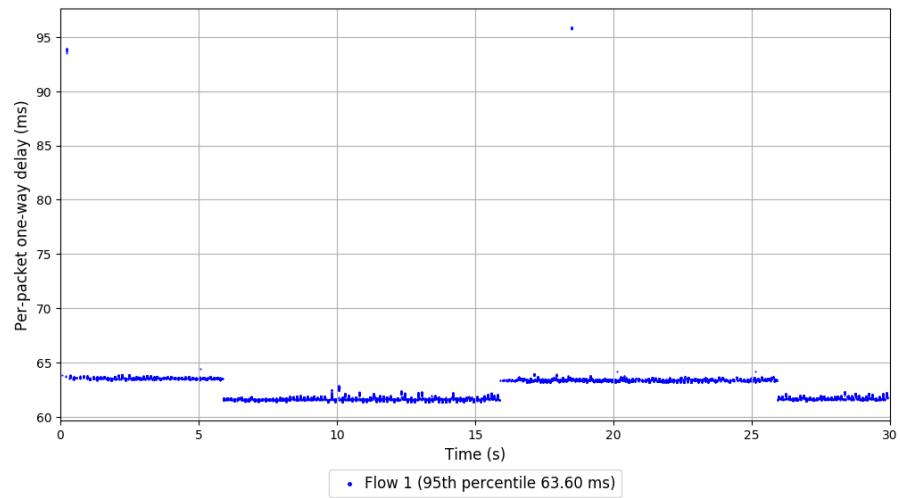
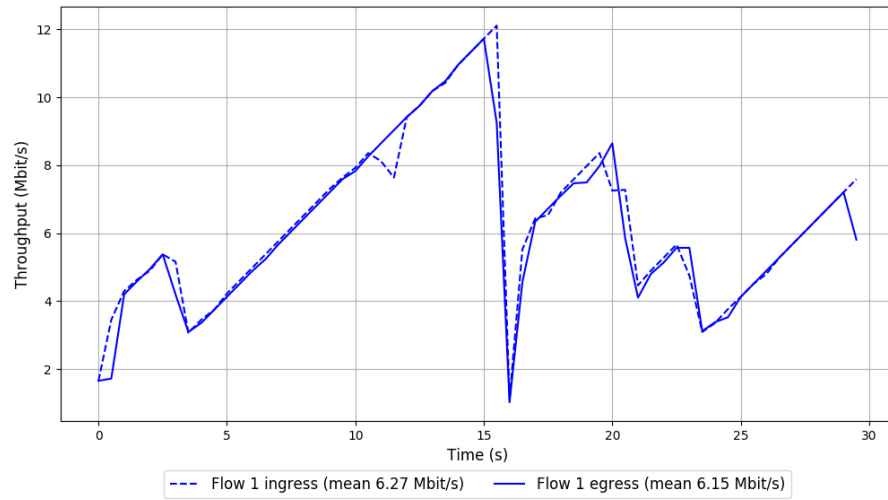
-- Flow 1:

Average throughput: 6.15 Mbit/s

95th percentile per-packet one-way delay: 63.605 ms

Loss rate: 2.32%

Run 2: Report of TCP Vegas — Data Link



Run 3: Statistics of TCP Vegas

Start at: 2017-08-17 04:55:42

End at: 2017-08-17 04:56:12

Below is generated by plot.py at 2017-08-17 08:58:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 22.64 Mbit/s

95th percentile per-packet one-way delay: 63.726 ms

Loss rate: 0.68%

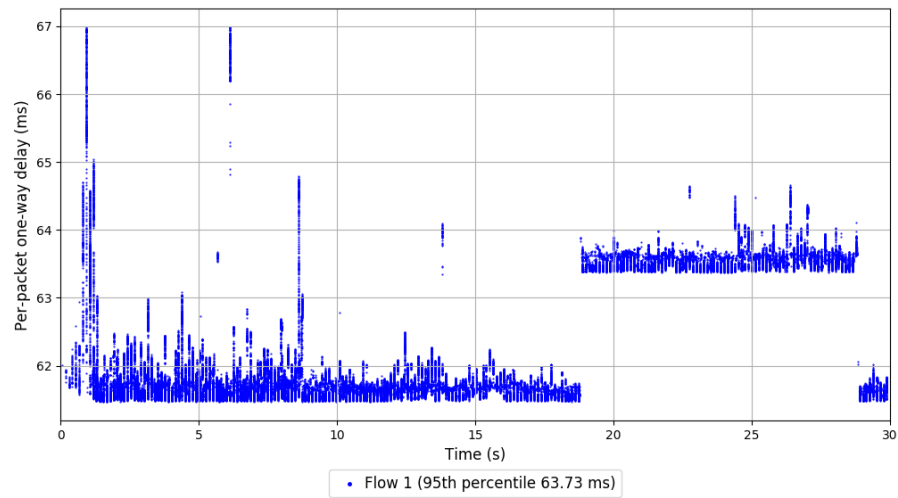
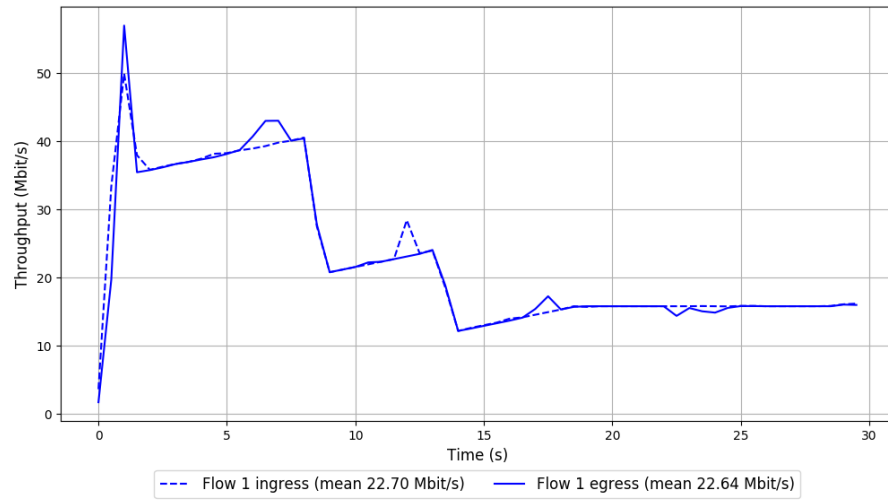
-- Flow 1:

Average throughput: 22.64 Mbit/s

95th percentile per-packet one-way delay: 63.726 ms

Loss rate: 0.68%

Run 3: Report of TCP Vegas — Data Link



Run 4: Statistics of TCP Vegas

Start at: 2017-08-17 05:05:45

End at: 2017-08-17 05:06:15

Below is generated by plot.py at 2017-08-17 08:58:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 5.55 Mbit/s

95th percentile per-packet one-way delay: 63.994 ms

Loss rate: 2.12%

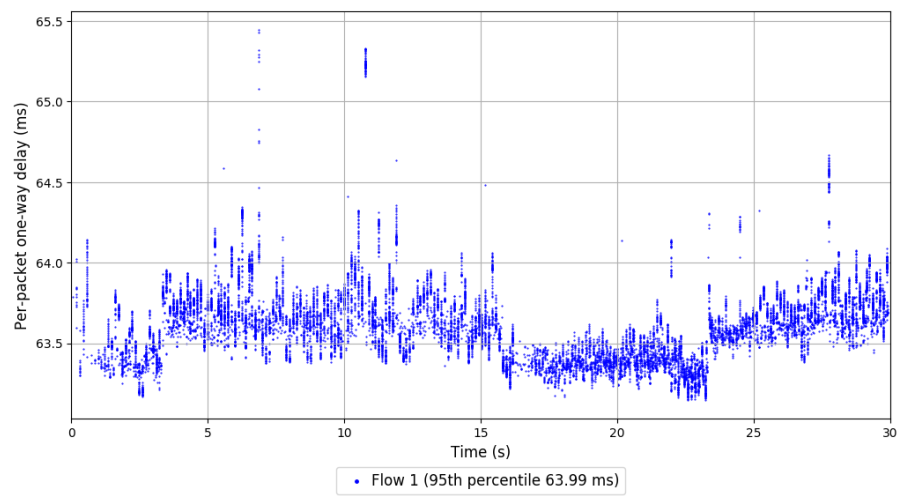
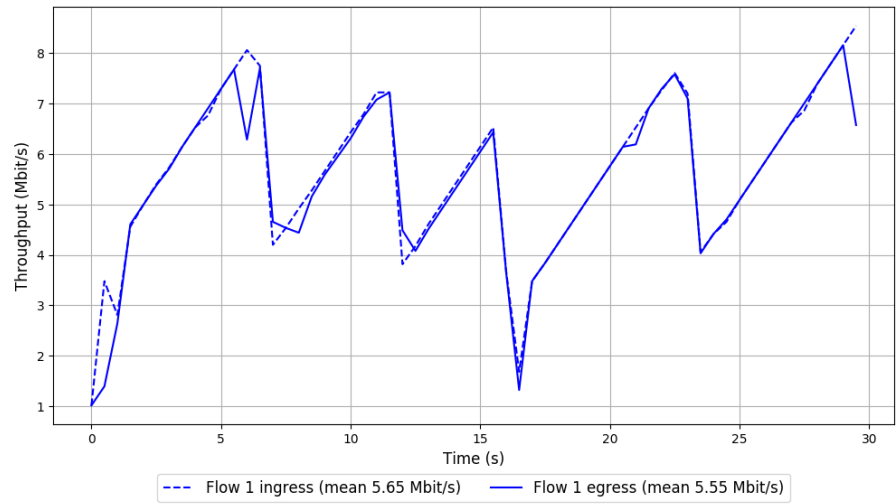
-- Flow 1:

Average throughput: 5.55 Mbit/s

95th percentile per-packet one-way delay: 63.994 ms

Loss rate: 2.12%

Run 4: Report of TCP Vegas — Data Link



Run 5: Statistics of TCP Vegas

Start at: 2017-08-17 05:16:24

End at: 2017-08-17 05:16:54

Below is generated by plot.py at 2017-08-17 08:58:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 6.65 Mbit/s

95th percentile per-packet one-way delay: 63.732 ms

Loss rate: 1.69%

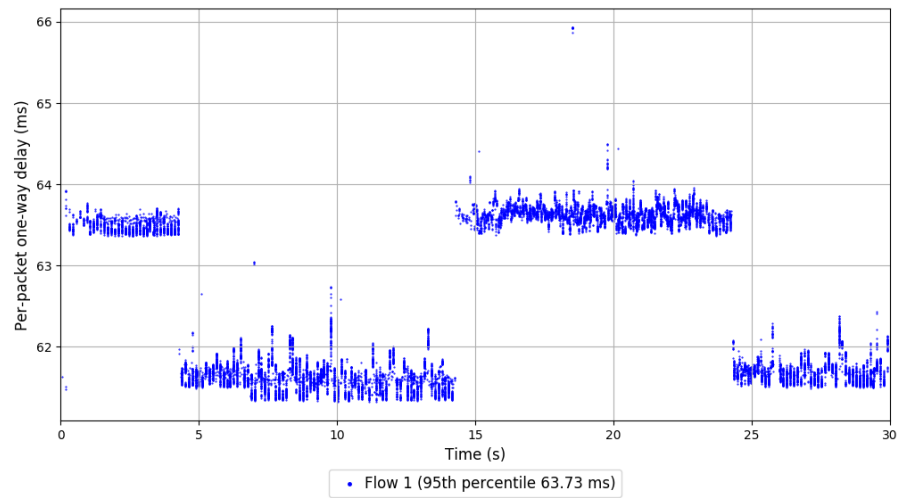
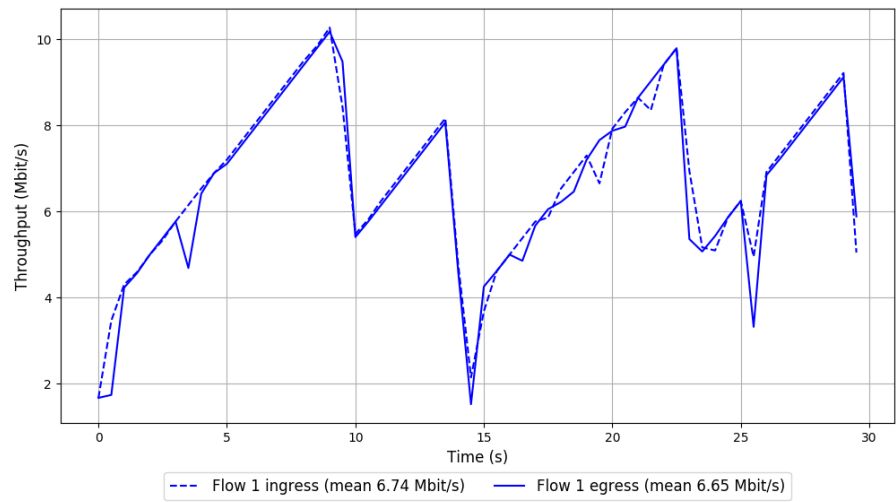
-- Flow 1:

Average throughput: 6.65 Mbit/s

95th percentile per-packet one-way delay: 63.732 ms

Loss rate: 1.69%

Run 5: Report of TCP Vegas — Data Link



Run 6: Statistics of TCP Vegas

Start at: 2017-08-17 05:26:29

End at: 2017-08-17 05:26:59

Below is generated by plot.py at 2017-08-17 08:58:44

Datalink statistics

-- Total of 1 flow:

Average throughput: 35.51 Mbit/s

95th percentile per-packet one-way delay: 64.302 ms

Loss rate: 0.49%

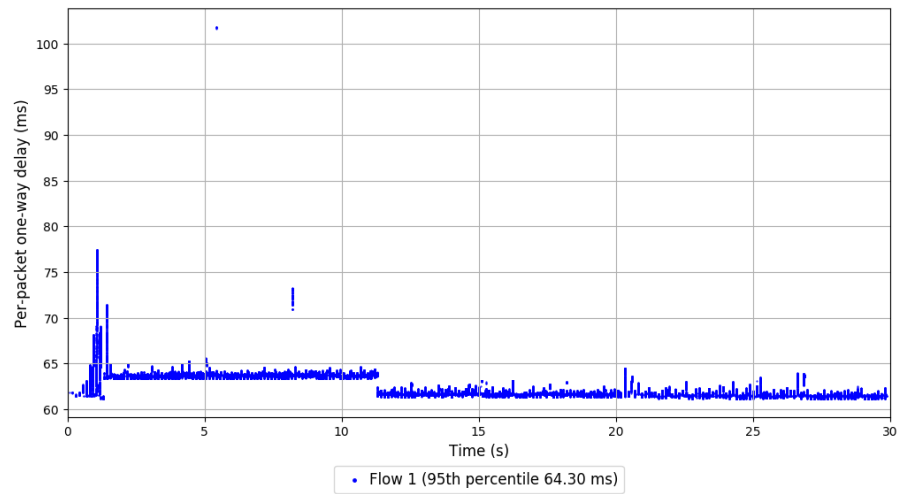
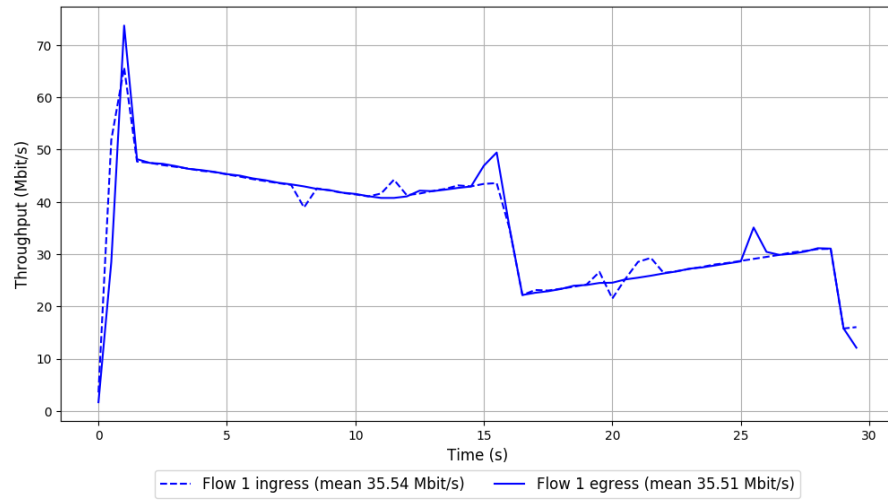
-- Flow 1:

Average throughput: 35.51 Mbit/s

95th percentile per-packet one-way delay: 64.302 ms

Loss rate: 0.49%

Run 6: Report of TCP Vegas — Data Link



Run 7: Statistics of TCP Vegas

Start at: 2017-08-17 05:37:00

End at: 2017-08-17 05:37:30

Below is generated by plot.py at 2017-08-17 08:58:55

Datalink statistics

-- Total of 1 flow:

Average throughput: 69.62 Mbit/s

95th percentile per-packet one-way delay: 63.606 ms

Loss rate: 0.12%

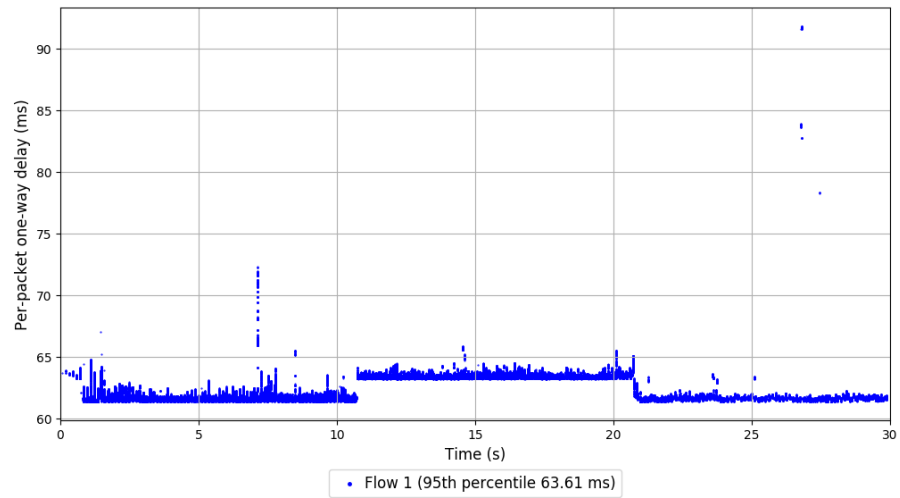
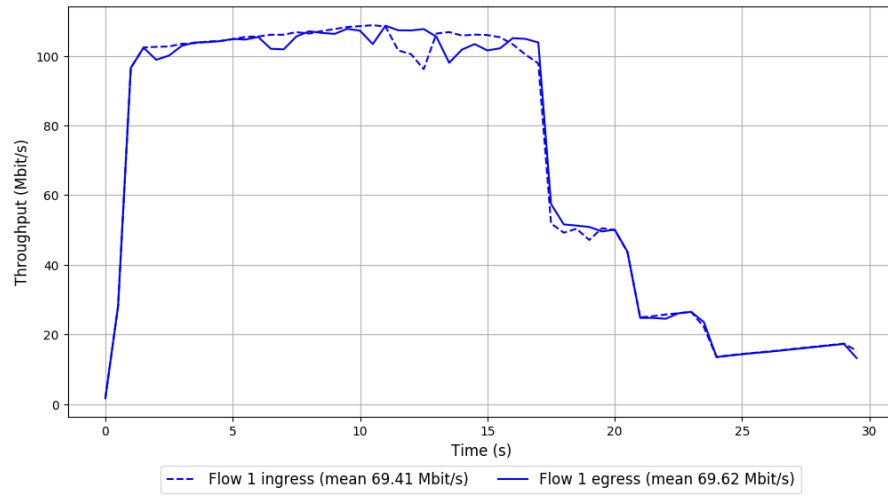
-- Flow 1:

Average throughput: 69.62 Mbit/s

95th percentile per-packet one-way delay: 63.606 ms

Loss rate: 0.12%

Run 7: Report of TCP Vegas — Data Link



Run 8: Statistics of TCP Vegas

Start at: 2017-08-17 05:47:31

End at: 2017-08-17 05:48:01

Below is generated by plot.py at 2017-08-17 08:58:55

Datalink statistics

-- Total of 1 flow:

Average throughput: 8.48 Mbit/s

95th percentile per-packet one-way delay: 63.742 ms

Loss rate: 1.01%

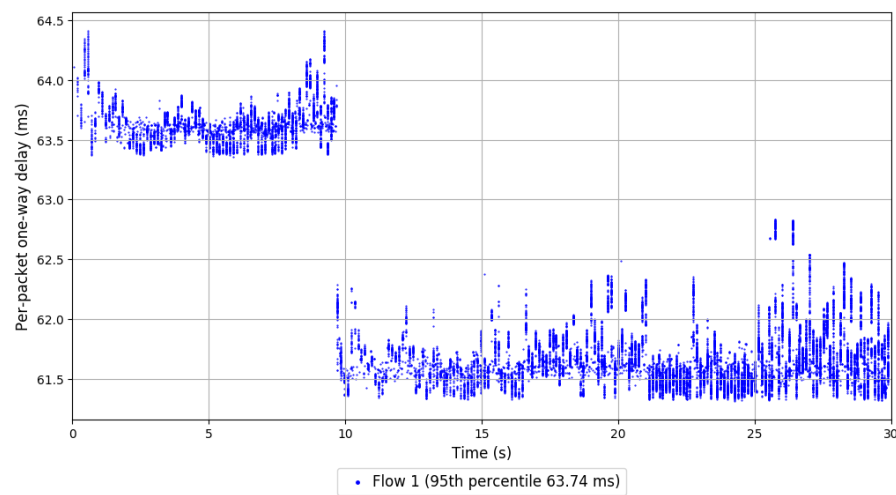
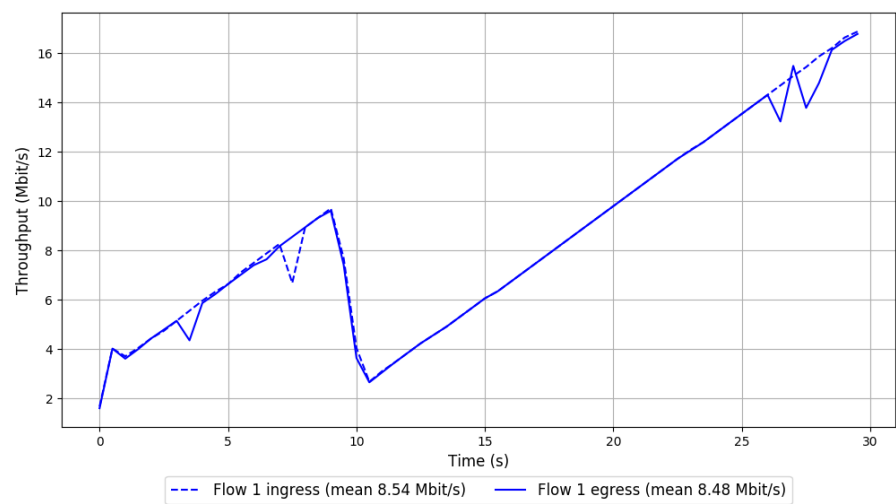
-- Flow 1:

Average throughput: 8.48 Mbit/s

95th percentile per-packet one-way delay: 63.742 ms

Loss rate: 1.01%

Run 8: Report of TCP Vegas — Data Link



Run 9: Statistics of TCP Vegas

Start at: 2017-08-17 05:57:55

End at: 2017-08-17 05:58:25

Below is generated by plot.py at 2017-08-17 08:58:58

Datalink statistics

-- Total of 1 flow:

Average throughput: 62.70 Mbit/s

95th percentile per-packet one-way delay: 64.077 ms

Loss rate: 0.25%

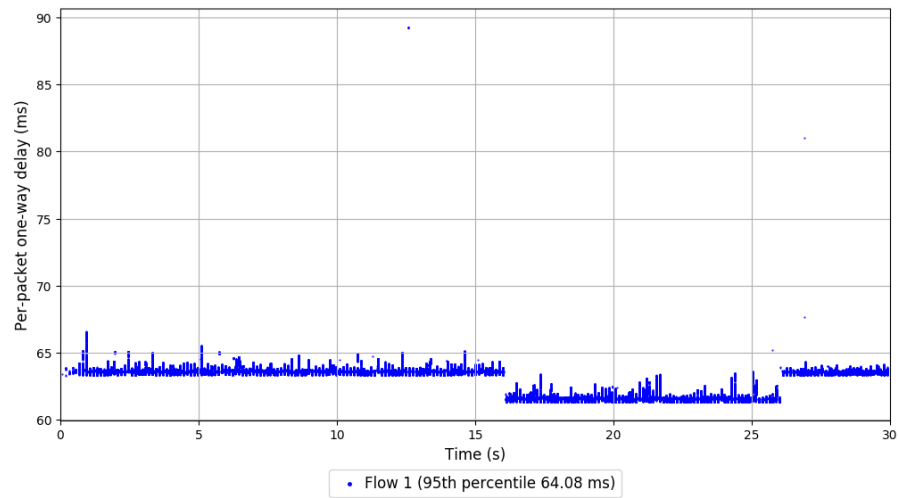
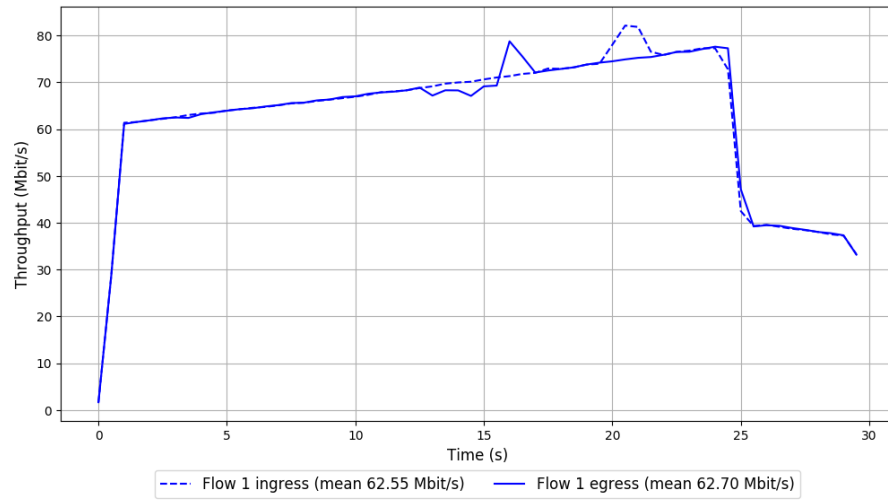
-- Flow 1:

Average throughput: 62.70 Mbit/s

95th percentile per-packet one-way delay: 64.077 ms

Loss rate: 0.25%

Run 9: Report of TCP Vegas — Data Link



Run 10: Statistics of TCP Vegas

Start at: 2017-08-17 06:08:31

End at: 2017-08-17 06:09:01

Below is generated by plot.py at 2017-08-17 08:58:58

Datalink statistics

-- Total of 1 flow:

Average throughput: 4.92 Mbit/s

95th percentile per-packet one-way delay: 63.697 ms

Loss rate: 2.84%

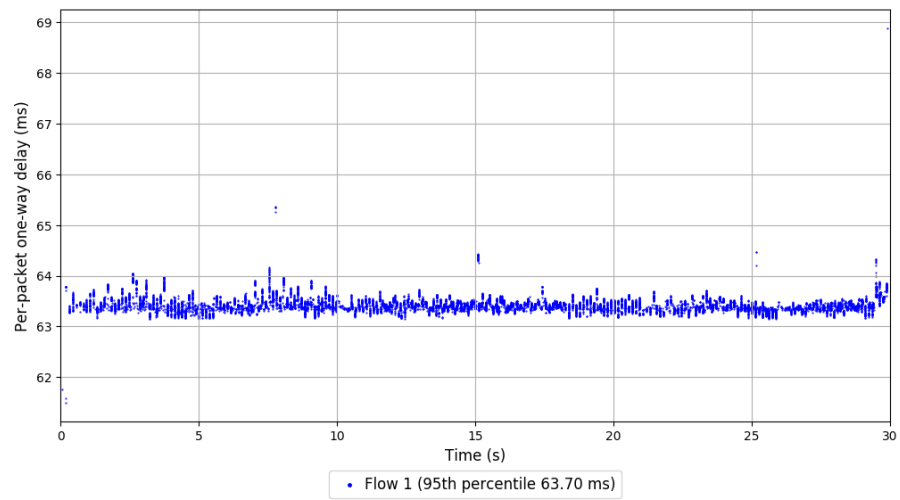
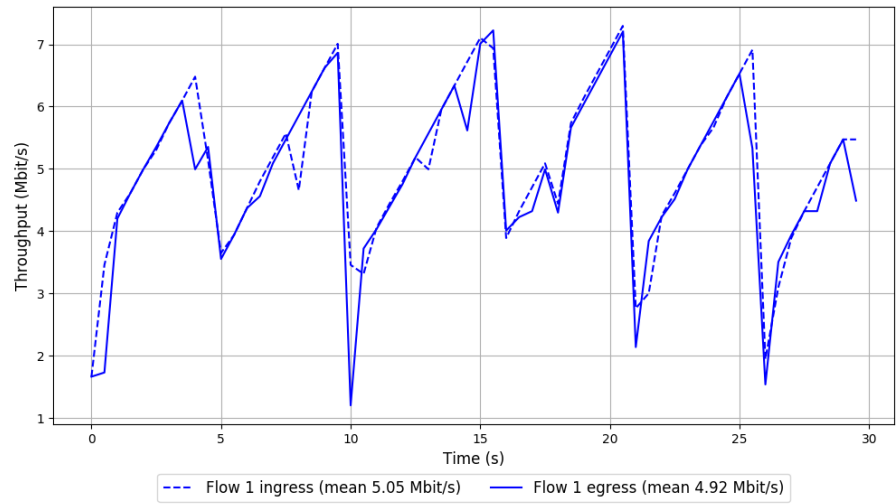
-- Flow 1:

Average throughput: 4.92 Mbit/s

95th percentile per-packet one-way delay: 63.697 ms

Loss rate: 2.84%

Run 10: Report of TCP Vegas — Data Link



Run 1: Statistics of Verus

Start at: 2017-08-17 04:38:09

End at: 2017-08-17 04:38:39

Below is generated by plot.py at 2017-08-17 08:59:06

Datalink statistics

-- Total of 1 flow:

Average throughput: 48.73 Mbit/s

95th percentile per-packet one-way delay: 71.366 ms

Loss rate: 56.05%

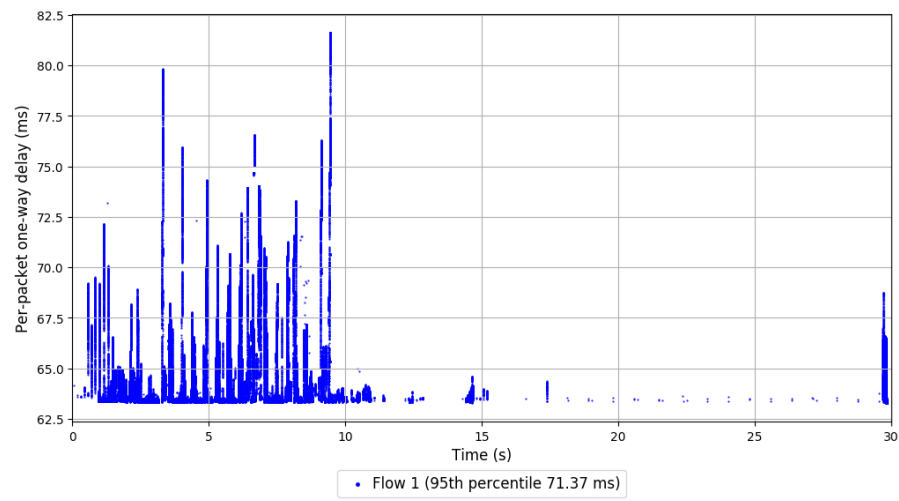
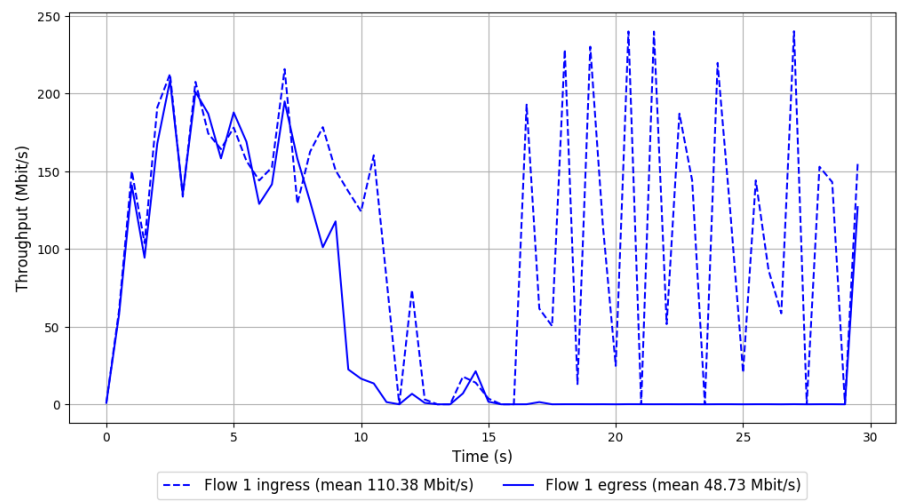
-- Flow 1:

Average throughput: 48.73 Mbit/s

95th percentile per-packet one-way delay: 71.366 ms

Loss rate: 56.05%

Run 1: Report of Verus — Data Link



Run 2: Statistics of Verus

Start at: 2017-08-17 04:48:38

End at: 2017-08-17 04:49:08

Below is generated by plot.py at 2017-08-17 08:59:14

Datalink statistics

-- Total of 1 flow:

Average throughput: 58.17 Mbit/s

95th percentile per-packet one-way delay: 69.949 ms

Loss rate: 53.93%

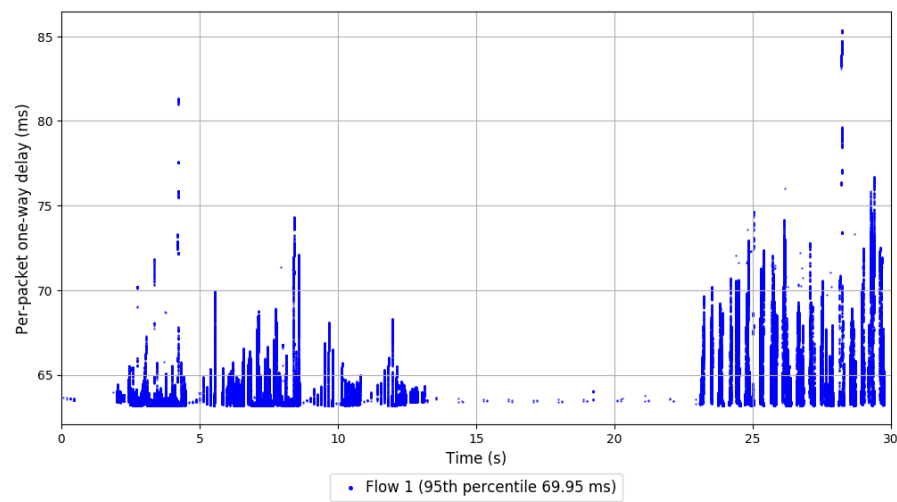
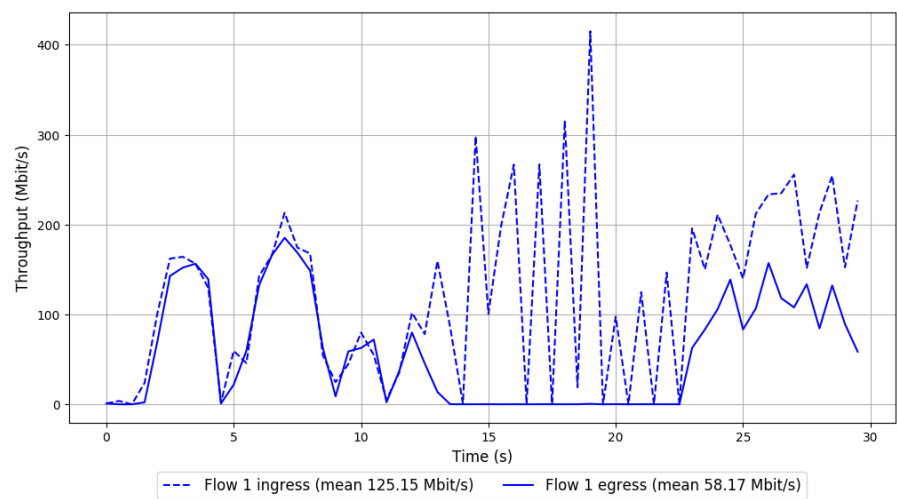
-- Flow 1:

Average throughput: 58.17 Mbit/s

95th percentile per-packet one-way delay: 69.949 ms

Loss rate: 53.93%

Run 2: Report of Verus — Data Link



Run 3: Statistics of Verus

Start at: 2017-08-17 04:58:59

End at: 2017-08-17 04:59:29

Below is generated by plot.py at 2017-08-17 08:59:16

Datalink statistics

-- Total of 1 flow:

Average throughput: 57.19 Mbit/s

95th percentile per-packet one-way delay: 68.885 ms

Loss rate: 6.51%

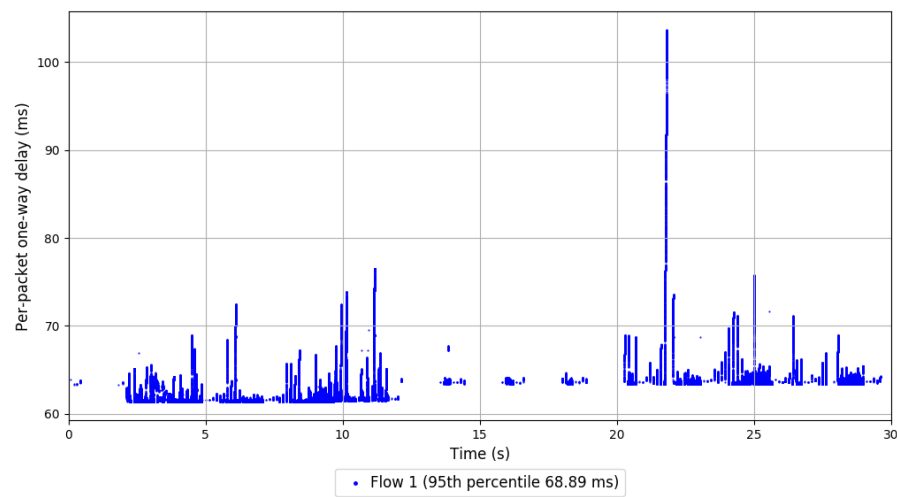
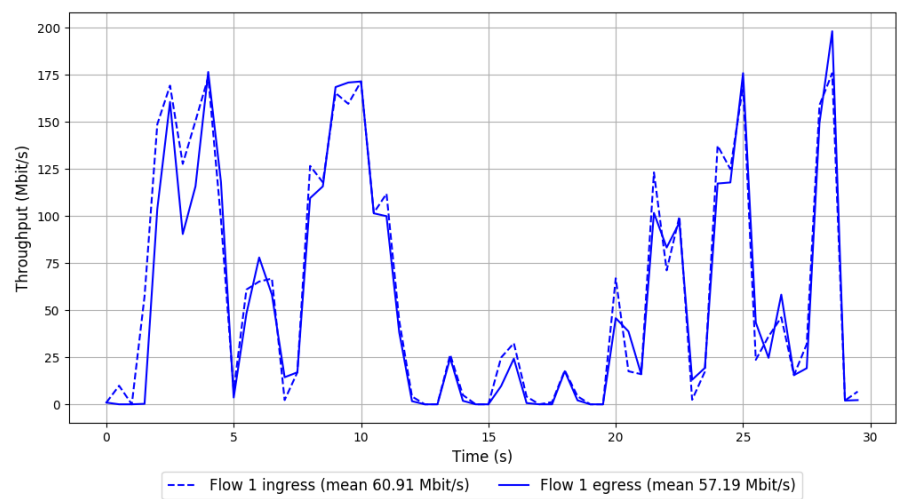
-- Flow 1:

Average throughput: 57.19 Mbit/s

95th percentile per-packet one-way delay: 68.885 ms

Loss rate: 6.51%

Run 3: Report of Verus — Data Link

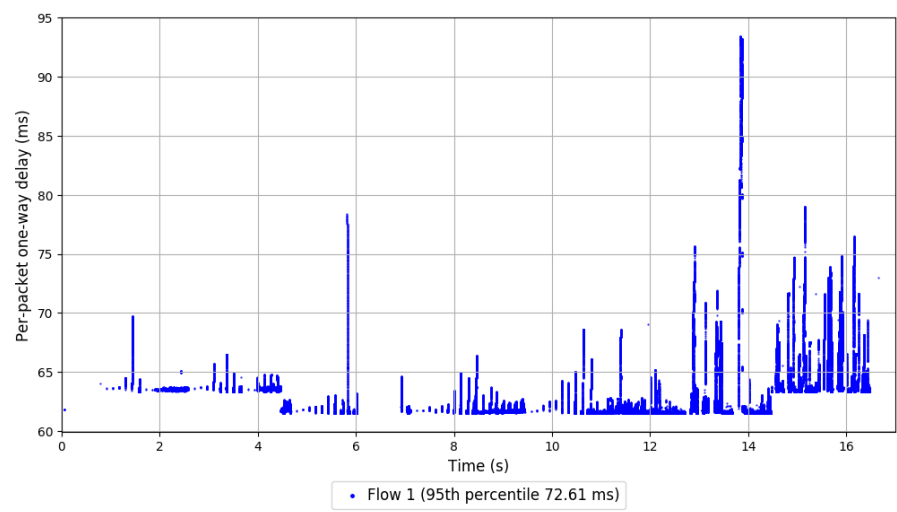
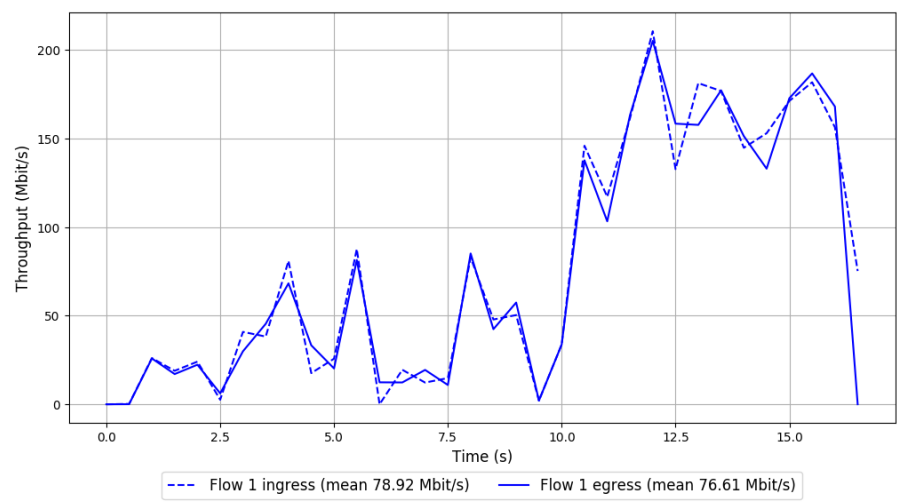


Run 4: Statistics of Verus

Start at: 2017-08-17 05:09:13

End at: 2017-08-17 05:09:43

Run 4: Report of Verus — Data Link



Run 5: Statistics of Verus

Start at: 2017-08-17 05:19:46

End at: 2017-08-17 05:20:16

Below is generated by plot.py at 2017-08-17 08:59:24

Datalink statistics

-- Total of 1 flow:

Average throughput: 36.95 Mbit/s

95th percentile per-packet one-way delay: 77.169 ms

Loss rate: 39.68%

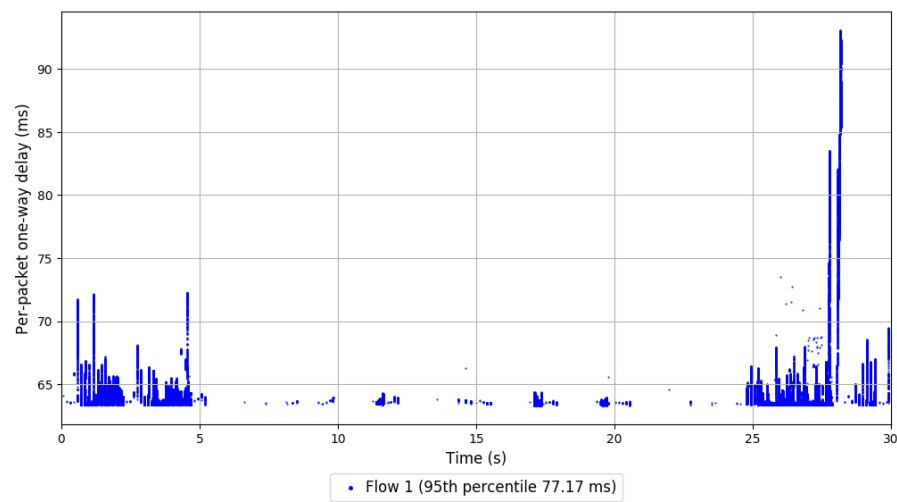
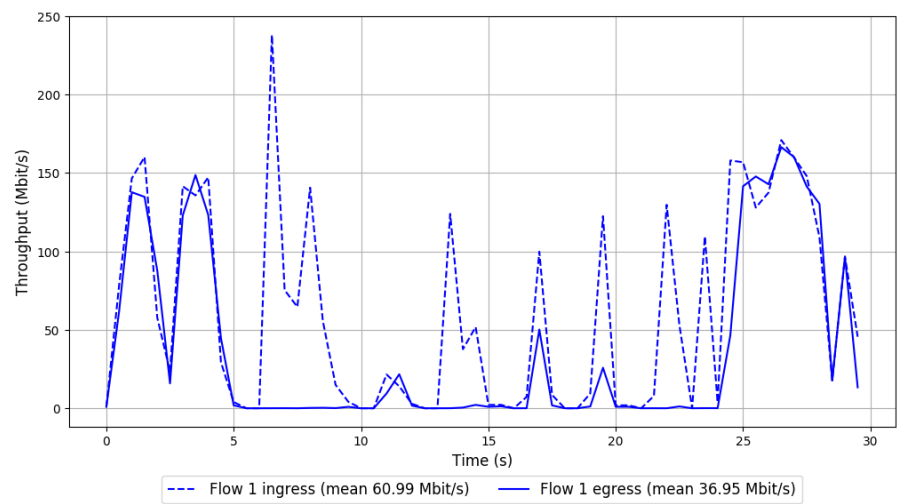
-- Flow 1:

Average throughput: 36.95 Mbit/s

95th percentile per-packet one-way delay: 77.169 ms

Loss rate: 39.68%

Run 5: Report of Verus — Data Link



Run 6: Statistics of Verus

Start at: 2017-08-17 05:30:10

End at: 2017-08-17 05:30:40

Below is generated by plot.py at 2017-08-17 08:59:40

Datalink statistics

-- Total of 1 flow:

Average throughput: 58.35 Mbit/s

95th percentile per-packet one-way delay: 136.305 ms

Loss rate: 55.84%

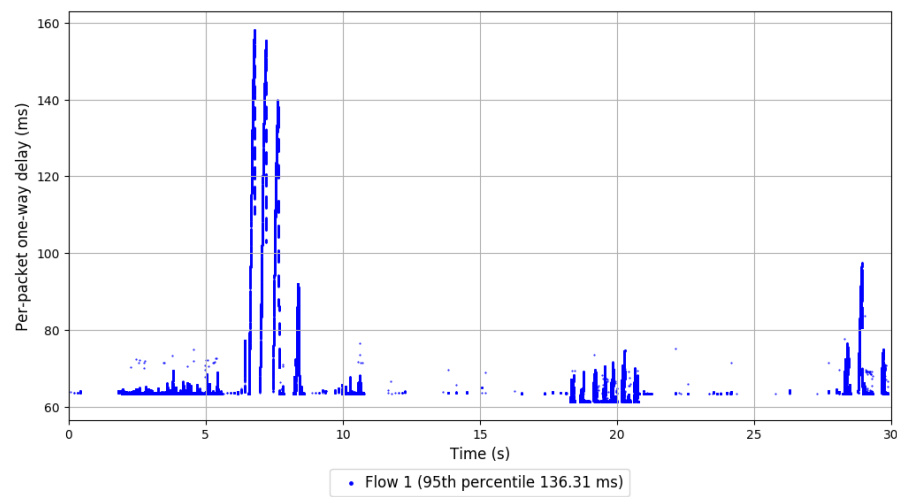
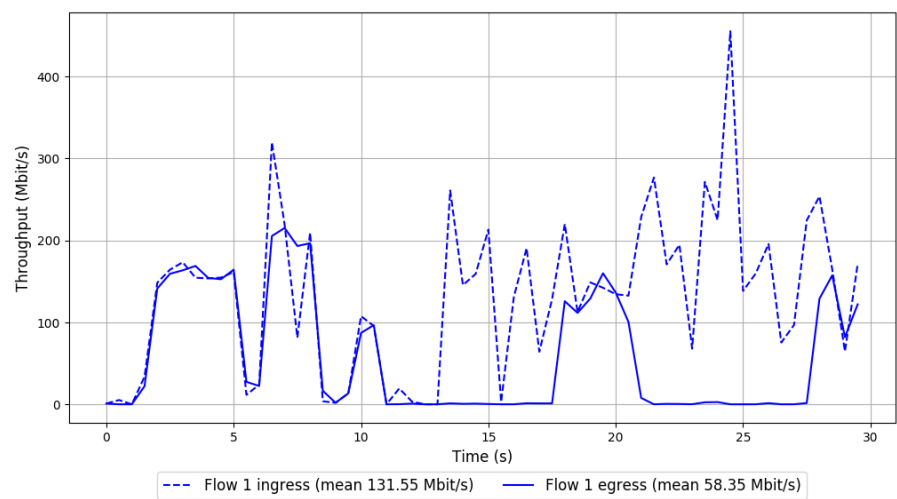
-- Flow 1:

Average throughput: 58.35 Mbit/s

95th percentile per-packet one-way delay: 136.305 ms

Loss rate: 55.84%

Run 6: Report of Verus — Data Link



Run 7: Statistics of Verus

Start at: 2017-08-17 05:40:20

End at: 2017-08-17 05:40:50

Below is generated by plot.py at 2017-08-17 08:59:47

Datalink statistics

-- Total of 1 flow:

Average throughput: 132.69 Mbit/s

95th percentile per-packet one-way delay: 66.972 ms

Loss rate: 1.10%

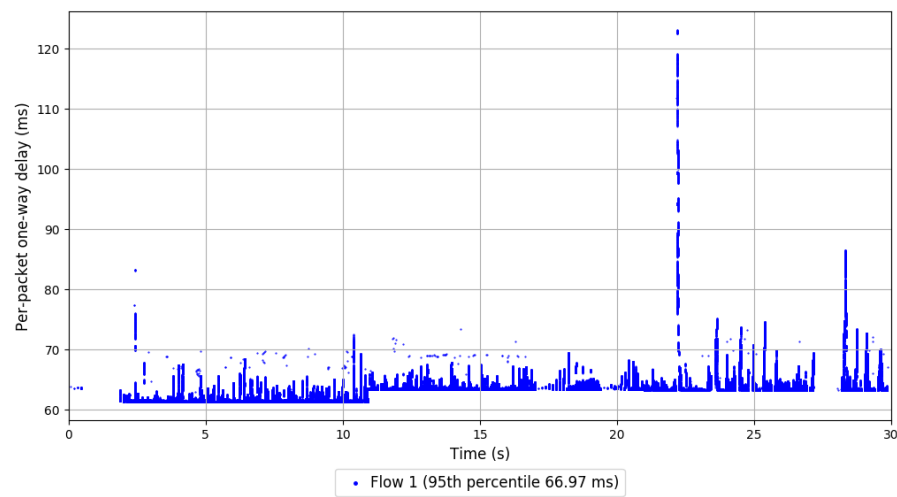
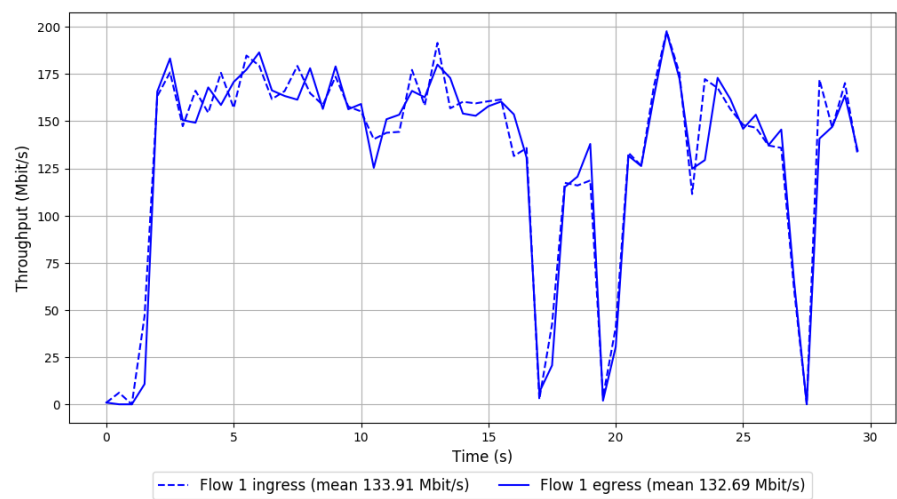
-- Flow 1:

Average throughput: 132.69 Mbit/s

95th percentile per-packet one-way delay: 66.972 ms

Loss rate: 1.10%

Run 7: Report of Verus — Data Link

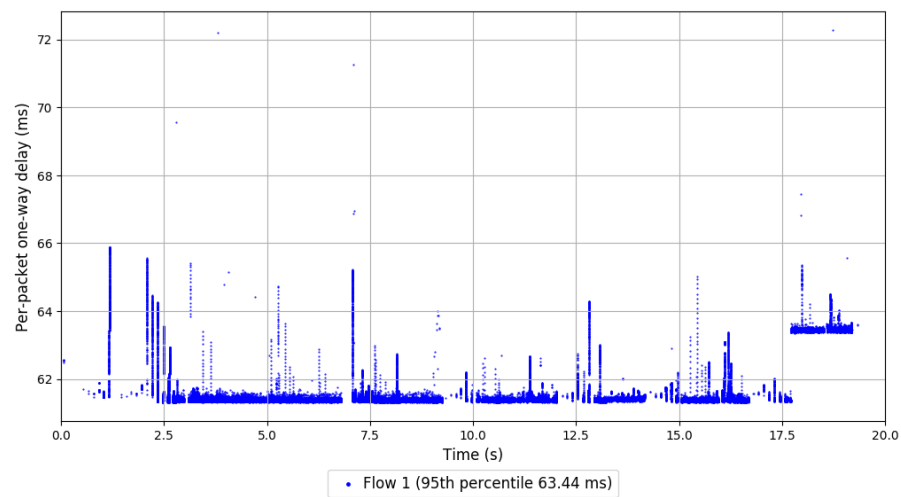
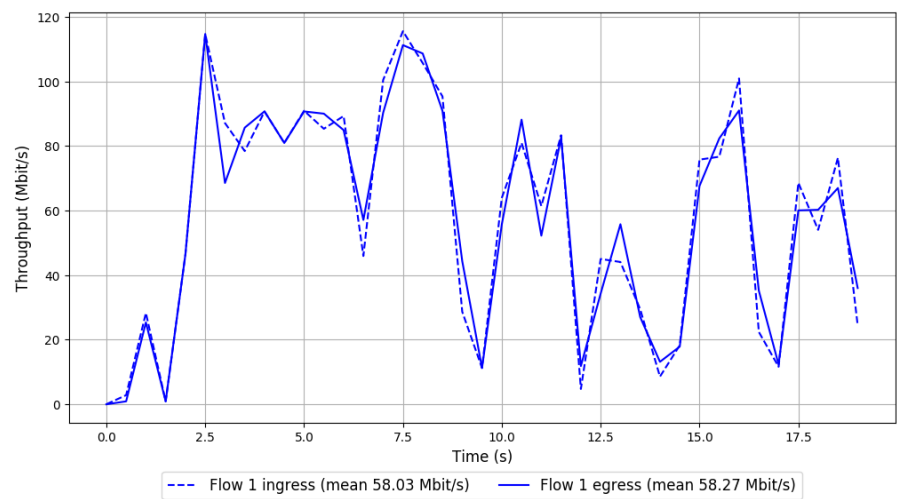


Run 8: Statistics of Verus

Start at: 2017-08-17 05:51:02

End at: 2017-08-17 05:51:33

Run 8: Report of Verus — Data Link



Run 9: Statistics of Verus

Start at: 2017-08-17 06:01:48

End at: 2017-08-17 06:02:18

Below is generated by plot.py at 2017-08-17 09:00:09

Datalink statistics

-- Total of 1 flow:

Average throughput: 123.55 Mbit/s

95th percentile per-packet one-way delay: 78.635 ms

Loss rate: 1.66%

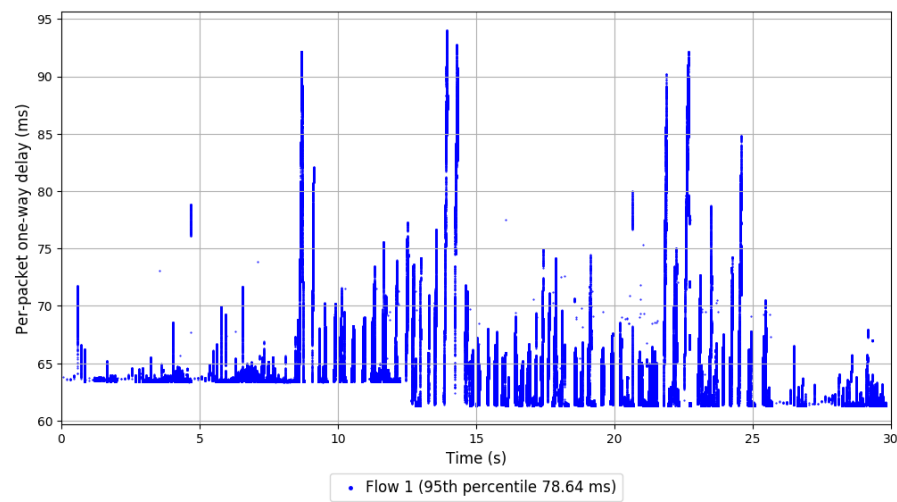
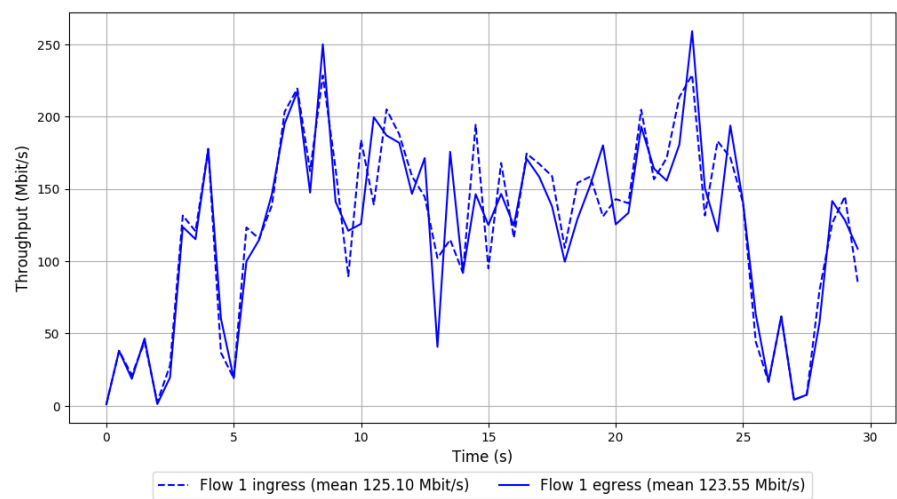
-- Flow 1:

Average throughput: 123.55 Mbit/s

95th percentile per-packet one-way delay: 78.635 ms

Loss rate: 1.66%

Run 9: Report of Verus — Data Link



Run 10: Statistics of Verus

Start at: 2017-08-17 06:12:00

End at: 2017-08-17 06:12:30

Below is generated by plot.py at 2017-08-17 09:00:09

Datalink statistics

-- Total of 1 flow:

Average throughput: 79.22 Mbit/s

95th percentile per-packet one-way delay: 69.299 ms

Loss rate: 18.26%

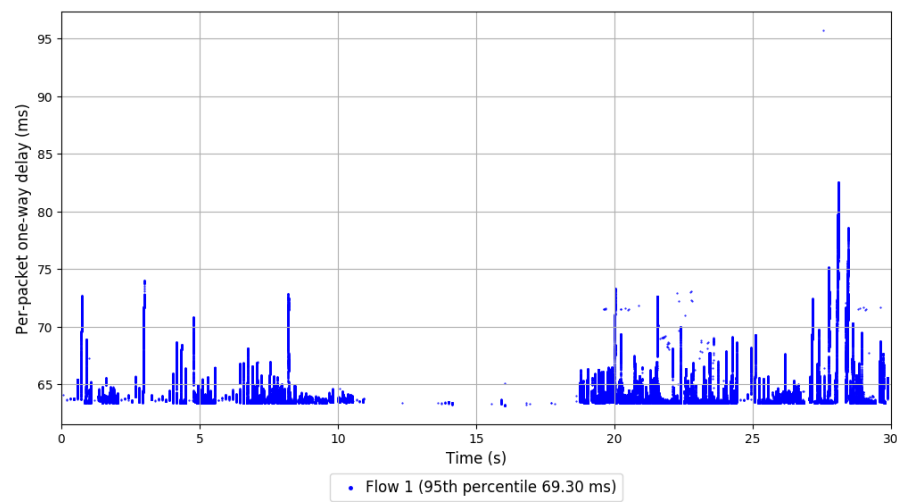
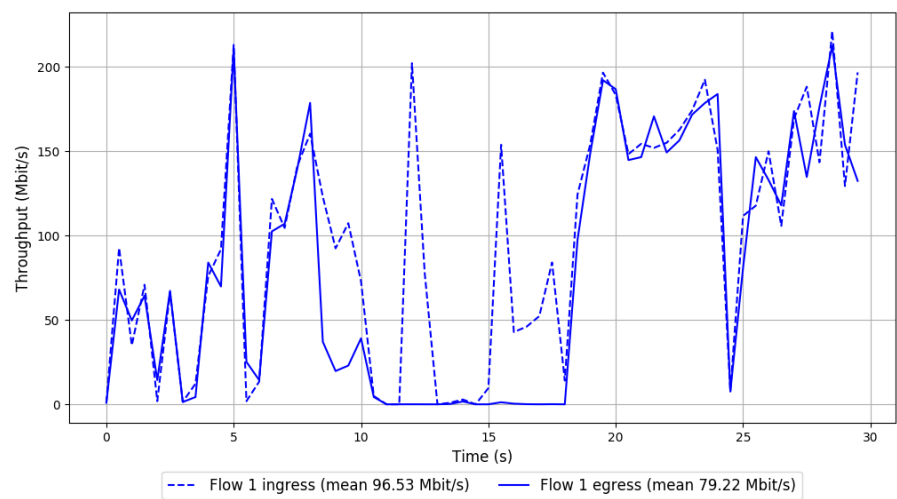
-- Flow 1:

Average throughput: 79.22 Mbit/s

95th percentile per-packet one-way delay: 69.299 ms

Loss rate: 18.26%

Run 10: Report of Verus — Data Link

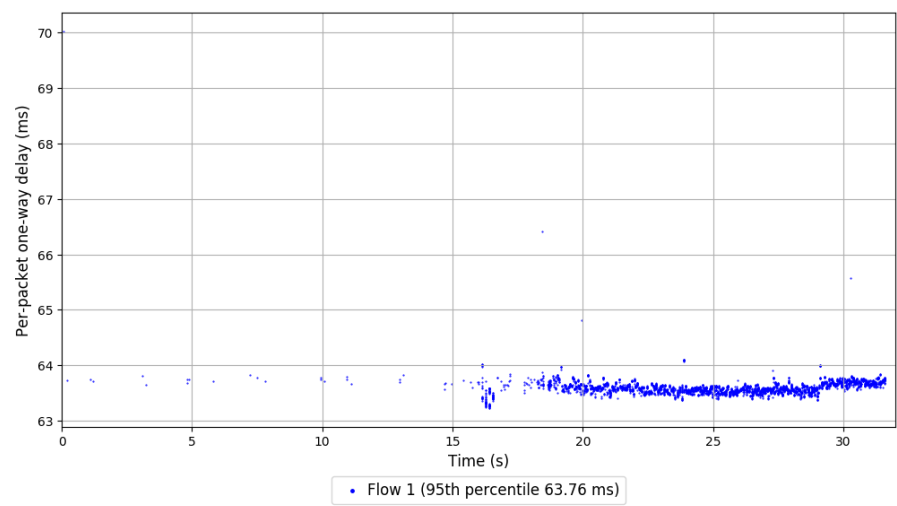
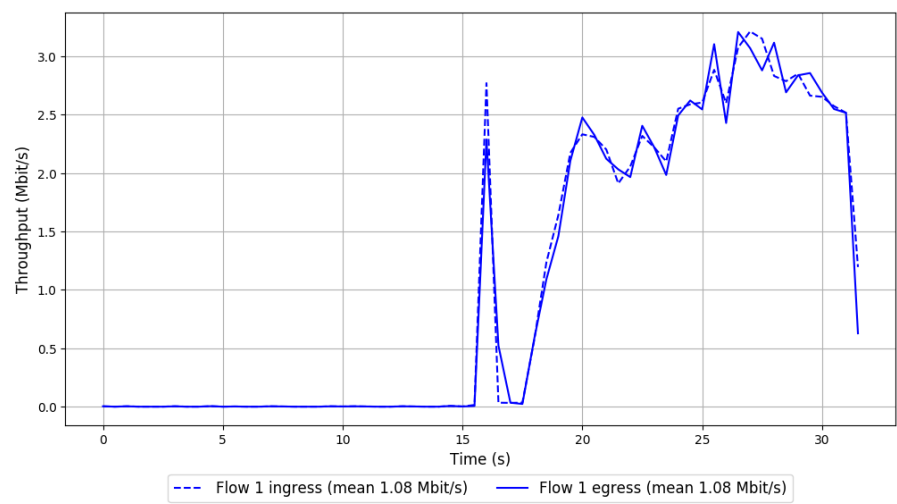


```
Run 1: Statistics of WebRTC media

Start at: 2017-08-17 04:29:43
End at: 2017-08-17 04:30:13

# Below is generated by plot.py at 2017-08-17 09:00:09
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.08 Mbit/s
95th percentile per-packet one-way delay: 63.757 ms
Loss rate: 1.19%
-- Flow 1:
Average throughput: 1.08 Mbit/s
95th percentile per-packet one-way delay: 63.757 ms
Loss rate: 1.19%
```


Run 1: Report of WebRTC media — Data Link

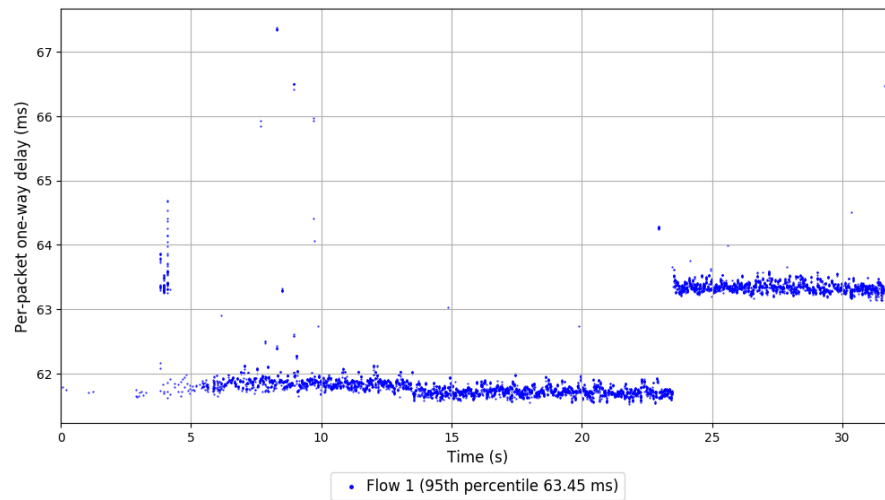
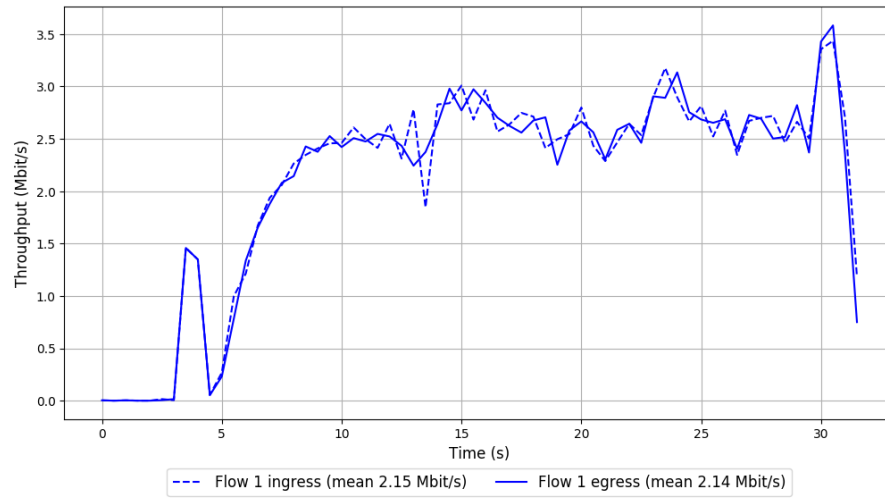


```
Run 2: Statistics of WebRTC media

Start at: 2017-08-17 04:40:06
End at: 2017-08-17 04:40:36

# Below is generated by plot.py at 2017-08-17 09:00:09
# Datalink statistics
-- Total of 1 flow:
Average throughput: 2.14 Mbit/s
95th percentile per-packet one-way delay: 63.445 ms
Loss rate: 0.68%
-- Flow 1:
Average throughput: 2.14 Mbit/s
95th percentile per-packet one-way delay: 63.445 ms
Loss rate: 0.68%
```

Run 2: Report of WebRTC media — Data Link



Run 3: Statistics of WebRTC media

Start at: 2017-08-17 04:50:37

End at: 2017-08-17 04:51:07

Below is generated by plot.py at 2017-08-17 09:00:09

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.20 Mbit/s

95th percentile per-packet one-way delay: 63.964 ms

Loss rate: 0.77%

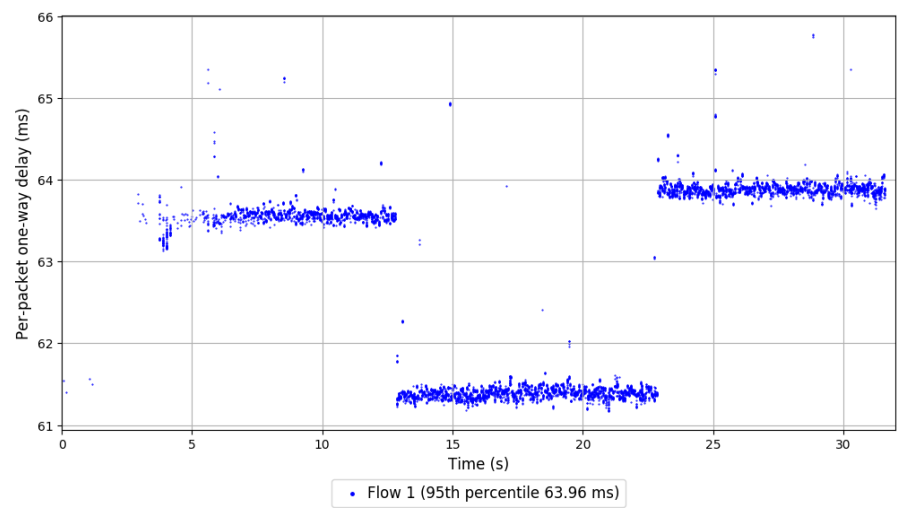
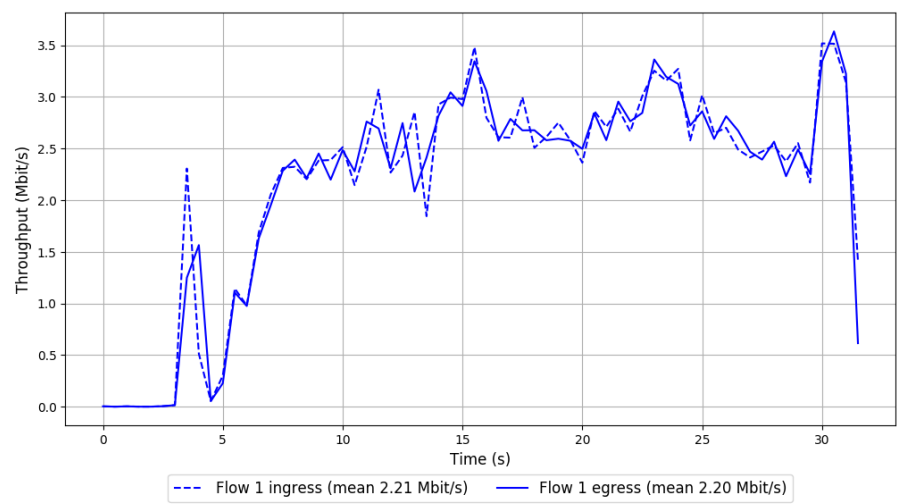
-- Flow 1:

Average throughput: 2.20 Mbit/s

95th percentile per-packet one-way delay: 63.964 ms

Loss rate: 0.77%

Run 3: Report of WebRTC media — Data Link



Run 4: Statistics of WebRTC media

Start at: 2017-08-17 05:00:55

End at: 2017-08-17 05:01:25

Below is generated by plot.py at 2017-08-17 09:00:09

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.24 Mbit/s

95th percentile per-packet one-way delay: 63.668 ms

Loss rate: 0.75%

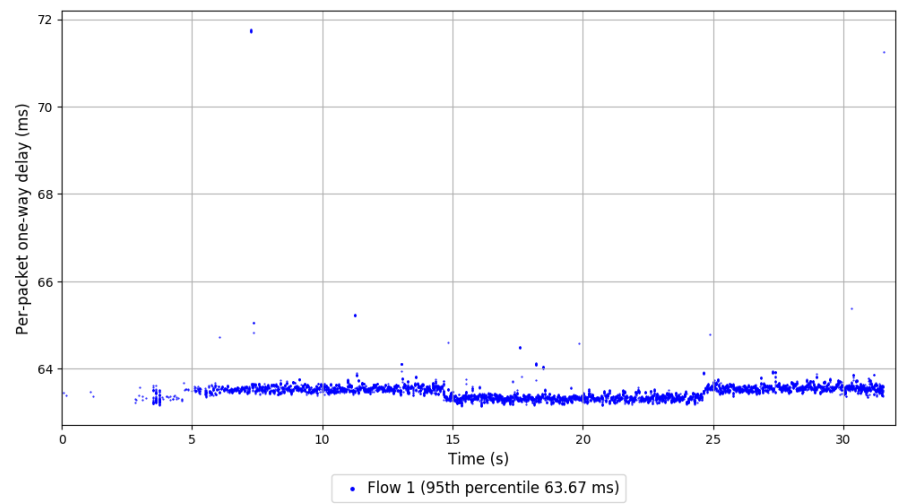
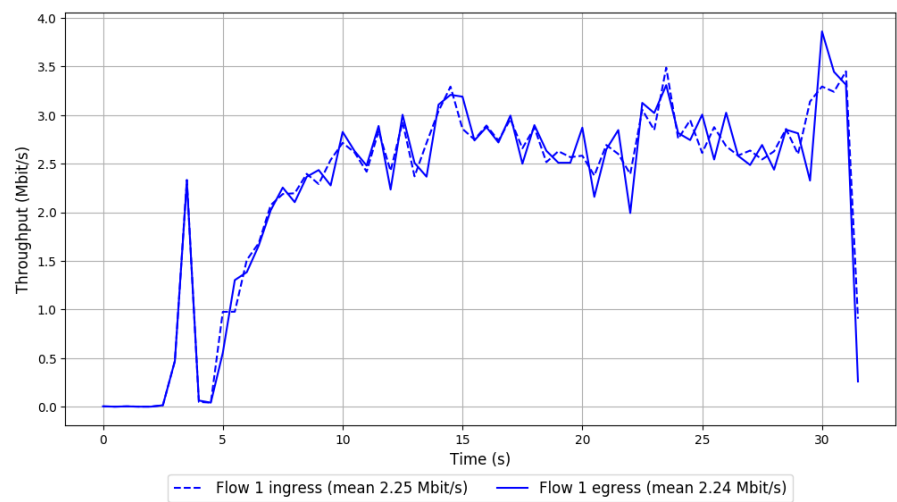
-- Flow 1:

Average throughput: 2.24 Mbit/s

95th percentile per-packet one-way delay: 63.668 ms

Loss rate: 0.75%

Run 4: Report of WebRTC media — Data Link



Run 5: Statistics of WebRTC media

Start at: 2017-08-17 05:11:10

End at: 2017-08-17 05:11:40

Below is generated by plot.py at 2017-08-17 09:00:09

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.18 Mbit/s

95th percentile per-packet one-way delay: 61.677 ms

Loss rate: 0.58%

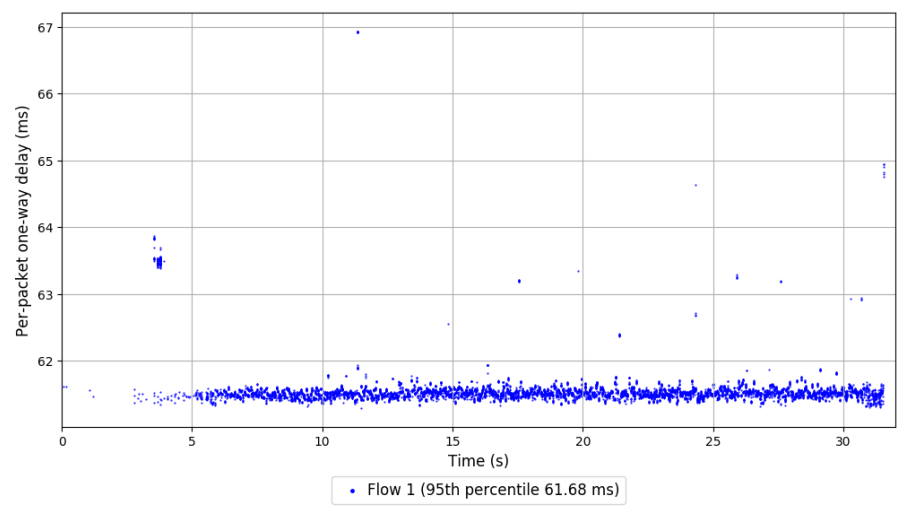
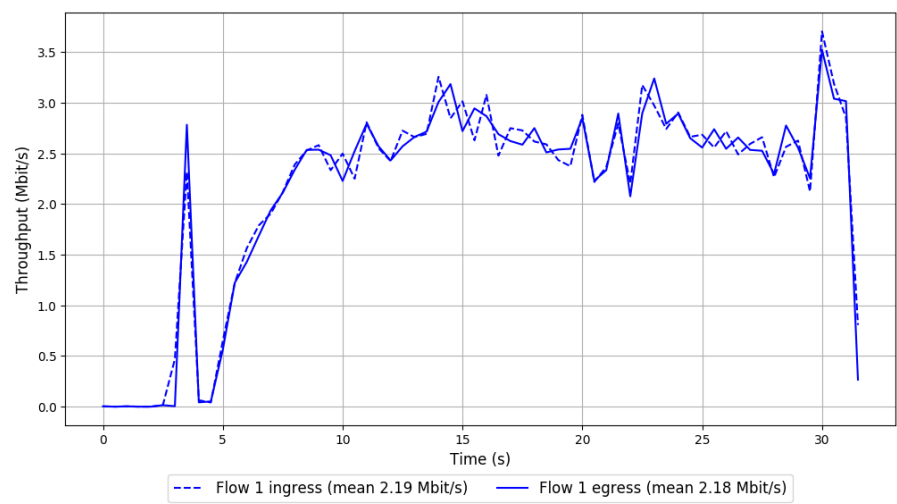
-- Flow 1:

Average throughput: 2.18 Mbit/s

95th percentile per-packet one-way delay: 61.677 ms

Loss rate: 0.58%

Run 5: Report of WebRTC media — Data Link



Run 6: Statistics of WebRTC media

Start at: 2017-08-17 05:21:42

End at: 2017-08-17 05:22:12

Below is generated by plot.py at 2017-08-17 09:00:10

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.16 Mbit/s

95th percentile per-packet one-way delay: 63.802 ms

Loss rate: 0.77%

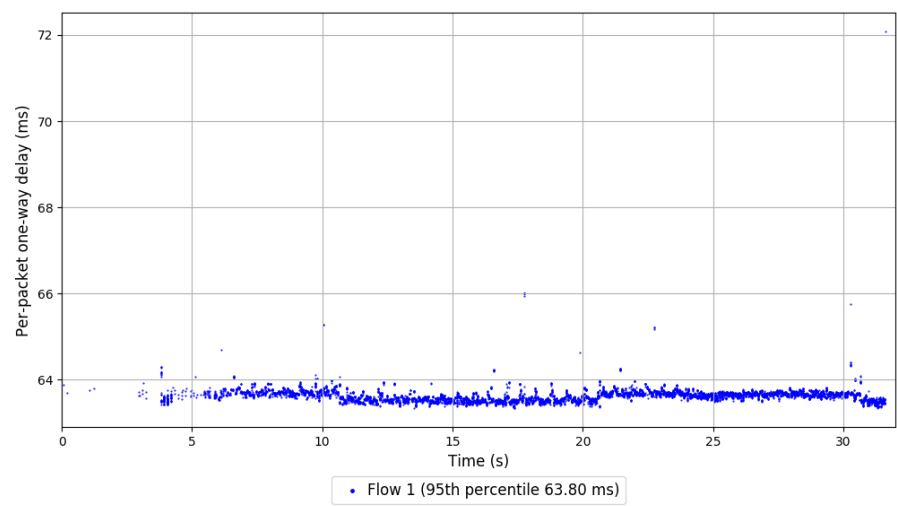
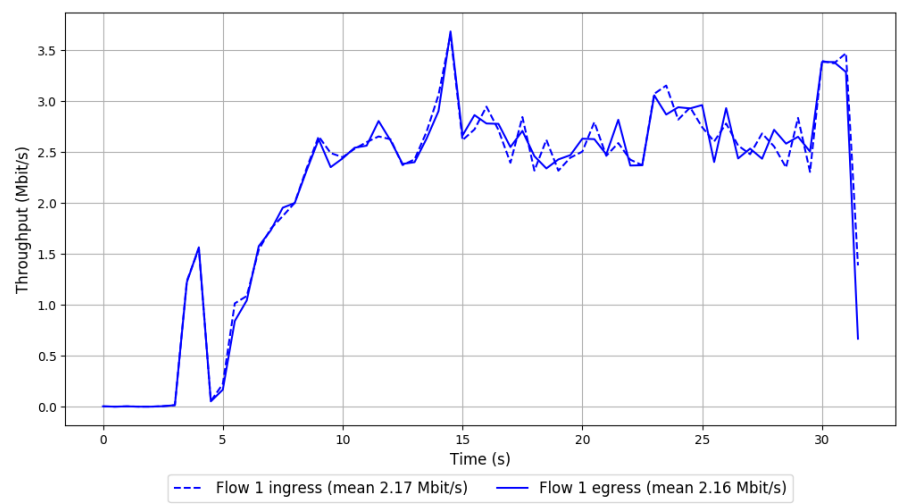
-- Flow 1:

Average throughput: 2.16 Mbit/s

95th percentile per-packet one-way delay: 63.802 ms

Loss rate: 0.77%

Run 6: Report of WebRTC media — Data Link



Run 7: Statistics of WebRTC media

Start at: 2017-08-17 05:32:08

End at: 2017-08-17 05:32:38

Below is generated by plot.py at 2017-08-17 09:00:10

Datalink statistics

-- Total of 1 flow:

Average throughput: 1.83 Mbit/s

95th percentile per-packet one-way delay: 63.719 ms

Loss rate: 0.74%

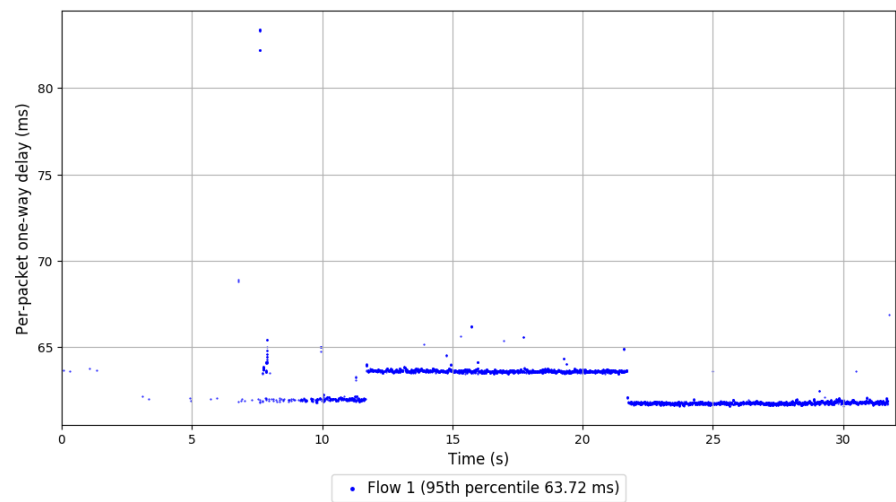
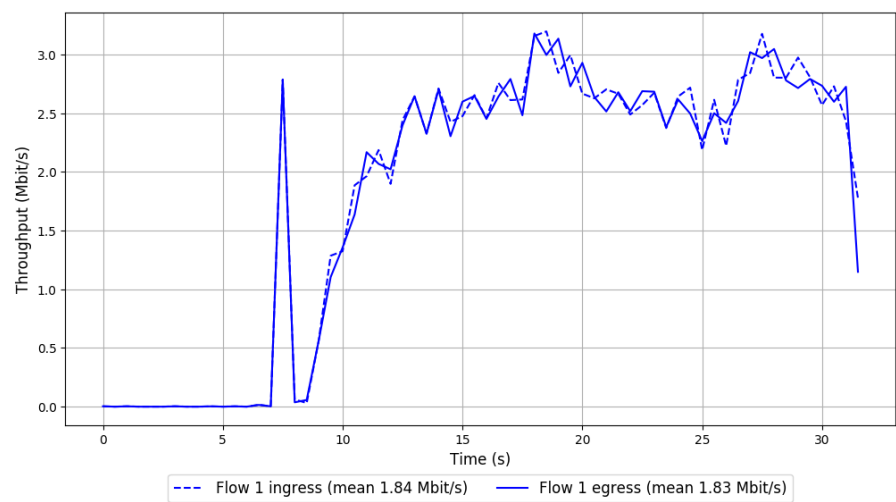
-- Flow 1:

Average throughput: 1.83 Mbit/s

95th percentile per-packet one-way delay: 63.719 ms

Loss rate: 0.74%

Run 7: Report of WebRTC media — Data Link



Run 8: Statistics of WebRTC media

Start at: 2017-08-17 05:42:22

End at: 2017-08-17 05:42:52

Below is generated by plot.py at 2017-08-17 09:00:12

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.19 Mbit/s

95th percentile per-packet one-way delay: 63.715 ms

Loss rate: 0.56%

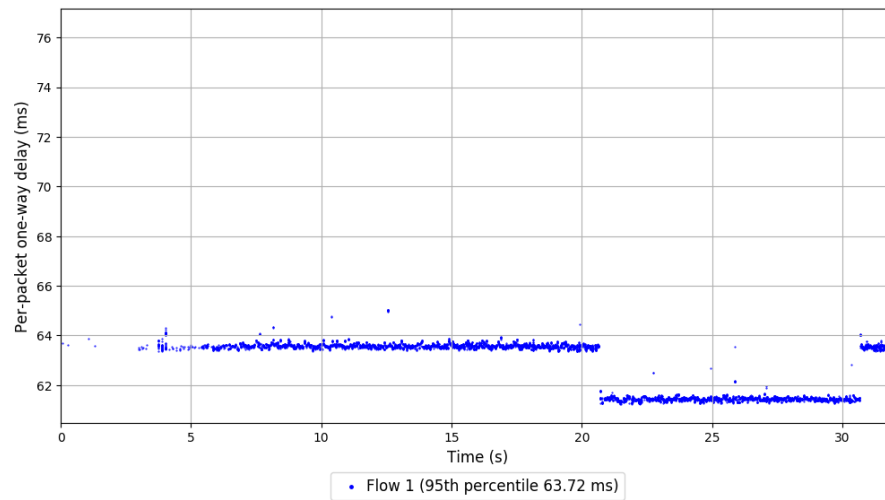
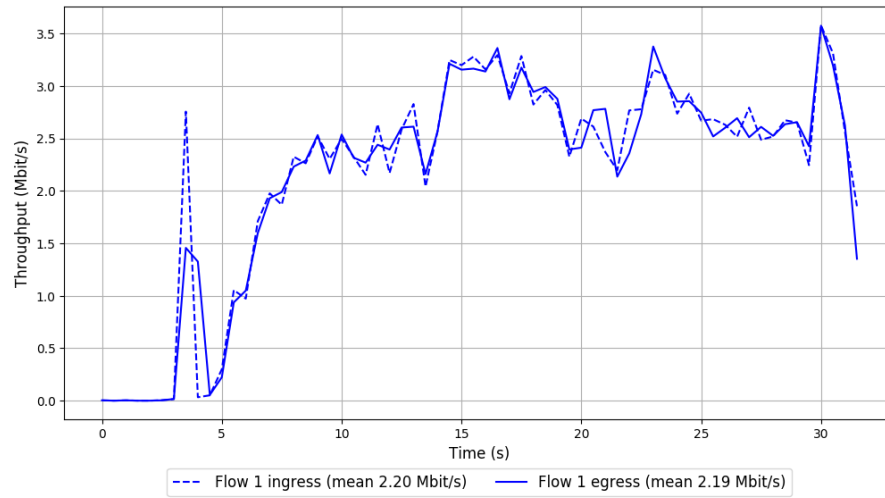
-- Flow 1:

Average throughput: 2.19 Mbit/s

95th percentile per-packet one-way delay: 63.715 ms

Loss rate: 0.56%

Run 8: Report of WebRTC media — Data Link



Run 9: Statistics of WebRTC media

Start at: 2017-08-17 05:52:58

End at: 2017-08-17 05:53:28

Below is generated by plot.py at 2017-08-17 09:00:12

Datalink statistics

-- Total of 1 flow:

Average throughput: 2.17 Mbit/s

95th percentile per-packet one-way delay: 61.877 ms

Loss rate: 0.66%

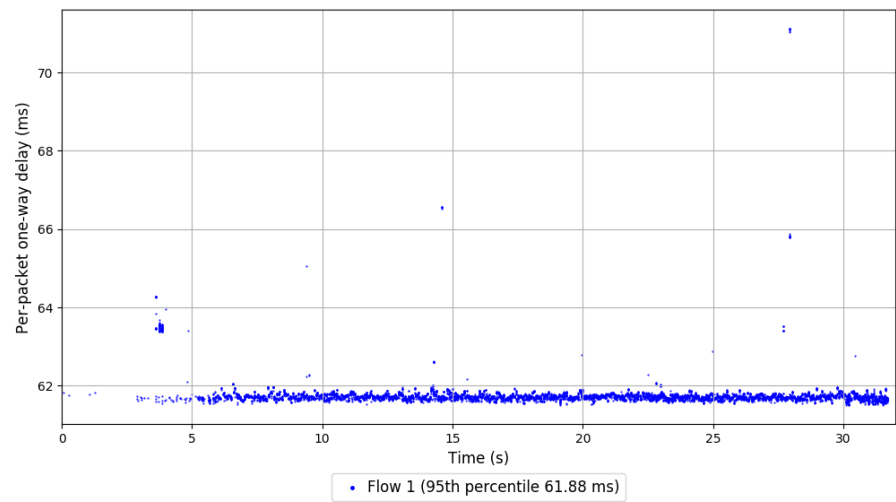
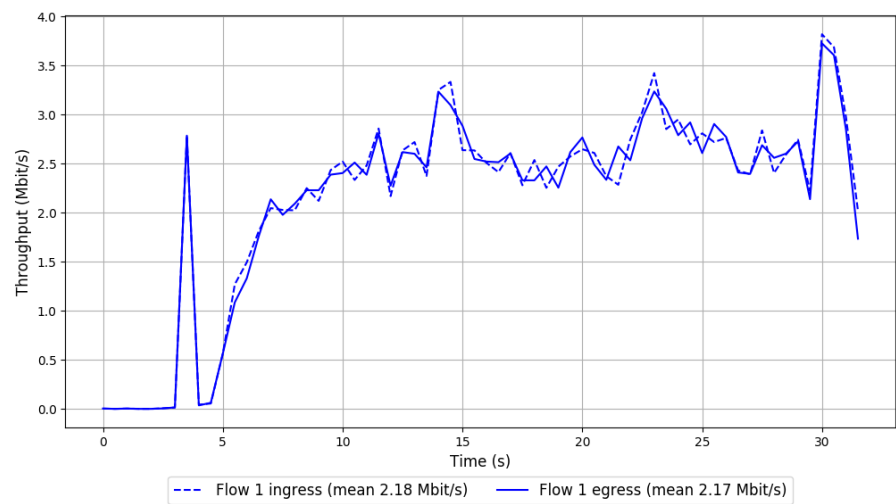
-- Flow 1:

Average throughput: 2.17 Mbit/s

95th percentile per-packet one-way delay: 61.877 ms

Loss rate: 0.66%

Run 9: Report of WebRTC media — Data Link



Run 10: Statistics of WebRTC media

Start at: 2017-08-17 06:03:50

End at: 2017-08-17 06:04:20

Run 10: Report of WebRTC media — Data Link

